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# **Contents**

1.1 apk-tools 2.12.7-r3
1.1.1 Available under license
1.2 balanced-match 1.0.2
1.2.1 Available under license
1.3 brace-expansion 1.1.11
1.3.1 Available under license
1.4 graphql 16.5.0
1.4.1 Available under license
1.5 uri-js 4.4.1
1.5.1 Available under license
1.6 busybox 1.34.1-r7
1.6.1 Available under license
1.7 open62541 v1.1 dev-280-gff87c287
1.7.1 Available under license
1.8 skalibs 2.11.0.0-r0
1.8.1 Available under license
1.9 ip-regex 2.1.0
1.9.1 Available under license
1.10 glob 7.2.3
1.10.1 Available under license
1.11 popsicle-transport-http 1.2.1
1.11.1 Available under license
1.12 cross-fetch 3.1.5
1.12.1 Available under license
1.13 cron 2.1.0

1.13.1 Available under license

1.31.1 Available under license 1.32 ajv 8.11.0 1.32.1 Available under license 1.33 graceful-fs 4.2.10

1.33.1 Available under license
1.34 types-tough-cookie 2.3.8
1.34.1 Available under license
1.35 psl 1.9.0
1.35.1 Available under license
1.36 minizip 1.01
1.36.1 Available under license
1.37 whatwg-url 5.0.0
1.37.1 Available under license
1.38 popsicle-redirects 1.1.1
1.38.1 Available under license
1.39 fast-deep-equal 3.1.3
1.39.1 Available under license
1.40 popsicle-transport-xhr 2.0.0
1.40.1 Available under license
1.41 lowdb 1.0.0
1.41.1 Available under license
1.42 open62541 v1.2.3 dev-280-gff87c287
1.42.1 Available under license
1.43 duktape 2.5.0
1.43 duktape 2.5.0 1.43.1 Available under license
1.43 duktape 2.5.0 1.43.1 Available under license 1.44 inflight 1.0.6
<ul><li>1.43 duktape 2.5.0</li><li>1.43.1 Available under license</li><li>1.44 inflight 1.0.6</li><li>1.45 punycode 2.1.1</li></ul>
<ul> <li>1.43 duktape 2.5.0</li> <li>1.43.1 Available under license</li> <li>1.44 inflight 1.0.6</li> <li>1.45 punycode 2.1.1</li> <li>1.45.1 Available under license</li> </ul>
<ul> <li>1.43 duktape 2.5.0</li> <li>1.43.1 Available under license</li> <li>1.44 inflight 1.0.6</li> <li>1.45 punycode 2.1.1</li> <li>1.45.1 Available under license</li> <li>1.46 node-gyp-build 4.5.0</li> </ul>
<ul> <li>1.43 duktape 2.5.0 <ul><li>1.43.1 Available under license</li></ul> </li> <li>1.44 inflight 1.0.6</li> <li>1.45 punycode 2.1.1 <ul><li>1.45.1 Available under license</li></ul> </li> <li>1.46 node-gyp-build 4.5.0 <ul><li>1.46.1 Available under license</li></ul> </li> </ul>
<ul> <li>1.43 duktape 2.5.0 <ul><li>1.43.1 Available under license</li></ul> </li> <li>1.44 inflight 1.0.6</li> <li>1.45 punycode 2.1.1 <ul><li>1.45.1 Available under license</li></ul> </li> <li>1.46 node-gyp-build 4.5.0 <ul><li>1.46.1 Available under license</li></ul> </li> <li>1.47 throwback 4.1.0</li></ul>
<ul> <li>1.43 duktape 2.5.0 <ul><li>1.43.1 Available under license</li></ul> </li> <li>1.44 inflight 1.0.6</li> <li>1.45 punycode 2.1.1 <ul><li>1.45.1 Available under license</li></ul> </li> <li>1.46 node-gyp-build 4.5.0 <ul><li>1.46.1 Available under license</li></ul> </li> <li>1.47 throwback 4.1.0 <ul><li>1.47.1 Available under license</li></ul> </li> </ul>
1.43 duktape 2.5.0 1.43.1 Available under license 1.44 inflight 1.0.6 1.45 punycode 2.1.1 1.45.1 Available under license 1.46 node-gyp-build 4.5.0 1.46.1 Available under license 1.47 throwback 4.1.0 1.47.1 Available under license 1.48 minizip 1.1
<ul> <li>1.43 duktape 2.5.0 <ul> <li>1.43.1 Available under license</li> </ul> </li> <li>1.44 inflight 1.0.6</li> <li>1.45 punycode 2.1.1 <ul> <li>1.45.1 Available under license</li> </ul> </li> <li>1.46 node-gyp-build 4.5.0 <ul> <li>1.46.1 Available under license</li> </ul> </li> <li>1.47 throwback 4.1.0 <ul> <li>1.47.1 Available under license</li> </ul> </li> <li>1.48 minizip 1.1 <ul> <li>1.48.1 Available under license</li> </ul> </li> </ul>
1.43 duktape 2.5.0 1.43.1 Available under license 1.44 inflight 1.0.6 1.45 punycode 2.1.1 1.45.1 Available under license 1.46 node-gyp-build 4.5.0 1.46.1 Available under license 1.47 throwback 4.1.0 1.47.1 Available under license 1.48 minizip 1.1 1.48.1 Available under license 1.49 make-error 1.3.6
1.43 duktape 2.5.0  1.43.1 Available under license 1.44 inflight 1.0.6 1.45 punycode 2.1.1  1.45.1 Available under license 1.46 node-gyp-build 4.5.0  1.46.1 Available under license 1.47 throwback 4.1.0  1.47.1 Available under license 1.48 minizip 1.1  1.48.1 Available under license 1.49 make-error 1.3.6  1.49.1 Available under license
1.43 duktape 2.5.0 1.43.1 Available under license 1.44 inflight 1.0.6 1.45 punycode 2.1.1 1.45.1 Available under license 1.46 node-gyp-build 4.5.0 1.46.1 Available under license 1.47 throwback 4.1.0 1.47.1 Available under license 1.48 minizip 1.1 1.48.1 Available under license 1.49 make-error 1.3.6

1.51.1 Available under license

1.51 utf-8-validate 5.0.9

1.53.1 Available under license
1.54 byte-length 1.0.2
1.54.1 Available under license
1.55 pax-utils 1.3.3-r0
1.55.1 Available under license
1.56 require-from-string 2.0.2
1.56.1 Available under license
1.57 libmodbus 3.1.6
1.57.1 Available under license
1.58 attr 2.5.1-r1
1.58.1 Available under license
1.59 node-fetch 2.6.7
1.59.1 Available under license
1.60 popsicle-cookie 1.0.0
1.60.1 Available under license
1.61 log-rotate 3.18.1-r4
1.61.1 Available under license
1.62 mime-types 2.1.35
1.62.1 Available under license
1.63 minimatch 3.1.2
1.63.1 Available under license
1.64 client-oauth2 4.3.3
1.64.1 Available under license 1.65 zlib 1.2.12-r3
1.65.1 Available under license
1.66 coreutils 9.0-r2
1.66.1 Available under license
1.67 mime-db 1.52.0
1.67.1 Available under license
1.68 asynckit 0.4.0
1.68.1 Available under license
1.69 acl 2.2.53-r0
1.69.1 Available under license
1.70 delayed-stream 1.0.0
1.70.1 Available under license

1.73 rapidjson 1.1.0
1.73.1 Available under license
1.74 types-vscode 1.69.0
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1.80.1 Available under license
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1.81.1 Available under license
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1.82.1 Available under license
1.83 path-is-absolute 1.0.1
1.84 alpine-baselayout 3.2.0-r18
1.84.1 Available under license
1.85 openssl 1.1.1t
1.85.1 Available under license
1.86 types/vscode 1.43.0
1.86.1 Available under license
1.87 webidl-conversions 3.0.1
1.87.1 Available under license
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1.88.1 Available under license
1.89 graphql-request 4.3.0
1.89.1 Available under license
1.90 tr46 0.0.3
1.90.1 Available under license
1.91 s6 2.11.0.0-r0
1.91.1 Available under license
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1.92.1 Available under license

# 1.93 cpp-httplib 0.7.8

1.93.1 Available under license

# 1.94 libretls 3.3.4-r3

1.94.1 Available under license

# 1.95 coreutils 9.0-r2

1.95.1 Available under license

# 1.96 libatomic 10.3.1\_git20211027-r0

1.96.1 Available under license

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1.97.1 Available under license

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1.98.1 Available under license

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1.100.1 Available under license

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1.101.1 Available under license

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1.102.1 Available under license

# 1.103 node-watch 0.7.3

1.103.1 Available under license

# 1.104 popsicle-content-encoding 1.0.0

1.104.1 Available under license

# 1.105 safe-buffer 5.2.1

1.105.1 Available under license

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# 1.7 open62541 v1.1 dev-280-gff87c287

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```
<opc:TypeDictionary xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"</pre>
xmlns:tns="http://opcfoundation.org/UA/POWERLINK/" DefaultByteOrder="LittleEndian"
xmlns:opc="http://opcfoundation.org/BinarySchema/" xmlns:ua="http://opcfoundation.org/UA/"
TargetNamespace="http://opcfoundation.org/UA/POWERLINK/">
 <opc:Import Namespace="http://opcfoundation.org/UA/"/>
 <opc:StructuredType BaseType="ua:ExtensionObject" Name="ErrorRegisterBits">
   <opc:Documentation>Represents the values of the POWERLINK ErrorRegister </opc:Documentation>
   <opc:Field TypeName="opc:ByteString" Name="Value"/>
   <opc:Field TypeName="opc:ByteString" Name="ValidBits"/>
 </opc:StructuredType>
 <opc:StructuredType BaseType="ua:ExtensionObject" Name="PowerlinkAttribute">
   <opc:Documentation>Represents the POWERLINK entry attributes/opc:Documentation>
   <opc:Field TypeName="opc:ByteString" Name="Value"/>
   <opc:Field TypeName="opc:ByteString" Name="ValidBits"/>
 </opc:StructuredType>
 <opc:StructuredType BaseType="ua:ExtensionObject" Name="PowerlinkErrorEntryDataType">
   <opc:Documentation>Represents the entries of the POWERLINK Object ERR_History_ADOM (Object 1003h,
SubIndex 1..254)</opc:Documentation>
   <opc:Field TypeName="opc:UInt16" Name="entryType"/>
   <opc:Field TypeName="opc:UInt16" Name="errorCode"/>
   <opc:Field TypeName="opc:UInt64" Name="timeStamp"/>
   <opc:Field TypeName="opc:UInt64" Name="additionalInformation"/>
 </opc:StructuredType>
 <opc:StructuredType BaseType="ua:ExtensionObject" Name="PowerlinkIpAddressDataType">
   <opc:Documentation>Structure DataType PowerlinkIpAddressDataType to represent POWERLINK Objects of
the POWERLINK data type IP_ADDRESS</opc:Documentation>
   <opc:Field TypeName="opc:Byte" Name="b1"/>
   <opc:Field TypeName="opc:Byte" Name="b2"/>
   <opc:Field TypeName="opc:Byte" Name="b3"/>
   <opc:Field TypeName="opc:Byte" Name="b4"/>
 </opc:StructuredType>
 <opc:StructuredType BaseType="ua:ExtensionObject" Name="PowerlinkPDOMappingEntryDataType">
   <opc:Documentation>Structure DataType PowerlinkPDOMappingEntryDataType to represent the entries of
POWERLINK Objects like PDO_RxCommParam_00h_REC</opc:Documentation>
   <opc:Field TypeName="opc:UInt16" Name="length"/>
   <opc:Field TypeName="opc:UInt16" Name="offset"/>
```

```
<opc:Field TypeName="opc:Byte" Name="reserved"/>
   <opc:Field TypeName="opc:Byte" Name="subIndex"/>
   <opc:Field TypeName="opc:UInt16" Name="index"/>
 </opc:StructuredType>
 <opc:EnumeratedType LengthInBits="32" Name="PowerlinkNMTResetCmdEnumeration">
   <opc:Documentation>This DataType is an Enumeration that represents the NMT reset commands for
POWERLINK</opc:Documentation>
   <opc:EnumeratedValue Name="NMTResetNode" Value="40"/>
   <opc:EnumeratedValue Name="NMTResetCommunication" Value="41"/>
   <opc:EnumeratedValue Name="NMTResetConfiguration" Value="42"/>
   <opc:EnumeratedValue Name="NMTSwReset" Value="43"/>
   <opc:EnumeratedValue Name="NMTInvalidService" Value="255"/>
 </opc:EnumeratedType>
 <opc:EnumeratedType LengthInBits="32" Name="PowerlinkNMTStateEnumeration">
   <opc:Documentation>This DataType is an enumeration that represents the NMT State/opc:Documentation>
   <opc:EnumeratedValue Name="NMT GS OFF " Value="0"/>
   <opc:EnumeratedValue Name="NMT_GS_INITIALISING" Value="25"/>
   <opc:EnumeratedValue Name="NMT GS RESET APPLICATION" Value="41"/>
   <opc:EnumeratedValue Name="NMT_GS_RESET_COMMUNICATION" Value="57"/>
   <opc:EnumeratedValue Name="NMT_GS_RESET_CONFIGURATION" Value="121"/>
   <opc:EnumeratedValue Name="NMT XS NOT ACTIVE" Value="28"/>
   <opc:EnumeratedValue Name="NMT_XS_PRE_OPERATIONAL_1" Value="29"/>
   <opc:EnumeratedValue Name="NMT_XS_PRE_OPERATIONAL_2" Value="93"/>
   <opc:EnumeratedValue Name="NMT_XS_READY_TO_OPERATE" Value="109"/>
   <opc:EnumeratedValue Name="NMT_XS_OPERATIONAL" Value="253"/>
   <opc:EnumeratedValue Name="NMT CS STOPPED" Value="77"/>
   <opc:EnumeratedValue Name="NMT_XS_BASIC_ETHERNET" Value="30"/>
 </opc:EnumeratedType>
</opc:TypeDictionary>
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 <opc:Field Name="x" TypeName="opc:Double" />
 <opc:Field Name="y" TypeName="opc:Double" />
 <opc:Field Name="point1" TypeName="tns:Point" />
</opc:StructuredType>
 <opc:StructuredType Name="PointWithArray" BaseType="ua:ExtensionObject">
 <opc:Field Name="x" TypeName="opc:Double" />
 <opc:Field Name="y" TypeName="opc:Double" />
 <opc:Field Name="z" TypeName="opc:Double" />
 <opc:Field Name="array1Size" TypeName="opc:UInt32" />
 <opc:Field Name="array1" TypeName="opc:Double" LengthField="array1Size" />
</opc:StructuredType>
</opc:TypeDictionary>
```

```
<?xml version="1.0" encoding="utf-8" ?>
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-->
<opc:TypeDictionary
xmlns:opc="http://opcfoundation.org/BinarySchema/"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:ua="http://opcfoundation.org/UA/"
xmlns:tns="http://yourorganisation.org/test/"
DefaultByteOrder="LittleEndian"
TargetNamespace="http://yourorganisation.org/test/"
<opc:Import Namespace="http://opcfoundation.org/UA/" Location="Opc.Ua.BinarySchema.bsd"/>
<opc:StructuredType Name="Point" BaseType="ua:ExtensionObject">
 <opc:Field Name="x" TypeName="opc:Double" />
 <opc:Field Name="y" TypeName="opc:Double" />
</opc:StructuredType>
<opc:StructuredType Name="NestedPoint" BaseType="ua:ExtensionObject">
 <opc:Field Name="x" TypeName="opc:Double" />
 <opc:Field Name="y" TypeName="opc:Double" />
```

```
<opc:Field Name="point1" TypeName="tns:Point" />
</opc:StructuredType>
 <opc:StructuredType Name="PointWithArray" BaseType="ua:ExtensionObject">
 <opc:Field Name="x" TypeName="opc:Double" />
 <opc:Field Name="y" TypeName="opc:Double" />
 <opc:Field Name="z" TypeName="opc:Double" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="array1" TypeName="opc:Double" LengthField="NoOfArrayDimensions" />
</opc:StructuredType>
<opc:StructuredType Name="PointWithPointArray" BaseType="ua:ExtensionObject">
 <opc:Field Name="x" TypeName="opc:Double" />
 <opc:Field Name="y" TypeName="opc:Double" />
 <opc:Field Name="z" TypeName="opc:Double" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="array1" TypeName="tns:Point" LengthField="NoOfArrayDimensions" />
</opc:StructuredType>
</opc:TypeDictionary>
<?xml version="1.0" encoding="utf-8" ?>
<!--
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```

Open Source Used In Edge Intelligence Edge\_1.10.2 48

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-->
```

```
<opc:TypeDictionary</pre>
xmlns:opc="http://opcfoundation.org/BinarySchema/"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:ua="http://opcfoundation.org/UA/"
xmlns:tns="http://opcfoundation.org/UA/"
DefaultByteOrder="LittleEndian"
TargetNamespace="http://opcfoundation.org/UA/"
<opc:Import Namespace="http://opcfoundation.org/BinarySchema/" />
<opc:StructuredType Name="XmlElement">
 <opc:Documentation>An XML element encoded as a UTF-8 string./opc:Documentation>
 <opc:Field Name="Length" TypeName="opc:Int32" />
 <opc:Field Name="Value" TypeName="opc:Char" LengthField="Length" />
</opc:StructuredType>
<opc:EnumeratedType Name="NodeIdType" LengthInBits="6">
 <opc:Documentation>The possible encodings for a NodeId value.
 <opc:EnumeratedValue Name="TwoByte" Value="0" />
 <opc:EnumeratedValue Name="FourByte" Value="1" />
 <opc:EnumeratedValue Name="Numeric" Value="2" />
 <opc:EnumeratedValue Name="String" Value="3" />
 <opc:EnumeratedValue Name="Guid" Value="4" />
 <opc:EnumeratedValue Name="ByteString" Value="5" />
</opc:EnumeratedType>
<opc:StructuredType Name="TwoByteNodeId">
 <opc:Field Name="Identifier" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="FourByteNodeId">
 <opc:Field Name="NamespaceIndex" TypeName="opc:Byte" />
 <opc:Field Name="Identifier" TypeName="opc:UInt16" />
</opc:StructuredType>
<opc:StructuredType Name="NumericNodeId">
 <opc:Field Name="NamespaceIndex" TypeName="opc:UInt16" />
 <opc:Field Name="Identifier" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="StringNodeId">
 <opc:Field Name="NamespaceIndex" TypeName="opc:UInt16" />
 <opc:Field Name="Identifier" TypeName="opc:CharArray" />
</opc:StructuredType>
```

```
<opc:StructuredType Name="GuidNodeId">
 <opc:Field Name="NamespaceIndex" TypeName="opc:UInt16" />
 <opc:Field Name="Identifier" TypeName="opc:Guid" />
</opc:StructuredType>
<opc:StructuredType Name="ByteStringNodeId">
 <opc:Field Name="NamespaceIndex" TypeName="opc:UInt16" />
 <opc:Field Name="Identifier" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:StructuredType Name="NodeId">
 <opc:Documentation>An identifier for a node in a UA server address space.
 <opc:Field Name="NodeIdType" TypeName="ua:NodeIdType" />
 <opc:Field Name="Reserved1" TypeName="opc:Bit" Length="2" />
 <opc:Field Name="TwoByte" TypeName="ua:TwoByteNodeId" SwitchField="NodeIdType" SwitchValue="0" />
 <opc:Field Name="FourByte" TypeName="ua:FourByteNodeId" SwitchField="NodeIdType" SwitchValue="1"</pre>
 <opc:Field Name="Numeric" TypeName="ua:NumericNodeId" SwitchField="NodeIdType" SwitchValue="2" />
 <opc:Field Name="String" TypeName="ua:StringNodeId" SwitchField="NodeIdType" SwitchValue="3" />
 <opc:Field Name="Guid" TypeName="ua:GuidNodeId" SwitchField="NodeIdType" SwitchValue="4" />
 <opc:Field Name="ByteString" TypeName="ua:ByteStringNodeId" SwitchField="NodeIdType"</pre>
SwitchValue="5" />
</opc:StructuredType>
<opc:StructuredType Name="ExpandedNodeId">
 <opc:Documentation>An identifier for a node in a UA server address space qualified with a complete namespace
string.</opc:Documentation>
 <opc:Field Name="NodeIdType" TypeName="ua:NodeIdType" />
 <opc:Field Name="ServerIndexSpecified" TypeName="opc:Bit" />
 <opc:Field Name="NamespaceURISpecified" TypeName="opc:Bit" />
 <opc:Field Name="TwoByte" TypeName="ua:TwoByteNodeId" SwitchField="NodeIdType" SwitchValue="0" />
 <opc:Field Name="FourByte" TypeName="ua:FourByteNodeId" SwitchField="NodeIdType" SwitchValue="1"</pre>
 <opc:Field Name="Numeric" TypeName="ua:NumericNodeId" SwitchField="NodeIdType" SwitchValue="2" />
 <opc:Field Name="String" TypeName="ua:StringNodeId" SwitchField="NodeIdType" SwitchValue="3" />
 <opc:Field Name="Guid" TypeName="ua:GuidNodeId" SwitchField="NodeIdType" SwitchValue="4" />
 <opc:Field Name="ByteString" TypeName="ua:ByteStringNodeId" SwitchField="NodeIdType"</pre>
SwitchValue="5" />
 <opc:Field Name="NamespaceURI" TypeName="opc:CharArray" SwitchField="NamespaceURISpecified"/>
 <opc:Field Name="ServerIndex" TypeName="opc:UInt32" SwitchField="ServerIndexSpecified"/>
</opc:StructuredType>
<opc:OpaqueType Name="StatusCode" LengthInBits="32" ByteOrderSignificant="true">
 <opc:Documentation>A 32-bit status code value./opc:Documentation>
</opc:OpaqueType>
<opc:StructuredType Name="DiagnosticInfo">
 <opc:Documentation>A recursive structure containing diagnostic information associated with a status
```

```
code.</opc:Documentation>
 <opc:Field Name="SymbolicIdSpecified" TypeName="opc:Bit" />
 <opc:Field Name="NamespaceURISpecified" TypeName="opc:Bit" />
 <opc:Field Name="LocaleSpecified" TypeName="opc:Bit" />
 <opc:Field Name="LocalizedTextSpecified" TypeName="opc:Bit" />
 <opc:Field Name="AdditionalInfoSpecified" TypeName="opc:Bit" />
 <opc:Field Name="InnerStatusCodeSpecified" TypeName="opc:Bit" />
 <opc:Field Name="InnerDiagnosticInfoSpecified" TypeName="opc:Bit" />
 <opc:Field Name="Reserved1" TypeName="opc:Bit" Length="2" />
 <opc:Field Name="SymbolicId" TypeName="opc:Int32" SwitchField="SymbolicIdSpecified" />
 <opc:Field Name="NamespaceURI" TypeName="opc:Int32" SwitchField="NamespaceURISpecified" />
 <opc:Field Name="Locale" TypeName="opc:Int32" SwitchField="LocaleSpecified" />
 <opc:Field Name="LocalizedText" TypeName="opc:Int32" SwitchField="LocalizedTextSpecified" />
 <opc:Field Name="AdditionalInfo" TypeName="opc:CharArray" SwitchField="AdditionalInfoSpecified" />
 <opc:Field Name="InnerStatusCode" TypeName="ua:StatusCode" SwitchField="InnerStatusCodeSpecified" />
 <opc:Field Name="InnerDiagnosticInfo" TypeName="ua:DiagnosticInfo"</pre>
SwitchField="InnerDiagnosticInfoSpecified" />
</opc:StructuredType>
<opc:StructuredType Name="QualifiedName">
 <opc:Documentation>A string qualified with a namespace index./opc:Documentation>
 <opc:Field Name="NamespaceIndex" TypeName="opc:UInt16" />
 <opc:Field Name="Name" TypeName="opc:CharArray" />
</opc:StructuredType>
<opc:StructuredType Name="LocalizedText">
 <opc:Documentation>A string qualified with a namespace index.</opc:Documentation>
 <opc:Field Name="LocaleSpecified" TypeName="opc:Bit" />
 <opc:Field Name="TextSpecified" TypeName="opc:Bit" />
 <opc:Field Name="Reserved1" TypeName="opc:Bit" Length="6" />
 <opc:Field Name="Locale" TypeName="opc:CharArray" SwitchField="LocaleSpecified" />
 <opc:Field Name="Text" TypeName="opc:CharArray" SwitchField="TextSpecified" />
</opc:StructuredType>
<opc:StructuredType Name="DataValue">
 <opc:Documentation>A value with an associated timestamp, and quality.</opc:Documentation>
 <opc:Field Name="ValueSpecified" TypeName="opc:Bit" />
 <opc:Field Name="StatusCodeSpecified" TypeName="opc:Bit" />
 <opc:Field Name="SourceTimestampSpecified" TypeName="opc:Bit" />
 <opc:Field Name="SourcePicosecondsSpecified" TypeName="opc:Bit" />
 <opc:Field Name="ServerTimestampSpecified" TypeName="opc:Bit" />
 <opc:Field Name="ServerPicosecondsSpecified" TypeName="opc:Bit" />
 <opc:Field Name="Reserved1" TypeName="opc:Bit" Length="2" />
 <opc:Field Name="Value" TypeName="ua:Variant" SwitchField="ValueSpecified" />
 <opc:Field Name="StatusCode" TypeName="ua:StatusCode" SwitchField="StatusCodeSpecified" />
 <opc:Field Name="SourceTimestamp" TypeName="opc:DateTime" SwitchField="SourceTimestampSpecified" />
 <opc:Field Name="SourcePicoseconds" TypeName="opc:UInt16" SwitchField="SourcePicosecondsSpecified" />
 <opc:Field Name="ServerTimestamp" TypeName="opc:DateTime" SwitchField="ServerTimestampSpecified" />
```

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<opc:Field Name="ServerPicoseconds" TypeName="opc:UInt16" SwitchField="ServerPicosecondsSpecified" />
</opc:StructuredType>
<opc:StructuredType Name="ExtensionObject">
  <opc:Documentation>A serialized object prefixed with its data type identifier.</opc:Documentation>
  <opc:Field Name="TypeIdSpecified" TypeName="opc:Bit" />
  <opc:Field Name="BinaryBody" TypeName="opc:Bit" />
  <opc:Field Name="XmlBody" TypeName="opc:Bit" />
  <opc:Field Name="Reserved1" TypeName="opc:Bit" Length="5" />
  <opc:Field Name="TypeId" TypeName="ua:ExpandedNodeId" SwitchField="TypeIdSpecified" />
 <opc:Field Name="BodyLength" TypeName="opc:Int32" />
  <opc:Field Name="Body" TypeName="opc:Byte" LengthField="BodyLength" />
</opc:StructuredType>
<opc:StructuredType Name="Variant">
 <opc:Documentation>A union of several types./opc:Documentation>
 <opc:Field Name="VariantType" TypeName="opc:Bit" Length="6" />
  <opc:Field Name="ArrayDimensionsSpecified" TypeName="opc:Bit" Length="1"/>
  <opc:Field Name="ArrayLengthSpecified" TypeName="opc:Bit" Length="1"/>
 <opc:Field Name="ArrayLength" TypeName="opc:Int32" SwitchField="ArrayLengthSpecified" />
  <opc:Field Name="Boolean" TypeName="opc:Boolean" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="1" />
  <opc:Field Name="SByte" TypeName="opc:SByte" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="2" />
  <opc:Field Name="Byte" TypeName="opc:Byte" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="3"/>
  <opc:Field Name="Int16" TypeName="opc:Int16" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="4" />
  <opc:Field Name="UInt16" TypeName="opc:UInt16" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="5" />
  <opc:Field Name="Int32" TypeName="opc:Int32" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="6" />
  <opc:Field Name="UInt32" TypeName="opc:UInt32" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="7" />
  <opc:Field Name="Int64" TypeName="opc:Int64" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="8" />
  <opc:Field Name="UInt64" TypeName="opc:UInt64" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="9" />
  <opc:Field Name="Float" TypeName="opc:Float" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="10" />
  <opc:Field Name="Double" TypeName="opc:Double" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="11" />
  <opc:Field Name="String" TypeName="opc:CharArray" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="12" />
  <opc:Field Name="DateTime" TypeName="opc:DateTime" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="13" />
  <opc:Field Name="Guid" TypeName="opc:Guid" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="14"/>
```

```
<opc:Field Name="ByteString" TypeName="opc:ByteString" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="15" />
  <opc:Field Name="XmlElement" TypeName="ua:XmlElement" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="16" />
  <opc:Field Name="NodeId" TypeName="ua:NodeId" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="17" />
  <opc:Field Name="ExpandedNodeId" TypeName="ua:ExpandedNodeId" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="18" />
  <opc:Field Name="StatusCode" TypeName="ua:StatusCode" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="19" />
  <opc:Field Name="QualifiedName" TypeName="ua:QualifiedName" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="20" />
  <opc:Field Name="LocalizedText" TypeName="ua:LocalizedText" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="21" />
  <opc:Field Name="ExtensionObject" TypeName="ua:ExtensionObject" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="22" />
  <opc:Field Name="DataValue" TypeName="ua:DataValue" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="23" />
  <opc:Field Name="Variant" TypeName="ua:Variant" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="24" />
  <opc:Field Name="DiagnosticInfo" TypeName="ua:DiagnosticInfo" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="25" />
  <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" SwitchField="ArrayDimensionsSpecified"</pre>
  <opc:Field Name="ArrayDimensions" TypeName="opc:Int32" LengthField="NoOfArrayDimensions"</pre>
SwitchField="ArrayDimensionsSpecified" />
</opc:StructuredType>
<opc:EnumeratedType Name="NamingRuleType" LengthInBits="32">
 <opc:EnumeratedValue Name="Mandatory" Value="1" />
 <opc:EnumeratedValue Name="Optional" Value="2" />
 <opc:EnumeratedValue Name="Constraint" Value="3" />
</opc:EnumeratedType>
<opc:OpaqueType Name="ImageBMP">
 <opc:Documentation>An image encoded in BMP format./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="ImageGIF">
 <opc:Documentation>An image encoded in GIF format./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="ImageJPG">
 <opc:Documentation>An image encoded in JPEG format./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="ImagePNG">
```

```
<opc:Documentation>An image encoded in PNG format.
</opc:OpaqueType>
<opc:OpaqueType Name="AudioDataType">
 <opc:Documentation>An image encoded in PNG format./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="BitFieldMaskDataType">
 <opc:Documentation>A mask of 32 bits that can be updated individually by using the top 32 bits as a
mask.</opc:Documentation>
</opc:OpaqueType>
<opc:StructuredType Name="KeyValuePair" BaseType="ua:ExtensionObject">
 <opc:Field Name="Key" TypeName="ua:QualifiedName" />
 <opc:Field Name="Value" TypeName="ua:Variant" />
</opc:StructuredType>
<opc:StructuredType Name="EndpointType" BaseType="ua:ExtensionObject">
 <opc:Field Name="EndpointUrl" TypeName="opc:String" />
 <opc:Field Name="SecurityMode" TypeName="tns:MessageSecurityMode" />
 <opc:Field Name="SecurityPolicyUri" TypeName="opc:String" />
 <opc:Field Name="TransportProfileUri" TypeName="opc:String" />
</opc:StructuredType>
<opc:EnumeratedType Name="OpenFileMode" LengthInBits="32">
 <opc:EnumeratedValue Name="Read" Value="1" />
 <opc:EnumeratedValue Name="Write" Value="2" />
 <opc:EnumeratedValue Name="EraseExisting" Value="4" />
 <opc:EnumeratedValue Name="Append" Value="8" />
</opc:EnumeratedType>
<opc:EnumeratedType Name="IdentityCriteriaType" LengthInBits="32">
 <opc:EnumeratedValue Name="UserName" Value="1" />
 <opc:EnumeratedValue Name="Thumbprint" Value="2" />
 <opc:EnumeratedValue Name="Role" Value="3" />
 <opc:EnumeratedValue Name="GroupId" Value="4" />
 <opc:EnumeratedValue Name="Anonymous" Value="5" />
 <opc:EnumeratedValue Name="AuthenticatedUser" Value="6" />
</opc:EnumeratedType>
<opc:StructuredType Name="IdentityMappingRuleType" BaseType="ua:ExtensionObject">
 <opc:Field Name="CriteriaType" TypeName="tns:IdentityCriteriaType" />
 <opc:Field Name="Criteria" TypeName="opc:String" />
</opc:StructuredType>
<opc:EnumeratedType Name="TrustListMasks" LengthInBits="32">
 <opc:EnumeratedValue Name="None" Value="0" />
 <opc:EnumeratedValue Name="TrustedCertificates" Value="1" />
```

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<opc:EnumeratedValue Name="TrustedCrls" Value="2" />
 <opc:EnumeratedValue Name="IssuerCertificates" Value="4" />
 <opc:EnumeratedValue Name="IssuerCrls" Value="8" />
 <opc:EnumeratedValue Name="All" Value="15" />
</opc:EnumeratedType>
<opc:StructuredType Name="TrustListDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="SpecifiedLists" TypeName="opc:UInt32" />
 <opc:Field Name="NoOfTrustedCertificates" TypeName="opc:Int32" />
 <opc:Field Name="TrustedCertificates" TypeName="opc:ByteString" LengthField="NoOfTrustedCertificates" />
 <opc:Field Name="NoOfTrustedCrls" TypeName="opc:Int32" />
 <opc:Field Name="TrustedCrls" TypeName="opc:ByteString" LengthField="NoOfTrustedCrls" />
 <opc:Field Name="NoOfIssuerCertificates" TypeName="opc:Int32" />
 <opc:Field Name="IssuerCertificates" TypeName="opc:ByteString" LengthField="NoOfIssuerCertificates" />
 <opc:Field Name="NoOfIssuerCrls" TypeName="opc:Int32" />
 <opc:Field Name="IssuerCrls" TypeName="opc:ByteString" LengthField="NoOfIssuerCrls" />
</opc:StructuredType>
<opc:StructuredType Name="DecimalDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="Scale" TypeName="opc:Int16" />
 <opc:Field Name="Value" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:StructuredType Name="DataTypeSchemaHeader" BaseType="ua:ExtensionObject">
 <opc:Field Name="NoOfNamespaces" TypeName="opc:Int32" />
 <opc:Field Name="Namespaces" TypeName="opc:String" LengthField="NoOfNamespaces" />
 <opc:Field Name="NoOfStructureDataTypes" TypeName="opc:Int32" />
 <opc:Field Name="StructureDataTypes" TypeName="tns:StructureDescription"</pre>
LengthField="NoOfStructureDataTypes" />
 <opc:Field Name="NoOfEnumDataTypes" TypeName="opc:Int32" />
 <opc:Field Name="EnumDataTypes" TypeName="tns:EnumDescription" LengthField="NoOfEnumDataTypes"</pre>
 <opc:Field Name="NoOfSimpleDataTypes" TypeName="opc:Int32" />
 <opc:Field Name="SimpleDataTypes" TypeName="tns:SimpleTypeDescription"</pre>
LengthField="NoOfSimpleDataTypes" />
</opc:StructuredType>
<opc:StructuredType Name="DataTypeDescription" BaseType="ua:ExtensionObject">
 <opc:Field Name="DataTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="Name" TypeName="ua:QualifiedName" />
</opc:StructuredType>
<opc:StructuredType Name="StructureDescription" BaseType="tns:DataTypeDescription">
 <opc:Field Name="DataTypeId" TypeName="ua:NodeId" SourceType="tns:DataTypeDescription" />
 <opc:Field Name="Name" TypeName="ua:QualifiedName" SourceType="tns:DataTypeDescription" />
 <opc:Field Name="StructureDefinition" TypeName="tns:StructureDefinition" />
</opc:StructuredType>
```

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<opc:StructuredType Name="EnumDescription" BaseType="tns:DataTypeDescription">
 <opc:Field Name="DataTypeId" TypeName="ua:NodeId" SourceType="tns:DataTypeDescription" />
 <opc:Field Name="Name" TypeName="ua:QualifiedName" SourceType="tns:DataTypeDescription" />
 <opc:Field Name="EnumDefinition" TypeName="tns:EnumDefinition" />
 <opc:Field Name="BuiltInType" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="SimpleTypeDescription" BaseType="tns:DataTypeDescription">
 <opc:Field Name="DataTypeId" TypeName="ua:NodeId" SourceType="tns:DataTypeDescription" />
 <opc:Field Name="Name" TypeName="ua:QualifiedName" SourceType="tns:DataTypeDescription" />
 <opc:Field Name="BaseDataType" TypeName="ua:NodeId" />
 <opc:Field Name="BuiltInType" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="UABinaryFileDataType" BaseType="tns:DataTypeSchemaHeader">
 <opc:Field Name="NoOfNamespaces" TypeName="opc:Int32" />
 <opc:Field Name="Namespaces" TypeName="opc:String" LengthField="NoOfNamespaces" />
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LengthField="NoOfStructureDataTypes" />
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 <opc:EnumeratedValue Name="SourcePicoSeconds" Value="8" />
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 <opc:Field Name="SecurityGroupId" TypeName="opc:String" />
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 <opc:Field Name="SecurityKeyServices" TypeName="tns:EndpointDescription"</pre>
LengthField="NoOfSecurityKeyServices" />
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SourceType="tns:PubSubGroupDataType" />
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LengthField="NoOfDataSetReaders" />
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<opc:StructuredType Name="ReaderGroupMessageDataType" BaseType="ua:ExtensionObject">
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<opc:StructuredType Name="DataSetReaderDataType" BaseType="ua:ExtensionObject">
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 <opc:Field Name="DataSetWriterId" TypeName="opc:UInt16" />
 <opc:Field Name="DataSetMetaData" TypeName="tns:DataSetMetaDataType" />
 <opc:Field Name="DataSetFieldContentMask" TypeName="tns:DataSetFieldContentMask" />
 <opc:Field Name="MessageReceiveTimeout" TypeName="opc:Double" />
 <opc:Field Name="KeyFrameCount" TypeName="opc:UInt32" />
 <opc:Field Name="HeaderLayoutUri" TypeName="opc:String" />
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LengthField="NoOfDataSetReaderProperties" />
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 <opc:Field Name="TargetNodeId" TypeName="ua:NodeId" />
 <opc:Field Name="AttributeId" TypeName="opc:UInt32" />
 <opc:Field Name="WriteIndexRange" TypeName="opc:String" />
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 <opc:Field Name="OverrideValue" TypeName="ua:Variant" />
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 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
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 <opc:Field Name="Connections" TypeName="tns:PubSubConnectionDataType"</pre>
LengthField="NoOfConnections" />
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</opc:EnumeratedType>
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 <opc:EnumeratedValue Name="NetworkMessageNumber" Value="16" />
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 <opc:EnumeratedValue Name="PayloadHeader" Value="64" />
 <opc:EnumeratedValue Name="Timestamp" Value="128" />
 <opc:EnumeratedValue Name="PicoSeconds" Value="256" />
 <opc:EnumeratedValue Name="DataSetClassId" Value="512" />
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 <opc:Field Name="DataSetMessageContentMask" TypeName="tns:UadpDataSetMessageContentMask" />
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BaseType="tns:WriterGroupMessageDataType">
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BaseType="tns:DataSetWriterMessageDataType">
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BaseType="tns:DataSetReaderMessageDataType">
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BaseType="tns:ConnectionTransportDataType">
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```
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</opc:StructuredType>
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BaseType="tns:WriterGroupTransportDataType">
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 <opc:Field Name="ResourceUri" TypeName="opc:String" />
 <opc:Field Name="AuthenticationProfileUri" TypeName="opc:String" />
 <opc:Field Name="RequestedDeliveryGuarantee" TypeName="tns:BrokerTransportQualityOfService" />
</opc:StructuredType>
<opc:StructuredType Name="BrokerDataSetWriterTransportDataType"</pre>
BaseType="tns:DataSetWriterTransportDataType">
 <opc:Field Name="QueueName" TypeName="opc:String" />
 <opc:Field Name="ResourceUri" TypeName="opc:String" />
 <opc:Field Name="AuthenticationProfileUri" TypeName="opc:String" />
 <opc:Field Name="RequestedDeliveryGuarantee" TypeName="tns:BrokerTransportQualityOfService" />
 <opc:Field Name="MetaDataQueueName" TypeName="opc:String" />
 <opc:Field Name="MetaDataUpdateTime" TypeName="opc:Double" />
</opc:StructuredType>
<opc:StructuredType Name="BrokerDataSetReaderTransportDataType"</pre>
BaseType="tns:DataSetReaderTransportDataType">
 <opc:Field Name="QueueName" TypeName="opc:String" />
 <opc:Field Name="ResourceUri" TypeName="opc:String" />
 <opc:Field Name="AuthenticationProfileUri" TypeName="opc:String" />
 <opc:Field Name="RequestedDeliveryGuarantee" TypeName="tns:BrokerTransportQualityOfService" />
 <opc:Field Name="MetaDataQueueName" TypeName="opc:String" />
</opc:StructuredType>
<opc:EnumeratedType Name="DiagnosticsLevel" LengthInBits="32">
 <opc:EnumeratedValue Name="Basic" Value="0" />
 <opc:EnumeratedValue Name="Advanced" Value="1" />
 <opc:EnumeratedValue Name="Info" Value="2" />
```

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<opc:EnumeratedValue Name="Log" Value="3" />
 <opc:EnumeratedValue Name="Debug" Value="4" />
</opc:EnumeratedType>
<opc:EnumeratedType Name="PubSubDiagnosticsCounterClassification" LengthInBits="32">
 <opc:EnumeratedValue Name="Information" Value="0" />
 <opc:EnumeratedValue Name="Error" Value="1" />
</opc:EnumeratedType>
<opc:EnumeratedType Name="IdType" LengthInBits="32">
 <opc:Documentation>The type of identifier used in a node id./opc:Documentation>
 <opc:EnumeratedValue Name="Numeric" Value="0" />
 <opc:EnumeratedValue Name="String" Value="1" />
 <opc:EnumeratedValue Name="Guid" Value="2" />
 <opc:EnumeratedValue Name="Opaque" Value="3" />
</opc:EnumeratedType>
<opc:EnumeratedType Name="NodeClass" LengthInBits="32">
 <opc:Documentation>A mask specifying the class of the node./opc:Documentation>
 <opc:EnumeratedValue Name="Unspecified" Value="0" />
 <opc:EnumeratedValue Name="Object" Value="1" />
 <opc:EnumeratedValue Name="Variable" Value="2" />
 <opc:EnumeratedValue Name="Method" Value="4" />
 <opc:EnumeratedValue Name="ObjectType" Value="8" />
 <opc:EnumeratedValue Name="VariableType" Value="16" />
 <opc:EnumeratedValue Name="ReferenceType" Value="32" />
 <opc:EnumeratedValue Name="DataType" Value="64" />
 <opc:EnumeratedValue Name="View" Value="128" />
</opc:EnumeratedType>
<opc:EnumeratedType Name="PermissionType" LengthInBits="32" IsOptionSet="true">
 <opc:EnumeratedValue Name="None" Value="0" />
 <opc:EnumeratedValue Name="Browse" Value="1" />
 <opc:EnumeratedValue Name="ReadRolePermissions" Value="2" />
 <opc:EnumeratedValue Name="WriteAttribute" Value="4" />
 <opc:EnumeratedValue Name="WriteRolePermissions" Value="8" />
 <opc:EnumeratedValue Name="WriteHistorizing" Value="16" />
 <opc:EnumeratedValue Name="Read" Value="32" />
 <opc:EnumeratedValue Name="Write" Value="64" />
 <opc:EnumeratedValue Name="ReadHistory" Value="128" />
 <opc:EnumeratedValue Name="InsertHistory" Value="256" />
 <opc:EnumeratedValue Name="ModifyHistory" Value="512" />
 <opc:EnumeratedValue Name="DeleteHistory" Value="1024" />
 <opc:EnumeratedValue Name="ReceiveEvents" Value="2048" />
 <opc:EnumeratedValue Name="Call" Value="4096" />
 <opc:EnumeratedValue Name="AddReference" Value="8192" />
 <opc:EnumeratedValue Name="RemoveReference" Value="16384" />
 <opc:EnumeratedValue Name="DeleteNode" Value="32768" />
```

```
<opc:EnumeratedValue Name="AddNode" Value="65536" />
</opc:EnumeratedType>
<opc:EnumeratedType Name="AccessLevelType" LengthInBits="8" IsOptionSet="true">
 <opc:EnumeratedValue Name="None" Value="0" />
 <opc:EnumeratedValue Name="CurrentRead" Value="1" />
 <opc:EnumeratedValue Name="CurrentWrite" Value="2" />
 <opc:EnumeratedValue Name="HistoryRead" Value="4" />
 <opc:EnumeratedValue Name="HistoryWrite" Value="8" />
 <opc:EnumeratedValue Name="SemanticChange" Value="16" />
 <opc:EnumeratedValue Name="StatusWrite" Value="32" />
 <opc:EnumeratedValue Name="TimestampWrite" Value="64" />
</opc:EnumeratedType>
<opc:EnumeratedType Name="AccessLevelExType" LengthInBits="32" IsOptionSet="true">
 <opc:EnumeratedValue Name="None" Value="0" />
 <opc:EnumeratedValue Name="CurrentRead" Value="1" />
 <opc:EnumeratedValue Name="CurrentWrite" Value="2" />
 <opc:EnumeratedValue Name="HistoryRead" Value="4" />
 <opc:EnumeratedValue Name="HistoryWrite" Value="8" />
 <opc:EnumeratedValue Name="SemanticChange" Value="16" />
 <opc:EnumeratedValue Name="StatusWrite" Value="32" />
 <opc:EnumeratedValue Name="TimestampWrite" Value="64" />
 <opc:EnumeratedValue Name="NonatomicRead" Value="256" />
 <opc:EnumeratedValue Name="NonatomicWrite" Value="512" />
 <opc:EnumeratedValue Name="WriteFullArrayOnly" Value="1024" />
</opc:EnumeratedType>
<opc:EnumeratedType Name="EventNotifierType" LengthInBits="8" IsOptionSet="true">
 <opc:EnumeratedValue Name="None" Value="0" />
 <opc:EnumeratedValue Name="SubscribeToEvents" Value="1" />
 <opc:EnumeratedValue Name="HistoryRead" Value="4" />
 <opc:EnumeratedValue Name="HistoryWrite" Value="8" />
</opc:EnumeratedType>
<opc:StructuredType Name="RolePermissionType" BaseType="ua:ExtensionObject">
<opc:Field Name="RoleId" TypeName="ua:NodeId" />
 <opc:Field Name="Permissions" TypeName="tns:PermissionType" />
</opc:StructuredType>
<opc:EnumeratedType Name="AccessRestrictionType" LengthInBits="32">
 <opc:EnumeratedValue Name="SigningRequired" Value="0" />
 <opc:EnumeratedValue Name="EncryptionRequired" Value="1" />
 <opc:EnumeratedValue Name="SessionRequired" Value="2" />
</opc:EnumeratedType>
<opc:EnumeratedType Name="StructureType" LengthInBits="32">
 <opc:EnumeratedValue Name="Structure" Value="0" />
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<opc:EnumeratedValue Name="StructureWithOptionalFields" Value="1" />
 <opc:EnumeratedValue Name="Union" Value="2" />
</opc:EnumeratedType>
<opc:StructuredType Name="StructureField" BaseType="ua:ExtensionObject">
 <opc:Field Name="Name" TypeName="opc:String" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" />
 <opc:Field Name="DataType" TypeName="ua:NodeId" />
 <opc:Field Name="ValueRank" TypeName="opc:Int32" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="ArrayDimensions" TypeName="opc:UInt32" LengthField="NoOfArrayDimensions" />
 <opc:Field Name="MaxStringLength" TypeName="opc:UInt32" />
 <opc:Field Name="IsOptional" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="StructureDefinition" BaseType="tns:DataTypeDefinition">
 <opc:Field Name="DefaultEncodingId" TypeName="ua:NodeId" />
 <opc:Field Name="BaseDataType" TypeName="ua:NodeId" />
 <opc:Field Name="StructureType" TypeName="tns:StructureType" />
 <opc:Field Name="NoOfFields" TypeName="opc:Int32" />
 <opc:Field Name="Fields" TypeName="tns:StructureField" LengthField="NoOfFields" />
</opc:StructuredType>
<opc:StructuredType Name="EnumDefinition" BaseType="tns:DataTypeDefinition">
 <opc:Field Name="NoOfFields" TypeName="opc:Int32" />
 <opc:Field Name="Fields" TypeName="tns:EnumField" LengthField="NoOfFields" />
</opc:StructuredType>
<opc:StructuredType Name="Node" BaseType="ua:ExtensionObject">
 <opc:Documentation>Specifies the attributes which belong to all nodes.</opc:Documentation>
 <opc:Field Name="NodeId" TypeName="ua:NodeId" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
</opc:StructuredType>
```

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<opc:StructuredType Name="InstanceNode" BaseType="tns:Node">
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
</opc:StructuredType>
<opc:StructuredType Name="TypeNode" BaseType="tns:Node">
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
</opc:StructuredType>
<opc:StructuredType Name="ObjectNode" BaseType="tns:InstanceNode">
 <opc:Documentation>Specifies the attributes which belong to object nodes./opc:Documentation>
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
```

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<opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
 <opc:Field Name="EventNotifier" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="ObjectTypeNode" BaseType="tns:TypeNode">
 <opc:Documentation>Specifies the attributes which belong to object type nodes.</opc:Documentation>
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
 <opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="VariableNode" BaseType="tns:InstanceNode">
 <opc:Documentation>Specifies the attributes which belong to variable nodes.</opc:Documentation>
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
```

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<opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
 <opc:Field Name="Value" TypeName="ua:Variant" />
 <opc:Field Name="DataType" TypeName="ua:NodeId" />
 <opc:Field Name="ValueRank" TypeName="opc:Int32" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="ArrayDimensions" TypeName="opc:UInt32" LengthField="NoOfArrayDimensions" />
 <opc:Field Name="AccessLevel" TypeName="opc:Byte" />
 <opc:Field Name="UserAccessLevel" TypeName="opc:Byte" />
 <opc:Field Name="MinimumSamplingInterval" TypeName="opc:Double" />
 <opc:Field Name="Historizing" TypeName="opc:Boolean" />
 <opc:Field Name="AccessLevelEx" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="VariableTypeNode" BaseType="tns:TypeNode">
 <opc:Documentation>Specifies the attributes which belong to variable type nodes.
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
 <opc:Field Name="Value" TypeName="ua:Variant" />
 <opc:Field Name="DataType" TypeName="ua:NodeId" />
 <opc:Field Name="ValueRank" TypeName="opc:Int32" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="ArrayDimensions" TypeName="opc:UInt32" LengthField="NoOfArrayDimensions" />
 <opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="ReferenceTypeNode" BaseType="tns:TypeNode">
 <opc:Documentation>Specifies the attributes which belong to reference type nodes./opc:Documentation>
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
```

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<opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
 <opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
 <opc:Field Name="Symmetric" TypeName="opc:Boolean" />
 <opc:Field Name="InverseName" TypeName="ua:LocalizedText" />
</opc:StructuredType>
<opc:StructuredType Name="MethodNode" BaseType="tns:InstanceNode">
 <opc:Documentation>Specifies the attributes which belong to method nodes.</opc:Documentation>
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
 <opc:Field Name="Executable" TypeName="opc:Boolean" />
 <opc:Field Name="UserExecutable" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="ViewNode" BaseType="tns:InstanceNode">
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
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<opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
 <opc:Field Name="ContainsNoLoops" TypeName="opc:Boolean" />
 <opc:Field Name="EventNotifier" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="DataTypeNode" BaseType="tns:TypeNode">
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
 <opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
 <opc:Field Name="DataTypeDefinition" TypeName="ua:ExtensionObject" />
</opc:StructuredType>
<opc:StructuredType Name="ReferenceNode" BaseType="ua:ExtensionObject">
 <opc:Documentation>Specifies a reference which belongs to a node.</opc:Documentation>
 <opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="IsInverse" TypeName="opc:Boolean" />
 <opc:Field Name="TargetId" TypeName="ua:ExpandedNodeId" />
</opc:StructuredType>
<opc:StructuredType Name="Argument" BaseType="ua:ExtensionObject">
 <opc:Documentation>An argument for a method./opc:Documentation>
 <opc:Field Name="Name" TypeName="opc:String" />
 <opc:Field Name="DataType" TypeName="ua:NodeId" />
 <opc:Field Name="ValueRank" TypeName="opc:Int32" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="ArrayDimensions" TypeName="opc:UInt32" LengthField="NoOfArrayDimensions" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" />
</opc:StructuredType>
```

```
<opc:StructuredType Name="EnumValueType" BaseType="ua:ExtensionObject">
 <opc:Documentation>A mapping between a value of an enumerated type and a name and
description.</opc:Documentation>
 <opc:Field Name="Value" TypeName="opc:Int64" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" />
</opc:StructuredType>
<opc:StructuredType Name="EnumField" BaseType="tns:EnumValueType">
 <opc:Field Name="Value" TypeName="opc:Int64" SourceType="tns:EnumValueType" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:EnumValueType" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:EnumValueType" />
 <opc:Field Name="Name" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="OptionSet" BaseType="ua:ExtensionObject">
 <opc:Documentation>This abstract Structured DataType is the base DataType for all DataTypes representing a bit
mask.</opc:Documentation>
 <opc:Field Name="Value" TypeName="opc:ByteString" />
 <opc:Field Name="ValidBits" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:StructuredType Name="Union" BaseType="ua:ExtensionObject">
 <opc:Documentation>This abstract DataType is the base DataType for all union
DataTypes.</opc:Documentation>
</opc:StructuredType>
<opc:OpaqueType Name="NormalizedString">
 <opc:Documentation>A string normalized based on the rules in the unicode specification.
</opc:OpaqueType>
<opc:OpaqueType Name="DecimalString">
 <opc:Documentation>An arbitraty numeric value./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="DurationString">
 <opc:Documentation>A period of time formatted as defined in ISO 8601-2000./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="TimeString">
 <opc:Documentation>A time formatted as defined in ISO 8601-2000.
</opc:OpaqueType>
<opc:OpaqueType Name="DateString">
 <opc:Documentation>A date formatted as defined in ISO 8601-2000./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="Duration">
```

```
<opc:Documentation>A period of time measured in milliseconds.
</opc:OpaqueType>
<opc:OpaqueType Name="UtcTime">
 <opc:Documentation>A date/time value specified in Universal Coordinated Time (UTC).
</opc:OpaqueType>
<opc:OpaqueType Name="LocaleId">
 <opc:Documentation>An identifier for a user locale.
</opc:OpaqueType>
<opc:StructuredType Name="TimeZoneDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="Offset" TypeName="opc:Int16" />
 <opc:Field Name="DaylightSavingInOffset" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:OpaqueType Name="Index">
 <opc:Documentation>This primitive data type is a UInt32 that identifies an element of an
array.</opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="IntegerId">
 <opc:Documentation>A numeric identifier for an object.</opc:Documentation>
</opc:OpaqueType>
<opc:EnumeratedType Name="ApplicationType" LengthInBits="32">
 <opc:Documentation>The types of applications.</opc:Documentation>
 <opc:EnumeratedValue Name="Server" Value="0" />
 <opc:EnumeratedValue Name="Client" Value="1" />
 <opc:EnumeratedValue Name="ClientAndServer" Value="2" />
 <opc:EnumeratedValue Name="DiscoveryServer" Value="3" />
</opc:EnumeratedType>
<opc:StructuredType Name="ApplicationDescription" BaseType="ua:ExtensionObject">
 <opc:Documentation>Describes an application and how to find it.
 <opc:Field Name="ApplicationUri" TypeName="opc:String" />
 <opc:Field Name="ProductUri" TypeName="opc:String" />
 <opc:Field Name="ApplicationName" TypeName="ua:LocalizedText" />
 <opc:Field Name="ApplicationType" TypeName="tns:ApplicationType" />
 <opc:Field Name="GatewayServerUri" TypeName="opc:String" />
 <opc:Field Name="DiscoveryProfileUri" TypeName="opc:String" />
 <opc:Field Name="NoOfDiscoveryUrls" TypeName="opc:Int32" />
 <opc:Field Name="DiscoveryUrls" TypeName="opc:String" LengthField="NoOfDiscoveryUrls" />
</opc:StructuredType>
<opc:StructuredType Name="RequestHeader" BaseType="ua:ExtensionObject">
 <opc:Documentation>The header passed with every server request./opc:Documentation>
 <opc:Field Name="AuthenticationToken" TypeName="ua:NodeId" />
```

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<opc:Field Name="Timestamp" TypeName="opc:DateTime" />
 <opc:Field Name="RequestHandle" TypeName="opc:UInt32" />
 <opc:Field Name="ReturnDiagnostics" TypeName="opc:UInt32" />
 <opc:Field Name="AuditEntryId" TypeName="opc:String" />
 <opc:Field Name="TimeoutHint" TypeName="opc:UInt32" />
 <opc:Field Name="AdditionalHeader" TypeName="ua:ExtensionObject" />
</opc:StructuredType>
<opc:StructuredType Name="ResponseHeader" BaseType="ua:ExtensionObject">
 <opc:Documentation>The header passed with every server response.
 <opc:Field Name="Timestamp" TypeName="opc:DateTime" />
 <opc:Field Name="RequestHandle" TypeName="opc:UInt32" />
 <opc:Field Name="ServiceResult" TypeName="ua:StatusCode" />
 <opc:Field Name="ServiceDiagnostics" TypeName="ua:DiagnosticInfo" />
 <opc:Field Name="NoOfStringTable" TypeName="opc:Int32" />
 <opc:Field Name="StringTable" TypeName="opc:String" LengthField="NoOfStringTable" />
 <opc:Field Name="AdditionalHeader" TypeName="ua:ExtensionObject" />
</opc:StructuredType>
<opc:OpaqueType Name="VersionTime">
</opc:OpaqueType>
<opc:StructuredType Name="ServiceFault" BaseType="ua:ExtensionObject">
 <opc:Documentation>The response returned by all services when there is a service level
error.</opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
</opc:StructuredType>
<opc:StructuredType Name="SessionlessInvokeRequestType" BaseType="ua:ExtensionObject">
 <opc:Field Name="NoOfUrisVersion" TypeName="opc:Int32" />
 <opc:Field Name="UrisVersion" TypeName="opc:UInt32" LengthField="NoOfUrisVersion" />
 <opc:Field Name="NoOfNamespaceUris" TypeName="opc:Int32" />
 <opc:Field Name="NamespaceUris" TypeName="opc:String" LengthField="NoOfNamespaceUris" />
 <opc:Field Name="NoOfServerUris" TypeName="opc:Int32" />
 <opc:Field Name="ServerUris" TypeName="opc:String" LengthField="NoOfServerUris" />
 <opc:Field Name="NoOfLocaleIds" TypeName="opc:Int32" />
 <opc:Field Name="LocaleIds" TypeName="opc:String" LengthField="NoOfLocaleIds" />
 <opc:Field Name="ServiceId" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="SessionlessInvokeResponseType" BaseType="ua:ExtensionObject">
 <opc:Field Name="NoOfNamespaceUris" TypeName="opc:Int32" />
 <opc:Field Name="NamespaceUris" TypeName="opc:String" LengthField="NoOfNamespaceUris" />
 <opc:Field Name="NoOfServerUris" TypeName="opc:Int32" />
 <opc:Field Name="ServerUris" TypeName="opc:String" LengthField="NoOfServerUris" />
 <opc:Field Name="ServiceId" TypeName="opc:UInt32" />
</opc:StructuredType>
```

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<opc:StructuredType Name="FindServersRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Finds the servers known to the discovery server.</opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="EndpointUrl" TypeName="opc:String" />
 <opc:Field Name="NoOfLocaleIds" TypeName="opc:Int32" />
 <opc:Field Name="LocaleIds" TypeName="opc:String" LengthField="NoOfLocaleIds" />
 <opc:Field Name="NoOfServerUris" TypeName="opc:Int32" />
 <opc:Field Name="ServerUris" TypeName="opc:String" LengthField="NoOfServerUris" />
</opc:StructuredType>
<opc:StructuredType Name="FindServersResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Finds the servers known to the discovery server./opc:Documentation>
<opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfServers" TypeName="opc:Int32" />
 <opc:Field Name="Servers" TypeName="tns:ApplicationDescription" LengthField="NoOfServers" />
</opc:StructuredType>
<opc:StructuredType Name="ServerOnNetwork" BaseType="ua:ExtensionObject">
 <opc:Field Name="RecordId" TypeName="opc:UInt32" />
 <opc:Field Name="ServerName" TypeName="opc:String" />
 <opc:Field Name="DiscoveryUrl" TypeName="opc:String" />
 <opc:Field Name="NoOfServerCapabilities" TypeName="opc:Int32" />
 <opc:Field Name="ServerCapabilities" TypeName="opc:String" LengthField="NoOfServerCapabilities" />
</opc:StructuredType>
<opc:StructuredType Name="FindServersOnNetworkRequest" BaseType="ua:ExtensionObject">
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="StartingRecordId" TypeName="opc:UInt32" />
 <opc:Field Name="MaxRecordsToReturn" TypeName="opc:UInt32" />
 <opc:Field Name="NoOfServerCapabilityFilter" TypeName="opc:Int32" />
<opc:Field Name="ServerCapabilityFilter" TypeName="opc:String" LengthField="NoOfServerCapabilityFilter"</pre>
</opc:StructuredType>
<opc:StructuredType Name="FindServersOnNetworkResponse" BaseType="ua:ExtensionObject">
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
<opc:Field Name="LastCounterResetTime" TypeName="opc:DateTime" />
 <opc:Field Name="NoOfServers" TypeName="opc:Int32" />
 <opc:Field Name="Servers" TypeName="tns:ServerOnNetwork" LengthField="NoOfServers" />
</opc:StructuredType>
<opc:OpaqueType Name="ApplicationInstanceCertificate">
 <opc:Documentation>A certificate for an instance of an application./opc:Documentation>
</opc:OpaqueType>
<opc:EnumeratedType Name="MessageSecurityMode" LengthInBits="32">
 <opc:Documentation>The type of security to use on a message./opc:Documentation>
 <opc:EnumeratedValue Name="Invalid" Value="0" />
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<opc:EnumeratedValue Name="None" Value="1" />
 <opc:EnumeratedValue Name="Sign" Value="2" />
 <opc:EnumeratedValue Name="SignAndEncrypt" Value="3" />
</opc:EnumeratedType>
<opc:EnumeratedType Name="UserTokenType" LengthInBits="32">
 <opc:Documentation>The possible user token types./opc:Documentation>
 <opc:EnumeratedValue Name="Anonymous" Value="0" />
 <opc:EnumeratedValue Name="UserName" Value="1" />
 <opc:EnumeratedValue Name="Certificate" Value="2" />
 <opc:EnumeratedValue Name="IssuedToken" Value="3" />
</opc:EnumeratedType>
<opc:StructuredType Name="UserTokenPolicy" BaseType="ua:ExtensionObject">
 <opc:Documentation>Describes a user token that can be used with a server./opc:Documentation>
 <opc:Field Name="PolicyId" TypeName="opc:String" />
 <opc:Field Name="TokenType" TypeName="tns:UserTokenType" />
 <opc:Field Name="IssuedTokenType" TypeName="opc:String" />
 <opc:Field Name="IssuerEndpointUrl" TypeName="opc:String" />
 <opc:Field Name="SecurityPolicyUri" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="EndpointDescription" BaseType="ua:ExtensionObject">
 <opc:Field Name="EndpointUrl" TypeName="opc:String" />
 <opc:Field Name="Server" TypeName="tns:ApplicationDescription" />
 <opc:Field Name="ServerCertificate" TypeName="opc:ByteString" />
 <opc:Field Name="SecurityMode" TypeName="tns:MessageSecurityMode" />
 <opc:Field Name="SecurityPolicyUri" TypeName="opc:String" />
 <opc:Field Name="NoOfUserIdentityTokens" TypeName="opc:Int32" />
 <opc:Field Name="UserIdentityTokens" TypeName="tns:UserTokenPolicy"</pre>
LengthField="NoOfUserIdentityTokens" />
 <opc:Field Name="TransportProfileUri" TypeName="opc:String" />
 <opc:Field Name="SecurityLevel" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="GetEndpointsRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Gets the endpoints used by the server.
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="EndpointUrl" TypeName="opc:String" />
 <opc:Field Name="NoOfLocaleIds" TypeName="opc:Int32" />
 <opc:Field Name="LocaleIds" TypeName="opc:String" LengthField="NoOfLocaleIds" />
 <opc:Field Name="NoOfProfileUris" TypeName="opc:Int32" />
 <opc:Field Name="ProfileUris" TypeName="opc:String" LengthField="NoOfProfileUris" />
</opc:StructuredType>
<opc:StructuredType Name="GetEndpointsResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Gets the endpoints used by the server./opc:Documentation>
```

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<opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfEndpoints" TypeName="opc:Int32" />
 <opc:Field Name="Endpoints" TypeName="tns:EndpointDescription" LengthField="NoOfEndpoints" />
</opc:StructuredType>
<opc:StructuredType Name="RegisteredServer" BaseType="ua:ExtensionObject">
 <opc:Documentation>The information required to register a server with a discovery server./opc:Documentation>
 <opc:Field Name="ServerUri" TypeName="opc:String" />
 <opc:Field Name="ProductUri" TypeName="opc:String" />
 <opc:Field Name="NoOfServerNames" TypeName="opc:Int32" />
 <opc:Field Name="ServerNames" TypeName="ua:LocalizedText" LengthField="NoOfServerNames" />
 <opc:Field Name="ServerType" TypeName="tns:ApplicationType" />
 <opc:Field Name="GatewayServerUri" TypeName="opc:String" />
 <opc:Field Name="NoOfDiscoveryUrls" TypeName="opc:Int32" />
 <opc:Field Name="DiscoveryUrls" TypeName="opc:String" LengthField="NoOfDiscoveryUrls" />
 <opc:Field Name="SemaphoreFilePath" TypeName="opc:String" />
 <opc:Field Name="IsOnline" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="RegisterServerRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Registers a server with the discovery server./opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="Server" TypeName="tns:RegisteredServer" />
</opc:StructuredType>
<opc:StructuredType Name="RegisterServerResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Registers a server with the discovery server./opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
</opc:StructuredType>
<opc:StructuredType Name="DiscoveryConfiguration" BaseType="ua:ExtensionObject">
 <opc:Documentation>A base type for discovery configuration information.</opc:Documentation>
</opc:StructuredType>
<opc:StructuredType Name="MdnsDiscoveryConfiguration" BaseType="tns:DiscoveryConfiguration">
 <opc:Documentation>The discovery information needed for mDNS registration.
 <opc:Field Name="MdnsServerName" TypeName="opc:String" />
 <opc:Field Name="NoOfServerCapabilities" TypeName="opc:Int32" />
 <opc:Field Name="ServerCapabilities" TypeName="opc:String" LengthField="NoOfServerCapabilities" />
</opc:StructuredType>
<opc:StructuredType Name="RegisterServer2Request" BaseType="ua:ExtensionObject">
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="Server" TypeName="tns:RegisteredServer" />
 <opc:Field Name="NoOfDiscoveryConfiguration" TypeName="opc:Int32" />
 <opc:Field Name="DiscoveryConfiguration" TypeName="ua:ExtensionObject"</pre>
LengthField="NoOfDiscoveryConfiguration" />
</opc:StructuredType>
```

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<opc:StructuredType Name="RegisterServer2Response" BaseType="ua:ExtensionObject">
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfConfigurationResults" TypeName="opc:Int32" />
 <opc:Field Name="ConfigurationResults" TypeName="ua:StatusCode"</pre>
LengthField="NoOfConfigurationResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:EnumeratedType Name="SecurityTokenRequestType" LengthInBits="32">
 <opc:Documentation>Indicates whether a token if being created or renewed.</opc:Documentation>
 <opc:EnumeratedValue Name="Issue" Value="0" />
 <opc:EnumeratedValue Name="Renew" Value="1" />
</opc:EnumeratedType>
<opc:StructuredType Name="ChannelSecurityToken" BaseType="ua:ExtensionObject">
 <opc:Documentation>The token that identifies a set of keys for an active secure channel.
 <opc:Field Name="ChannelId" TypeName="opc:UInt32" />
 <opc:Field Name="TokenId" TypeName="opc:UInt32" />
 <opc:Field Name="CreatedAt" TypeName="opc:DateTime" />
 <opc:Field Name="RevisedLifetime" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="OpenSecureChannelRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Creates a secure channel with a server.
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="ClientProtocolVersion" TypeName="opc:UInt32" />
 <opc:Field Name="RequestType" TypeName="tns:SecurityTokenRequestType" />
 <opc:Field Name="SecurityMode" TypeName="tns:MessageSecurityMode" />
 <opc:Field Name="ClientNonce" TypeName="opc:ByteString" />
 <opc:Field Name="RequestedLifetime" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="OpenSecureChannelResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Creates a secure channel with a server./opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="ServerProtocolVersion" TypeName="opc:UInt32" />
 <opc:Field Name="SecurityToken" TypeName="tns:ChannelSecurityToken" />
 <opc:Field Name="ServerNonce" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:StructuredType Name="CloseSecureChannelRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Closes a secure channel.
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
</opc:StructuredType>
<opc:StructuredType Name="CloseSecureChannelResponse" BaseType="ua:ExtensionObject">
```

```
<opc:Documentation>Closes a secure channel./opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
</opc:StructuredType>
<opc:StructuredType Name="SignedSoftwareCertificate" BaseType="ua:ExtensionObject">
 <opc:Documentation>A software certificate with a digital signature./opc:Documentation>
 <opc:Field Name="CertificateData" TypeName="opc:ByteString" />
 <opc:Field Name="Signature" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:OpaqueType Name="SessionAuthenticationToken">
 <opc:Documentation>A unique identifier for a session used to authenticate requests.
</opc:OpaqueType>
<opc:StructuredType Name="SignatureData" BaseType="ua:ExtensionObject">
 <opc:Documentation>A digital signature.
 <opc:Field Name="Algorithm" TypeName="opc:String" />
 <opc:Field Name="Signature" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:StructuredType Name="CreateSessionRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Creates a new session with the server./opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="ClientDescription" TypeName="tns:ApplicationDescription" />
 <opc:Field Name="ServerUri" TypeName="opc:String" />
 <opc:Field Name="EndpointUrl" TypeName="opc:String" />
 <opc:Field Name="SessionName" TypeName="opc:String" />
 <opc:Field Name="ClientNonce" TypeName="opc:ByteString" />
 <opc:Field Name="ClientCertificate" TypeName="opc:ByteString" />
 <opc:Field Name="RequestedSessionTimeout" TypeName="opc:Double" />
 <opc:Field Name="MaxResponseMessageSize" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="CreateSessionResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Creates a new session with the server.
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="SessionId" TypeName="ua:NodeId" />
 <opc:Field Name="AuthenticationToken" TypeName="ua:NodeId" />
 <opc:Field Name="RevisedSessionTimeout" TypeName="opc:Double" />
 <opc:Field Name="ServerNonce" TypeName="opc:ByteString" />
 <opc:Field Name="ServerCertificate" TypeName="opc:ByteString" />
 <opc:Field Name="NoOfServerEndpoints" TypeName="opc:Int32" />
 <opc:Field Name="ServerEndpoints" TypeName="tns:EndpointDescription"</pre>
LengthField="NoOfServerEndpoints" />
 <opc:Field Name="NoOfServerSoftwareCertificates" TypeName="opc:Int32" />
 <opc:Field Name="ServerSoftwareCertificates" TypeName="tns:SignedSoftwareCertificate"</pre>
LengthField="NoOfServerSoftwareCertificates" />
 <opc:Field Name="ServerSignature" TypeName="tns:SignatureData" />
```

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<opc:Field Name="MaxRequestMessageSize" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="UserIdentityToken" BaseType="ua:ExtensionObject">
 <opc:Documentation>A base type for a user identity token./opc:Documentation>
 <opc:Field Name="PolicyId" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="AnonymousIdentityToken" BaseType="tns:UserIdentityToken">
 <opc:Documentation>A token representing an anonymous user.
 <opc:Field Name="PolicyId" TypeName="opc:String" SourceType="tns:UserIdentityToken" />
</opc:StructuredType>
<opc:StructuredType Name="UserNameIdentityToken" BaseType="tns:UserIdentityToken">
 <opc:Documentation>A token representing a user identified by a user name and password.
 <opc:Field Name="PolicyId" TypeName="opc:String" SourceType="tns:UserIdentityToken" />
 <opc:Field Name="UserName" TypeName="opc:String" />
 <opc:Field Name="Password" TypeName="opc:ByteString" />
 <opc:Field Name="EncryptionAlgorithm" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="X509IdentityToken" BaseType="tns:UserIdentityToken">
 <opc:Documentation>A token representing a user identified by an X509 certificate.</opc:Documentation>
 <opc:Field Name="PolicyId" TypeName="opc:String" SourceType="tns:UserIdentityToken" />
 <opc:Field Name="CertificateData" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:StructuredType Name="IssuedIdentityToken" BaseType="tns:UserIdentityToken">
 <opc:Documentation>A token representing a user identified by a WS-Security XML token./opc:Documentation>
 <opc:Field Name="PolicyId" TypeName="opc:String" SourceType="tns:UserIdentityToken" />
 <opc:Field Name="TokenData" TypeName="opc:ByteString" />
 <opc:Field Name="EncryptionAlgorithm" TypeName="opc:String" />
</opc:StructuredType>
<opc:OpaqueType Name="RsaEncryptedSecret">
</opc:OpaqueType>
<opc:StructuredType Name="ActivateSessionRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Activates a session with the server./opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="ClientSignature" TypeName="tns:SignatureData" />
 <opc:Field Name="NoOfClientSoftwareCertificates" TypeName="opc:Int32" />
 <opc:Field Name="ClientSoftwareCertificates" TypeName="tns:SignedSoftwareCertificate"</pre>
LengthField="NoOfClientSoftwareCertificates" />
 <opc:Field Name="NoOfLocaleIds" TypeName="opc:Int32" />
 <opc:Field Name="LocaleIds" TypeName="opc:String" LengthField="NoOfLocaleIds" />
 <opc:Field Name="UserIdentityToken" TypeName="ua:ExtensionObject" />
 <opc:Field Name="UserTokenSignature" TypeName="tns:SignatureData" />
```

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</opc:StructuredType>
<opc:StructuredType Name="ActivateSessionResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Activates a session with the server.
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="ServerNonce" TypeName="opc:ByteString" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="ua:StatusCode" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="CloseSessionRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Closes a session with the server.opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="DeleteSubscriptions" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="CloseSessionResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Closes a session with the server.opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
</opc:StructuredType>
<opc:StructuredType Name="CancelRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Cancels an outstanding request./opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="RequestHandle" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="CancelResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Cancels an outstanding request.opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="CancelCount" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:EnumeratedType Name="NodeAttributesMask" LengthInBits="32">
 <opc:Documentation>The bits used to specify default attributes for a new node.</opc:Documentation>
 <opc:EnumeratedValue Name="None" Value="0" />
 <opc:EnumeratedValue Name="AccessLevel" Value="1" />
 <opc:EnumeratedValue Name="ArrayDimensions" Value="2" />
 <opc:EnumeratedValue Name="BrowseName" Value="4" />
 <opc:EnumeratedValue Name="ContainsNoLoops" Value="8" />
 <opc:EnumeratedValue Name="DataType" Value="16" />
 <opc:EnumeratedValue Name="Description" Value="32" />
 <opc:EnumeratedValue Name="DisplayName" Value="64" />
 <opc:EnumeratedValue Name="EventNotifier" Value="128" />
 <opc:EnumeratedValue Name="Executable" Value="256" />
 <opc:EnumeratedValue Name="Historizing" Value="512" />
```

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<opc:EnumeratedValue Name="InverseName" Value="1024" />
 <opc:EnumeratedValue Name="IsAbstract" Value="2048" />
 <opc:EnumeratedValue Name="MinimumSamplingInterval" Value="4096" />
 <opc:EnumeratedValue Name="NodeClass" Value="8192" />
 <opc:EnumeratedValue Name="NodeId" Value="16384" />
 <opc:EnumeratedValue Name="Symmetric" Value="32768" />
 <opc:EnumeratedValue Name="UserAccessLevel" Value="65536" />
 <opc:EnumeratedValue Name="UserExecutable" Value="131072" />
 <opc:EnumeratedValue Name="UserWriteMask" Value="262144" />
 <opc:EnumeratedValue Name="ValueRank" Value="524288" />
 <opc:EnumeratedValue Name="WriteMask" Value="1048576" />
 <opc:EnumeratedValue Name="Value" Value="2097152" />
 <opc:EnumeratedValue Name="DataTypeDefinition" Value="4194304" />
 <opc:EnumeratedValue Name="RolePermissions" Value="8388608" />
 <opc:EnumeratedValue Name="AccessRestrictions" Value="16777216" />
 <opc:EnumeratedValue Name="All" Value="33554431" />
 <opc:EnumeratedValue Name="BaseNode" Value="26501220" />
 <opc:EnumeratedValue Name="Object" Value="26501348" />
 <opc:EnumeratedValue Name="ObjectType" Value="26503268" />
 <opc:EnumeratedValue Name="Variable" Value="26571383" />
 <opc:EnumeratedValue Name="VariableType" Value="28600438" />
 <opc:EnumeratedValue Name="Method" Value="26632548" />
 <opc:EnumeratedValue Name="ReferenceType" Value="26537060" />
 <opc:EnumeratedValue Name="View" Value="26501356" />
</opc:EnumeratedType>
<opc:StructuredType Name="NodeAttributes" BaseType="ua:ExtensionObject">
 <opc:Documentation>The base attributes for all nodes./opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="ObjectAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for an object node.opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="EventNotifier" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="VariableAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for a variable node./opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
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<opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Value" TypeName="ua:Variant" />
 <opc:Field Name="DataType" TypeName="ua:NodeId" />
 <opc:Field Name="ValueRank" TypeName="opc:Int32" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="ArrayDimensions" TypeName="opc:UInt32" LengthField="NoOfArrayDimensions" />
 <opc:Field Name="AccessLevel" TypeName="opc:Byte" />
 <opc:Field Name="UserAccessLevel" TypeName="opc:Byte" />
 <opc:Field Name="MinimumSamplingInterval" TypeName="opc:Double" />
 <opc:Field Name="Historizing" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="MethodAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for a method node.opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Executable" TypeName="opc:Boolean" />
 <opc:Field Name="UserExecutable" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="ObjectTypeAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for an object type node./opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="VariableTypeAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for a variable type node.
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Value" TypeName="ua:Variant" />
 <opc:Field Name="DataType" TypeName="ua:NodeId" />
 <opc:Field Name="ValueRank" TypeName="opc:Int32" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="ArrayDimensions" TypeName="opc:UInt32" LengthField="NoOfArrayDimensions" />
```

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<opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="ReferenceTypeAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for a reference type node./opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
 <opc:Field Name="Symmetric" TypeName="opc:Boolean" />
 <opc:Field Name="InverseName" TypeName="ua:LocalizedText" />
</opc:StructuredType>
<opc:StructuredType Name="DataTypeAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for a data type node./opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="ViewAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for a view node.opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="ContainsNoLoops" TypeName="opc:Boolean" />
 <opc:Field Name="EventNotifier" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="GenericAttributeValue" BaseType="ua:ExtensionObject">
 <opc:Field Name="AttributeId" TypeName="opc:UInt32" />
 <opc:Field Name="Value" TypeName="ua:Variant" />
</opc:StructuredType>
<opc:StructuredType Name="GenericAttributes" BaseType="tns:NodeAttributes">
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="NoOfAttributeValues" TypeName="opc:Int32" />
```

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<opc:Field Name="AttributeValues" TypeName="tns:GenericAttributeValue"</p>
LengthField="NoOfAttributeValues" />
</opc:StructuredType>
<opc:StructuredType Name="AddNodesItem" BaseType="ua:ExtensionObject">
 <opc:Documentation>A request to add a node to the server address space.Opc:Documentation>
 <opc:Field Name="ParentNodeId" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="RequestedNewNodeId" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" />
 <opc:Field Name="NodeAttributes" TypeName="ua:ExtensionObject" />
 <opc:Field Name="TypeDefinition" TypeName="ua:ExpandedNodeId" />
</opc:StructuredType>
<opc:StructuredType Name="AddNodesResult" BaseType="ua:ExtensionObject">
 <opc:Documentation>A result of an add node operation./opc:Documentation>
 <opc:Field Name="StatusCode" TypeName="ua:StatusCode" />
 <opc:Field Name="AddedNodeId" TypeName="ua:NodeId" />
</opc:StructuredType>
<opc:StructuredType Name="AddNodesRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Adds one or more nodes to the server address space.</opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="NoOfNodesToAdd" TypeName="opc:Int32" />
 <opc:Field Name="NodesToAdd" TypeName="tns:AddNodesItem" LengthField="NoOfNodesToAdd" />
</opc:StructuredType>
<opc:StructuredType Name="AddNodesResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Adds one or more nodes to the server address space./opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="tns:AddNodesResult" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="AddReferencesItem" BaseType="ua:ExtensionObject">
 <opc:Documentation>A request to add a reference to the server address space.</opc:Documentation>
 <opc:Field Name="SourceNodeId" TypeName="ua:NodeId" />
 <opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="IsForward" TypeName="opc:Boolean" />
 <opc:Field Name="TargetServerUri" TypeName="opc:String" />
 <opc:Field Name="TargetNodeId" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="TargetNodeClass" TypeName="tns:NodeClass" />
</opc:StructuredType>
<opc:StructuredType Name="AddReferencesRequest" BaseType="ua:ExtensionObject">
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<opc:Documentation>Adds one or more references to the server address space.
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="NoOfReferencesToAdd" TypeName="opc:Int32" />
 <opc:Field Name="ReferencesToAdd" TypeName="tns:AddReferencesItem"</pre>
LengthField="NoOfReferencesToAdd" />
</opc:StructuredType>
<opc:StructuredType Name="AddReferencesResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Adds one or more references to the server address space.
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="ua:StatusCode" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="DeleteNodesItem" BaseType="ua:ExtensionObject">
 <opc:Documentation>A request to delete a node to the server address space./opc:Documentation>
 <opc:Field Name="NodeId" TypeName="ua:NodeId" />
 <opc:Field Name="DeleteTargetReferences" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="DeleteNodesRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Delete one or more nodes from the server address space./opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="NoOfNodesToDelete" TypeName="opc:Int32" />
 <opc:Field Name="NodesToDelete" TypeName="tns:DeleteNodesItem" LengthField="NoOfNodesToDelete" />
</opc:StructuredType>
<opc:StructuredType Name="DeleteNodesResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Delete one or more nodes from the server address space.</opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="ua:StatusCode" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="DeleteReferencesItem" BaseType="ua:ExtensionObject">
 <opc:Documentation>A request to delete a node from the server address space./opc:Documentation>
 <opc:Field Name="SourceNodeId" TypeName="ua:NodeId" />
 <opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="IsForward" TypeName="opc:Boolean" />
 <opc:Field Name="TargetNodeId" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="DeleteBidirectional" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="DeleteReferencesRequest" BaseType="ua:ExtensionObject">
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<opc:Documentation>Delete one or more references from the server address space.
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="NoOfReferencesToDelete" TypeName="opc:Int32" />
 <opc:Field Name="ReferencesToDelete" TypeName="tns:DeleteReferencesItem"</pre>
LengthField="NoOfReferencesToDelete" />
</opc:StructuredType>
<opc:StructuredType Name="DeleteReferencesResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Delete one or more references from the server address space.
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="ua:StatusCode" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:EnumeratedType Name="AttributeWriteMask" LengthInBits="32" IsOptionSet="true">
 <opc:Documentation>Define bits used to indicate which attributes are writable.</opc:Documentation>
 <opc:EnumeratedValue Name="None" Value="0" />
 <opc:EnumeratedValue Name="AccessLevel" Value="1" />
 <opc:EnumeratedValue Name="ArrayDimensions" Value="2" />
 <opc:EnumeratedValue Name="BrowseName" Value="4" />
 <opc:EnumeratedValue Name="ContainsNoLoops" Value="8" />
 <opc:EnumeratedValue Name="DataType" Value="16" />
 <opc:EnumeratedValue Name="Description" Value="32" />
 <opc:EnumeratedValue Name="DisplayName" Value="64" />
 <opc:EnumeratedValue Name="EventNotifier" Value="128" />
 <opc:EnumeratedValue Name="Executable" Value="256" />
 <opc:EnumeratedValue Name="Historizing" Value="512" />
 <opc:EnumeratedValue Name="InverseName" Value="1024" />
 <opc:EnumeratedValue Name="IsAbstract" Value="2048" />
 <opc:EnumeratedValue Name="MinimumSamplingInterval" Value="4096" />
 <opc:EnumeratedValue Name="NodeClass" Value="8192" />
 <opc:EnumeratedValue Name="NodeId" Value="16384" />
 <opc:EnumeratedValue Name="Symmetric" Value="32768" />
 <opc:EnumeratedValue Name="UserAccessLevel" Value="65536" />
 <opc:EnumeratedValue Name="UserExecutable" Value="131072" />
 <opc:EnumeratedValue Name="UserWriteMask" Value="262144" />
 <opc:EnumeratedValue Name="ValueRank" Value="524288" />
 <opc:EnumeratedValue Name="WriteMask" Value="1048576" />
 <opc:EnumeratedValue Name="ValueForVariableType" Value="2097152" />
 <opc:EnumeratedValue Name="DataTypeDefinition" Value="4194304" />
 <opc:EnumeratedValue Name="RolePermissions" Value="8388608" />
 <opc:EnumeratedValue Name="AccessRestrictions" Value="16777216" />
 <opc:EnumeratedValue Name="AccessLevelEx" Value="33554432" />
</opc:EnumeratedType>
<opc:EnumeratedType Name="BrowseDirection" LengthInBits="32">
```

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<opc:Documentation>The directions of the references to return./opc:Documentation>
 <opc:EnumeratedValue Name="Forward" Value="0" />
 <opc:EnumeratedValue Name="Inverse" Value="1" />
 <opc:EnumeratedValue Name="Both" Value="2" />
 <opc:EnumeratedValue Name="Invalid" Value="3" />
</opc:EnumeratedType>
<opc:StructuredType Name="ViewDescription" BaseType="ua:ExtensionObject">
 <opc:Documentation>The view to browse.</opc:Documentation>
 <opc:Field Name="ViewId" TypeName="ua:NodeId" />
 <opc:Field Name="Timestamp" TypeName="opc:DateTime" />
 <opc:Field Name="ViewVersion" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="BrowseDescription" BaseType="ua:ExtensionObject">
 <opc:Documentation>A request to browse the the references from a node.
 <opc:Field Name="NodeId" TypeName="ua:NodeId" />
 <opc:Field Name="BrowseDirection" TypeName="tns:BrowseDirection" />
 <opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="IncludeSubtypes" TypeName="opc:Boolean" />
 <opc:Field Name="NodeClassMask" TypeName="opc:UInt32" />
 <opc:Field Name="ResultMask" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:EnumeratedType Name="BrowseResultMask" LengthInBits="32">
 <opc:Documentation>A bit mask which specifies what should be returned in a browse
response.</opc:Documentation>
 <opc:EnumeratedValue Name="None" Value="0" />
 <opc:EnumeratedValue Name="ReferenceTypeId" Value="1" />
 <opc:EnumeratedValue Name="IsForward" Value="2" />
 <opc:EnumeratedValue Name="NodeClass" Value="4" />
 <opc:EnumeratedValue Name="BrowseName" Value="8" />
 <opc:EnumeratedValue Name="DisplayName" Value="16" />
 <opc:EnumeratedValue Name="TypeDefinition" Value="32" />
 <opc:EnumeratedValue Name="All" Value="63" />
 <opc:EnumeratedValue Name="ReferenceTypeInfo" Value="3" />
 <opc:EnumeratedValue Name="TargetInfo" Value="60" />
</opc:EnumeratedType>
<opc:StructuredType Name="ReferenceDescription" BaseType="ua:ExtensionObject">
 <opc:Documentation>The description of a reference.
 <opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="IsForward" TypeName="opc:Boolean" />
 <opc:Field Name="NodeId" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" />
 <opc:Field Name="TypeDefinition" TypeName="ua:ExpandedNodeId" />
```

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</opc:StructuredType>
<opc:OpaqueType Name="ContinuationPoint">
 <opc:Documentation>An identifier for a suspended query or browse operation.
</opc:OpaqueType>
<opc:StructuredType Name="BrowseResult" BaseType="ua:ExtensionObject">
 <opc:Documentation>The result of a browse operation./opc:Documentation>
 <opc:Field Name="StatusCode" TypeName="ua:StatusCode" />
 <opc:Field Name="ContinuationPoint" TypeName="opc:ByteString" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceDescription" LengthField="NoOfReferences" />
</opc:StructuredType>
<opc:StructuredType Name="BrowseRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Browse the references for one or more nodes from the server address
space.</opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="View" TypeName="tns:ViewDescription" />
 <opc:Field Name="RequestedMaxReferencesPerNode" TypeName="opc:UInt32" />
 <opc:Field Name="NoOfNodesToBrowse" TypeName="opc:Int32" />
 <opc:Field Name="NodesToBrowse" TypeName="tns:BrowseDescription" LengthField="NoOfNodesToBrowse"</pre>
</opc:StructuredType>
<opc:StructuredType Name="BrowseResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Browse the references for one or more nodes from the server address
space.</opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="tns:BrowseResult" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="BrowseNextRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Continues one or more browse operations./opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="ReleaseContinuationPoints" TypeName="opc:Boolean" />
 <opc:Field Name="NoOfContinuationPoints" TypeName="opc:Int32" />
 <opc:Field Name="ContinuationPoints" TypeName="opc:ByteString" LengthField="NoOfContinuationPoints" />
</opc:StructuredType>
<opc:StructuredType Name="BrowseNextResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Continues one or more browse operations.
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="tns:BrowseResult" LengthField="NoOfResults" />
```

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<opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="RelativePathElement" BaseType="ua:ExtensionObject">
 <opc:Documentation>An element in a relative path.
 <opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="IsInverse" TypeName="opc:Boolean" />
 <opc:Field Name="IncludeSubtypes" TypeName="opc:Boolean" />
 <opc:Field Name="TargetName" TypeName="ua:QualifiedName" />
</opc:StructuredType>
<opc:StructuredType Name="RelativePath" BaseType="ua:ExtensionObject">
 <opc:Documentation>A relative path constructed from reference types and browse names.
 <opc:Field Name="NoOfElements" TypeName="opc:Int32" />
 <opc:Field Name="Elements" TypeName="tns:RelativePathElement" LengthField="NoOfElements" />
</opc:StructuredType>
<opc:StructuredType Name="BrowsePath" BaseType="ua:ExtensionObject">
 <opc:Documentation>A request to translate a path into a node id.</opc:Documentation>
 <opc:Field Name="StartingNode" TypeName="ua:NodeId" />
 <opc:Field Name="RelativePath" TypeName="tns:RelativePath" />
</opc:StructuredType>
<opc:StructuredType Name="BrowsePathTarget" BaseType="ua:ExtensionObject">
 <opc:Documentation>The target of the translated path.opc:Documentation>
 <opc:Field Name="TargetId" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="RemainingPathIndex" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="BrowsePathResult" BaseType="ua:ExtensionObject">
 <opc:Documentation>The result of a translate opearation./opc:Documentation>
 <opc:Field Name="StatusCode" TypeName="ua:StatusCode" />
 <opc:Field Name="NoOfTargets" TypeName="opc:Int32" />
 <opc:Field Name="Targets" TypeName="tns:BrowsePathTarget" LengthField="NoOfTargets" />
</opc:StructuredType>
<opc:StructuredType Name="TranslateBrowsePathsToNodeIdsRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Translates one or more paths in the server address space./opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="NoOfBrowsePaths" TypeName="opc:Int32" />
 <opc:Field Name="BrowsePaths" TypeName="tns:BrowsePath" LengthField="NoOfBrowsePaths" />
</opc:StructuredType>
<opc:StructuredType Name="TranslateBrowsePathsToNodeIdsResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Translates one or more paths in the server address space./opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
```

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<opc:Field Name="Results" TypeName="tns:BrowsePathResult" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="RegisterNodesRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Registers one or more nodes for repeated use within a session.
<opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="NoOfNodesToRegister" TypeName="opc:Int32" />
 <opc:Field Name="NodesToRegister" TypeName="ua:NodeId" LengthField="NoOfNodesToRegister" />
</opc:StructuredType>
<opc:StructuredType Name="RegisterNodesResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Registers one or more nodes for repeated use within a session.
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfRegisteredNodeIds" TypeName="opc:Int32" />
 <opc:Field Name="RegisteredNodeIds" TypeName="ua:NodeId" LengthField="NoOfRegisteredNodeIds" />
</opc:StructuredType>
<opc:StructuredType Name="UnregisterNodesRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Unregisters one or more previously registered nodes.
<opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="NoOfNodesToUnregister" TypeName="opc:Int32" />
 <opc:Field Name="NodesToUnregister" TypeName="ua:NodeId" LengthField="NoOfNodesToUnregister" />
</opc:StructuredType>
<opc:StructuredType Name="UnregisterNodesResponse" BaseType="ua:ExtensionObject">
<opc:Documentation>Unregisters one or more previously registered nodes./opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
</opc:StructuredType>
<opc:OpaqueType Name="Counter">
 <opc:Documentation>A monotonically increasing value./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="NumericRange">
 <opc:Documentation>Specifies a range of array indexes.opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="Time">
 <opc:Documentation>A time value specified as HH:MM:SS.SSS./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="Date">
 <opc:Documentation>A date value.
</opc:OpaqueType>
<opc:StructuredType Name="EndpointConfiguration" BaseType="ua:ExtensionObject">
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<opc:Field Name="OperationTimeout" TypeName="opc:Int32" />
 <opc:Field Name="UseBinaryEncoding" TypeName="opc:Boolean" />
 <opc:Field Name="MaxStringLength" TypeName="opc:Int32" />
 <opc:Field Name="MaxByteStringLength" TypeName="opc:Int32" />
 <opc:Field Name="MaxArrayLength" TypeName="opc:Int32" />
 <opc:Field Name="MaxMessageSize" TypeName="opc:Int32" />
 <opc:Field Name="MaxBufferSize" TypeName="opc:Int32" />
 <opc:Field Name="ChannelLifetime" TypeName="opc:Int32" />
 <opc:Field Name="SecurityTokenLifetime" TypeName="opc:Int32" />
</opc:StructuredType>
<opc:StructuredType Name="QueryDataDescription" BaseType="ua:ExtensionObject">
 <opc:Field Name="RelativePath" TypeName="tns:RelativePath" />
 <opc:Field Name="AttributeId" TypeName="opc:UInt32" />
 <opc:Field Name="IndexRange" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="NodeTypeDescription" BaseType="ua:ExtensionObject">
 <opc:Field Name="TypeDefinitionNode" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="IncludeSubTypes" TypeName="opc:Boolean" />
 <opc:Field Name="NoOfDataToReturn" TypeName="opc:Int32" />
 <opc:Field Name="DataToReturn" TypeName="tns:QueryDataDescription" LengthField="NoOfDataToReturn"</pre>
</opc:StructuredType>
<opc:EnumeratedType Name="FilterOperator" LengthInBits="32">
 <opc:EnumeratedValue Name="Equals" Value="0" />
 <opc:EnumeratedValue Name="IsNull" Value="1" />
 <opc:EnumeratedValue Name="GreaterThan" Value="2" />
 <opc:EnumeratedValue Name="LessThan" Value="3" />
 <opc:EnumeratedValue Name="GreaterThanOrEqual" Value="4" />
 <opc:EnumeratedValue Name="LessThanOrEqual" Value="5" />
 <opc:EnumeratedValue Name="Like" Value="6" />
 <opc:EnumeratedValue Name="Not" Value="7" />
 <opc:EnumeratedValue Name="Between" Value="8" />
 <opc:EnumeratedValue Name="InList" Value="9" />
 <opc:EnumeratedValue Name="And" Value="10" />
 <opc:EnumeratedValue Name="Or" Value="11" />
 <opc:EnumeratedValue Name="Cast" Value="12" />
 <opc:EnumeratedValue Name="InView" Value="13" />
 <opc:EnumeratedValue Name="OfType" Value="14" />
 <opc:EnumeratedValue Name="RelatedTo" Value="15" />
 <opc:EnumeratedValue Name="BitwiseAnd" Value="16" />
 <opc:EnumeratedValue Name="BitwiseOr" Value="17" />
</opc:EnumeratedType>
<opc:StructuredType Name="QueryDataSet" BaseType="ua:ExtensionObject">
 <opc:Field Name="NodeId" TypeName="ua:ExpandedNodeId" />
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<opc:Field Name="TypeDefinitionNode" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="NoOfValues" TypeName="opc:Int32" />
 <opc:Field Name="Values" TypeName="ua:Variant" LengthField="NoOfValues" />
</opc:StructuredType>
<opc:StructuredType Name="NodeReference" BaseType="ua:ExtensionObject">
 <opc:Field Name="NodeId" TypeName="ua:NodeId" />
<opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="IsForward" TypeName="opc:Boolean" />
 <opc:Field Name="NoOfReferencedNodeIds" TypeName="opc:Int32" />
 <opc:Field Name="ReferencedNodeIds" TypeName="ua:NodeId" LengthField="NoOfReferencedNodeIds" />
</opc:StructuredType>
<opc:StructuredType Name="ContentFilterElement" BaseType="ua:ExtensionObject">
 <opc:Field Name="FilterOperator" TypeName="tns:FilterOperator" />
<opc:Field Name="NoOfFilterOperands" TypeName="opc:Int32" />
 <opc:Field Name="FilterOperands" TypeName="ua:ExtensionObject" LengthField="NoOfFilterOperands" />
</opc:StructuredType>
<opc:StructuredType Name="ContentFilter" BaseType="ua:ExtensionObject">
 <opc:Field Name="NoOfElements" TypeName="opc:Int32" />
 <opc:Field Name="Elements" TypeName="tns:ContentFilterElement" LengthField="NoOfElements" />
</opc:StructuredType>
<opc:StructuredType Name="FilterOperand" BaseType="ua:ExtensionObject">
</opc:StructuredType>
<opc:StructuredType Name="ElementOperand" BaseType="tns:FilterOperand">
 <opc:Field Name="Index" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="LiteralOperand" BaseType="tns:FilterOperand">
 <opc:Field Name="Value" TypeName="ua:Variant" />
</opc:StructuredType>
<opc:StructuredType Name="AttributeOperand" BaseType="tns:FilterOperand">
<opc:Field Name="NodeId" TypeName="ua:NodeId" />
 <opc:Field Name="Alias" TypeName="opc:String" />
 <opc:Field Name="BrowsePath" TypeName="tns:RelativePath" />
 <opc:Field Name="AttributeId" TypeName="opc:UInt32" />
 <opc:Field Name="IndexRange" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="SimpleAttributeOperand" BaseType="tns:FilterOperand">
 <opc:Field Name="TypeDefinitionId" TypeName="ua:NodeId" />
 <opc:Field Name="NoOfBrowsePath" TypeName="opc:Int32" />
 <opc:Field Name="BrowsePath" TypeName="ua:QualifiedName" LengthField="NoOfBrowsePath" />
 <opc:Field Name="AttributeId" TypeName="opc:UInt32" />
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<opc:Field Name="IndexRange" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="ContentFilterElementResult" BaseType="ua:ExtensionObject">
 <opc:Field Name="StatusCode" TypeName="ua:StatusCode" />
 <opc:Field Name="NoOfOperandStatusCodes" TypeName="opc:Int32" />
 <opc:Field Name="OperandStatusCodes" TypeName="ua:StatusCode" LengthField="NoOfOperandStatusCodes"</pre>
  <opc:Field Name="NoOfOperandDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="OperandDiagnosticInfos" TypeName="ua:DiagnosticInfo"</pre>
LengthField="NoOfOperandDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="ContentFilterResult" BaseType="ua:ExtensionObject">
  <opc:Field Name="NoOfElementResults" TypeName="opc:Int32" />
 <opc:Field Name="ElementResults" TypeName="tns:ContentFilterElementResult"</pre>
LengthField="NoOfElementResults" />
 <opc:Field Name="NoOfElementDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="ElementDiagnosticInfos" TypeName="ua:DiagnosticInfo"</pre>
LengthField="NoOfElementDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="ParsingResult" BaseType="ua:ExtensionObject">
 <opc:Field Name="StatusCode" TypeName="ua:StatusCode" />
 <opc:Field Name="NoOfDataStatusCodes" TypeName="opc:Int32" />
 <opc:Field Name="DataStatusCodes" TypeName="ua:StatusCode" LengthField="NoOfDataStatusCodes" />
 <opc:Field Name="NoOfDataDiagnosticInfos" TypeName="opc:Int32" />
  <opc:Field Name="DataDiagnosticInfos" TypeName="ua:DiagnosticInfo"</pre>
LengthField="NoOfDataDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="QueryFirstRequest" BaseType="ua:ExtensionObject">
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="View" TypeName="tns:ViewDescription" />
 <opc:Field Name="NoOfNodeTypes" TypeName="opc:Int32" />
 <opc:Field Name="NodeTypes" TypeName="tns:NodeTypeDescription" LengthField="NoOfNodeTypes" />
  <opc:Field Name="Filter" TypeName="tns:ContentFilter" />
  <opc:Field Name="MaxDataSetsToReturn" TypeName="opc:UInt32" />
  <opc:Field Name="MaxReferencesToReturn" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="QueryFirstResponse" BaseType="ua:ExtensionObject">
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfQueryDataSets" TypeName="opc:Int32" />
  <opc:Field Name="QueryDataSets" TypeName="tns:QueryDataSet" LengthField="NoOfQueryDataSets" />
  <opc:Field Name="ContinuationPoint" TypeName="opc:ByteString" />
  <opc:Field Name="NoOfParsingResults" TypeName="opc:Int32" />
  <opc:Field Name="ParsingResults" TypeName="tns:ParsingResult" LengthField="NoOfParsingResults" />
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<opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
 <opc:Field Name="FilterResult" TypeName="tns:ContentFilterResult" />
</opc:StructuredType>
<opc:StructuredType Name="QueryNextRequest" BaseType="ua:ExtensionObject">
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
<opc:Field Name="ReleaseContinuationPoint" TypeName="opc:Boolean" />
 <opc:Field Name="ContinuationPoint" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:StructuredType Name="QueryNextResponse" BaseType="ua:ExtensionObject">
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
<opc:Field Name="NoOfQueryDataSets" TypeName="opc:Int32" />
 <opc:Field Name="QueryDataSets" TypeName="tns:QueryDataSet" LengthField="NoOfQueryDataSets" />
 <opc:Field Name="RevisedContinuationPoint" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:EnumeratedType Name="TimestampsToReturn" LengthInBits="32">
 <opc:EnumeratedValue Name="Source" Value="0" />
 <opc:EnumeratedValue Name="Server" Value="1" />
 <opc:EnumeratedValue Name="Both" Value="2" />
 <opc:EnumeratedValue Name="Neither" Value="3" />
 <opc:EnumeratedValue Name="Invalid" Value="4" />
</opc:EnumeratedType>
<opc:StructuredType Name="ReadValueId" BaseType="ua:ExtensionObject">
 <opc:Field Name="NodeId" TypeName="ua:NodeId" />
<opc:Field Name="AttributeId" TypeName="opc:UInt32" />
 <opc:Field Name="IndexRange" TypeName="opc:String" />
 <opc:Field Name="DataEncoding" TypeName="ua:QualifiedName" />
</opc:StructuredType>
<opc:StructuredType Name="ReadRequest" BaseType="ua:ExtensionObject">
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="MaxAge" TypeName="opc:Double" />
 <opc:Field Name="TimestampsToReturn" TypeName="tns:TimestampsToReturn" />
 <opc:Field Name="NoOfNodesToRead" TypeName="opc:Int32" />
 <opc:Field Name="NodesToRead" TypeName="tns:ReadValueId" LengthField="NoOfNodesToRead" />
</opc:StructuredType>
<opc:StructuredType Name="ReadResponse" BaseType="ua:ExtensionObject">
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="ua:DataValue" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
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<opc:StructuredType Name="HistoryReadValueId" BaseType="ua:ExtensionObject">
 <opc:Field Name="NodeId" TypeName="ua:NodeId" />
 <opc:Field Name="IndexRange" TypeName="opc:String" />
 <opc:Field Name="DataEncoding" TypeName="ua:QualifiedName" />
 <opc:Field Name="ContinuationPoint" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:StructuredType Name="HistoryReadResult" BaseType="ua:ExtensionObject">
<opc:Field Name="StatusCode" TypeName="ua:StatusCode" />
<opc:Field Name="ContinuationPoint" TypeName="opc:ByteString" />
 <opc:Field Name="HistoryData" TypeName="ua:ExtensionObject" />
</opc:StructuredType>
<opc:StructuredType Name="HistoryReadDetails" BaseType="ua:ExtensionObject">
</opc:StructuredType>
<opc:StructuredType Name="ReadEventDetails" BaseType="tns:HistoryReadDetails">
 <opc:Field Name="NumValuesPerNode" TypeName="opc:UInt32" />
 <opc:Field Name="StartTime" TypeName="opc:DateTime" />
 <opc:Field Name="EndTime" TypeName="opc:DateTime" />
 <opc:Field Name="Filter" TypeName="tns:EventFilter" />
</opc:StructuredType>
<opc:StructuredType Name="ReadRawModifiedDetails" BaseType="tns:HistoryReadDetails">
 <opc:Field Name="IsReadModified" TypeName="opc:Boolean" />
 <opc:Field Name="StartTime" TypeName="opc:DateTime" />
 <opc:Field Name="EndTime" TypeName="opc:DateTime" />
 <opc:Field Name="NumValuesPerNode" TypeName="opc:UInt32" />
 <opc:Field Name="ReturnBounds" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="ReadProcessedDetails" BaseType="tns:HistoryReadDetails">
 <opc:Field Name="StartTime" TypeName="opc:DateTime" />
 <opc:Field Name="EndTime" TypeName="opc:DateTime" />
 <opc:Field Name="ProcessingInterval" TypeName="opc:Double" />
 <opc:Field Name="NoOfAggregateType" TypeName="opc:Int32" />
 <opc:Field Name="AggregateType" TypeName="ua:NodeId" LengthField="NoOfAggregateType" />
 <opc:Field Name="AggregateConfiguration" TypeName="tns:AggregateConfiguration" />
</opc:StructuredType>
<opc:StructuredType Name="ReadAtTimeDetails" BaseType="tns:HistoryReadDetails">
<opc:Field Name="NoOfReqTimes" TypeName="opc:Int32" />
 <opc:Field Name="ReqTimes" TypeName="opc:DateTime" LengthField="NoOfReqTimes" />
 <opc:Field Name="UseSimpleBounds" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="HistoryData" BaseType="ua:ExtensionObject">
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<opc:Field Name="NoOfDataValues" TypeName="opc:Int32" />
 <opc:Field Name="DataValues" TypeName="ua:DataValue" LengthField="NoOfDataValues" />
</opc:StructuredType>
<opc:StructuredType Name="ModificationInfo" BaseType="ua:ExtensionObject">
 <opc:Field Name="ModificationTime" TypeName="opc:DateTime" />
 <opc:Field Name="UpdateType" TypeName="tns:HistoryUpdateType" />
 <opc:Field Name="UserName" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="HistoryModifiedData" BaseType="tns:HistoryData">
 <opc:Field Name="NoOfDataValues" TypeName="opc:Int32" />
 <opc:Field Name="DataValues" TypeName="ua:DataValue" LengthField="NoOfDataValues" />
 <opc:Field Name="NoOfModificationInfos" TypeName="opc:Int32" />
 <opc:Field Name="ModificationInfos" TypeName="tns:ModificationInfo"</pre>
LengthField="NoOfModificationInfos" />
</opc:StructuredType>
<opc:StructuredType Name="HistoryEvent" BaseType="ua:ExtensionObject">
 <opc:Field Name="NoOfEvents" TypeName="opc:Int32" />
 <opc:Field Name="Events" TypeName="tns:HistoryEventFieldList" LengthField="NoOfEvents" />
</opc:StructuredType>
<opc:StructuredType Name="HistoryReadRequest" BaseType="ua:ExtensionObject">
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="HistoryReadDetails" TypeName="ua:ExtensionObject" />
 <opc:Field Name="TimestampsToReturn" TypeName="tns:TimestampsToReturn" />
 <opc:Field Name="ReleaseContinuationPoints" TypeName="opc:Boolean" />
 <opc:Field Name="NoOfNodesToRead" TypeName="opc:Int32" />
 <opc:Field Name="NodesToRead" TypeName="tns:HistoryReadValueId" LengthField="NoOfNodesToRead" />
</opc:StructuredType>
<opc:StructuredType Name="HistoryReadResponse" BaseType="ua:ExtensionObject">
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="tns:HistoryReadResult" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="WriteValue" BaseType="ua:ExtensionObject">
 <opc:Field Name="NodeId" TypeName="ua:NodeId" />
 <opc:Field Name="AttributeId" TypeName="opc:UInt32" />
 <opc:Field Name="IndexRange" TypeName="opc:String" />
 <opc:Field Name="Value" TypeName="ua:DataValue" />
</opc:StructuredType>
<opc:StructuredType Name="WriteRequest" BaseType="ua:ExtensionObject">
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<opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="NoOfNodesToWrite" TypeName="opc:Int32" />
 <opc:Field Name="NodesToWrite" TypeName="tns:WriteValue" LengthField="NoOfNodesToWrite" />
</opc:StructuredType>
<opc:StructuredType Name="WriteResponse" BaseType="ua:ExtensionObject">
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
<opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="ua:StatusCode" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
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<opc:StructuredType Name="TransferSubscriptionsResponse" BaseType="ua:ExtensionObject">
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 <opc:EnumeratedValue Name="Suspended" Value="3" />
 <opc:EnumeratedValue Name="Shutdown" Value="4" />
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 <opc:EnumeratedValue Name="Unknown" Value="7" />
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 <opc:Field Name="RejectedSessionCount" TypeName="opc:UInt32" />
 <opc:Field Name="SessionTimeoutCount" TypeName="opc:UInt32" />
 <opc:Field Name="SessionAbortCount" TypeName="opc:UInt32" />
 <opc:Field Name="CurrentSubscriptionCount" TypeName="opc:UInt32" />
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 <opc:Field Name="PublishingIntervalCount" TypeName="opc:UInt32" />
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 <opc:Field Name="ServerUri" TypeName="opc:String" />
 <opc:Field Name="EndpointUrl" TypeName="opc:String" />
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 <opc:Field Name="ClientConnectionTime" TypeName="opc:DateTime" />
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<opc:Field Name="ClientLastContactTime" TypeName="opc:DateTime" />
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 <opc:Field Name="CurrentPublishRequestsInQueue" TypeName="opc:UInt32" />
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 <opc:Field Name="SetMonitoringModeCount" TypeName="tns:ServiceCounterDataType" />
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 <opc:Field Name="TranslateBrowsePathsToNodeIdsCount" TypeName="tns:ServiceCounterDataType" />
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 <opc:Field Name="QueryNextCount" TypeName="tns:ServiceCounterDataType" />
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<opc:StructuredType Name="SubscriptionDiagnosticsDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="SessionId" TypeName="ua:NodeId" />
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 <opc:Field Name="LastMethodCall" TypeName="opc:String" />
 <opc:Field Name="LastMethodSessionId" TypeName="ua:NodeId" />
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## 1.8 skalibs 2.11.0.0-r0

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# 1.9 ip-regex 2.1.0

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# 1.10 glob 7.2.3

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# 1.11 popsicle-transport-http 1.2.1

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## 1.12 cross-fetch 3.1.5

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## 1.13 cron 2.1.0

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## 1.16 make-error-cause 2.3.0

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## 1.17 servie/events 1.0.0

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## 1.18 lodash 4.17.21

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## 1.21 azure-iot-sdk-c 1.3.9

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Upstream-Name: azure-iot-sdk-c

Source: https://github.com/Azure/azure-iot-sdk-c.git

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Upstream-Name: iothub-client-sample-firmware-update Source: https://github.com/Azure/azure-iot-sdks.git

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# 1.42 open62541 v1.2.3 dev-280-gff87c287

<opc:TypeDictionary xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"</pre>

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xmlns:tns="http://opcfoundation.org/UA/POWERLINK/" DefaultByteOrder="LittleEndian"
xmlns:opc="http://opcfoundation.org/BinarySchema/" xmlns:ua="http://opcfoundation.org/UA/"
TargetNamespace="http://opcfoundation.org/UA/POWERLINK/">
<opc:Import Namespace="http://opcfoundation.org/UA/"/>
<opc:StructuredType BaseType="ua:ExtensionObject" Name="ErrorRegisterBits">
<opc:Documentation>Represents the values of the POWERLINK ErrorRegister </opc:Documentation>
<opc:Field TypeName="opc:ByteString" Name="Value"/>

```
<opc:Field TypeName="opc:ByteString" Name="ValidBits"/>
 </opc:StructuredType>
 <opc:StructuredType BaseType="ua:ExtensionObject" Name="PowerlinkAttribute">
    <opc:Documentation>Represents the POWERLINK entry attributes/opc:Documentation>
   <opc:Field TypeName="opc:ByteString" Name="Value"/>
    <opc:Field TypeName="opc:ByteString" Name="ValidBits"/>
 </opc:StructuredType>
 <opc:StructuredType BaseType="ua:ExtensionObject" Name="PowerlinkErrorEntryDataType">
    <opc:Documentation>Represents the entries of the POWERLINK Object ERR_History_ADOM (Object 1003h,
SubIndex 1..254)</opc:Documentation>
   <opc:Field TypeName="opc:UInt16" Name="entryType"/>
    <opc:Field TypeName="opc:UInt16" Name="errorCode"/>
   <opc:Field TypeName="opc:UInt64" Name="timeStamp"/>
   <opc:Field TypeName="opc:UInt64" Name="additionalInformation"/>
 </opc:StructuredType>
 <opc:StructuredType BaseType="ua:ExtensionObject" Name="PowerlinkIpAddressDataType">
    <opc:Documentation>Structure DataType PowerlinkIpAddressDataType to represent POWERLINK Objects of
the POWERLINK data type IP ADDRESS</opc:Documentation>
   <opc:Field TypeName="opc:Byte" Name="b1"/>
   <opc:Field TypeName="opc:Byte" Name="b2"/>
    <opc:Field TypeName="opc:Byte" Name="b3"/>
    <opc:Field TypeName="opc:Byte" Name="b4"/>
 </opc:StructuredType>
 <opc:StructuredType BaseType="ua:ExtensionObject" Name="PowerlinkPDOMappingEntryDataType">
    <opc:Documentation>Structure DataType PowerlinkPDOMappingEntryDataType to represent the entries of
POWERLINK Objects like PDO RxCommParam 00h REC</opc:Documentation>
   <opc:Field TypeName="opc:UInt16" Name="length"/>
   <opc:Field TypeName="opc:UInt16" Name="offset"/>
   <opc:Field TypeName="opc:Byte" Name="reserved"/>
   <opc:Field TypeName="opc:Byte" Name="subIndex"/>
    <opc:Field TypeName="opc:UInt16" Name="index"/>
 </opc:StructuredType>
 <opc:EnumeratedType LengthInBits="32" Name="PowerlinkNMTResetCmdEnumeration">
    <opc:Documentation>This DataType is an Enumeration that represents the NMT reset commands for
POWERLINK</opc:Documentation>
    <opc:EnumeratedValue Name="NMTResetNode" Value="40"/>
   <opc:EnumeratedValue Name="NMTResetCommunication" Value="41"/>
    <opc:EnumeratedValue Name="NMTResetConfiguration" Value="42"/>
    <opc:EnumeratedValue Name="NMTSwReset" Value="43"/>
    <opc:EnumeratedValue Name="NMTInvalidService" Value="255"/>
 </opc:EnumeratedType>
 <opc:EnumeratedType LengthInBits="32" Name="PowerlinkNMTStateEnumeration">
   <opc:Documentation>This DataType is an enumeration that represents the NMT State/opc:Documentation>
    <opc:EnumeratedValue Name="NMT_GS_OFF" Value="0"/>
    <opc:EnumeratedValue Name="NMT_GS_INITIALISING" Value="25"/>
    <opc:EnumeratedValue Name="NMT_GS_RESET_APPLICATION" Value="41"/>
    <opc:EnumeratedValue Name="NMT_GS_RESET_COMMUNICATION" Value="57"/>
    <opc:EnumeratedValue Name="NMT_GS_RESET_CONFIGURATION" Value="121"/>
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<opc:EnumeratedValue Name="MULTIPLE_IDENTIFIERS" Value="9"/>
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<opc:TypeDictionary
xmlns:opc="http://opcfoundation.org/BinarySchema/"</pre>

```
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:ua="http://opcfoundation.org/UA/"
xmlns:tns="http://opcfoundation.org/UA/"
DefaultByteOrder="LittleEndian"
TargetNamespace="http://opcfoundation.org/UA/"
<opc:Import Namespace="http://opcfoundation.org/BinarySchema/" />
<!-- Transport types begin -->
<opc:EnumeratedType Name="MessageType" LengthInBits="32">
 <opc:Documentation>Message Type and whether the message contains an intermediate
chunk</opc:Documentation>
 <opc:EnumeratedValue Name="ACK" Value="0x4B4341" />
 <opc:EnumeratedValue Name="HEL" Value="0x4C4548" />
 <opc:EnumeratedValue Name="MSG" Value="0x47534D" />
 <opc:EnumeratedValue Name="OPN" Value="0x4E504F" />
 <opc:EnumeratedValue Name="CLO" Value="0x4F4C43" />
 <opc:EnumeratedValue Name="ERR" Value="0x525245" />
 <opc:EnumeratedValue Name="INVALID" Value="0x0" />
</opc:EnumeratedType>
<opc:EnumeratedType Name="ChunkType" LengthInBits="32">
 <opc:Documentation>Type of the chunk/opc:Documentation>
 <opc:EnumeratedValue Name="FINAL" Value="0x46000000" />
 <opc:EnumeratedValue Name="INTERMEDIATE" Value="0x43000000" />
 <opc:EnumeratedValue Name="ABORT" Value="0x41000000" />
</opc:EnumeratedType>
<opc:StructuredType Name="TcpMessageHeader">
 <opc:Documentation>TCP Header/opc:Documentation>
 <opc:Field Name="MessageTypeAndChunkType" TypeName="opc:UInt32" />
 <opc:Field Name="MessageSize" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="TcpHelloMessage">
 <opc:Documentation>Hello Message/opc:Documentation>
 <opc:Field Name="ProtocolVersion" TypeName="opc:UInt32" />
 <opc:Field Name="ReceiveBufferSize" TypeName="opc:UInt32" />
 <opc:Field Name="SendBufferSize" TypeName="opc:UInt32" />
 <opc:Field Name="MaxMessageSize" TypeName="opc:UInt32" />
<opc:Field Name="MaxChunkCount" TypeName="opc:UInt32" />
 <opc:Field Name="EndpointUrl" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="TcpAcknowledgeMessage">
 <opc:Documentation>Acknowledge Message/opc:Documentation>
```

```
<opc:Field Name="ProtocolVersion" TypeName="opc:UInt32" />
 <opc:Field Name="ReceiveBufferSize" TypeName="opc:UInt32" />
 <opc:Field Name="SendBufferSize" TypeName="opc:UInt32" />
 <opc:Field Name="MaxMessageSize" TypeName="opc:UInt32" />
<opc:Field Name="MaxChunkCount" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="TcpErrorMessage">
 <opc:Documentation>Error Message/opc:Documentation>
 <opc:Field Name="Error" TypeName="opc:UInt32" />
 <opc:Field Name="Reason" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="AsymmetricAlgorithmSecurityHeader">
 <opc:Documentation>Asymmetric Security Header</opc:Documentation>
 <opc:Field Name="SecurityPolicyUri" TypeName="opc:ByteString" />
 <opc:Field Name="SenderCertificate" TypeName="opc:ByteString" />
 <opc:Field Name="ReceiverCertificateThumbprint" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:StructuredType Name="SymmetricAlgorithmSecurityHeader">
 <opc:Documentation>Symmetric Security Header/opc:Documentation>
 <opc:Field Name="TokenId" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="SequenceHeader">
 <opc:Documentation>Secure Layer Sequence Header/opc:Documentation>
 <opc:Field Name="SequenceNumber" TypeName="opc:UInt32" />
 <opc:Field Name="RequestId" TypeName="opc:UInt32"/>
</opc:StructuredType>
<!-- Transport types end -->
</opc:TypeDictionary>
<?xml version="1.0" encoding="utf-8" ?>
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<opc:TypeDictionary
xmlns:opc="http://opcfoundation.org/BinarySchema/"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:ua="http://opcfoundation.org/UA/"
xmlns:tns="http://yourorganisation.org/test/"
DefaultByteOrder="LittleEndian"
TargetNamespace="http://yourorganisation.org/test/"
<opc:Import Namespace="http://opcfoundation.org/UA/" Location="Opc.Ua.BinarySchema.bsd"/>
<opc:StructuredType Name="Point" BaseType="ua:ExtensionObject">
 <opc:Field Name="x" TypeName="opc:Double" />
 <opc:Field Name="y" TypeName="opc:Double" />
</opc:StructuredType>
<opc:StructuredType Name="NestedPoint" BaseType="ua:ExtensionObject">
 <opc:Field Name="x" TypeName="opc:Double" />
 <opc:Field Name="y" TypeName="opc:Double" />
 <opc:Field Name="point1" TypeName="tns:Point" />
</opc:StructuredType>
 <opc:StructuredType Name="PointWithArray" BaseType="ua:ExtensionObject">
 <opc:Field Name="x" TypeName="opc:Double" />
 <opc:Field Name="y" TypeName="opc:Double" />
 <opc:Field Name="z" TypeName="opc:Double" />
 <opc:Field Name="array1Size" TypeName="opc:UInt32" />
 <opc:Field Name="array1" TypeName="opc:Double" LengthField="array1Size" />
</opc:StructuredType>
<opc:StructuredType BaseType="ua:Union" Name="SelfContainingUnion">
 <opc:Field TypeName="opc:UInt32" Name="SwitchField"/>
 <opc:Field SwitchField="SwitchField" TypeName="opc:Double" SwitchValue="1" Name="Double"/>
```

```
<opc:Field SwitchField="SwitchField" TypeName="opc:Int32" SwitchValue="2" Name="NoOfArray"/>
 <opc:Field LengthField="NoOfArray" SwitchField="SwitchField" TypeName="tns:SelfContainingUnion"</pre>
SwitchValue="2" Name="Array"/>
</opc:StructuredType>
</opc:TypeDictionary>
<opc:TypeDictionary xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"</pre>
xmlns:tns="http://opcfoundation.org/UA/AutoID/" DefaultByteOrder="LittleEndian"
xmlns:opc="http://opcfoundation.org/BinarySchema/" xmlns:ua="http://opcfoundation.org/UA/"
TargetNamespace="http://opcfoundation.org/UA/AutoID/">
<opc:Import Namespace="http://opcfoundation.org/UA/"/>
<opc:StructuredType BaseType="ua:ExtensionObject" Name="StructWithBitsWithoutOF">
<opc:Field TypeName="opc:Bit" Name="Bit3"/>
<opc:Field TypeName="opc:CharArray" Name="AntennaName"/>
</opc:StructuredType>
<opc:StructuredType BaseType="ua:ExtensionObject" Name="StructWithOFBitsNotAtBeginning">
<opc:Field TypeName="opc:Double" Name="testDouble"/>
<opc:Field TypeName="opc:Bit" Name="AntennaNameSpecified"/>
<opc:Field Length="31" TypeName="opc:Bit" Name="Reserved1"/>
<opc:Field SwitchField="AntennaNameSpecified" TypeName="opc:CharArray" Name="AntennaName"/>
</opc:StructuredType>
<opc:StructuredType BaseType="ua:ExtensionObject" Name="StructWithOFWithoutSpecified">
<opc:Field TypeName="opc:Bit" Name="AntennaNameSpec"/>
<opc:Field Length="31" TypeName="opc:Bit" Name="Reserved1"/>
<opc:Field TypeName="opc:Double" Name="testDouble"/>
<opc:Field SwitchField="AntennaNameSpec" TypeName="opc:CharArray" Name="AntennaName"/>
</opc:StructuredType>
<opc:StructuredType BaseType="ua:ExtensionObject" Name="StructWithOFWithoutSwitchField">
<opc:Field TypeName="opc:Bit" Name="AntennaNameSpecified"/>
<opc:Field Length="31" TypeName="opc:Bit" Name="Reserved1"/>
<opc:Field TypeName="opc:Double" Name="testDouble"/>
<opc:Field TypeName="opc:CharArray" Name="AntennaName"/>
</opc:StructuredType>
<opc:StructuredType BaseType="ua:ExtensionObject" Name="StructWithOFWithoutReserved1">
<opc:Field TypeName="opc:Bit" Name="AntennaNameSpecified"/>
<opc:Field TypeName="opc:Double" Name="testDouble"/>
<opc:Field SwitchField="AntennaNameSpecified" TypeName="opc:CharArray" Name="AntennaName"/>
</opc:StructuredType>
</opc:TypeDictionary>
<?xml version="1.0" encoding="utf-8" ?>
<!--
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<opc:TypeDictionary</pre>
xmlns:opc="http://opcfoundation.org/BinarySchema/"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:ua="http://opcfoundation.org/UA/"
xmlns:tns="http://yourorganisation.org/test/"
DefaultByteOrder="LittleEndian"
TargetNamespace="http://yourorganisation.org/test/"
<opc:Import Namespace="http://opcfoundation.org/UA/" Location="Opc.Ua.BinarySchema.bsd"/>
<opc:StructuredType Name="Point" BaseType="ua:ExtensionObject">
 <opc:Field Name="x" TypeName="opc:Double" />
 <opc:Field Name="y" TypeName="opc:Double" />
</opc:StructuredType>
<opc:StructuredType Name="NestedPoint" BaseType="ua:ExtensionObject">
 <opc:Field Name="x" TypeName="opc:Double" />
 <opc:Field Name="y" TypeName="opc:Double" />
 <opc:Field Name="point1" TypeName="tns:Point" />
</opc:StructuredType>
 <opc:StructuredType Name="PointWithArray" BaseType="ua:ExtensionObject">
 <opc:Field Name="x" TypeName="opc:Double" />
 <opc:Field Name="y" TypeName="opc:Double" />
 <opc:Field Name="z" TypeName="opc:Double" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="array1" TypeName="opc:Double" LengthField="NoOfArrayDimensions" />
```

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```
</opc:StructuredType>
<opc:StructuredType Name="PointWithPointArray" BaseType="ua:ExtensionObject">
 <opc:Field Name="x" TypeName="opc:Double" />
 <opc:Field Name="y" TypeName="opc:Double" />
 <opc:Field Name="z" TypeName="opc:Double" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="array1" TypeName="tns:Point" LengthField="NoOfArrayDimensions" />
</opc:StructuredType>
</opc:TypeDictionary>
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* http://opcfoundation.org/License/MIT/1.00/
```

-->

```
<opc:TypeDictionary</pre>
xmlns:opc="http://opcfoundation.org/BinarySchema/"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:ua="http://opcfoundation.org/UA/"
xmlns:tns="http://opcfoundation.org/UA/"
DefaultByteOrder="LittleEndian"
TargetNamespace="http://opcfoundation.org/UA/"
<opc:Import Namespace="http://opcfoundation.org/BinarySchema/" />
<opc:StructuredType Name="XmlElement">
 <opc:Documentation>An XML element encoded as a UTF-8 string./opc:Documentation>
 <opc:Field Name="Length" TypeName="opc:Int32" />
 <opc:Field Name="Value" TypeName="opc:Char" LengthField="Length" />
</opc:StructuredType>
<opc:EnumeratedType Name="NodeIdType" LengthInBits="6">
 <opc:Documentation>The possible encodings for a NodeId value.
 <opc:EnumeratedValue Name="TwoByte" Value="0" />
 <opc:EnumeratedValue Name="FourByte" Value="1" />
 <opc:EnumeratedValue Name="Numeric" Value="2" />
 <opc:EnumeratedValue Name="String" Value="3" />
 <opc:EnumeratedValue Name="Guid" Value="4" />
 <opc:EnumeratedValue Name="ByteString" Value="5" />
</opc:EnumeratedType>
<opc:StructuredType Name="TwoByteNodeId">
 <opc:Field Name="Identifier" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="FourByteNodeId">
 <opc:Field Name="NamespaceIndex" TypeName="opc:Byte" />
 <opc:Field Name="Identifier" TypeName="opc:UInt16" />
</opc:StructuredType>
<opc:StructuredType Name="NumericNodeId">
 <opc:Field Name="NamespaceIndex" TypeName="opc:UInt16" />
 <opc:Field Name="Identifier" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="StringNodeId">
 <opc:Field Name="NamespaceIndex" TypeName="opc:UInt16" />
 <opc:Field Name="Identifier" TypeName="opc:CharArray" />
</opc:StructuredType>
<opc:StructuredType Name="GuidNodeId">
 <opc:Field Name="NamespaceIndex" TypeName="opc:UInt16" />
```

```
<opc:Field Name="Identifier" TypeName="opc:Guid" />
</opc:StructuredType>
<opc:StructuredType Name="ByteStringNodeId">
 <opc:Field Name="NamespaceIndex" TypeName="opc:UInt16" />
 <opc:Field Name="Identifier" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:StructuredType Name="NodeId">
 <opc:Documentation>An identifier for a node in a UA server address space.
 <opc:Field Name="NodeIdType" TypeName="ua:NodeIdType" />
 <opc:Field Name="Reserved1" TypeName="opc:Bit" Length="2" />
 <opc:Field Name="TwoByte" TypeName="ua:TwoByteNodeId" SwitchField="NodeIdType" SwitchValue="0" />
 <opc:Field Name="FourByte" TypeName="ua:FourByteNodeId" SwitchField="NodeIdType" SwitchValue="1"</pre>
 <opc:Field Name="Numeric" TypeName="ua:NumericNodeId" SwitchField="NodeIdType" SwitchValue="2" />
 <opc:Field Name="String" TypeName="ua:StringNodeId" SwitchField="NodeIdType" SwitchValue="3" />
 <opc:Field Name="Guid" TypeName="ua:GuidNodeId" SwitchField="NodeIdType" SwitchValue="4" />
 <opc:Field Name="ByteString" TypeName="ua:ByteStringNodeId" SwitchField="NodeIdType"</pre>
SwitchValue="5" />
</opc:StructuredType>
<opc:StructuredType Name="ExpandedNodeId">
 <opc:Documentation>An identifier for a node in a UA server address space qualified with a complete namespace
string.</opc:Documentation>
 <opc:Field Name="NodeIdType" TypeName="ua:NodeIdType" />
 <opc:Field Name="ServerIndexSpecified" TypeName="opc:Bit" />
 <opc:Field Name="NamespaceURISpecified" TypeName="opc:Bit" />
 <opc:Field Name="TwoByte" TypeName="ua:TwoByteNodeId" SwitchField="NodeIdType" SwitchValue="0" />
 <opc:Field Name="FourByte" TypeName="ua:FourByteNodeId" SwitchField="NodeIdType" SwitchValue="1"</pre>
/>
 <opc:Field Name="Numeric" TypeName="ua:NumericNodeId" SwitchField="NodeIdType" SwitchValue="2" />
 <opc:Field Name="String" TypeName="ua:StringNodeId" SwitchField="NodeIdType" SwitchValue="3" />
 <opc:Field Name="Guid" TypeName="ua:GuidNodeId" SwitchField="NodeIdType" SwitchValue="4" />
 <opc:Field Name="ByteString" TypeName="ua:ByteStringNodeId" SwitchField="NodeIdType"</pre>
SwitchValue="5" />
 <opc:Field Name="NamespaceURI" TypeName="opc:CharArray" SwitchField="NamespaceURISpecified"/>
 <opc:Field Name="ServerIndex" TypeName="opc:UInt32" SwitchField="ServerIndexSpecified"/>
</opc:StructuredType>
<opc:OpaqueType Name="StatusCode" LengthInBits="32" ByteOrderSignificant="true">
 <opc:Documentation>A 32-bit status code value./opc:Documentation>
</opc:OpaqueType>
<opc:StructuredType Name="DiagnosticInfo">
 <opc:Documentation>A recursive structure containing diagnostic information associated with a status
code.</opc:Documentation>
 <opc:Field Name="SymbolicIdSpecified" TypeName="opc:Bit" />
```

```
<opc:Field Name="NamespaceURISpecified" TypeName="opc:Bit" />
 <opc:Field Name="LocaleSpecified" TypeName="opc:Bit" />
 <opc:Field Name="LocalizedTextSpecified" TypeName="opc:Bit" />
 <opc:Field Name="AdditionalInfoSpecified" TypeName="opc:Bit" />
 <opc:Field Name="InnerStatusCodeSpecified" TypeName="opc:Bit" />
 <opc:Field Name="InnerDiagnosticInfoSpecified" TypeName="opc:Bit" />
 <opc:Field Name="Reserved1" TypeName="opc:Bit" Length="2" />
 <opc:Field Name="SymbolicId" TypeName="opc:Int32" SwitchField="SymbolicIdSpecified" />
 <opc:Field Name="NamespaceURI" TypeName="opc:Int32" SwitchField="NamespaceURISpecified" />
 <opc:Field Name="Locale" TypeName="opc:Int32" SwitchField="LocaleSpecified" />
 <opc:Field Name="LocalizedText" TypeName="opc:Int32" SwitchField="LocalizedTextSpecified" />
 <opc:Field Name="AdditionalInfo" TypeName="opc:CharArray" SwitchField="AdditionalInfoSpecified" />
 <opc:Field Name="InnerStatusCode" TypeName="ua:StatusCode" SwitchField="InnerStatusCodeSpecified" />
 <opc:Field Name="InnerDiagnosticInfo" TypeName="ua:DiagnosticInfo"</pre>
SwitchField="InnerDiagnosticInfoSpecified" />
</opc:StructuredType>
<opc:StructuredType Name="QualifiedName">
 <opc:Documentation>A string qualified with a namespace index./opc:Documentation>
 <opc:Field Name="NamespaceIndex" TypeName="opc:UInt16" />
 <opc:Field Name="Name" TypeName="opc:CharArray" />
</opc:StructuredType>
<opc:StructuredType Name="LocalizedText">
 <opc:Documentation>A string qualified with a namespace index./opc:Documentation>
 <opc:Field Name="LocaleSpecified" TypeName="opc:Bit" />
 <opc:Field Name="TextSpecified" TypeName="opc:Bit" />
 <opc:Field Name="Reserved1" TypeName="opc:Bit" Length="6" />
 <opc:Field Name="Locale" TypeName="opc:CharArray" SwitchField="LocaleSpecified" />
 <opc:Field Name="Text" TypeName="opc:CharArray" SwitchField="TextSpecified" />
</opc:StructuredType>
<opc:StructuredType Name="DataValue">
 <opc:Documentation>A value with an associated timestamp, and quality./opc:Documentation>
 <opc:Field Name="ValueSpecified" TypeName="opc:Bit" />
 <opc:Field Name="StatusCodeSpecified" TypeName="opc:Bit" />
 <opc:Field Name="SourceTimestampSpecified" TypeName="opc:Bit" />
 <opc:Field Name="SourcePicosecondsSpecified" TypeName="opc:Bit" />
 <opc:Field Name="ServerTimestampSpecified" TypeName="opc:Bit" />
 <opc:Field Name="ServerPicosecondsSpecified" TypeName="opc:Bit" />
 <opc:Field Name="Reserved1" TypeName="opc:Bit" Length="2" />
 <opc:Field Name="Value" TypeName="ua:Variant" SwitchField="ValueSpecified" />
 <opc:Field Name="StatusCode" TypeName="ua:StatusCode" SwitchField="StatusCodeSpecified" />
 <opc:Field Name="SourceTimestamp" TypeName="opc:DateTime" SwitchField="SourceTimestampSpecified" />
 <opc:Field Name="SourcePicoseconds" TypeName="opc:UInt16" SwitchField="SourcePicosecondsSpecified" />
 <opc:Field Name="ServerTimestamp" TypeName="opc:DateTime" SwitchField="ServerTimestampSpecified" />
 <opc:Field Name="ServerPicoseconds" TypeName="opc:UInt16" SwitchField="ServerPicosecondsSpecified" />
</opc:StructuredType>
```

```
<opc:StructuredType Name="ExtensionObject">
  <opc:Documentation>A serialized object prefixed with its data type identifier.</opc:Documentation>
  <opc:Field Name="TypeIdSpecified" TypeName="opc:Bit" />
  <opc:Field Name="BinaryBody" TypeName="opc:Bit" />
  <opc:Field Name="XmlBody" TypeName="opc:Bit" />
  <opc:Field Name="Reserved1" TypeName="opc:Bit" Length="5" />
 <opc:Field Name="TypeId" TypeName="ua:ExpandedNodeId" SwitchField="TypeIdSpecified" />
  <opc:Field Name="BodyLength" TypeName="opc:Int32" />
  <opc:Field Name="Body" TypeName="opc:Byte" LengthField="BodyLength" />
</opc:StructuredType>
<opc:StructuredType Name="Variant">
  <opc:Documentation>A union of several types./opc:Documentation>
  <opc:Field Name="VariantType" TypeName="opc:Bit" Length="6" />
  <opc:Field Name="ArrayDimensionsSpecified" TypeName="opc:Bit" Length="1"/>
 <opc:Field Name="ArrayLengthSpecified" TypeName="opc:Bit" Length="1"/>
  <opc:Field Name="ArrayLength" TypeName="opc:Int32" SwitchField="ArrayLengthSpecified" />
  <opc:Field Name="Boolean" TypeName="opc:Boolean" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="1"/>
  <opc:Field Name="SByte" TypeName="opc:SByte" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="2" />
  <opc:Field Name="Byte" TypeName="opc:Byte" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="3" />
  <opc:Field Name="Int16" TypeName="opc:Int16" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="4" />
  <opc:Field Name="UInt16" TypeName="opc:UInt16" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="5"/>
  <opc:Field Name="Int32" TypeName="opc:Int32" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="6" />
  <opc:Field Name="UInt32" TypeName="opc:UInt32" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="7" />
  <opc:Field Name="Int64" TypeName="opc:Int64" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="8"/>
  <opc:Field Name="UInt64" TypeName="opc:UInt64" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="9" />
  <opc:Field Name="Float" TypeName="opc:Float" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="10" />
  <opc:Field Name="Double" TypeName="opc:Double" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="11" />
  <opc:Field Name="String" TypeName="opc:CharArray" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="12" />
  <opc:Field Name="DateTime" TypeName="opc:DateTime" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="13" />
  <opc:Field Name="Guid" TypeName="opc:Guid" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="14" />
  <opc:Field Name="ByteString" TypeName="opc:ByteString" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="15" />
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<opc:Field Name="XmlElement" TypeName="ua:XmlElement" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="16" />
  <opc:Field Name="NodeId" TypeName="ua:NodeId" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="17" />
  <opc:Field Name="ExpandedNodeId" TypeName="ua:ExpandedNodeId" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="18" />
  <opc:Field Name="StatusCode" TypeName="ua:StatusCode" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="19" />
  <opc:Field Name="QualifiedName" TypeName="ua:QualifiedName" LengthField="ArrayLength"</p>
SwitchField="VariantType" SwitchValue="20" />
  <opc:Field Name="LocalizedText" TypeName="ua:LocalizedText" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="21" />
  <opc:Field Name="ExtensionObject" TypeName="ua:ExtensionObject" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="22" />
  <opc:Field Name="DataValue" TypeName="ua:DataValue" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="23" />
  <opc:Field Name="Variant" TypeName="ua:Variant" LengthField="ArrayLength" SwitchField="VariantType"</pre>
SwitchValue="24" />
  <opc:Field Name="DiagnosticInfo" TypeName="ua:DiagnosticInfo" LengthField="ArrayLength"</pre>
SwitchField="VariantType" SwitchValue="25" />
  <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" SwitchField="ArrayDimensionsSpecified"</pre>
/>
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SwitchField="ArrayDimensionsSpecified" />
</opc:StructuredType>
<opc:EnumeratedType Name="NamingRuleType" LengthInBits="32">
  <opc:EnumeratedValue Name="Mandatory" Value="1" />
  <opc:EnumeratedValue Name="Optional" Value="2" />
  <opc:EnumeratedValue Name="Constraint" Value="3" />
</opc:EnumeratedType>
<opc:OpaqueType Name="ImageBMP">
  <opc:Documentation>An image encoded in BMP format./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="ImageGIF">
  <opc:Documentation>An image encoded in GIF format.opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="ImageJPG">
  <opc:Documentation>An image encoded in JPEG format./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="ImagePNG">
  <opc:Documentation>An image encoded in PNG format.opc:Documentation>
</opc:OpaqueType>
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<opc:OpaqueType Name="AudioDataType">
 <opc:Documentation>An image encoded in PNG format./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="BitFieldMaskDataType">
 <opc:Documentation>A mask of 32 bits that can be updated individually by using the top 32 bits as a
mask.</opc:Documentation>
</opc:OpaqueType>
<opc:StructuredType Name="KeyValuePair" BaseType="ua:ExtensionObject">
 <opc:Field Name="Key" TypeName="ua:QualifiedName" />
 <opc:Field Name="Value" TypeName="ua:Variant" />
</opc:StructuredType>
<opc:StructuredType Name="EndpointType" BaseType="ua:ExtensionObject">
 <opc:Field Name="EndpointUrl" TypeName="opc:String" />
 <opc:Field Name="SecurityMode" TypeName="tns:MessageSecurityMode" />
 <opc:Field Name="SecurityPolicyUri" TypeName="opc:String" />
 <opc:Field Name="TransportProfileUri" TypeName="opc:String" />
</opc:StructuredType>
<opc:EnumeratedType Name="OpenFileMode" LengthInBits="32">
 <opc:EnumeratedValue Name="Read" Value="1" />
 <opc:EnumeratedValue Name="Write" Value="2" />
 <opc:EnumeratedValue Name="EraseExisting" Value="4" />
 <opc:EnumeratedValue Name="Append" Value="8" />
</opc:EnumeratedType>
<opc:EnumeratedType Name="IdentityCriteriaType" LengthInBits="32">
 <opc:EnumeratedValue Name="UserName" Value="1" />
 <opc:EnumeratedValue Name="Thumbprint" Value="2" />
 <opc:EnumeratedValue Name="Role" Value="3" />
 <opc:EnumeratedValue Name="GroupId" Value="4" />
 <opc:EnumeratedValue Name="Anonymous" Value="5" />
 <opc:EnumeratedValue Name="AuthenticatedUser" Value="6" />
</opc:EnumeratedType>
<opc:StructuredType Name="IdentityMappingRuleType" BaseType="ua:ExtensionObject">
 <opc:Field Name="CriteriaType" TypeName="tns:IdentityCriteriaType" />
 <opc:Field Name="Criteria" TypeName="opc:String" />
</opc:StructuredType>
<opc:EnumeratedType Name="TrustListMasks" LengthInBits="32">
 <opc:EnumeratedValue Name="None" Value="0" />
 <opc:EnumeratedValue Name="TrustedCertificates" Value="1" />
 <opc:EnumeratedValue Name="TrustedCrls" Value="2" />
 <opc:EnumeratedValue Name="IssuerCertificates" Value="4" />
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<opc:EnumeratedValue Name="IssuerCrls" Value="8" />
 <opc:EnumeratedValue Name="All" Value="15" />
</opc:EnumeratedType>
<opc:StructuredType Name="TrustListDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="SpecifiedLists" TypeName="opc:UInt32" />
 <opc:Field Name="NoOfTrustedCertificates" TypeName="opc:Int32" />
 <opc:Field Name="TrustedCertificates" TypeName="opc:ByteString" LengthField="NoOfTrustedCertificates" />
 <opc:Field Name="NoOfTrustedCrls" TypeName="opc:Int32" />
 <opc:Field Name="TrustedCrls" TypeName="opc:ByteString" LengthField="NoOfTrustedCrls" />
 <opc:Field Name="NoOfIssuerCertificates" TypeName="opc:Int32" />
 <opc:Field Name="IssuerCertificates" TypeName="opc:ByteString" LengthField="NoOfIssuerCertificates" />
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 <opc:Field Name="IssuerCrls" TypeName="opc:ByteString" LengthField="NoOfIssuerCrls" />
</opc:StructuredType>
<opc:StructuredType Name="DecimalDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="Scale" TypeName="opc:Int16" />
 <opc:Field Name="Value" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:StructuredType Name="DataTypeSchemaHeader" BaseType="ua:ExtensionObject">
 <opc:Field Name="NoOfNamespaces" TypeName="opc:Int32" />
 <opc:Field Name="Namespaces" TypeName="opc:String" LengthField="NoOfNamespaces" />
 <opc:Field Name="NoOfStructureDataTypes" TypeName="opc:Int32" />
 <opc:Field Name="StructureDataTypes" TypeName="tns:StructureDescription"</pre>
LengthField="NoOfStructureDataTypes" />
 <opc:Field Name="NoOfEnumDataTypes" TypeName="opc:Int32" />
 <opc:Field Name="EnumDataTypes" TypeName="tns:EnumDescription" LengthField="NoOfEnumDataTypes"</pre>
 <opc:Field Name="NoOfSimpleDataTypes" TypeName="opc:Int32" />
 <opc:Field Name="SimpleDataTypes" TypeName="tns:SimpleTypeDescription"</pre>
LengthField="NoOfSimpleDataTypes" />
</opc:StructuredType>
<opc:StructuredType Name="DataTypeDescription" BaseType="ua:ExtensionObject">
 <opc:Field Name="DataTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="Name" TypeName="ua:QualifiedName" />
</opc:StructuredType>
<opc:StructuredType Name="StructureDescription" BaseType="tns:DataTypeDescription">
 <opc:Field Name="DataTypeId" TypeName="ua:NodeId" SourceType="tns:DataTypeDescription" />
 <opc:Field Name="Name" TypeName="ua:QualifiedName" SourceType="tns:DataTypeDescription" />
 <opc:Field Name="StructureDefinition" TypeName="tns:StructureDefinition" />
</opc:StructuredType>
<opc:StructuredType Name="EnumDescription" BaseType="tns:DataTypeDescription">
 <opc:Field Name="DataTypeId" TypeName="ua:NodeId" SourceType="tns:DataTypeDescription" />
```

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<opc:Field Name="Name" TypeName="ua:QualifiedName" SourceType="tns:DataTypeDescription" />
 <opc:Field Name="EnumDefinition" TypeName="tns:EnumDefinition" />
 <opc:Field Name="BuiltInType" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="SimpleTypeDescription" BaseType="tns:DataTypeDescription">
 <opc:Field Name="DataTypeId" TypeName="ua:NodeId" SourceType="tns:DataTypeDescription" />
 <opc:Field Name="Name" TypeName="ua:QualifiedName" SourceType="tns:DataTypeDescription" />
 <opc:Field Name="BaseDataType" TypeName="ua:NodeId" />
 <opc:Field Name="BuiltInType" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="UABinaryFileDataType" BaseType="tns:DataTypeSchemaHeader">
 <opc:Field Name="NoOfNamespaces" TypeName="opc:Int32" />
 <opc:Field Name="Namespaces" TypeName="opc:String" LengthField="NoOfNamespaces" />
 <opc:Field Name="NoOfStructureDataTypes" TypeName="opc:Int32" />
 <opc:Field Name="StructureDataTypes" TypeName="tns:StructureDescription"</pre>
LengthField="NoOfStructureDataTypes" />
 <opc:Field Name="NoOfEnumDataTypes" TypeName="opc:Int32" />
 <opc:Field Name="EnumDataTypes" TypeName="tns:EnumDescription" LengthField="NoOfEnumDataTypes"</pre>
 <opc:Field Name="NoOfSimpleDataTypes" TypeName="opc:Int32" />
 <opc:Field Name="SimpleDataTypes" TypeName="tns:SimpleTypeDescription"</pre>
LengthField="NoOfSimpleDataTypes" />
 <opc:Field Name="SchemaLocation" TypeName="opc:String" />
 <opc:Field Name="NoOfFileHeader" TypeName="opc:Int32" />
 <opc:Field Name="FileHeader" TypeName="tns:KeyValuePair" LengthField="NoOfFileHeader" />
 <opc:Field Name="Body" TypeName="ua:Variant" />
</opc:StructuredType>
<opc:EnumeratedType Name="PubSubState" LengthInBits="32">
 <opc:EnumeratedValue Name="Disabled" Value="0" />
 <opc:EnumeratedValue Name="Paused" Value="1" />
 <opc:EnumeratedValue Name="Operational" Value="2" />
 <opc:EnumeratedValue Name="Error" Value="3" />
</opc:EnumeratedType>
<opc:StructuredType Name="DataSetMetaDataType" BaseType="tns:DataTypeSchemaHeader">
 <opc:Field Name="NoOfNamespaces" TypeName="opc:Int32" />
 <opc:Field Name="Namespaces" TypeName="opc:String" LengthField="NoOfNamespaces" />
 <opc:Field Name="NoOfStructureDataTypes" TypeName="opc:Int32" />
 <opc:Field Name="StructureDataTypes" TypeName="tns:StructureDescription"</pre>
LengthField="NoOfStructureDataTypes" />
 <opc:Field Name="NoOfEnumDataTypes" TypeName="opc:Int32" />
 <opc:Field Name="EnumDataTypes" TypeName="tns:EnumDescription" LengthField="NoOfEnumDataTypes"</pre>
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 <opc:Field Name="NoOfSimpleDataTypes" TypeName="opc:Int32" />
 <opc:Field Name="SimpleDataTypes" TypeName="tns:SimpleTypeDescription"</pre>
```

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LengthField="NoOfSimpleDataTypes" />
 <opc:Field Name="Name" TypeName="opc:String" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" />
 <opc:Field Name="NoOfFields" TypeName="opc:Int32" />
 <opc:Field Name="Fields" TypeName="tns:FieldMetaData" LengthField="NoOfFields" />
 <opc:Field Name="DataSetClassId" TypeName="opc:Guid" />
 <opc:Field Name="ConfigurationVersion" TypeName="tns:ConfigurationVersionDataType" />
</opc:StructuredType>
<opc:StructuredType Name="FieldMetaData" BaseType="ua:ExtensionObject">
 <opc:Field Name="Name" TypeName="opc:String" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" />
 <opc:Field Name="FieldFlags" TypeName="tns:DataSetFieldFlags" />
 <opc:Field Name="BuiltInType" TypeName="opc:Byte" />
 <opc:Field Name="DataType" TypeName="ua:NodeId" />
 <opc:Field Name="ValueRank" TypeName="opc:Int32" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="ArrayDimensions" TypeName="opc:UInt32" LengthField="NoOfArrayDimensions" />
 <opc:Field Name="MaxStringLength" TypeName="opc:UInt32" />
 <opc:Field Name="DataSetFieldId" TypeName="opc:Guid" />
 <opc:Field Name="NoOfProperties" TypeName="opc:Int32" />
 <opc:Field Name="Properties" TypeName="tns:KeyValuePair" LengthField="NoOfProperties" />
</opc:StructuredType>
<opc:EnumeratedType Name="DataSetFieldFlags" LengthInBits="16" IsOptionSet="true">
 <opc:EnumeratedValue Name="None" Value="0" />
 <opc:EnumeratedValue Name="PromotedField" Value="1" />
</opc:EnumeratedType>
<opc:StructuredType Name="ConfigurationVersionDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="MajorVersion" TypeName="opc:UInt32" />
 <opc:Field Name="MinorVersion" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="PublishedDataSetDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="Name" TypeName="opc:String" />
 <opc:Field Name="NoOfDataSetFolder" TypeName="opc:Int32" />
 <opc:Field Name="DataSetFolder" TypeName="opc:String" LengthField="NoOfDataSetFolder" />
 <opc:Field Name="DataSetMetaData" TypeName="tns:DataSetMetaDataType" />
 <opc:Field Name="NoOfExtensionFields" TypeName="opc:Int32" />
 <opc:Field Name="ExtensionFields" TypeName="tns:KeyValuePair" LengthField="NoOfExtensionFields" />
 <opc:Field Name="DataSetSource" TypeName="ua:ExtensionObject" />
</opc:StructuredType>
<opc:StructuredType Name="PublishedDataSetSourceDataType" BaseType="ua:ExtensionObject">
</opc:StructuredType>
<opc:StructuredType Name="PublishedVariableDataType" BaseType="ua:ExtensionObject">
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<opc:Field Name="PublishedVariable" TypeName="ua:NodeId" />
 <opc:Field Name="AttributeId" TypeName="opc:UInt32" />
 <opc:Field Name="SamplingIntervalHint" TypeName="opc:Double" />
 <opc:Field Name="DeadbandType" TypeName="opc:UInt32" />
 <opc:Field Name="DeadbandValue" TypeName="opc:Double" />
 <opc:Field Name="IndexRange" TypeName="opc:String" />
 <opc:Field Name="SubstituteValue" TypeName="ua:Variant" />
 <opc:Field Name="NoOfMetaDataProperties" TypeName="opc:Int32" />
 <opc:Field Name="MetaDataProperties" TypeName="ua:QualifiedName"</p>
LengthField="NoOfMetaDataProperties" />
</opc:StructuredType>
<opc:StructuredType Name="PublishedDataItemsDataType" BaseType="tns:PublishedDataSetSourceDataType">
 <opc:Field Name="NoOfPublishedData" TypeName="opc:Int32" />
 <opc:Field Name="PublishedData" TypeName="tns:PublishedVariableDataType"</pre>
LengthField="NoOfPublishedData" />
</opc:StructuredType>
<opc:StructuredType Name="PublishedEventsDataType" BaseType="tns:PublishedDataSetSourceDataType">
 <opc:Field Name="EventNotifier" TypeName="ua:NodeId" />
 <opc:Field Name="NoOfSelectedFields" TypeName="opc:Int32" />
 <opc:Field Name="SelectedFields" TypeName="tns:SimpleAttributeOperand"</pre>
LengthField="NoOfSelectedFields" />
 <opc:Field Name="Filter" TypeName="tns:ContentFilter" />
</opc:StructuredType>
<opc:EnumeratedType Name="DataSetFieldContentMask" LengthInBits="32" IsOptionSet="true">
 <opc:EnumeratedValue Name="None" Value="0" />
 <opc:EnumeratedValue Name="StatusCode" Value="1" />
 <opc:EnumeratedValue Name="SourceTimestamp" Value="2" />
 <opc:EnumeratedValue Name="ServerTimestamp" Value="4" />
 <opc:EnumeratedValue Name="SourcePicoSeconds" Value="8" />
 <opc:EnumeratedValue Name="ServerPicoSeconds" Value="16" />
 <opc:EnumeratedValue Name="RawData" Value="32" />
</opc:EnumeratedType>
<opc:StructuredType Name="DataSetWriterDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="Name" TypeName="opc:String" />
 <opc:Field Name="Enabled" TypeName="opc:Boolean" />
 <opc:Field Name="DataSetWriterId" TypeName="opc:UInt16" />
 <opc:Field Name="DataSetFieldContentMask" TypeName="tns:DataSetFieldContentMask" />
 <opc:Field Name="KeyFrameCount" TypeName="opc:UInt32" />
 <opc:Field Name="DataSetName" TypeName="opc:String" />
 <opc:Field Name="NoOfDataSetWriterProperties" TypeName="opc:Int32" />
 <opc:Field Name="DataSetWriterProperties" TypeName="tns:KeyValuePair"</pre>
LengthField="NoOfDataSetWriterProperties" />
 <opc:Field Name="TransportSettings" TypeName="ua:ExtensionObject" />
 <opc:Field Name="MessageSettings" TypeName="ua:ExtensionObject" />
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</opc:StructuredType>
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</opc:StructuredType>
<opc:StructuredType Name="DataSetWriterMessageDataType" BaseType="ua:ExtensionObject">
</opc:StructuredType>
<opc:StructuredType Name="PubSubGroupDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="Name" TypeName="opc:String" />
 <opc:Field Name="Enabled" TypeName="opc:Boolean" />
 <opc:Field Name="SecurityMode" TypeName="tns:MessageSecurityMode" />
 <opc:Field Name="SecurityGroupId" TypeName="opc:String" />
 <opc:Field Name="NoOfSecurityKeyServices" TypeName="opc:Int32" />
 <opc:Field Name="SecurityKeyServices" TypeName="tns:EndpointDescription"</pre>
LengthField="NoOfSecurityKeyServices" />
 <opc:Field Name="MaxNetworkMessageSize" TypeName="opc:UInt32" />
 <opc:Field Name="NoOfGroupProperties" TypeName="opc:Int32" />
 <opc:Field Name="GroupProperties" TypeName="tns:KeyValuePair" LengthField="NoOfGroupProperties" />
</opc:StructuredType>
<opc:StructuredType Name="WriterGroupDataType" BaseType="tns:PubSubGroupDataType">
 <opc:Field Name="Name" TypeName="opc:String" SourceType="tns:PubSubGroupDataType" />
 <opc:Field Name="Enabled" TypeName="opc:Boolean" SourceType="tns:PubSubGroupDataType" />
 <opc:Field Name="SecurityMode" TypeName="tns:MessageSecurityMode"</pre>
SourceType="tns:PubSubGroupDataType" />
 <opc:Field Name="SecurityGroupId" TypeName="opc:String" SourceType="tns:PubSubGroupDataType" />
 <opc:Field Name="NoOfSecurityKeyServices" TypeName="opc:Int32" />
 <opc:Field Name="SecurityKeyServices" TypeName="tns:EndpointDescription"</pre>
LengthField="NoOfSecurityKeyServices" />
 <opc:Field Name="MaxNetworkMessageSize" TypeName="opc:UInt32"</p>
SourceType="tns:PubSubGroupDataType" />
 <opc:Field Name="NoOfGroupProperties" TypeName="opc:Int32" />
 <opc:Field Name="GroupProperties" TypeName="tns:KeyValuePair" LengthField="NoOfGroupProperties" />
 <opc:Field Name="WriterGroupId" TypeName="opc:UInt16" />
 <opc:Field Name="PublishingInterval" TypeName="opc:Double" />
 <opc:Field Name="KeepAliveTime" TypeName="opc:Double" />
 <opc:Field Name="Priority" TypeName="opc:Byte" />
 <opc:Field Name="NoOfLocaleIds" TypeName="opc:Int32" />
 <opc:Field Name="LocaleIds" TypeName="opc:String" LengthField="NoOfLocaleIds" />
 <opc:Field Name="HeaderLayoutUri" TypeName="opc:String" />
 <opc:Field Name="TransportSettings" TypeName="ua:ExtensionObject" />
 <opc:Field Name="MessageSettings" TypeName="ua:ExtensionObject" />
 <opc:Field Name="NoOfDataSetWriters" TypeName="opc:Int32" />
 <opc:Field Name="DataSetWriters" TypeName="tns:DataSetWriterDataType"</pre>
LengthField="NoOfDataSetWriters" />
</opc:StructuredType>
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<opc:StructuredType Name="WriterGroupTransportDataType" BaseType="ua:ExtensionObject">
</opc:StructuredType>
<opc:StructuredType Name="WriterGroupMessageDataType" BaseType="ua:ExtensionObject">
</opc:StructuredType>
<opc:StructuredType Name="PubSubConnectionDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="Name" TypeName="opc:String" />
 <opc:Field Name="Enabled" TypeName="opc:Boolean" />
 <opc:Field Name="PublisherId" TypeName="ua:Variant" />
 <opc:Field Name="TransportProfileUri" TypeName="opc:String" />
 <opc:Field Name="Address" TypeName="ua:ExtensionObject" />
 <opc:Field Name="NoOfConnectionProperties" TypeName="opc:Int32" />
 <opc:Field Name="ConnectionProperties" TypeName="tns:KeyValuePair"</pre>
LengthField="NoOfConnectionProperties" />
 <opc:Field Name="TransportSettings" TypeName="ua:ExtensionObject" />
 <opc:Field Name="NoOfWriterGroups" TypeName="opc:Int32" />
 <opc:Field Name="WriterGroups" TypeName="tns:WriterGroupDataType" LengthField="NoOfWriterGroups" />
 <opc:Field Name="NoOfReaderGroups" TypeName="opc:Int32" />
 <opc:Field Name="ReaderGroups" TypeName="tns:ReaderGroupDataType" LengthField="NoOfReaderGroups"</pre>
</opc:StructuredType>
<opc:StructuredType Name="ConnectionTransportDataType" BaseType="ua:ExtensionObject">
</opc:StructuredType>
<opc:StructuredType Name="NetworkAddressDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="NetworkInterface" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="NetworkAddressUrlDataType" BaseType="tns:NetworkAddressDataType">
 <opc:Field Name="NetworkInterface" TypeName="opc:String" SourceType="tns:NetworkAddressDataType" />
 <opc:Field Name="Url" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="ReaderGroupDataType" BaseType="tns:PubSubGroupDataType">
 <opc:Field Name="Name" TypeName="opc:String" SourceType="tns:PubSubGroupDataType" />
 <opc:Field Name="Enabled" TypeName="opc:Boolean" SourceType="tns:PubSubGroupDataType" />
 <opc:Field Name="SecurityMode" TypeName="tns:MessageSecurityMode"</pre>
SourceType="tns:PubSubGroupDataType" />
 <opc:Field Name="SecurityGroupId" TypeName="opc:String" SourceType="tns:PubSubGroupDataType" />
 <opc:Field Name="NoOfSecurityKeyServices" TypeName="opc:Int32" />
 <opc:Field Name="SecurityKeyServices" TypeName="tns:EndpointDescription"</pre>
LengthField="NoOfSecurityKeyServices" />
 <opc:Field Name="MaxNetworkMessageSize" TypeName="opc:UInt32"</pre>
SourceType="tns:PubSubGroupDataType"/>
 <opc:Field Name="NoOfGroupProperties" TypeName="opc:Int32" />
 <opc:Field Name="GroupProperties" TypeName="tns:KeyValuePair" LengthField="NoOfGroupProperties" />
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<opc:Field Name="TransportSettings" TypeName="ua:ExtensionObject" />
 <opc:Field Name="MessageSettings" TypeName="ua:ExtensionObject" />
 <opc:Field Name="NoOfDataSetReaders" TypeName="opc:Int32" />
 <opc:Field Name="DataSetReaders" TypeName="tns:DataSetReaderDataType"</pre>
LengthField="NoOfDataSetReaders" />
</opc:StructuredType>
<opc:StructuredType Name="ReaderGroupTransportDataType" BaseType="ua:ExtensionObject">
</opc:StructuredType>
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 <opc:Field Name="Enabled" TypeName="opc:Boolean" />
 <opc:Field Name="PublisherId" TypeName="ua:Variant" />
 <opc:Field Name="WriterGroupId" TypeName="opc:UInt16" />
 <opc:Field Name="DataSetWriterId" TypeName="opc:UInt16" />
 <opc:Field Name="DataSetMetaData" TypeName="tns:DataSetMetaDataType" />
 <opc:Field Name="DataSetFieldContentMask" TypeName="tns:DataSetFieldContentMask" />
 <opc:Field Name="MessageReceiveTimeout" TypeName="opc:Double" />
 <opc:Field Name="KeyFrameCount" TypeName="opc:UInt32" />
 <opc:Field Name="HeaderLayoutUri" TypeName="opc:String" />
 <opc:Field Name="SecurityMode" TypeName="tns:MessageSecurityMode" />
 <opc:Field Name="SecurityGroupId" TypeName="opc:String" />
 <opc:Field Name="NoOfSecurityKeyServices" TypeName="opc:Int32" />
 <opc:Field Name="SecurityKeyServices" TypeName="tns:EndpointDescription"</pre>
LengthField="NoOfSecurityKeyServices" />
 <opc:Field Name="NoOfDataSetReaderProperties" TypeName="opc:Int32" />
 <opc:Field Name="DataSetReaderProperties" TypeName="tns:KeyValuePair"</pre>
LengthField="NoOfDataSetReaderProperties" />
 <opc:Field Name="TransportSettings" TypeName="ua:ExtensionObject" />
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 <opc:Field Name="SubscribedDataSet" TypeName="ua:ExtensionObject" />
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<opc:Field Name="TargetVariables" TypeName="tns:FieldTargetDataType"</pre>
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 <opc:Field Name="ReceiverIndexRange" TypeName="opc:String" />
 <opc:Field Name="TargetNodeId" TypeName="ua:NodeId" />
 <opc:Field Name="AttributeId" TypeName="opc:UInt32" />
 <opc:Field Name="WriteIndexRange" TypeName="opc:String" />
 <opc:Field Name="OverrideValueHandling" TypeName="tns:OverrideValueHandling" />
 <opc:Field Name="OverrideValue" TypeName="ua:Variant" />
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<opc:StructuredType Name="SubscribedDataSetMirrorDataType" BaseType="tns:SubscribedDataSetDataType">
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 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
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 <opc:Field Name="PublishedDataSets" TypeName="tns:PublishedDataSetDataType"</pre>
LengthField="NoOfPublishedDataSets" />
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 <opc:Field Name="Connections" TypeName="tns:PubSubConnectionDataType"</pre>
LengthField="NoOfConnections" />
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</opc:StructuredType>
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 <opc:EnumeratedValue Name="AscendingWriterId" Value="1" />
 <opc:EnumeratedValue Name="AscendingWriterIdSingle" Value="2" />
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 <opc:EnumeratedValue Name="PublisherId" Value="1" />
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 <opc:EnumeratedValue Name="WriterGroupId" Value="4" />
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<opc:EnumeratedValue Name="GroupVersion" Value="8" />
 <opc:EnumeratedValue Name="NetworkMessageNumber" Value="16" />
 <opc:EnumeratedValue Name="SequenceNumber" Value="32" />
 <opc:EnumeratedValue Name="PayloadHeader" Value="64" />
 <opc:EnumeratedValue Name="Timestamp" Value="128" />
 <opc:EnumeratedValue Name="PicoSeconds" Value="256" />
 <opc:EnumeratedValue Name="DataSetClassId" Value="512" />
 <opc:EnumeratedValue Name="PromotedFields" Value="1024" />
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BaseType="tns:WriterGroupMessageDataType">
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 <opc:Field Name="NetworkMessageContentMask" TypeName="tns:UadpNetworkMessageContentMask" />
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 <opc:EnumeratedValue Name="PicoSeconds" Value="2" />
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 <opc:EnumeratedValue Name="MinorVersion" Value="16" />
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BaseType="tns:DataSetWriterMessageDataType">
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 <opc:Field Name="NetworkMessageNumber" TypeName="opc:UInt16" />
 <opc:Field Name="DataSetOffset" TypeName="opc:UInt16" />
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<opc:StructuredType Name="UadpDataSetReaderMessageDataType"</pre>
BaseType="tns:DataSetReaderMessageDataType">
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 <opc:Field Name="DataSetClassId" TypeName="opc:Guid" />
 <opc:Field Name="NetworkMessageContentMask" TypeName="tns:UadpNetworkMessageContentMask" />
 <opc:Field Name="DataSetMessageContentMask" TypeName="tns:UadpDataSetMessageContentMask" />
 <opc:Field Name="PublishingInterval" TypeName="opc:Double" />
 <opc:Field Name="ReceiveOffset" TypeName="opc:Double" />
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<opc:Field Name="ProcessingOffset" TypeName="opc:Double" />
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 <opc:EnumeratedValue Name="DataSetMessageHeader" Value="2" />
 <opc:EnumeratedValue Name="SingleDataSetMessage" Value="4" />
 <opc:EnumeratedValue Name="PublisherId" Value="8" />
 <opc:EnumeratedValue Name="DataSetClassId" Value="16" />
 <opc:EnumeratedValue Name="ReplyTo" Value="32" />
</opc:EnumeratedType>
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BaseType="tns:WriterGroupMessageDataType">
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BaseType="tns:DataSetReaderMessageDataType">
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BaseType="tns:ConnectionTransportDataType">
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<opc:StructuredType Name="DatagramWriterGroupTransportDataType"</pre>
BaseType="tns:WriterGroupTransportDataType">
 <opc:Field Name="MessageRepeatCount" TypeName="opc:Byte" />
 <opc:Field Name="MessageRepeatDelay" TypeName="opc:Double" />
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BaseType="tns:ConnectionTransportDataType">
 <opc:Field Name="ResourceUri" TypeName="opc:String" />
 <opc:Field Name="AuthenticationProfileUri" TypeName="opc:String" />
</opc:StructuredType>
<opc:EnumeratedType Name="BrokerTransportQualityOfService" LengthInBits="32">
 <opc:EnumeratedValue Name="NotSpecified" Value="0" />
 <opc:EnumeratedValue Name="BestEffort" Value="1" />
 <opc:EnumeratedValue Name="AtLeastOnce" Value="2" />
 <opc:EnumeratedValue Name="AtMostOnce" Value="3" />
 <opc:EnumeratedValue Name="ExactlyOnce" Value="4" />
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<opc:StructuredType Name="BrokerWriterGroupTransportDataType"</pre>
BaseType="tns:WriterGroupTransportDataType">
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 <opc:Field Name="ResourceUri" TypeName="opc:String" />
 <opc:Field Name="AuthenticationProfileUri" TypeName="opc:String" />
 <opc:Field Name="RequestedDeliveryGuarantee" TypeName="tns:BrokerTransportQualityOfService" />
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BaseType="tns:DataSetWriterTransportDataType">
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 <opc:Field Name="AuthenticationProfileUri" TypeName="opc:String" />
 <opc:Field Name="RequestedDeliveryGuarantee" TypeName="tns:BrokerTransportQualityOfService" />
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 <opc:Field Name="MetaDataUpdateTime" TypeName="opc:Double" />
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BaseType="tns:DataSetReaderTransportDataType">
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 <opc:Field Name="AuthenticationProfileUri" TypeName="opc:String" />
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 <opc:Field Name="MetaDataQueueName" TypeName="opc:String" />
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 <opc:EnumeratedValue Name="Advanced" Value="1" />
 <opc:EnumeratedValue Name="Info" Value="2" />
 <opc:EnumeratedValue Name="Log" Value="3" />
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 <opc:EnumeratedValue Name="Error" Value="1" />
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 <opc:Documentation>The type of identifier used in a node id./opc:Documentation>
 <opc:EnumeratedValue Name="Numeric" Value="0" />
 <opc:EnumeratedValue Name="String" Value="1" />
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</opc:EnumeratedType>
<opc:EnumeratedType Name="NodeClass" LengthInBits="32">
 <opc:Documentation>A mask specifying the class of the node./opc:Documentation>
 <opc:EnumeratedValue Name="Unspecified" Value="0" />
 <opc:EnumeratedValue Name="Object" Value="1" />
 <opc:EnumeratedValue Name="Variable" Value="2" />
 <opc:EnumeratedValue Name="Method" Value="4" />
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 <opc:EnumeratedValue Name="VariableType" Value="16" />
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 <opc:EnumeratedValue Name="DataType" Value="64" />
 <opc:EnumeratedValue Name="View" Value="128" />
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<opc:EnumeratedType Name="PermissionType" LengthInBits="32" IsOptionSet="true">
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 <opc:EnumeratedValue Name="Browse" Value="1" />
 <opc:EnumeratedValue Name="ReadRolePermissions" Value="2" />
 <opc:EnumeratedValue Name="WriteAttribute" Value="4" />
 <opc:EnumeratedValue Name="WriteRolePermissions" Value="8" />
 <opc:EnumeratedValue Name="WriteHistorizing" Value="16" />
 <opc:EnumeratedValue Name="Read" Value="32" />
 <opc:EnumeratedValue Name="Write" Value="64" />
 <opc:EnumeratedValue Name="ReadHistory" Value="128" />
 <opc:EnumeratedValue Name="InsertHistory" Value="256" />
 <opc:EnumeratedValue Name="ModifyHistory" Value="512" />
 <opc:EnumeratedValue Name="DeleteHistory" Value="1024" />
 <opc:EnumeratedValue Name="ReceiveEvents" Value="2048" />
 <opc:EnumeratedValue Name="Call" Value="4096" />
 <opc:EnumeratedValue Name="AddReference" Value="8192" />
 <opc:EnumeratedValue Name="RemoveReference" Value="16384" />
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 <opc:EnumeratedValue Name="CurrentRead" Value="1" />
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 <opc:EnumeratedValue Name="StatusWrite" Value="32" />
 <opc:EnumeratedValue Name="TimestampWrite" Value="64" />
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 <opc:EnumeratedValue Name="WriteFullArrayOnly" Value="1024" />
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 <opc:EnumeratedValue Name="None" Value="0" />
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 <opc:EnumeratedValue Name="HistoryRead" Value="4" />
 <opc:EnumeratedValue Name="HistoryWrite" Value="8" />
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 <opc:Field Name="ValueRank" TypeName="opc:Int32" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="ArrayDimensions" TypeName="opc:UInt32" LengthField="NoOfArrayDimensions" />
 <opc:Field Name="MaxStringLength" TypeName="opc:UInt32" />
 <opc:Field Name="IsOptional" TypeName="opc:Boolean" />
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<opc:StructuredType Name="StructureDefinition" BaseType="tns:DataTypeDefinition">
 <opc:Field Name="DefaultEncodingId" TypeName="ua:NodeId" />
 <opc:Field Name="BaseDataType" TypeName="ua:NodeId" />
 <opc:Field Name="StructureType" TypeName="tns:StructureType" />
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 <opc:Documentation>Specifies the attributes which belong to all nodes.</opc:Documentation>
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 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
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 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
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 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
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<opc:StructuredType Name="InstanceNode" BaseType="tns:Node">
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<opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
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 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
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 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
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 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
```

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<opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
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 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
 <opc:Field Name="EventNotifier" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="ObjectTypeNode" BaseType="tns:TypeNode">
 <opc:Documentation>Specifies the attributes which belong to object type nodes.</opc:Documentation>
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
 <opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="VariableNode" BaseType="tns:InstanceNode">
 <opc:Documentation>Specifies the attributes which belong to variable nodes.</opc:Documentation>
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
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<opc:Field Name="Value" TypeName="ua:Variant" />
 <opc:Field Name="DataType" TypeName="ua:NodeId" />
 <opc:Field Name="ValueRank" TypeName="opc:Int32" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="ArrayDimensions" TypeName="opc:UInt32" LengthField="NoOfArrayDimensions" />
 <opc:Field Name="AccessLevel" TypeName="opc:Byte" />
 <opc:Field Name="UserAccessLevel" TypeName="opc:Byte" />
 <opc:Field Name="MinimumSamplingInterval" TypeName="opc:Double" />
 <opc:Field Name="Historizing" TypeName="opc:Boolean" />
 <opc:Field Name="AccessLevelEx" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="VariableTypeNode" BaseType="tns:TypeNode">
 <opc:Documentation>Specifies the attributes which belong to variable type nodes.</opc:Documentation>
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
 <opc:Field Name="Value" TypeName="ua:Variant" />
 <opc:Field Name="DataType" TypeName="ua:NodeId" />
 <opc:Field Name="ValueRank" TypeName="opc:Int32" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="ArrayDimensions" TypeName="opc:UInt32" LengthField="NoOfArrayDimensions" />
 <opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="ReferenceTypeNode" BaseType="tns:TypeNode">
 <opc:Documentation>Specifies the attributes which belong to reference type nodes./opc:Documentation>
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
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<opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
 <opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
 <opc:Field Name="Symmetric" TypeName="opc:Boolean" />
 <opc:Field Name="InverseName" TypeName="ua:LocalizedText" />
</opc:StructuredType>
<opc:StructuredType Name="MethodNode" BaseType="tns:InstanceNode">
 <opc:Documentation>Specifies the attributes which belong to method nodes.</opc:Documentation>
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
 <opc:Field Name="Executable" TypeName="opc:Boolean" />
 <opc:Field Name="UserExecutable" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="ViewNode" BaseType="tns:InstanceNode">
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
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LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
 <opc:Field Name="ContainsNoLoops" TypeName="opc:Boolean" />
 <opc:Field Name="EventNotifier" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="DataTypeNode" BaseType="tns:TypeNode">
 <opc:Field Name="NodeId" TypeName="ua:NodeId" SourceType="tns:Node" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" SourceType="tns:Node" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" SourceType="tns:Node" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:Node" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:Node" />
 <opc:Field Name="NoOfRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="RolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfRolePermissions" />
 <opc:Field Name="NoOfUserRolePermissions" TypeName="opc:Int32" />
 <opc:Field Name="UserRolePermissions" TypeName="tns:RolePermissionType"</pre>
LengthField="NoOfUserRolePermissions" />
 <opc:Field Name="AccessRestrictions" TypeName="opc:UInt16" SourceType="tns:Node" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceNode" LengthField="NoOfReferences" />
 <opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
 <opc:Field Name="DataTypeDefinition" TypeName="ua:ExtensionObject" />
</opc:StructuredType>
<opc:StructuredType Name="ReferenceNode" BaseType="ua:ExtensionObject">
 <opc:Documentation>Specifies a reference which belongs to a node./opc:Documentation>
 <opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="IsInverse" TypeName="opc:Boolean" />
 <opc:Field Name="TargetId" TypeName="ua:ExpandedNodeId" />
</opc:StructuredType>
<opc:StructuredType Name="Argument" BaseType="ua:ExtensionObject">
 <opc:Documentation>An argument for a method./opc:Documentation>
 <opc:Field Name="Name" TypeName="opc:String" />
 <opc:Field Name="DataType" TypeName="ua:NodeId" />
 <opc:Field Name="ValueRank" TypeName="opc:Int32" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="ArrayDimensions" TypeName="opc:UInt32" LengthField="NoOfArrayDimensions" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" />
</opc:StructuredType>
<opc:StructuredType Name="EnumValueType" BaseType="ua:ExtensionObject">
 <opc:Documentation>A mapping between a value of an enumerated type and a name and
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description.</opc:Documentation>
 <opc:Field Name="Value" TypeName="opc:Int64" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" />
</ope:StructuredType>
<opc:StructuredType Name="EnumField" BaseType="tns:EnumValueType">
 <opc:Field Name="Value" TypeName="opc:Int64" SourceType="tns:EnumValueType" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:EnumValueType" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:EnumValueType" />
 <opc:Field Name="Name" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="OptionSet" BaseType="ua:ExtensionObject">
 <opc:Documentation>This abstract Structured DataType is the base DataType for all DataTypes representing a bit
mask.</opc:Documentation>
 <opc:Field Name="Value" TypeName="opc:ByteString" />
 <opc:Field Name="ValidBits" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:StructuredType Name="Union" BaseType="ua:ExtensionObject">
 <opc:Documentation>This abstract DataType is the base DataType for all union
DataTypes.</opc:Documentation>
</opc:StructuredType>
<opc:OpaqueType Name="NormalizedString">
 <opc:Documentation>A string normalized based on the rules in the unicode specification.
</opc:OpaqueType>
<opc:OpaqueType Name="DecimalString">
 <opc:Documentation>An arbitraty numeric value./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="DurationString">
 <opc:Documentation>A period of time formatted as defined in ISO 8601-2000.
</opc:OpaqueType>
<opc:OpaqueType Name="TimeString">
 <opc:Documentation>A time formatted as defined in ISO 8601-2000./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="DateString">
 <opc:Documentation>A date formatted as defined in ISO 8601-2000./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="Duration">
 <opc:Documentation>A period of time measured in milliseconds./opc:Documentation>
</opc:OpaqueType>
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<opc:OpaqueType Name="UtcTime">
 <opc:Documentation>A date/time value specified in Universal Coordinated Time (UTC).</opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="LocaleId">
 <opc:Documentation>An identifier for a user locale./opc:Documentation>
</opc:OpaqueType>
<opc:StructuredType Name="TimeZoneDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="Offset" TypeName="opc:Int16" />
 <opc:Field Name="DaylightSavingInOffset" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:OpaqueType Name="Index">
 <opc:Documentation>This primitive data type is a UInt32 that identifies an element of an
array.</opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="IntegerId">
 <opc:Documentation>A numeric identifier for an object./opc:Documentation>
</opc:OpaqueType>
<opc:EnumeratedType Name="ApplicationType" LengthInBits="32">
 <opc:Documentation>The types of applications./opc:Documentation>
 <opc:EnumeratedValue Name="Server" Value="0" />
 <opc:EnumeratedValue Name="Client" Value="1" />
 <opc:EnumeratedValue Name="ClientAndServer" Value="2" />
 <opc:EnumeratedValue Name="DiscoveryServer" Value="3" />
</opc:EnumeratedType>
<opc:StructuredType Name="ApplicationDescription" BaseType="ua:ExtensionObject">
 <opc:Documentation>Describes an application and how to find it.
 <opc:Field Name="ApplicationUri" TypeName="opc:String" />
 <opc:Field Name="ProductUri" TypeName="opc:String" />
 <opc:Field Name="ApplicationName" TypeName="ua:LocalizedText" />
 <opc:Field Name="ApplicationType" TypeName="tns:ApplicationType" />
 <opc:Field Name="GatewayServerUri" TypeName="opc:String" />
 <opc:Field Name="DiscoveryProfileUri" TypeName="opc:String" />
 <opc:Field Name="NoOfDiscoveryUrls" TypeName="opc:Int32" />
 <opc:Field Name="DiscoveryUrls" TypeName="opc:String" LengthField="NoOfDiscoveryUrls" />
</opc:StructuredType>
<opc:StructuredType Name="RequestHeader" BaseType="ua:ExtensionObject">
 <opc:Documentation>The header passed with every server request./opc:Documentation>
 <opc:Field Name="AuthenticationToken" TypeName="ua:NodeId" />
 <opc:Field Name="Timestamp" TypeName="opc:DateTime" />
 <opc:Field Name="RequestHandle" TypeName="opc:UInt32" />
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<opc:Field Name="ReturnDiagnostics" TypeName="opc:UInt32" />
 <opc:Field Name="AuditEntryId" TypeName="opc:String" />
 <opc:Field Name="TimeoutHint" TypeName="opc:UInt32" />
 <opc:Field Name="AdditionalHeader" TypeName="ua:ExtensionObject" />
</opc:StructuredType>
<opc:StructuredType Name="ResponseHeader" BaseType="ua:ExtensionObject">
 <opc:Documentation>The header passed with every server response.</opc:Documentation>
 <opc:Field Name="Timestamp" TypeName="opc:DateTime" />
 <opc:Field Name="RequestHandle" TypeName="opc:UInt32" />
 <opc:Field Name="ServiceResult" TypeName="ua:StatusCode" />
 <opc:Field Name="ServiceDiagnostics" TypeName="ua:DiagnosticInfo" />
 <opc:Field Name="NoOfStringTable" TypeName="opc:Int32" />
 <opc:Field Name="StringTable" TypeName="opc:String" LengthField="NoOfStringTable" />
 <opc:Field Name="AdditionalHeader" TypeName="ua:ExtensionObject" />
</opc:StructuredType>
<opc:OpaqueType Name="VersionTime">
</opc:OpaqueType>
<opc:StructuredType Name="ServiceFault" BaseType="ua:ExtensionObject">
 <opc:Documentation>The response returned by all services when there is a service level
error.</opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
</opc:StructuredType>
<opc:StructuredType Name="SessionlessInvokeRequestType" BaseType="ua:ExtensionObject">
 <opc:Field Name="NoOfUrisVersion" TypeName="opc:Int32" />
 <opc:Field Name="UrisVersion" TypeName="opc:UInt32" LengthField="NoOfUrisVersion" />
 <opc:Field Name="NoOfNamespaceUris" TypeName="opc:Int32" />
 <opc:Field Name="NamespaceUris" TypeName="opc:String" LengthField="NoOfNamespaceUris" />
 <opc:Field Name="NoOfServerUris" TypeName="opc:Int32" />
 <opc:Field Name="ServerUris" TypeName="opc:String" LengthField="NoOfServerUris" />
 <opc:Field Name="NoOfLocaleIds" TypeName="opc:Int32" />
 <opc:Field Name="LocaleIds" TypeName="opc:String" LengthField="NoOfLocaleIds" />
 <opc:Field Name="ServiceId" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="SessionlessInvokeResponseType" BaseType="ua:ExtensionObject">
 <opc:Field Name="NoOfNamespaceUris" TypeName="opc:Int32" />
 <opc:Field Name="NamespaceUris" TypeName="opc:String" LengthField="NoOfNamespaceUris" />
 <opc:Field Name="NoOfServerUris" TypeName="opc:Int32" />
 <opc:Field Name="ServerUris" TypeName="opc:String" LengthField="NoOfServerUris" />
 <opc:Field Name="ServiceId" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="FindServersRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Finds the servers known to the discovery server.</opc:Documentation>
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<opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="EndpointUrl" TypeName="opc:String" />
 <opc:Field Name="NoOfLocaleIds" TypeName="opc:Int32" />
 <opc:Field Name="LocaleIds" TypeName="opc:String" LengthField="NoOfLocaleIds" />
 <opc:Field Name="NoOfServerUris" TypeName="opc:Int32" />
 <opc:Field Name="ServerUris" TypeName="opc:String" LengthField="NoOfServerUris" />
</opc:StructuredType>
<opc:StructuredType Name="FindServersResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Finds the servers known to the discovery server./opc:Documentation>
<opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfServers" TypeName="opc:Int32" />
 <opc:Field Name="Servers" TypeName="tns:ApplicationDescription" LengthField="NoOfServers" />
</opc:StructuredType>
<opc:StructuredType Name="ServerOnNetwork" BaseType="ua:ExtensionObject">
 <opc:Field Name="RecordId" TypeName="opc:UInt32" />
 <opc:Field Name="ServerName" TypeName="opc:String" />
 <opc:Field Name="DiscoveryUrl" TypeName="opc:String" />
 <opc:Field Name="NoOfServerCapabilities" TypeName="opc:Int32" />
 <opc:Field Name="ServerCapabilities" TypeName="opc:String" LengthField="NoOfServerCapabilities" />
</opc:StructuredType>
<opc:StructuredType Name="FindServersOnNetworkRequest" BaseType="ua:ExtensionObject">
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="StartingRecordId" TypeName="opc:UInt32" />
 <opc:Field Name="MaxRecordsToReturn" TypeName="opc:UInt32" />
 <opc:Field Name="NoOfServerCapabilityFilter" TypeName="opc:Int32" />
 <opc:Field Name="ServerCapabilityFilter" TypeName="opc:String" LengthField="NoOfServerCapabilityFilter"</pre>
</opc:StructuredType>
<opc:StructuredType Name="FindServersOnNetworkResponse" BaseType="ua:ExtensionObject">
<opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="LastCounterResetTime" TypeName="opc:DateTime" />
 <opc:Field Name="NoOfServers" TypeName="opc:Int32" />
 <opc:Field Name="Servers" TypeName="tns:ServerOnNetwork" LengthField="NoOfServers" />
</opc:StructuredType>
<opc:OpaqueType Name="ApplicationInstanceCertificate">
 <opc:Documentation>A certificate for an instance of an application.</opc:Documentation>
</opc:OpaqueType>
<opc:EnumeratedType Name="MessageSecurityMode" LengthInBits="32">
 <opc:Documentation>The type of security to use on a message./opc:Documentation>
 <opc:EnumeratedValue Name="Invalid" Value="0" />
 <opc:EnumeratedValue Name="None" Value="1" />
 <opc:EnumeratedValue Name="Sign" Value="2" />
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<opc:EnumeratedValue Name="SignAndEncrypt" Value="3" />
</opc:EnumeratedType>
<opc:EnumeratedType Name="UserTokenType" LengthInBits="32">
 <opc:Documentation>The possible user token types./opc:Documentation>
 <opc:EnumeratedValue Name="Anonymous" Value="0" />
 <opc:EnumeratedValue Name="UserName" Value="1" />
 <opc:EnumeratedValue Name="Certificate" Value="2" />
 <opc:EnumeratedValue Name="IssuedToken" Value="3" />
</opc:EnumeratedType>
<opc:StructuredType Name="UserTokenPolicy" BaseType="ua:ExtensionObject">
 <opc:Documentation>Describes a user token that can be used with a server.</opc:Documentation>
 <opc:Field Name="PolicyId" TypeName="opc:String" />
 <opc:Field Name="TokenType" TypeName="tns:UserTokenType" />
 <opc:Field Name="IssuedTokenType" TypeName="opc:String" />
 <opc:Field Name="IssuerEndpointUrl" TypeName="opc:String" />
 <opc:Field Name="SecurityPolicyUri" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="EndpointDescription" BaseType="ua:ExtensionObject">
 <opc:Documentation>The description of a endpoint that can be used to access a server./opc:Documentation>
 <opc:Field Name="EndpointUrl" TypeName="opc:String" />
 <opc:Field Name="Server" TypeName="tns:ApplicationDescription" />
 <opc:Field Name="ServerCertificate" TypeName="opc:ByteString" />
 <opc:Field Name="SecurityMode" TypeName="tns:MessageSecurityMode" />
 <opc:Field Name="SecurityPolicyUri" TypeName="opc:String" />
 <opc:Field Name="NoOfUserIdentityTokens" TypeName="opc:Int32" />
 <opc:Field Name="UserIdentityTokens" TypeName="tns:UserTokenPolicy"</pre>
LengthField="NoOfUserIdentityTokens" />
 <opc:Field Name="TransportProfileUri" TypeName="opc:String" />
 <opc:Field Name="SecurityLevel" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="GetEndpointsRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Gets the endpoints used by the server./opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="EndpointUrl" TypeName="opc:String" />
 <opc:Field Name="NoOfLocaleIds" TypeName="opc:Int32" />
 <opc:Field Name="LocaleIds" TypeName="opc:String" LengthField="NoOfLocaleIds" />
 <opc:Field Name="NoOfProfileUris" TypeName="opc:Int32" />
 <opc:Field Name="ProfileUris" TypeName="opc:String" LengthField="NoOfProfileUris" />
</opc:StructuredType>
<opc:StructuredType Name="GetEndpointsResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Gets the endpoints used by the server./opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfEndpoints" TypeName="opc:Int32" />
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<opc:Field Name="Endpoints" TypeName="tns:EndpointDescription" LengthField="NoOfEndpoints" />
</opc:StructuredType>
<opc:StructuredType Name="RegisteredServer" BaseType="ua:ExtensionObject">
 <opc:Documentation>The information required to register a server with a discovery server.</opc:Documentation>
 <opc:Field Name="ServerUri" TypeName="opc:String" />
 <opc:Field Name="ProductUri" TypeName="opc:String" />
 <opc:Field Name="NoOfServerNames" TypeName="opc:Int32" />
 <opc:Field Name="ServerNames" TypeName="ua:LocalizedText" LengthField="NoOfServerNames" />
 <opc:Field Name="ServerType" TypeName="tns:ApplicationType" />
 <opc:Field Name="GatewayServerUri" TypeName="opc:String" />
 <opc:Field Name="NoOfDiscoveryUrls" TypeName="opc:Int32" />
 <opc:Field Name="DiscoveryUrls" TypeName="opc:String" LengthField="NoOfDiscoveryUrls" />
 <opc:Field Name="SemaphoreFilePath" TypeName="opc:String" />
 <opc:Field Name="IsOnline" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="RegisterServerRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Registers a server with the discovery server./opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="Server" TypeName="tns:RegisteredServer" />
</opc:StructuredType>
<opc:StructuredType Name="RegisterServerResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Registers a server with the discovery server./opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
</opc:StructuredType>
<opc:StructuredType Name="DiscoveryConfiguration" BaseType="ua:ExtensionObject">
 <opc:Documentation>A base type for discovery configuration information.
</opc:StructuredType>
<opc:StructuredType Name="MdnsDiscoveryConfiguration" BaseType="tns:DiscoveryConfiguration">
 <opc:Documentation>The discovery information needed for mDNS registration.
 <opc:Field Name="MdnsServerName" TypeName="opc:String" />
 <opc:Field Name="NoOfServerCapabilities" TypeName="opc:Int32" />
 <opc:Field Name="ServerCapabilities" TypeName="opc:String" LengthField="NoOfServerCapabilities" />
</opc:StructuredType>
<opc:StructuredType Name="RegisterServer2Request" BaseType="ua:ExtensionObject">
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="Server" TypeName="tns:RegisteredServer" />
 <opc:Field Name="NoOfDiscoveryConfiguration" TypeName="opc:Int32" />
 <opc:Field Name="DiscoveryConfiguration" TypeName="ua:ExtensionObject"</pre>
LengthField="NoOfDiscoveryConfiguration" />
</opc:StructuredType>
<opc:StructuredType Name="RegisterServer2Response" BaseType="ua:ExtensionObject">
```

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<opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfConfigurationResults" TypeName="opc:Int32" />
 <opc:Field Name="ConfigurationResults" TypeName="ua:StatusCode"</pre>
LengthField="NoOfConfigurationResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:EnumeratedType Name="SecurityTokenRequestType" LengthInBits="32">
 <opc:Documentation>Indicates whether a token if being created or renewed.</opc:Documentation>
 <opc:EnumeratedValue Name="Issue" Value="0" />
 <opc:EnumeratedValue Name="Renew" Value="1" />
</opc:EnumeratedType>
<opc:StructuredType Name="ChannelSecurityToken" BaseType="ua:ExtensionObject">
 <opc:Documentation>The token that identifies a set of keys for an active secure channel./opc:Documentation>
 <opc:Field Name="ChannelId" TypeName="opc:UInt32" />
 <opc:Field Name="TokenId" TypeName="opc:UInt32" />
 <opc:Field Name="CreatedAt" TypeName="opc:DateTime" />
 <opc:Field Name="RevisedLifetime" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="OpenSecureChannelRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Creates a secure channel with a server.
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="ClientProtocolVersion" TypeName="opc:UInt32" />
 <opc:Field Name="RequestType" TypeName="tns:SecurityTokenRequestType" />
 <opc:Field Name="SecurityMode" TypeName="tns:MessageSecurityMode" />
 <opc:Field Name="ClientNonce" TypeName="opc:ByteString" />
 <opc:Field Name="RequestedLifetime" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="OpenSecureChannelResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Creates a secure channel with a server./opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="ServerProtocolVersion" TypeName="opc:UInt32" />
 <opc:Field Name="SecurityToken" TypeName="tns:ChannelSecurityToken" />
 <opc:Field Name="ServerNonce" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:StructuredType Name="CloseSecureChannelRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Closes a secure channel.
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
</opc:StructuredType>
<opc:StructuredType Name="CloseSecureChannelResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Closes a secure channel.</opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
```

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</opc:StructuredType>
<opc:StructuredType Name="SignedSoftwareCertificate" BaseType="ua:ExtensionObject">
 <opc:Documentation>A software certificate with a digital signature./opc:Documentation>
 <opc:Field Name="CertificateData" TypeName="opc:ByteString" />
 <opc:Field Name="Signature" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:OpaqueType Name="SessionAuthenticationToken">
 <opc:Documentation>A unique identifier for a session used to authenticate requests./opc:Documentation>
</opc:OpaqueType>
<opc:StructuredType Name="SignatureData" BaseType="ua:ExtensionObject">
 <opc:Documentation>A digital signature.
 <opc:Field Name="Algorithm" TypeName="opc:String" />
 <opc:Field Name="Signature" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:StructuredType Name="CreateSessionRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Creates a new session with the server.
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="ClientDescription" TypeName="tns:ApplicationDescription" />
 <opc:Field Name="ServerUri" TypeName="opc:String" />
 <opc:Field Name="EndpointUrl" TypeName="opc:String" />
 <opc:Field Name="SessionName" TypeName="opc:String" />
 <opc:Field Name="ClientNonce" TypeName="opc:ByteString" />
 <opc:Field Name="ClientCertificate" TypeName="opc:ByteString" />
 <opc:Field Name="RequestedSessionTimeout" TypeName="opc:Double" />
 <opc:Field Name="MaxResponseMessageSize" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="CreateSessionResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Creates a new session with the server./opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="SessionId" TypeName="ua:NodeId" />
 <opc:Field Name="AuthenticationToken" TypeName="ua:NodeId" />
 <opc:Field Name="RevisedSessionTimeout" TypeName="opc:Double" />
 <opc:Field Name="ServerNonce" TypeName="opc:ByteString" />
 <opc:Field Name="ServerCertificate" TypeName="opc:ByteString" />
 <opc:Field Name="NoOfServerEndpoints" TypeName="opc:Int32" />
 <opc:Field Name="ServerEndpoints" TypeName="tns:EndpointDescription"</pre>
LengthField="NoOfServerEndpoints" />
 <opc:Field Name="NoOfServerSoftwareCertificates" TypeName="opc:Int32" />
 <opc:Field Name="ServerSoftwareCertificates" TypeName="tns:SignedSoftwareCertificate"</pre>
LengthField="NoOfServerSoftwareCertificates" />
 <opc:Field Name="ServerSignature" TypeName="tns:SignatureData" />
 <opc:Field Name="MaxRequestMessageSize" TypeName="opc:UInt32" />
</opc:StructuredType>
```

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<opc:StructuredType Name="UserIdentityToken" BaseType="ua:ExtensionObject">
 <opc:Documentation>A base type for a user identity token./opc:Documentation>
 <opc:Field Name="PolicyId" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="AnonymousIdentityToken" BaseType="tns:UserIdentityToken">
 <opc:Documentation>A token representing an anonymous user./opc:Documentation>
 <opc:Field Name="PolicyId" TypeName="opc:String" SourceType="tns:UserIdentityToken" />
</opc:StructuredType>
<opc:StructuredType Name="UserNameIdentityToken" BaseType="tns:UserIdentityToken">
 <opc:Documentation>A token representing a user identified by a user name and password.
 <opc:Field Name="PolicyId" TypeName="opc:String" SourceType="tns:UserIdentityToken" />
 <opc:Field Name="UserName" TypeName="opc:String" />
 <opc:Field Name="Password" TypeName="opc:ByteString" />
 <opc:Field Name="EncryptionAlgorithm" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="X509IdentityToken" BaseType="tns:UserIdentityToken">
 <opc:Documentation>A token representing a user identified by an X509 certificate.</opc:Documentation>
 <opc:Field Name="PolicyId" TypeName="opc:String" SourceType="tns:UserIdentityToken" />
 <opc:Field Name="CertificateData" TypeName="opc:ByteString" />
</opc:StructuredType>
<opc:StructuredType Name="IssuedIdentityToken" BaseType="tns:UserIdentityToken">
 <opc:Documentation>A token representing a user identified by a WS-Security XML token.
 <opc:Field Name="PolicyId" TypeName="opc:String" SourceType="tns:UserIdentityToken" />
 <opc:Field Name="TokenData" TypeName="opc:ByteString" />
 <opc:Field Name="EncryptionAlgorithm" TypeName="opc:String" />
</opc:StructuredType>
<opc:OpaqueType Name="RsaEncryptedSecret">
</opc:OpaqueType>
<opc:StructuredType Name="ActivateSessionRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Activates a session with the server./opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="ClientSignature" TypeName="tns:SignatureData" />
 <opc:Field Name="NoOfClientSoftwareCertificates" TypeName="opc:Int32" />
 <opc:Field Name="ClientSoftwareCertificates" TypeName="tns:SignedSoftwareCertificate"</pre>
LengthField="NoOfClientSoftwareCertificates" />
 <opc:Field Name="NoOfLocaleIds" TypeName="opc:Int32" />
 <opc:Field Name="LocaleIds" TypeName="opc:String" LengthField="NoOfLocaleIds" />
 <opc:Field Name="UserIdentityToken" TypeName="ua:ExtensionObject" />
 <opc:Field Name="UserTokenSignature" TypeName="tns:SignatureData" />
</opc:StructuredType>
```

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<opc:StructuredType Name="ActivateSessionResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Activates a session with the server.
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="ServerNonce" TypeName="opc:ByteString" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="ua:StatusCode" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="CloseSessionRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Closes a session with the server.opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="DeleteSubscriptions" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="CloseSessionResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Closes a session with the server./opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
</opc:StructuredType>
<opc:StructuredType Name="CancelRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Cancels an outstanding request.
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="RequestHandle" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="CancelResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Cancels an outstanding request.
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="CancelCount" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:EnumeratedType Name="NodeAttributesMask" LengthInBits="32">
 <opc:Documentation>The bits used to specify default attributes for a new node.</opc:Documentation>
 <opc:EnumeratedValue Name="None" Value="0" />
 <opc:EnumeratedValue Name="AccessLevel" Value="1" />
 <opc:EnumeratedValue Name="ArrayDimensions" Value="2" />
 <opc:EnumeratedValue Name="BrowseName" Value="4" />
 <opc:EnumeratedValue Name="ContainsNoLoops" Value="8" />
 <opc:EnumeratedValue Name="DataType" Value="16" />
 <opc:EnumeratedValue Name="Description" Value="32" />
 <opc:EnumeratedValue Name="DisplayName" Value="64" />
 <opc:EnumeratedValue Name="EventNotifier" Value="128" />
 <opc:EnumeratedValue Name="Executable" Value="256" />
 <opc:EnumeratedValue Name="Historizing" Value="512" />
 <opc:EnumeratedValue Name="InverseName" Value="1024" />
 <opc:EnumeratedValue Name="IsAbstract" Value="2048" />
```

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<opc:EnumeratedValue Name="MinimumSamplingInterval" Value="4096" />
 <opc:EnumeratedValue Name="NodeClass" Value="8192" />
 <opc:EnumeratedValue Name="NodeId" Value="16384" />
 <opc:EnumeratedValue Name="Symmetric" Value="32768" />
 <opc:EnumeratedValue Name="UserAccessLevel" Value="65536" />
 <opc:EnumeratedValue Name="UserExecutable" Value="131072" />
 <opc:EnumeratedValue Name="UserWriteMask" Value="262144" />
 <opc:EnumeratedValue Name="ValueRank" Value="524288" />
 <opc:EnumeratedValue Name="WriteMask" Value="1048576" />
 <opc:EnumeratedValue Name="Value" Value="2097152" />
 <opc:EnumeratedValue Name="DataTypeDefinition" Value="4194304" />
 <opc:EnumeratedValue Name="RolePermissions" Value="8388608" />
 <opc:EnumeratedValue Name="AccessRestrictions" Value="16777216" />
 <opc:EnumeratedValue Name="All" Value="33554431" />
 <opc:EnumeratedValue Name="BaseNode" Value="26501220" />
 <opc:EnumeratedValue Name="Object" Value="26501348" />
 <opc:EnumeratedValue Name="ObjectType" Value="26503268" />
 <opc:EnumeratedValue Name="Variable" Value="26571383" />
 <opc:EnumeratedValue Name="VariableType" Value="28600438" />
 <opc:EnumeratedValue Name="Method" Value="26632548" />
 <opc:EnumeratedValue Name="ReferenceType" Value="26537060" />
 <opc:EnumeratedValue Name="View" Value="26501356" />
</opc:EnumeratedType>
<opc:StructuredType Name="NodeAttributes" BaseType="ua:ExtensionObject">
 <opc:Documentation>The base attributes for all nodes./opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="ObjectAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for an object node.</opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="EventNotifier" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="VariableAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for a variable node.opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
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<opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Value" TypeName="ua:Variant" />
 <opc:Field Name="DataType" TypeName="ua:NodeId" />
 <opc:Field Name="ValueRank" TypeName="opc:Int32" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="ArrayDimensions" TypeName="opc:UInt32" LengthField="NoOfArrayDimensions" />
 <opc:Field Name="AccessLevel" TypeName="opc:Byte" />
 <opc:Field Name="UserAccessLevel" TypeName="opc:Byte" />
 <opc:Field Name="MinimumSamplingInterval" TypeName="opc:Double" />
 <opc:Field Name="Historizing" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="MethodAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for a method node.opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Executable" TypeName="opc:Boolean" />
 <opc:Field Name="UserExecutable" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="ObjectTypeAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for an object type node./opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="VariableTypeAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for a variable type node./opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Value" TypeName="ua:Variant" />
 <opc:Field Name="DataType" TypeName="ua:NodeId" />
 <opc:Field Name="ValueRank" TypeName="opc:Int32" />
 <opc:Field Name="NoOfArrayDimensions" TypeName="opc:Int32" />
 <opc:Field Name="ArrayDimensions" TypeName="opc:UInt32" LengthField="NoOfArrayDimensions" />
 <opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
</opc:StructuredType>
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<opc:StructuredType Name="ReferenceTypeAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for a reference type node./opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
 <opc:Field Name="Symmetric" TypeName="opc:Boolean" />
 <opc:Field Name="InverseName" TypeName="ua:LocalizedText" />
</opc:StructuredType>
<opc:StructuredType Name="DataTypeAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for a data type node./opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="IsAbstract" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="ViewAttributes" BaseType="tns:NodeAttributes">
 <opc:Documentation>The attributes for a view node.opc:Documentation>
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="ContainsNoLoops" TypeName="opc:Boolean" />
 <opc:Field Name="EventNotifier" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="GenericAttributeValue" BaseType="ua:ExtensionObject">
 <opc:Field Name="AttributeId" TypeName="opc:UInt32" />
 <opc:Field Name="Value" TypeName="ua:Variant" />
</opc:StructuredType>
<opc:StructuredType Name="GenericAttributes" BaseType="tns:NodeAttributes">
 <opc:Field Name="SpecifiedAttributes" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" SourceType="tns:NodeAttributes" />
 <opc:Field Name="WriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="UserWriteMask" TypeName="opc:UInt32" SourceType="tns:NodeAttributes" />
 <opc:Field Name="NoOfAttributeValues" TypeName="opc:Int32" />
 <opc:Field Name="AttributeValues" TypeName="tns:GenericAttributeValue"</p>
LengthField="NoOfAttributeValues" />
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</opc:StructuredType>
<opc:StructuredType Name="AddNodesItem" BaseType="ua:ExtensionObject">
 <opc:Documentation>A request to add a node to the server address space.</opc:Documentation>
 <opc:Field Name="ParentNodeId" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="RequestedNewNodeId" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" />
 <opc:Field Name="NodeAttributes" TypeName="ua:ExtensionObject" />
 <opc:Field Name="TypeDefinition" TypeName="ua:ExpandedNodeId" />
</opc:StructuredType>
<opc:StructuredType Name="AddNodesResult" BaseType="ua:ExtensionObject">
 <opc:Documentation>A result of an add node operation./opc:Documentation>
 <opc:Field Name="StatusCode" TypeName="ua:StatusCode" />
 <opc:Field Name="AddedNodeId" TypeName="ua:NodeId" />
</opc:StructuredType>
<opc:StructuredType Name="AddNodesRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Adds one or more nodes to the server address space.
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="NoOfNodesToAdd" TypeName="opc:Int32" />
 <opc:Field Name="NodesToAdd" TypeName="tns:AddNodesItem" LengthField="NoOfNodesToAdd" />
</opc:StructuredType>
<opc:StructuredType Name="AddNodesResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Adds one or more nodes to the server address space.</opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="tns:AddNodesResult" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="AddReferencesItem" BaseType="ua:ExtensionObject">
 <opc:Documentation>A request to add a reference to the server address space.</opc:Documentation>
 <opc:Field Name="SourceNodeId" TypeName="ua:NodeId" />
 <opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="IsForward" TypeName="opc:Boolean" />
 <opc:Field Name="TargetServerUri" TypeName="opc:String" />
 <opc:Field Name="TargetNodeId" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="TargetNodeClass" TypeName="tns:NodeClass" />
</opc:StructuredType>
<opc:StructuredType Name="AddReferencesRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Adds one or more references to the server address space.</opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
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<opc:Field Name="NoOfReferencesToAdd" TypeName="opc:Int32" />
 <opc:Field Name="ReferencesToAdd" TypeName="tns:AddReferencesItem"</pre>
LengthField="NoOfReferencesToAdd" />
</opc:StructuredType>
<opc:StructuredType Name="AddReferencesResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Adds one or more references to the server address space.</opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="ua:StatusCode" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="DeleteNodesItem" BaseType="ua:ExtensionObject">
 <opc:Documentation>A request to delete a node to the server address space./opc:Documentation>
 <opc:Field Name="NodeId" TypeName="ua:NodeId" />
 <opc:Field Name="DeleteTargetReferences" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="DeleteNodesRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Delete one or more nodes from the server address space./opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="NoOfNodesToDelete" TypeName="opc:Int32" />
 <opc:Field Name="NodesToDelete" TypeName="tns:DeleteNodesItem" LengthField="NoOfNodesToDelete" />
</opc:StructuredType>
<opc:StructuredType Name="DeleteNodesResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Delete one or more nodes from the server address space.
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="ua:StatusCode" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="DeleteReferencesItem" BaseType="ua:ExtensionObject">
 <opc:Documentation>A request to delete a node from the server address space.
 <opc:Field Name="SourceNodeId" TypeName="ua:NodeId" />
 <opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="IsForward" TypeName="opc:Boolean" />
 <opc:Field Name="TargetNodeId" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="DeleteBidirectional" TypeName="opc:Boolean" />
</opc:StructuredType>
<opc:StructuredType Name="DeleteReferencesRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Delete one or more references from the server address space.</opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
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<opc:Field Name="NoOfReferencesToDelete" TypeName="opc:Int32" />
 <opc:Field Name="ReferencesToDelete" TypeName="tns:DeleteReferencesItem"</pre>
LengthField="NoOfReferencesToDelete" />
</opc:StructuredType>
<opc:StructuredType Name="DeleteReferencesResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Delete one or more references from the server address space.
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="ua:StatusCode" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:EnumeratedType Name="AttributeWriteMask" LengthInBits="32" IsOptionSet="true">
 <opc:Documentation>Define bits used to indicate which attributes are writable.</opc:Documentation>
 <opc:EnumeratedValue Name="None" Value="0" />
 <opc:EnumeratedValue Name="AccessLevel" Value="1" />
 <opc:EnumeratedValue Name="ArrayDimensions" Value="2" />
 <opc:EnumeratedValue Name="BrowseName" Value="4" />
 <opc:EnumeratedValue Name="ContainsNoLoops" Value="8" />
 <opc:EnumeratedValue Name="DataType" Value="16" />
 <opc:EnumeratedValue Name="Description" Value="32" />
 <opc:EnumeratedValue Name="DisplayName" Value="64" />
 <opc:EnumeratedValue Name="EventNotifier" Value="128" />
 <opc:EnumeratedValue Name="Executable" Value="256" />
 <opc:EnumeratedValue Name="Historizing" Value="512" />
 <opc:EnumeratedValue Name="InverseName" Value="1024" />
 <opc:EnumeratedValue Name="IsAbstract" Value="2048" />
 <opc:EnumeratedValue Name="MinimumSamplingInterval" Value="4096" />
 <opc:EnumeratedValue Name="NodeClass" Value="8192" />
 <opc:EnumeratedValue Name="NodeId" Value="16384" />
 <opc:EnumeratedValue Name="Symmetric" Value="32768" />
 <opc:EnumeratedValue Name="UserAccessLevel" Value="65536" />
 <opc:EnumeratedValue Name="UserExecutable" Value="131072" />
 <opc:EnumeratedValue Name="UserWriteMask" Value="262144" />
 <opc:EnumeratedValue Name="ValueRank" Value="524288" />
 <opc:EnumeratedValue Name="WriteMask" Value="1048576" />
 <opc:EnumeratedValue Name="ValueForVariableType" Value="2097152" />
 <opc:EnumeratedValue Name="DataTypeDefinition" Value="4194304" />
 <opc:EnumeratedValue Name="RolePermissions" Value="8388608" />
 <opc:EnumeratedValue Name="AccessRestrictions" Value="16777216" />
 <opc:EnumeratedValue Name="AccessLevelEx" Value="33554432" />
</opc:EnumeratedType>
<opc:EnumeratedType Name="BrowseDirection" LengthInBits="32">
 <opc:Documentation>The directions of the references to return.</opc:Documentation>
 <opc:EnumeratedValue Name="Forward" Value="0" />
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<opc:EnumeratedValue Name="Inverse" Value="1" />
 <opc:EnumeratedValue Name="Both" Value="2" />
 <opc:EnumeratedValue Name="Invalid" Value="3" />
</opc:EnumeratedType>
<opc:StructuredType Name="ViewDescription" BaseType="ua:ExtensionObject">
 <opc:Documentation>The view to browse./opc:Documentation>
 <opc:Field Name="ViewId" TypeName="ua:NodeId" />
 <opc:Field Name="Timestamp" TypeName="opc:DateTime" />
 <opc:Field Name="ViewVersion" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="BrowseDescription" BaseType="ua:ExtensionObject">
 <opc:Documentation>A request to browse the the references from a node.
 <opc:Field Name="NodeId" TypeName="ua:NodeId" />
 <opc:Field Name="BrowseDirection" TypeName="tns:BrowseDirection" />
 <opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="IncludeSubtypes" TypeName="opc:Boolean" />
 <opc:Field Name="NodeClassMask" TypeName="opc:UInt32" />
 <opc:Field Name="ResultMask" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:EnumeratedType Name="BrowseResultMask" LengthInBits="32">
 <opc:Documentation>A bit mask which specifies what should be returned in a browse
response.</opc:Documentation>
 <opc:EnumeratedValue Name="None" Value="0" />
 <opc:EnumeratedValue Name="ReferenceTypeId" Value="1" />
 <opc:EnumeratedValue Name="IsForward" Value="2" />
 <opc:EnumeratedValue Name="NodeClass" Value="4" />
 <opc:EnumeratedValue Name="BrowseName" Value="8" />
 <opc:EnumeratedValue Name="DisplayName" Value="16" />
 <opc:EnumeratedValue Name="TypeDefinition" Value="32" />
 <opc:EnumeratedValue Name="All" Value="63" />
 <opc:EnumeratedValue Name="ReferenceTypeInfo" Value="3" />
 <opc:EnumeratedValue Name="TargetInfo" Value="60" />
</opc:EnumeratedType>
<opc:StructuredType Name="ReferenceDescription" BaseType="ua:ExtensionObject">
 <opc:Documentation>The description of a reference.</opc:Documentation>
 <opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="IsForward" TypeName="opc:Boolean" />
 <opc:Field Name="NodeId" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="BrowseName" TypeName="ua:QualifiedName" />
 <opc:Field Name="DisplayName" TypeName="ua:LocalizedText" />
 <opc:Field Name="NodeClass" TypeName="tns:NodeClass" />
 <opc:Field Name="TypeDefinition" TypeName="ua:ExpandedNodeId" />
</opc:StructuredType>
```

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<opc:OpaqueType Name="ContinuationPoint">
 <opc:Documentation>An identifier for a suspended query or browse operation.
</opc:OpaqueType>
<opc:StructuredType Name="BrowseResult" BaseType="ua:ExtensionObject">
 <opc:Documentation>The result of a browse operation.
 <opc:Field Name="StatusCode" TypeName="ua:StatusCode" />
 <opc:Field Name="ContinuationPoint" TypeName="opc:ByteString" />
 <opc:Field Name="NoOfReferences" TypeName="opc:Int32" />
 <opc:Field Name="References" TypeName="tns:ReferenceDescription" LengthField="NoOfReferences" />
</opc:StructuredType>
<opc:StructuredType Name="BrowseRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Browse the references for one or more nodes from the server address
space.</opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="View" TypeName="tns:ViewDescription" />
 <opc:Field Name="RequestedMaxReferencesPerNode" TypeName="opc:UInt32" />
 <opc:Field Name="NoOfNodesToBrowse" TypeName="opc:Int32" />
 <opc:Field Name="NodesToBrowse" TypeName="tns:BrowseDescription" LengthField="NoOfNodesToBrowse"</pre>
</opc:StructuredType>
<opc:StructuredType Name="BrowseResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Browse the references for one or more nodes from the server address
space.</opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="tns:BrowseResult" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="BrowseNextRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Continues one or more browse operations.
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="ReleaseContinuationPoints" TypeName="opc:Boolean" />
 <opc:Field Name="NoOfContinuationPoints" TypeName="opc:Int32" />
 <opc:Field Name="ContinuationPoints" TypeName="opc:ByteString" LengthField="NoOfContinuationPoints" />
</opc:StructuredType>
<opc:StructuredType Name="BrowseNextResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Continues one or more browse operations.
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="tns:BrowseResult" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
 <opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
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</opc:StructuredType>
<opc:StructuredType Name="RelativePathElement" BaseType="ua:ExtensionObject">
 <opc:Documentation>An element in a relative path./opc:Documentation>
 <opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="IsInverse" TypeName="opc:Boolean" />
 <opc:Field Name="IncludeSubtypes" TypeName="opc:Boolean" />
 <opc:Field Name="TargetName" TypeName="ua:QualifiedName" />
</opc:StructuredType>
<opc:StructuredType Name="RelativePath" BaseType="ua:ExtensionObject">
 <opc:Documentation>A relative path constructed from reference types and browse names.</opc:Documentation>
 <opc:Field Name="NoOfElements" TypeName="opc:Int32" />
 <opc:Field Name="Elements" TypeName="tns:RelativePathElement" LengthField="NoOfElements" />
</opc:StructuredType>
<opc:StructuredType Name="BrowsePath" BaseType="ua:ExtensionObject">
 <opc:Documentation>A request to translate a path into a node id.
 <opc:Field Name="StartingNode" TypeName="ua:NodeId" />
 <opc:Field Name="RelativePath" TypeName="tns:RelativePath" />
</opc:StructuredType>
<opc:StructuredType Name="BrowsePathTarget" BaseType="ua:ExtensionObject">
 <opc:Documentation>The target of the translated path./opc:Documentation>
 <opc:Field Name="TargetId" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="RemainingPathIndex" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="BrowsePathResult" BaseType="ua:ExtensionObject">
 <opc:Documentation>The result of a translate opearation.</opc:Documentation>
 <opc:Field Name="StatusCode" TypeName="ua:StatusCode" />
 <opc:Field Name="NoOfTargets" TypeName="opc:Int32" />
 <opc:Field Name="Targets" TypeName="tns:BrowsePathTarget" LengthField="NoOfTargets" />
</opc:StructuredType>
<opc:StructuredType Name="TranslateBrowsePathsToNodeIdsRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Translates one or more paths in the server address space./opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="NoOfBrowsePaths" TypeName="opc:Int32" />
 <opc:Field Name="BrowsePaths" TypeName="tns:BrowsePath" LengthField="NoOfBrowsePaths" />
</opc:StructuredType>
<opc:StructuredType Name="TranslateBrowsePathsToNodeIdsResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Translates one or more paths in the server address space.
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfResults" TypeName="opc:Int32" />
 <opc:Field Name="Results" TypeName="tns:BrowsePathResult" LengthField="NoOfResults" />
 <opc:Field Name="NoOfDiagnosticInfos" TypeName="opc:Int32" />
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<opc:Field Name="DiagnosticInfos" TypeName="ua:DiagnosticInfo" LengthField="NoOfDiagnosticInfos" />
</opc:StructuredType>
<opc:StructuredType Name="RegisterNodesRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Registers one or more nodes for repeated use within a session.
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="NoOfNodesToRegister" TypeName="opc:Int32" />
 <opc:Field Name="NodesToRegister" TypeName="ua:NodeId" LengthField="NoOfNodesToRegister" />
</opc:StructuredType>
<opc:StructuredType Name="RegisterNodesResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Registers one or more nodes for repeated use within a session.
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
 <opc:Field Name="NoOfRegisteredNodeIds" TypeName="opc:Int32" />
 <opc:Field Name="RegisteredNodeIds" TypeName="ua:NodeId" LengthField="NoOfRegisteredNodeIds" />
</opc:StructuredType>
<opc:StructuredType Name="UnregisterNodesRequest" BaseType="ua:ExtensionObject">
 <opc:Documentation>Unregisters one or more previously registered nodes./opc:Documentation>
 <opc:Field Name="RequestHeader" TypeName="tns:RequestHeader" />
 <opc:Field Name="NoOfNodesToUnregister" TypeName="opc:Int32" />
 <opc:Field Name="NodesToUnregister" TypeName="ua:NodeId" LengthField="NoOfNodesToUnregister" />
</opc:StructuredType>
<opc:StructuredType Name="UnregisterNodesResponse" BaseType="ua:ExtensionObject">
 <opc:Documentation>Unregisters one or more previously registered nodes./opc:Documentation>
 <opc:Field Name="ResponseHeader" TypeName="tns:ResponseHeader" />
</opc:StructuredType>
<opc:OpaqueType Name="Counter">
 <opc:Documentation>A monotonically increasing value.opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="NumericRange">
 <opc:Documentation>Specifies a range of array indexes.
</opc:OpaqueType>
<opc:OpaqueType Name="Time">
 <opc:Documentation>A time value specified as HH:MM:SS.SSS./opc:Documentation>
</opc:OpaqueType>
<opc:OpaqueType Name="Date">
 <opc:Documentation>A date value.
</opc:OpaqueType>
<opc:StructuredType Name="EndpointConfiguration" BaseType="ua:ExtensionObject">
 <opc:Field Name="OperationTimeout" TypeName="opc:Int32" />
 <opc:Field Name="UseBinaryEncoding" TypeName="opc:Boolean" />
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<opc:Field Name="MaxStringLength" TypeName="opc:Int32" />
 <opc:Field Name="MaxByteStringLength" TypeName="opc:Int32" />
 <opc:Field Name="MaxArrayLength" TypeName="opc:Int32" />
 <opc:Field Name="MaxMessageSize" TypeName="opc:Int32" />
 <opc:Field Name="MaxBufferSize" TypeName="opc:Int32" />
 <opc:Field Name="ChannelLifetime" TypeName="opc:Int32" />
 <opc:Field Name="SecurityTokenLifetime" TypeName="opc:Int32" />
</opc:StructuredType>
<opc:StructuredType Name="QueryDataDescription" BaseType="ua:ExtensionObject">
 <opc:Field Name="RelativePath" TypeName="tns:RelativePath" />
 <opc:Field Name="AttributeId" TypeName="opc:UInt32" />
 <opc:Field Name="IndexRange" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="NodeTypeDescription" BaseType="ua:ExtensionObject">
 <opc:Field Name="TypeDefinitionNode" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="IncludeSubTypes" TypeName="opc:Boolean" />
 <opc:Field Name="NoOfDataToReturn" TypeName="opc:Int32" />
 <opc:Field Name="DataToReturn" TypeName="tns:QueryDataDescription" LengthField="NoOfDataToReturn"</pre>
</opc:StructuredType>
<opc:EnumeratedType Name="FilterOperator" LengthInBits="32">
 <opc:EnumeratedValue Name="Equals" Value="0" />
 <opc:EnumeratedValue Name="IsNull" Value="1" />
 <opc:EnumeratedValue Name="GreaterThan" Value="2" />
 <opc:EnumeratedValue Name="LessThan" Value="3" />
 <opc:EnumeratedValue Name="GreaterThanOrEqual" Value="4" />
 <opc:EnumeratedValue Name="LessThanOrEqual" Value="5" />
 <opc:EnumeratedValue Name="Like" Value="6" />
 <opc:EnumeratedValue Name="Not" Value="7" />
 <opc:EnumeratedValue Name="Between" Value="8" />
 <opc:EnumeratedValue Name="InList" Value="9" />
 <opc:EnumeratedValue Name="And" Value="10" />
 <opc:EnumeratedValue Name="Or" Value="11" />
 <opc:EnumeratedValue Name="Cast" Value="12" />
 <opc:EnumeratedValue Name="InView" Value="13" />
 <opc:EnumeratedValue Name="OfType" Value="14" />
 <opc:EnumeratedValue Name="RelatedTo" Value="15" />
 <opc:EnumeratedValue Name="BitwiseAnd" Value="16" />
 <opc:EnumeratedValue Name="BitwiseOr" Value="17" />
</opc:EnumeratedType>
<opc:StructuredType Name="QueryDataSet" BaseType="ua:ExtensionObject">
 <opc:Field Name="NodeId" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="TypeDefinitionNode" TypeName="ua:ExpandedNodeId" />
 <opc:Field Name="NoOfValues" TypeName="opc:Int32" />
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<opc:Field Name="Values" TypeName="ua:Variant" LengthField="NoOfValues" />
</opc:StructuredType>
<opc:StructuredType Name="NodeReference" BaseType="ua:ExtensionObject">
 <opc:Field Name="NodeId" TypeName="ua:NodeId" />
 <opc:Field Name="ReferenceTypeId" TypeName="ua:NodeId" />
 <opc:Field Name="IsForward" TypeName="opc:Boolean" />
 <opc:Field Name="NoOfReferencedNodeIds" TypeName="opc:Int32" />
 <opc:Field Name="ReferencedNodeIds" TypeName="ua:NodeId" LengthField="NoOfReferencedNodeIds" />
</opc:StructuredType>
<opc:StructuredType Name="ContentFilterElement" BaseType="ua:ExtensionObject">
<opc:Field Name="FilterOperator" TypeName="tns:FilterOperator" />
<opc:Field Name="NoOfFilterOperands" TypeName="opc:Int32" />
 <opc:Field Name="FilterOperands" TypeName="ua:ExtensionObject" LengthField="NoOfFilterOperands" />
</opc:StructuredType>
<opc:StructuredType Name="ContentFilter" BaseType="ua:ExtensionObject">
<opc:Field Name="NoOfElements" TypeName="opc:Int32" />
 <opc:Field Name="Elements" TypeName="tns:ContentFilterElement" LengthField="NoOfElements" />
</opc:StructuredType>
<opc:StructuredType Name="FilterOperand" BaseType="ua:ExtensionObject">
</opc:StructuredType>
<opc:StructuredType Name="ElementOperand" BaseType="tns:FilterOperand">
 <opc:Field Name="Index" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:StructuredType Name="LiteralOperand" BaseType="tns:FilterOperand">
 <opc:Field Name="Value" TypeName="ua:Variant" />
</opc:StructuredType>
<opc:StructuredType Name="AttributeOperand" BaseType="tns:FilterOperand">
 <opc:Field Name="NodeId" TypeName="ua:NodeId" />
<opc:Field Name="Alias" TypeName="opc:String" />
 <opc:Field Name="BrowsePath" TypeName="tns:RelativePath" />
 <opc:Field Name="AttributeId" TypeName="opc:UInt32" />
 <opc:Field Name="IndexRange" TypeName="opc:String" />
</opc:StructuredType>
<opc:StructuredType Name="SimpleAttributeOperand" BaseType="tns:FilterOperand">
 <opc:Field Name="TypeDefinitionId" TypeName="ua:NodeId" />
 <opc:Field Name="NoOfBrowsePath" TypeName="opc:Int32" />
 <opc:Field Name="BrowsePath" TypeName="ua:QualifiedName" LengthField="NoOfBrowsePath" />
 <opc:Field Name="AttributeId" TypeName="opc:UInt32" />
 <opc:Field Name="IndexRange" TypeName="opc:String" />
</opc:StructuredType>
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<opc:StructuredType Name="ContentFilterElementResult" BaseType="ua:ExtensionObject">
 <opc:Field Name="StatusCode" TypeName="ua:StatusCode" />
 <opc:Field Name="NoOfOperandStatusCodes" TypeName="opc:Int32" />
 <opc:Field Name="OperandStatusCodes" TypeName="ua:StatusCode" LengthField="NoOfOperandStatusCodes"</pre>
 <opc:Field Name="NoOfOperandDiagnosticInfos" TypeName="opc:Int32" />
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 <opc:Field Name="TimestampsToReturn" TypeName="tns:TimestampsToReturn" />
 <opc:Field Name="ReleaseContinuationPoints" TypeName="opc:Boolean" />
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 <opc:Field Name="MonitoringMode" TypeName="tns:MonitoringMode" />
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LengthField="NoOfAddDiagnosticInfos" />
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 <opc:Field Name="LatePublishRequestCount" TypeName="opc:UInt32" />
 <opc:Field Name="CurrentKeepAliveCount" TypeName="opc:UInt32" />
 <opc:Field Name="CurrentLifetimeCount" TypeName="opc:UInt32" />
 <opc:Field Name="UnacknowledgedMessageCount" TypeName="opc:UInt32" />
 <opc:Field Name="DiscardedMessageCount" TypeName="opc:UInt32" />
 <opc:Field Name="MonitoredItemCount" TypeName="opc:UInt32" />
 <opc:Field Name="DisabledMonitoredItemCount" TypeName="opc:UInt32" />
 <opc:Field Name="MonitoringQueueOverflowCount" TypeName="opc:UInt32" />
 <opc:Field Name="NextSequenceNumber" TypeName="opc:UInt32" />
 <opc:Field Name="EventQueueOverFlowCount" TypeName="opc:UInt32" />
</opc:StructuredType>
<opc:EnumeratedType Name="ModelChangeStructureVerbMask" LengthInBits="32">
 <opc:EnumeratedValue Name="NodeAdded" Value="1" />
 <opc:EnumeratedValue Name="NodeDeleted" Value="2" />
 <opc:EnumeratedValue Name="ReferenceAdded" Value="4" />
 <opc:EnumeratedValue Name="ReferenceDeleted" Value="8" />
```

```
<opc:EnumeratedValue Name="DataTypeChanged" Value="16" />
</opc:EnumeratedType>
<opc:StructuredType Name="ModelChangeStructureDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="Affected" TypeName="ua:NodeId" />
<opc:Field Name="AffectedType" TypeName="ua:NodeId" />
 <opc:Field Name="Verb" TypeName="opc:Byte" />
</opc:StructuredType>
<opc:StructuredType Name="SemanticChangeStructureDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="Affected" TypeName="ua:NodeId" />
 <opc:Field Name="AffectedType" TypeName="ua:NodeId" />
</opc:StructuredType>
<opc:StructuredType Name="Range" BaseType="ua:ExtensionObject">
<opc:Field Name="Low" TypeName="opc:Double" />
 <opc:Field Name="High" TypeName="opc:Double" />
</opc:StructuredType>
<opc:StructuredType Name="EUInformation" BaseType="ua:ExtensionObject">
 <opc:Field Name="NamespaceUri" TypeName="opc:String" />
<opc:Field Name="UnitId" TypeName="opc:Int32" />
<opc:Field Name="DisplayName" TypeName="ua:LocalizedText" />
 <opc:Field Name="Description" TypeName="ua:LocalizedText" />
</opc:StructuredType>
<opc:EnumeratedType Name="AxisScaleEnumeration" LengthInBits="32">
 <opc:EnumeratedValue Name="Linear" Value="0" />
<opc:EnumeratedValue Name="Log" Value="1" />
 <opc:EnumeratedValue Name="Ln" Value="2" />
</opc:EnumeratedType>
<opc:StructuredType Name="ComplexNumberType" BaseType="ua:ExtensionObject">
<opc:Field Name="Real" TypeName="opc:Float" />
 <opc:Field Name="Imaginary" TypeName="opc:Float" />
</opc:StructuredType>
<opc:StructuredType Name="DoubleComplexNumberType" BaseType="ua:ExtensionObject">
 <opc:Field Name="Real" TypeName="opc:Double" />
 <opc:Field Name="Imaginary" TypeName="opc:Double" />
</opc:StructuredType>
<opc:StructuredType Name="AxisInformation" BaseType="ua:ExtensionObject">
 <opc:Field Name="EngineeringUnits" TypeName="tns:EUInformation" />
 <opc:Field Name="EURange" TypeName="tns:Range" />
 <opc:Field Name="Title" TypeName="ua:LocalizedText" />
 <opc:Field Name="AxisScaleType" TypeName="tns:AxisScaleEnumeration" />
 <opc:Field Name="NoOfAxisSteps" TypeName="opc:Int32" />
```

```
<opc:Field Name="AxisSteps" TypeName="opc:Double" LengthField="NoOfAxisSteps" />
</opc:StructuredType>
<opc:StructuredType Name="XVType" BaseType="ua:ExtensionObject">
 <opc:Field Name="X" TypeName="opc:Double" />
 <opc:Field Name="Value" TypeName="opc:Float" />
</opc:StructuredType>
<opc:StructuredType Name="ProgramDiagnosticDataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="CreateSessionId" TypeName="ua:NodeId" />
 <opc:Field Name="CreateClientName" TypeName="opc:String" />
 <opc:Field Name="InvocationCreationTime" TypeName="opc:DateTime" />
 <opc:Field Name="LastTransitionTime" TypeName="opc:DateTime" />
 <opc:Field Name="LastMethodCall" TypeName="opc:String" />
 <opc:Field Name="LastMethodSessionId" TypeName="ua:NodeId" />
 <opc:Field Name="NoOfLastMethodInputArguments" TypeName="opc:Int32" />
 <opc:Field Name="LastMethodInputArguments" TypeName="tns:Argument"</pre>
LengthField="NoOfLastMethodInputArguments" />
 <opc:Field Name="NoOfLastMethodOutputArguments" TypeName="opc:Int32" />
 <opc:Field Name="LastMethodOutputArguments" TypeName="tns:Argument"</pre>
LengthField="NoOfLastMethodOutputArguments" />
 <opc:Field Name="LastMethodCallTime" TypeName="opc:DateTime" />
 <opc:Field Name="LastMethodReturnStatus" TypeName="tns:StatusResult" />
</opc:StructuredType>
<opc:StructuredType Name="ProgramDiagnostic2DataType" BaseType="ua:ExtensionObject">
 <opc:Field Name="CreateSessionId" TypeName="ua:NodeId" />
 <opc:Field Name="CreateClientName" TypeName="opc:String" />
 <opc:Field Name="InvocationCreationTime" TypeName="opc:DateTime" />
 <opc:Field Name="LastTransitionTime" TypeName="opc:DateTime" />
 <opc:Field Name="LastMethodCall" TypeName="opc:String" />
 <opc:Field Name="LastMethodSessionId" TypeName="ua:NodeId" />
 <opc:Field Name="NoOfLastMethodInputArguments" TypeName="opc:Int32" />
 <opc:Field Name="LastMethodInputArguments" TypeName="tns:Argument"</pre>
LengthField="NoOfLastMethodInputArguments" />
 <opc:Field Name="NoOfLastMethodOutputArguments" TypeName="opc:Int32" />
 <opc:Field Name="LastMethodOutputArguments" TypeName="tns:Argument"</pre>
LengthField="NoOfLastMethodOutputArguments" />
 <opc:Field Name="NoOfLastMethodInputValues" TypeName="opc:Int32" />
 <opc:Field Name="LastMethodInputValues" TypeName="ua:Variant"</pre>
LengthField="NoOfLastMethodInputValues" />
 <opc:Field Name="NoOfLastMethodOutputValues" TypeName="opc:Int32" />
 <opc:Field Name="LastMethodOutputValues" TypeName="ua:Variant"</pre>
LengthField="NoOfLastMethodOutputValues" />
 <opc:Field Name="LastMethodCallTime" TypeName="opc:DateTime" />
 <opc:Field Name="LastMethodReturnStatus" TypeName="tns:StatusResult" />
</opc:StructuredType>
```

```
<opc:StructuredType Name="Annotation" BaseType="ua:ExtensionObject">
  <opc:Field Name="Message" TypeName="opc:String" />
  <opc:Field Name="UserName" TypeName="opc:String" />
  <opc:Field Name="AnnotationTime" TypeName="opc:DateTime" />
  </opc:StructuredType>

<opc:EnumeratedType Name="ExceptionDeviationFormat" LengthInBits="32">
  <opc:EnumeratedValue Name="AbsoluteValue" Value="0" />
  <opc:EnumeratedValue Name="PercentOfValue" Value="1" />
  <opc:EnumeratedValue Name="PercentOfRange" Value="2" />
  <opc:EnumeratedValue Name="PercentOfEURange" Value="3" />
  <opc:EnumeratedValue Name="Unknown" Value="4" />
  </opc:EnumeratedType>

</opc:TypeDictionary>
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```

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## 1.43 duktape 2.5.0

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/\* Written in 2015 by Sebastiano Vigna (vigna@acm.org)

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CommonJS specification snapshots are included in the references/
directory. CommonJS is under the MIT license: <a href="http://www.commonjs.org/">http://www.commonjs.org/</a>.

# 1.44 inflight 1.0.6

## 1.45 punycode 2.1.1

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# 1.46 node-gyp-build 4.5.0

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## 1.47 throwback 4.1.0

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# 1.48 minizip 1.1

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MiniZip - Copyright (c) 1998-2010 - by Gilles Vollant - version 1.1 64 bits from Mathias Svensson

#### Introduction

\_\_\_\_\_

MiniZip 1.1 is built from MiniZip 1.0 by Gilles Vollant ( http://www.winimage.com/zLibDll/minizip.html )

When adding ZIP64 support into minizip it would result into risk of breaking compatibility with minizip 1.0. All possible work was done for compatibility.

#### Background

\_\_\_\_\_

When adding ZIP64 support Mathias Svensson found that Even Rouault have added ZIP64 support for unzip.c into minizip for a open source project called gdal ( http://www.gdal.org/)

That was used as a starting point. And after that ZIP64 support was added to zip.c some refactoring and code cleanup was also done.

#### Changed from MiniZip 1.0 to MiniZip 1.1

\_\_\_\_\_

- \* Added ZIP64 support for unzip ( by Even Rouault )
- \* Added ZIP64 support for zip (by Mathias Svensson)
- \* Reverted some changed that Even Rouault did.
- \* Bunch of patches received from Gulles Vollant that he received for MiniZip from various users.
- \* Added unzip patch for BZIP Compression method (patch create by Daniel Borca)
- \* Added BZIP Compress method for zip
- \* Did some refactoring and code cleanup

#### Credits

Gilles Vollant - Original MiniZip author

Even Rouault - ZIP64 unzip Support

Daniel Borca - BZip Compression method support in unzip

Mathias Svensson - ZIP64 zip support

Mathias Svensson - BZip Compression method support in zip

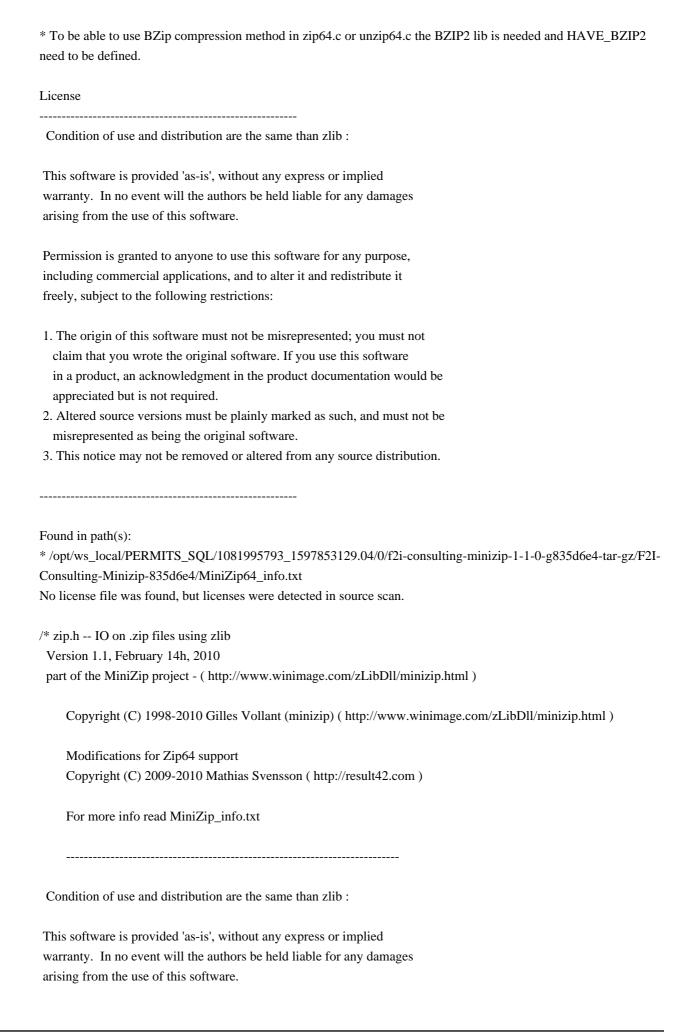
#### Resources

ZipLayout http://result42.com/projects/ZipFileLayout

Command line tool for Windows that shows the layout and information of the headers in a zip archive. Used when debugging and validating the creation of zip files using MiniZip64

ZIP App Note http://www.pkware.com/documents/casestudies/APPNOTE.TXT Zip File specification

Notes.



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  Changes

  See header of zip.h

\*/

Found in path(s):

\* /opt/ws\_local/PERMITS\_SQL/1081995793\_1597853129.04/0/f2i-consulting-minizip-1-1-0-g835d6e4-tar-gz/F2I-Consulting-Minizip-835d6e4/zip.h

No license file was found, but licenses were detected in source scan.

/\* unzip.c -- IO for uncompress .zip files using zlib

Version 1.1, February 14h, 2010

part of the MiniZip project - ( http://www.winimage.com/zLibDll/minizip.html )

Copyright (C) 1998-2010 Gilles Vollant (minizip) ( http://www.winimage.com/zLibDll/minizip.html )

Modifications of Unzip for Zip64 Copyright (C) 2007-2008 Even Rouault

Modifications for Zip64 support on both zip and unzip Copyright (C) 2009-2010 Mathias Svensson (http://result42.com)

For more info read MiniZip\_info.txt

-----

Decryption code comes from crypt.c by Info-ZIP but has been greatly reduced in terms of compatibility with older software. The following is from the original crypt.c. Code woven in by Terry Thorsen 1/2003.

Copyright (c) 1990-2000 Info-ZIP. All rights reserved.

See the accompanying file LICENSE, version 2000-Apr-09 or later (the contents of which are also included in zip.h) for terms of use. If, for some reason, all these files are missing, the Info-ZIP license also may be found at: ftp://ftp.info-zip.org/pub/infozip/license.html

crypt.c (full version) by Info-ZIP. Last revised: [see crypt.h]

The encryption/decryption parts of this source code (as opposed to the non-echoing password parts) were originally written in Europe. The whole source package can be freely distributed, including from the USA. (Prior to January 2000, re-export from the US was a violation of US law.)

This encryption code is a direct transcription of the algorithm from Roger Schlafly, described by Phil Katz in the file appnote.txt. This file (appnote.txt) is distributed with the PKZIP program (even in the version without encryption capabilities).

-----

Changes in unzip.c

2007-2008 - Even Rouault - Addition of cpl\_unzGetCurrentFileZStreamPos

2007-2008 - Even Rouault - Decoration of symbol names unz\* -> cpl\_unz\*

2007-2008 - Even Rouault - Remove old C style function prototypes

2007-2008 - Even Rouault - Add unzip support for ZIP64

Copyright (C) 2007-2008 Even Rouault

Oct-2009 - Mathias Svensson - Removed cpl\_\* from symbol names (Even Rouault added them but since this is now moved to a new project (minizip64) I renamed them again).

Oct-2009 - Mathias Svensson - Fixed problem if uncompressed size was > 4G and compressed size was <4G should only read the compressed/uncompressed size from the Zip64 format if the size from normal header was 0xFFFFFFFF

Oct-2009 - Mathias Svensson - Applied some bug fixes from paches recived from Gilles Vollant
Oct-2009 - Mathias Svensson - Applied support to unzip files with compression mathod BZIP2 (bzip2 lib is required)

Patch created by Daniel Borca

Jan-2010 - back to unzip and minizip 1.0 name scheme, with compatibility layer

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\*/

Found in path(s):

 $*/opt/ws\_local/PERMITS\_SQL/1081995793\_1597853129.04/0/f2i-consulting-minizip-1-1-0-g835d6e4-tar-gz/F2I-Consulting-Minizip-835d6e4/unzip.c$ 

No license file was found, but licenses were detected in source scan. /\* unzip.h -- IO for uncompress .zip files using zlib Version 1.1, February 14h, 2010 part of the MiniZip project - ( http://www.winimage.com/zLibDll/minizip.html ) Copyright (C) 1998-2010 Gilles Vollant (minizip) ( http://www.winimage.com/zLibDll/minizip.html ) Modifications of Unzip for Zip64 Copyright (C) 2007-2008 Even Rouault Modifications for Zip64 support on both zip and unzip Copyright (C) 2009-2010 Mathias Svensson (http://result42.com) For more info read MiniZip\_info.txt Condition of use and distribution are the same than zlib: This software is provided 'as-is', without any express or implied warranty. In no event will the authors be held liable for any damages arising from the use of this software. Permission is granted to anyone to use this software for any purpose, including commercial applications, and to alter it and redistribute it freely, subject to the following restrictions: 1. The origin of this software must not be misrepresented; you must not claim that you wrote the original software. If you use this software in a product, an acknowledgment in the product documentation would be appreciated but is not required. 2. Altered source versions must be plainly marked as such, and must not be misrepresented as being the original software. 3. This notice may not be removed or altered from any source distribution. Changes See header of unzip64.c \*/ Found in path(s): \* /opt/ws\_local/PERMITS\_SQL/1081995793\_1597853129.04/0/f2i-consulting-minizip-1-1-0-g835d6e4-tar-gz/F2I-

Consulting-Minizip-835d6e4/unzip.h

## 1.49 make-error 1.3.6

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## 1.50 fs.realpath 1.0.0

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## 1.51 utf-8-validate 5.0.9

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## 1.52 protobuf.js\_edge 7.1.2

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5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

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If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

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For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

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Version 2.1, February 1999

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# 1.63 minimatch 3.1.2

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# 1.64 client-oauth 24.3.3

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# 1.65 zlib 1.2.12-r3

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# 1.66 coreutils 9.0-r2

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## 1.67 mime-db 1.52.0

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Upstream-Name: iothub-client-sample-firmware-update Source: https://github.com/Azure/azure-iot-sdks.git

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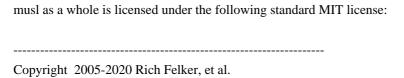
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## 1.81 musl 1.2.2-r7

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# 1.83 path-is-absolute 1.0.1

# 1.84 alpine-baselayout 3.2.0-r18

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# 1.86 types/vscode 1.43.0

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## 1.87 webidl-conversions 3.0.1

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# 1.89 graphql-request 4.3.0

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## 1.90 tr46 0.0.3

## 1.90.1 Available under license:

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## 1.91 s6 2.11.0.0-r0

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\* C implementation based on the original Perl and shell versions

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20220614/c_rehash.c
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# certdata.txt
# This file contains the object definitions for the certs and other
# information "built into" NSS.
# Object definitions:
# Certificates
# -- Attribute --
                     -- type --
                                  -- value --
# CKA_CLASS
                         CK_OBJECT_CLASS CKO_CERTIFICATE
                                           CK_TRUE
# CKA_TOKEN
                          CK BBOOL
# CKA PRIVATE
                          CK BBOOL
                                            CK_FALSE
# CKA_MODIFIABLE
                             CK_BBOOL
                                               CK_FALSE
# CKA_LABEL
                         UTF8
                                       (varies)
# CKA_CERTIFICATE_TYPE
                                 CK_CERTIFICATE_TYPE CKC_X_509
# CKA_SUBJECT
                          DER+base64
                                           (varies)
# CKA_ID
                      byte array
                                    (varies)
# CKA_ISSUER
                         DER+base64
                                          (varies)
# CKA_SERIAL_NUMBER
                                DER+base64
                                                 (varies)
# CKA_VALUE
                          DER+base64
                                           (varies)
# CKA_NSS_EMAIL
                            ASCII7
                                          (unused here)
# CKA_NSS_SERVER_DISTRUST_AFTER DER+base64
                                                         (varies)
# CKA_NSS_EMAIL_DISTRUST_AFTER DER+base64
                                                        (varies)
# Trust
# -- Attribute --
                     -- type --
                                  -- value --
                         CK_OBJECT_CLASS CKO_TRUST
# CKA_CLASS
# CKA_TOKEN
                         CK_BBOOL
                                           CK_TRUE
# CKA_PRIVATE
                          CK_BBOOL
                                            CK_FALSE
```

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```
# CKA MODIFIABLE
                          CK BBOOL
                                          CK FALSE
# CKA_LABEL
                       UTF8
                                   (varies)
# CKA_ISSUER
                       DER+base64
                                      (varies)
# CKA_SERIAL_NUMBER
                             DER+base64
                                            (varies)
# CKA_CERT_HASH
                          binary+base64
                                        (varies)
# CKA_EXPIRES
                       CK_DATE
                                      (not used here)
# CKA TRUST DIGITAL SIGNATURE CK TRUST
                                                  (varies)
# CKA_TRUST_NON_REPUDIATION CK_TRUST
                                                  (varies)
# CKA_TRUST_KEY_ENCIPHERMENT CK_TRUST
                                                   (varies)
# CKA_TRUST_DATA_ENCIPHERMENT CK_TRUST
                                                    (varies)
# CKA_TRUST_KEY_AGREEMENT
                                 CK_TRUST
                                                 (varies)
# CKA_TRUST_KEY_CERT_SIGN
                                CK_TRUST
                                                (varies)
# CKA_TRUST_CRL_SIGN
                            CK_TRUST
                                            (varies)
# CKA_TRUST_SERVER_AUTH
                               CK_TRUST
                                               (varies)
# CKA_TRUST_CLIENT_AUTH
                               CK_TRUST
                                               (varies)
# CKA_TRUST_CODE_SIGNING
                               CK_TRUST
                                               (varies)
# CKA_TRUST_EMAIL_PROTECTION CK_TRUST
                                                  (varies)
# CKA TRUST IPSEC END SYSTEM CK TRUST
                                                  (varies)
# CKA_TRUST_IPSEC_TUNNEL
                               CK_TRUST
                                               (varies)
# CKA_TRUST_IPSEC_USER
                             CK_TRUST
                                             (varies)
# CKA TRUST TIME STAMPING
                               CK TRUST
                                                (varies)
# CKA_TRUST_STEP_UP_APPROVED CK_BBOOL
                                                   (varies)
# (other trust attributes can be defined)
# The object to tell NSS that this is a root list and we don't
# have to go looking for others.
BEGINDATA
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_BUILTIN_ROOT_LIST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Mozilla Builtin Roots"
#
# Certificate "GlobalSign Root CA"
# Issuer: CN=GlobalSign Root CA,OU=Root CA,O=GlobalSign nv-sa,C=BE
# Serial Number:04:00:00:00:00:01:15:4b:5a:c3:94
# Subject: CN=GlobalSign Root CA,OU=Root CA,O=GlobalSign nv-sa,C=BE
# Not Valid Before: Tue Sep 01 12:00:00 1998
# Not Valid After: Fri Jan 28 12:00:00 2028
# Fingerprint (SHA-256):
EB:D4:10:40:E4:BB:3E:C7:42:C9:E3:81:D3:1E:F2:A4:1A:48:B6:68:5C:96:E7:CE:F3:C1:DF:6C:D4:33:1C:99
# Fingerprint (SHA1): B1:BC:96:8B:D4:F4:9D:62:2A:A8:9A:81:F2:15:01:52:A4:1D:82:9C
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
```

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA LABEL UTF8 "GlobalSign Root CA"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \000\127\006\003\125\004\0006\023\002\102\105\061 $$ \031\060\027\006\003\125\004\012\023\020\107\154\157\142\141\154 $$ $$ \123\151\147\156\040\156\166\055\163\141\061\020\060\016\0006\003\125\004\003\022\157\157\164\040\103\101\061\033\060\031 $$ \006\003\125\004\003\023\022\107\154\157\142\141\154\123\151\147 $$ \156\040\122\157\157\164\040\103\101 $$$ 

**END** 

CKA ID UTF8 "0"

## CKA\_ISSUER MULTILINE\_OCTAL

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\013\004\000\000\000\000\001\025\113\132\303\224

**END** 

#### CKA VALUE MULTILINE OCTAL

\060\202\003\165\060\202\002\135\240\003\002\001\002\002\013\004  $\label{eq:condition} $$ \000\000\000\001\025\113\132\303\224\060\015\006\011\052\206 $$$ \110\206\367\015\001\001\005\005\000\060\127\061\013\060\011\006 \003\125\004\006\023\002\102\105\061\031\060\027\006\003\125\004 \055\163\141\061\020\060\016\006\003\125\004\013\023\007\122\157 \157\164\040\103\101\061\033\060\031\006\003\125\004\003\023\022 \107\154\157\142\141\154\123\151\147\156\040\122\157\157\164\040 \103\101\060\036\027\015\071\070\060\071\060\061\061\062\060\060 \060\060\132\027\015\062\070\060\061\062\070\061\062\060\060 \060\132\060\127\061\013\060\011\006\003\125\004\006\023\002\102 \105\061\031\060\027\006\003\125\004\012\023\020\107\154\157\142  $\label{eq:condition} $$ 141\154\123\151\147\156\040\156\166\055\163\141\061\020\060\016 $$$  $\label{eq:condition} $$ \006\003\125\004\013\023\007\122\157\157\164\040\103\101\061\033$ \060\031\006\003\125\004\003\023\022\107\154\157\142\141\154\123 \015\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202 \001\017\000\060\202\001\012\002\202\001\001\000\332\016\346\231 \215\316\243\343\117\212\176\373\361\213\203\045\153\352\110\037 \361\052\260\271\225\021\004\275\360\143\321\342\147\146\317\034 \335\317\033\110\053\356\215\211\216\232\257\051\200\145\253\351 \307\055\022\313\253\034\114\160\007\241\075\012\060\315\025\215

\117\370\335\324\214\120\025\034\357\120\356\304\056\367\374\351 \122\362\221\175\340\155\325\065\060\216\136\103\163\362\101\351  $\label{eq:condition} $$ 325\152\343\262\211\072\126\071\070\157\006\074\210\151\133\052$ \115\305\247\124\270\154\211\314\233\371\074\312\345\375\211\365  $\label{eq:condition} $$ \022\074\222\170\226\326\334\164\156\223\104\141\321\215\307\106$ \262\165\016\206\350\031\212\325\155\154\325\170\026\225\242\351 \310\012\070\353\362\044\023\117\163\124\223\023\205\072\033\274  $\label{eq:condition} $$ \036\064\265\213\005\214\271\167\213\261\333\037\040\221\253\011 $$$ \123\156\220\316\173\067\164\271\160\107\221\042\121\143\026\171 \256\261\256\101\046\010\310\031\053\321\106\252\110\326\144\052 \327\203\064\377\054\052\301\154\031\103\112\007\205\347\323\174 \366\041\150\357\352\362\122\237\177\223\220\317\002\003\001\000 \001\243\102\060\100\060\016\006\003\125\035\017\001\001\377\004  $\label{eq:condition} $$ \005\060\003\001\001\377\060\035\006\003\125\035\016\004\026\004$ \024\140\173\146\032\105\015\227\312\211\120\057\175\004\315\064 \250\377\374\375\113\060\015\006\011\052\206\110\206\367\015\001 \001\005\005\000\003\202\001\001\000\326\163\347\174\117\166\320 \215\277\354\272\242\276\064\305\050\062\265\174\374\154\234\054  $\label{eq:condition} $$ \053\275\011\236\123\277\153\136\252\021\110\266\345\010\243\263$ \312\075\141\115\323\106\011\263\076\303\240\343\143\125\033\362 \272\357\255\071\341\103\271\070\243\346\057\212\046\073\357\240  $\label{eq:condition} $$ 120\126\371\306\012\375\070\315\304\013\160\121\224\227\230\004$ \337\303\137\224\325\025\311\024\101\234\304\135\165\144\025\015 \377\125\060\354\206\217\377\015\357\054\271\143\106\366\252\374 \337\274\151\375\056\022\110\144\232\340\225\360\246\357\051\217 \001\261\025\265\014\035\245\376\151\054\151\044\170\036\263\247  $\label{eq:condition} $$ \034\161\142\356\312\310\227\254\027\135\212\302\370\107\206\156$$ \052\304\126\061\225\320\147\211\205\053\371\154\246\135\106\235 \014\252\202\344\231\121\335\160\267\333\126\075\141\344\152\341 \134\326\366\376\075\336\101\314\007\256\143\122\277\123\123\364 \053\351\307\375\266\367\202\137\205\322\101\030\333\201\263\004 \034\305\037\244\200\157\025\040\311\336\014\210\012\035\326\146 \125\342\374\110\311\051\046\151\340

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "GlobalSign Root CA"
```

EB:D4:10:40:E4:BB:3E:C7:42:C9:E3:81:D3:1E:F2:A4:1A:48:B6:68:5C:96:E7:CE:F3:C1:DF:6C:D4:33:1C:99

<sup>#</sup> Issuer: CN=GlobalSign Root CA,OU=Root CA,O=GlobalSign nv-sa,C=BE

<sup>#</sup> Serial Number:04:00:00:00:00:01:15:4b:5a:c3:94

<sup>#</sup> Subject: CN=GlobalSign Root CA,OU=Root CA,O=GlobalSign nv-sa,C=BE

<sup>#</sup> Not Valid Before: Tue Sep 01 12:00:00 1998

<sup>#</sup> Not Valid After: Fri Jan 28 12:00:00 2028

<sup>#</sup> Fingerprint (SHA-256):

<sup>#</sup> Fingerprint (SHA1): B1:BC:96:8B:D4:F4:9D:62:2A:A8:9A:81:F2:15:01:52:A4:1D:82:9C

```
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GlobalSign Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\261\274\226\213\324\364\235\142\052\250\232\201\362\025\001\122
\244\035\202\234
END
CKA CERT MD5 HASH MULTILINE OCTAL
\label{eq:condition} $$ \076\105\122\025\011\121\222\341\267\135\067\237\261\207\051\212 $$
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\127\061\013\060\011\006\003\125\004\006\023\002\102\105\061 $$
\label{eq:condition} $$ \031\060\027\006\003\125\004\012\023\020\107\154\157\142\141\154
\123\151\147\156\040\156\166\055\163\141\061\020\060\016\006\003
\125\004\013\023\007\122\157\157\164\040\103\101\061\033\060\031
\006\003\125\004\003\023\022\107\154\157\142\141\154\123\151\147
\156\040\122\157\157\164\040\103\101
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\013\004\000\000\000\000\001\025\113\132\303\224
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "Verisign Class 1 Public Primary Certification Authority - G3"
# Issuer: CN=VeriSign Class 1 Public Primary Certification Authority - G3,OU="(c) 1999 VeriSign, Inc. - For
authorized use only", OU=VeriSign Trust Network, O="VeriSign, Inc.", C=US
# Serial Number:00:8b:5b:75:56:84:54:85:0b:00:cf:af:38:48:ce:b1:a4
# Subject: CN=VeriSign Class 1 Public Primary Certification Authority - G3,OU="(c) 1999 VeriSign, Inc. - For
authorized use only", OU=VeriSign Trust Network, O="VeriSign, Inc.", C=US
# Not Valid Before: Fri Oct 01 00:00:00 1999
# Not Valid After: Wed Jul 16 23:59:59 2036
# Fingerprint (SHA-256):
CB:B5:AF:18:5E:94:2A:24:02:F9:EA:CB:C0:ED:5B:B8:76:EE:A3:C1:22:36:23:D0:04:47:E4:F3:BA:55:4B:65
# Fingerprint (SHA1): 20:42:85:DC:F7:EB:76:41:95:57:8E:13:6B:D4:B7:D1:E9:8E:46:A5
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Verisign Class 1 Public Primary Certification Authority - G3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
```

 $\label{eq:condition} $$ \060\201\312\061\013\060\011\006\003\125\004\012\023\016\126\145\162\151\123\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003\125\004\013\023\061\050\143\051\040\061\071\071\071\071\040\126\145\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157\156\154\171\061\105\060\103\106\003\125\004\003\023\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040\061\040\120\165\142\151\143\144\164\151\155\141\162\171\040\103\145\162\151\146\151\143\141\164\151\157\156\040\101\165\164\157\156\142\151\164\171\040\055\040\107\063$ 

**END** 

## CKA ID UTF8 "0"

## CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003\125\0004\012\023\016\126\145\162\151\123\151\147\156\054\040\111\156\143\155\147\156\040\124\162\155\142\153\151\147\156\040\124\162\145\162\151\123\151\147\156\143\1051\1040\1061\1071\1071\1071\1040\126\145\162\151\123\151\147\156\143\1056\1040\105\163\145\1040\105\151\123\151\147\156\105\163\145\1040\103\125\1040\103\125\1142\151\143\1040\103\155\141\1162\171\1040\103\145\162\151\1143\141\164\151\1157\156\040\101\105\163\142\151\143\141\164\151\1157\156\040\101\105\163\142\151\143\141\164\151\1157\156\040\101\105\163\142\151\143\141\164\151\1157\156\040\101\1157\156\040\101\1157\156\040\101\1157\156\040\101\1157\156\040\101\1157\156\040\101\1157\156\040\101\1157\156\040\101\1157\156\040\101\1157\156\040\101\105\163\142\151\146\151\143\141\164\151\1157\156\040\101\1157\156\040\101\1157\156\040\101\1157\156\040\101\105\162\151\1157\1156\142\151\1164\171\040\1055\040\107\063$ 

END

## CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\021\000\213\133\165\126\204\124\205\013\000\317\257\070\110 \316\261\244

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \end{align} $$ \end{align$ 

\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151 \146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151 \164\171\040\055\040\107\063\060\036\027\015\071\071\061\060\060 \061\060\060\060\060\060\060\132\027\015\063\066\060\067\061\066 \062\063\065\071\065\071\132\060\201\312\061\013\060\011\006\003 \125\004\006\023\002\125\123\061\027\060\025\006\003\125\004\012 \023\016\126\145\162\151\123\151\147\156\054\040\111\156\143\056 \061\037\060\035\006\003\125\004\013\023\026\126\145\162\151\123  $\label{eq:control_loss} $$ 151\147\156\040\124\162\165\163\164\040\116\145\164\167\157\162$ \153\061\072\060\070\006\003\125\004\013\023\061\050\143\051\040  $\label{eq:condition} $$ \061\071\071\040\126\145\162\151\123\151\147\156\054\040\111 $$$ \156\143\056\040\055\040\106\157\162\040\141\165\164\150\157\162 \151\172\145\144\040\165\163\145\040\157\156\154\171\061\105\060  $\label{eq:condition} $$ 103\006\003\125\004\003\023\074\126\145\162\151\123\151\147\156$  $\\ \\ 040\\ \\ 103\\ \\ 154\\ \\ 141\\ \\ 163\\ \\ 163\\ \\ 040\\ \\ 061\\ \\ 040\\ \\ 120\\ \\ 165\\ \\ 142\\ \\ 154\\ \\ 151\\ \\ 143\\ \\ 040$ \120\162\151\155\141\162\171\040\103\145\162\164\151\146\151\143  $\\ 141\\164\\151\\157\\156\\040\\101\\165\\164\\150\\157\\162\\151\\164\\171\\040$ \055\040\107\063\060\202\001\042\060\015\006\011\052\206\110\206 \367\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012  $\label{eq:condition} $$ \002\202\001\000\335\204\324\271\264\371\247\330\363\004\170 $$$ \234\336\075\334\154\023\026\331\172\335\044\121\146\300\307\046 \131\015\254\006\010\302\224\321\063\037\360\203\065\037\156\033 \310\336\252\156\025\116\124\047\357\304\155\032\354\013\343\016 \360\104\245\127\307\100\130\036\243\107\037\161\354\140\366\155 \224\310\030\071\355\376\102\030\126\337\344\114\111\020\170\116 \001\166\065\143\022\066\335\146\274\001\004\066\243\125\150\325 \242\066\011\254\253\041\046\124\006\255\077\312\024\340\254\312 \255\006\035\225\342\370\235\361\340\140\377\302\177\165\053\114 \314\332\376\207\231\041\352\272\376\076\124\327\322\131\170\333 \074\156\317\240\023\000\032\270\047\241\344\276\147\226\312\240 \305\263\234\335\311\165\236\353\060\232\137\243\315\331\256\170 \031\077\043\351\134\333\051\275\255\125\310\033\124\214\143\366 \350\246\352\307\067\022\134\243\051\036\002\331\333\037\073\264 \327\017\126\107\201\025\004\112\257\203\047\321\305\130\210\301 \335\366\252\247\243\030\332\150\252\155\021\121\341\277\145\153 \237\226\166\321\075\002\003\001\000\001\060\015\006\011\052\206 \110\206\367\015\001\001\005\005\000\003\202\001\001\000\253\146 \215\327\263\272\307\232\266\346\125\320\005\361\237\061\215\132  $\label{eq:condition} $$ \252\331\252\106\046\017\161\355\245\255\123\126\142\001\107\052$$ \104\351\376\077\164\013\023\233\271\364\115\033\262\321\137\262 \266\322\210\134\263\237\315\313\324\247\331\140\225\204\072\370 \301\067\035\141\312\347\260\305\345\221\332\124\246\254\061\201 \256\227\336\315\010\254\270\300\227\200\177\156\162\244\347\151 \023\225\145\037\304\223\074\375\171\217\004\324\076\117\352\367 \236\316\315\147\174\117\145\002\377\221\205\124\163\307\377\066 \367\206\055\354\320\136\117\377\021\237\162\006\326\270\032\361 \114\015\046\145\342\104\200\036\307\237\343\335\350\012\332\354 \245\040\200\151\150\241\117\176\341\153\317\007\101\372\203\216  $\label{eq:control} $$ \274\070\335\260\056\021\261\153\262\102\314\232\274\371\110\042 \171\112\031\017\262\034\076\040\164\331\152\303\276\362\050\170 \023\126\171\117\155\120\352\033\266\265\127\261\067\146\130\043 \363\334\017\337\012\207\304\357\206\005\325\070\024\140\231\243 \113\336\006\226\161\054\362\333\266\037\244\357\077\356 \END$ 

CKA NSS MOZILLA CA POLICY CK BBOOL CK TRUE

CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# For Email Distrust After: Wed Aug 31 00:00:00 2022

 ${\tt CKA\_NSS\_EMAIL\_DISTRUST\_AFTER\ MULTILINE\_OCTAL}$ 

 $\label{eq:condition} $$ \062\060\070\063\061\060\060\060\060\060\060\132$$ 

**END** 

- # Trust for "Verisign Class 1 Public Primary Certification Authority G3"
- # Issuer: CN=VeriSign Class 1 Public Primary Certification Authority G3,OU="(c) 1999 VeriSign, Inc. For authorized use only",OU=VeriSign Trust Network,O="VeriSign, Inc.",C=US
- # Serial Number:00:8b:5b:75:56:84:54:85:0b:00:cf:af:38:48:ce:b1:a4
- # Subject: CN=VeriSign Class 1 Public Primary Certification Authority G3,OU="(c) 1999 VeriSign, Inc. For authorized use only",OU=VeriSign Trust Network,O="VeriSign, Inc.",C=US
- # Not Valid Before: Fri Oct 01 00:00:00 1999
- # Not Valid After: Wed Jul 16 23:59:59 2036
- # Fingerprint (SHA-256):
- CB:B5:AF:18:5E:94:2A:24:02:F9:EA:CB:C0:ED:5B:B8:76:EE:A3:C1:22:36:23:D0:04:47:E4:F3:BA:55:4B:65
- # Fingerprint (SHA1): 20:42:85:DC:F7:EB:76:41:95:57:8E:13:6B:D4:B7:D1:E9:8E:46:A5
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST
- CKA TOKEN CK BBOOL CK TRUE
- CKA PRIVATE CK BBOOL CK FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA LABEL UTF8 "Verisign Class 1 Public Primary Certification Authority G3"
- CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\040\102\205\334\367\353\166\101\225\127\216\023\153\324\267\321 \351\216\106\245

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \261\107\274\030\127\321\030\240\170\055\354\161\350\052\225\163$$ 

END

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\201\312\006\003\125\0004\003\125\0004\006\023\002\125\123\006\0025\006\003\125\0004\012\023\016\126\145\162\151\123\151\147\156\004\0124\162\155\123\151\147\156\004\124\162\165\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003\125\0004\013\023\061\050\143\051\040\061\071\071\071\040\126\145\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106\145\162\151\123\151\147\156\153\162\151\172\145\144\040\165\163\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023\074\126\145\162\151\123\151\147\156\0040\103\154\141\163\163\040\061\040\120\165\142\151\143\040\120\162\151\155\141\162\171$ 

```
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\063
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\label{eq:condition} $$ \002\021\000\213\133\165\126\204\124\205\013\000\317\257\070\110 $$
\316\261\244
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Verisign Class 2 Public Primary Certification Authority - G3"
# Issuer: CN=VeriSign Class 2 Public Primary Certification Authority - G3,OU="(c) 1999 VeriSign, Inc. - For
authorized use only", OU=VeriSign Trust Network, O="VeriSign, Inc.", C=US
# Serial Number:61:70:cb:49:8c:5f:98:45:29:e7:b0:a6:d9:50:5b:7a
# Subject: CN=VeriSign Class 2 Public Primary Certification Authority - G3,OU="(c) 1999 VeriSign, Inc. - For
authorized use only", OU=VeriSign Trust Network, O="VeriSign, Inc.", C=US
# Not Valid Before: Fri Oct 01 00:00:00 1999
# Not Valid After: Wed Jul 16 23:59:59 2036
# Fingerprint (SHA-256):
92:A9:D9:83:3F:E1:94:4D:B3:66:E8:BF:AE:7A:95:B6:48:0C:2D:6C:6C:2A:1B:E6:5D:42:36:B6:08:FC:A1:BB
# Fingerprint (SHA1): 61:EF:43:D7:7F:CA:D4:61:51:BC:98:E0:C3:59:12:AF:9F:EB:63:11
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "Verisign Class 2 Public Primary Certification Authority - G3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\label{eq:condition} $$ \frac{151}147\\156\\054\\040\\111\\1156\\143\\056\\061\\037\\060\\035\\006\\003\\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\061\071\071\071\040\126\145
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\062\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\063
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
```

 $\label{eq:condition} $$ \060\201\312\061\013\060\011\006\003\125\004\012\023\016\126\145\162\151\123\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003\125\004\013\023\061\050\143\051\040\061\071\071\071\071\040\126\145\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106\165\163\145\040\157\156\154\171\061\105\060\103\106\003\125\004\003\023\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040\062\040\120\165\142\151\143\143\141\164\151\155\141\162\171\040\103\145\162\151\157\156\040\101\1165\164\157\156\040\101\106\040\101\106\040\101\106\040\101\1165\164\157\162\151\164\171\040\055\040\107\063$ 

**END** 

## CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\141\160\313\111\214\137\230\105\051\347\260\246\331\120 \133\172

**END** 

#### CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \060\202\004\031\060\202\003\001\002\020\141\160\313\111\214\137 $$$ \230\105\051\347\260\246\331\120\133\172\060\015\006\011\052\206 \110\206\367\015\001\001\005\005\000\060\201\312\061\013\060\011  $\label{eq:condition} $$ \006\003\125\004\006\023\002\125\123\061\027\060\025\006\003\125$ \004\012\023\016\126\145\162\151\123\151\147\156\054\040\111\156 \143\056\061\037\060\035\006\003\125\004\013\023\026\126\145\162 \151\123\151\147\156\040\124\162\165\163\164\040\116\145\164\167 \157\162\153\061\072\060\070\006\003\125\004\013\023\061\050\143  $\label{eq:condition} $$ \051\040\061\071\071\071\040\126\145\162\151\123\151\147\156\054$$$ \040\111\156\143\056\040\055\040\106\157\162\040\141\165\164\150 \157\162\151\172\145\144\040\165\163\145\040\157\156\154\171\061  $\label{eq:condition} $$ 105\060\103\006\003\125\004\003\023\074\126\145\162\151\123\151 $$$ \147\156\040\103\154\141\163\163\040\062\040\120\165\142\154\151 \143\040\120\162\151\155\141\162\171\040\103\145\162\164\151\146 \151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164 \171\040\055\040\107\063\060\036\027\015\071\071\061\060\060\061 \060\060\060\060\060\060\060\132\027\015\063\066\060\067\061\066\062 \063\065\071\065\071\132\060\201\312\061\013\060\011\006\003\125  $\label{eq:condition} $$ \004\006\023\002\125\123\061\027\060\025\006\003\125\004\012\023$  $\label{eq:condition} $$ \016\126\145\162\151\123\151\147\156\054\040\111\156\143\056\061 $$$  $\label{eq:condition} $$ \037\060\035\006\003\125\004\013\023\026\126\145\162\151\123\151 $$$ \147\156\040\124\162\165\163\164\040\116\145\164\167\157\162\153 \061\072\060\070\006\003\125\004\013\023\061\050\143\051\040\061 \071\071\071\040\126\145\162\151\123\151\147\156\054\040\111\156 \143\056\040\055\040\106\157\162\040\141\165\164\150\157\162\151 \172\145\144\040\165\163\145\040\157\156\154\171\061\105\060\103 \006\003\125\004\003\023\074\126\145\162\151\123\151\147\156\040 \103\154\141\163\163\040\062\040\120\165\142\154\151\143\040\120 \162\151\155\141\162\171\040\103\145\162\164\151\146\151\143\141

\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040\055 \040\107\063\060\202\001\042\060\015\006\011\052\206\110\206\367 \015\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002 \202\001\001\000\257\012\015\302\325\054\333\147\271\055\345\224 \047\335\245\276\340\260\115\217\263\141\126\074\326\174\303\364 \315\076\206\313\242\210\342\341\330\244\151\305\265\342\277\301 \246\107\120\136\106\071\213\325\226\272\265\157\024\277\020\316  $\\ \langle 047 \rangle 223 \langle 236 \rangle 005 \rangle 107 \langle 233 \rangle 061 \rangle 172 \langle 023 \rangle 330 \rangle 037 \rangle 331 \rangle 323 \rangle 002 \rangle 067 \rangle 2132 \rangle 002 \rangle$ \255\054\107\360\216\201\006\247\015\060\014\353\367\074\017\040 \035\334\162\106\356\245\002\310\133\303\311\126\151\114\305\030  $\label{eq:condition} $$ 301\221\173\013\325\023\000\233\274\357\303\110\076\106\140\040 $$$ \205\052\325\220\266\315\213\240\314\062\335\267\375\100\125\262 \120\034\126\256\314\215\167\115\307\040\115\247\061\166\357\150 \222\212\220\036\010\201\126\262\255\151\243\122\320\313\034\304  $\label{eq:condition} $$ \037\231\376\114\350\026\143\216\306\010\216\366\061\366$ \322\372\345\166\335\265\034\222\243\111\315\315\001\315\150\315 \251\151\272\243\353\035\015\234\244\040\246\301\240\305\321\106 \114\027\155\322\254\146\077\226\214\340\204\324\066\377\042\131 \305\371\021\140\250\137\004\175\362\032\366\045\102\141\017\304 \112\270\076\211\002\003\001\000\001\060\015\006\011\052\206\110 \206\367\015\001\001\005\005\000\003\202\001\001\000\064\046\025 \074\300\215\115\103\111\035\275\351\041\222\327\146\234\267\336  $\label{eq:condition} $$ 305 \ 270 \ 320 \ 344 \ 135 \ 137 \ 166 \ 042 \ 300 \ 046 \ 371 \ 204 \ 072 \ 072 \ 371 \ 214$ \265\373\354\140\361\350\316\004\260\310\335\247\003\217\060\363 \230\337\244\346\244\061\337\323\034\013\106\334\162\040\077\256 \356\005\074\244\063\077\013\071\254\160\170\163\113\231\053\337 \060\302\124\260\250\073\125\241\376\026\050\315\102\275\164\156  $\label{eq:condition} $$ \200\333\047\104\247\316\104\135\324\033\220\230\015\036\102\224 $$$ \261\000\054\004\320\164\243\002\005\042\143\143\315\203\265\373 \301\155\142\153\151\165\375\135\160\101\271\365\277\174\337\276  $\label{eq:condition} $$ 301 \062 \163 \042 \041 \213 \130 \201 \173 \025 \221 \172 \272 \343 \144 \110$ \260\177\373\066\045\332\225\320\361\044\024\027\335\030\200\153 \106\043\071\124\365\216\142\011\004\035\224\220\246\233\346\045 \342\102\105\252\270\220\255\276\010\217\251\013\102\030\224\317 \162\071\341\261\103\340\050\317\267\347\132\154\023\153\111\263 \377\343\030\174\211\213\063\135\254\063\327\247\371\332\072\125  $\label{eq:condition} $$ \frac{311}{130}020\frac{371}{252}\frac{357}{132}\frac{266}{317}\frac{113}{113}\frac{337}{052} $$$ 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
# For Email Distrust After: Wed Aug 31 00:00:00 2022
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER MULTILINE\_OCTAL
\062\062\060\070\063\061\060\060\060\060\060\060\060\132
END

# Trust for "Verisign Class 2 Public Primary Certification Authority - G3"
# Issuer: CN=VeriSign Class 2 Public Primary Certification Authority - G3,OU="(c) 1999 VeriSign, Inc. - For authorized use only",OU=VeriSign Trust Network,O="VeriSign, Inc.",C=US

**END** 

```
# Serial Number:61:70:cb:49:8c:5f:98:45:29:e7:b0:a6:d9:50:5b:7a
# Subject: CN=VeriSign Class 2 Public Primary Certification Authority - G3,OU="(c) 1999 VeriSign, Inc. - For
authorized use only", OU=VeriSign Trust Network, O="VeriSign, Inc.", C=US
# Not Valid Before: Fri Oct 01 00:00:00 1999
# Not Valid After: Wed Jul 16 23:59:59 2036
# Fingerprint (SHA-256):
92:A9:D9:83:3F:E1:94:4D:B3:66:E8:BF:AE:7A:95:B6:48:0C:2D:6C:6C:2A:1B:E6:5D:42:36:B6:08:FC:A1:BB
# Fingerprint (SHA1): 61:EF:43:D7:7F:CA:D4:61:51:BC:98:E0:C3:59:12:AF:9F:EB:63:11
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "Verisign Class 2 Public Primary Certification Authority - G3"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\label{eq:condition} $$ 141\357\103\327\177\312\324\141\121\274\230\340\303\131\022\257
\237\353\143\021
END
CKA CERT MD5 HASH MULTILINE OCTAL
\370\276\304\143\042\311\250\106\164\213\270\035\036\112\053\366
END
CKA ISSUER MULTILINE OCTAL
\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\label{eq:condition} $$ \0061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\061\071\071\071\040\126\145
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\062\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\063
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\020\141\160\313\111\214\137\230\105\051\347\260\246\331\120
\133\172
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Entrust.net Premium 2048 Secure Server CA"
```

# Issuer: CN=Entrust.net Certification Authority (2048), OU=(c) 1999 Entrust.net

Limited,OU=www.entrust.net/CPS\_2048 incorp. by ref. (limits liab.),O=Entrust.net

# Serial Number: 946069240 (0x3863def8)

# Subject: CN=Entrust.net Certification Authority (2048),OU=(c) 1999 Entrust.net

Limited,OU=www.entrust.net/CPS\_2048 incorp. by ref. (limits liab.),O=Entrust.net

# Not Valid Before: Fri Dec 24 17:50:51 1999

# Not Valid After: Tue Jul 24 14:15:12 2029

# Fingerprint (SHA-256):

6D:C4:71:72:E0:1C:BC:B0:BF:62:58:0D:89:5F:E2:B8:AC:9A:D4:F8:73:80:1E:0C:10:B9:C8:37:D2:1E:B1:77

# Fingerprint (SHA1): 50:30:06:09:1D:97:D4:F5:AE:39:F7:CB:E7:92:7D:7D:65:2D:34:31

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "Entrust.net Premium 2048 Secure Server CA"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\201\264\061\024\060\022\006\003\125\004\012\023\013\105\156$$ 

\164\162\165\163\164\056\156\145\164\061\100\060\076\006\003\125

\004\013\024\067\167\167\167\056\145\156\164\162\165\163\164\056

 $\label{eq:condition} $$ \frac{156}145\\164\\057\\103\\120\\123\\137\\062\\060\\064\\070\\040\\151\\156\\143$ 

\157\162\160\056\040\142\171\040\162\145\146\056\040\050\154\151

\155\151\164\163\040\154\151\141\142\056\051\061\045\060\043\006

 $\label{eq:condition} $$ \003\125\004\013\023\034\050\143\051\040\061\071\071\071\040\105$ 

\156\164\162\165\163\164\056\156\145\164\040\114\151\155\151\164

\145\144\061\063\060\061\006\003\125\004\003\023\052\105\156\164

\162\165\163\164\056\156\145\164\040\103\145\162\164\151\146\151

\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171

\040\050\062\060\064\070\051

**END** 

CKA\_ID UTF8 "0"

## CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\201\264\061\024\060\022\006\003\125\004\012\023\013\105\156\164\162\165\163\164\056\156\145\164\061\100\060\0076\006\003\125\004\013\024\067\167\167\167\167\056\145\156\164\162\165\163\164\056\145\156\164\162\165\163\164\056\145\145\146\056\040\050\154\151\155\151\164\163\040\154\151\141\142\056\051\061\045\060\043\006\003\125\004\013\023\034\050\143\051\040\061\071\071\071\071\040\105\156\164\162\165\163\164\056\156\145\164\040\114\151\155\151\164\162\165\163\164\056\156\145\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040\050\062\060\064\070\051$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $002\004\070\143\336\370$ 

**END** 

CKA\_VALUE MULTILINE\_OCTAL

\060\202\004\052\060\202\003\022\240\003\002\001\002\002\004\070 \143\336\370\060\015\006\011\052\206\110\206\367\015\001\001\005 \005\000\060\201\264\061\024\060\022\006\003\125\004\012\023\013 \105\156\164\162\165\163\164\056\156\145\164\061\100\060\076\006 \003\125\004\013\024\067\167\167\167\056\145\156\164\162\165\163 \164\056\156\145\164\057\103\120\123\137\062\060\064\070\040\151 \156\143\157\162\160\056\040\142\171\040\162\145\146\056\040\050 \154\151\155\151\164\163\040\154\151\141\142\056\051\061\045\060  $\\ \\043\\ \\006\\ \\003\\ \\125\\ \\004\\ \\013\\ \\023\\ \\034\\ \\050\\ \\143\\ \\051\\ \\040\\ \\061\\ \\071\\ \\071\\ \\071\\ \\071$ \040\105\156\164\162\165\163\164\056\156\145\164\040\114\151\155 \151\164\145\144\061\063\060\061\006\003\125\004\003\023\052\105  $\label{eq:condition} $$ \frac{156\\164\\162\\165\\163\\164\\056\\156\\145\\164\\040\\103\\145\\162\\164\\151$ \146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151  $\label{eq:condition} $$ 164\171\040\050\062\060\064\070\051\060\036\027\015\071\061\$ \062\062\064\061\067\065\060\065\061\132\027\015\062\071\060\067 \062\064\061\064\061\065\061\062\132\060\201\264\061\024\060\022 \145\164\061\100\060\076\006\003\125\004\013\024\067\167\167\167 \056\145\156\164\162\165\163\164\056\156\145\164\057\103\120\123  $\label{eq:condition} $$ 137\062\060\064\070\040\151\156\143\157\162\160\056\040\142\171$ \040\162\145\146\056\040\050\154\151\155\151\164\163\040\154\151 \141\142\056\051\061\045\060\043\006\003\125\004\013\023\034\050  $\\ 143 \\ 051 \\ 040 \\ 061 \\ 071 \\ 071 \\ 071 \\ 040 \\ 105 \\ 156 \\ 164 \\ 162 \\ 165 \\ 163 \\ 164 \\ 056 \\$ \156\145\164\040\114\151\155\151\164\145\144\061\063\060\061\006 \003\125\004\003\023\052\105\156\164\162\165\163\164\056\156\145 \164\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040 \101\165\164\150\157\162\151\164\171\040\050\062\060\064\070\051  $\label{eq:condition} $$ \000\202\001\042\060\015\006\011\052\206\110\206\367\015\001\001$ \001\005\000\003\202\001\017\000\060\202\001\012\002\202\001\001 \000\255\115\113\251\022\206\262\352\243\040\007\025\026\144\052  $\label{eq:condition} $$ \053\113\321\277\013\112\115\216\355\200\166\245\147\267\170\100 $$$ \300\163\102\310\150\300\333\123\053\335\136\270\166\230\065\223 \213\032\235\174\023\072\016\037\133\267\036\317\345\044\024\036 \261\201\251\215\175\270\314\153\113\003\361\002\014\334\253\245 \100\044\000\177\164\224\241\235\010\051\263\210\013\365\207\167 \235\125\315\344\303\176\327\152\144\253\205\024\206\225\133\227 \062\120\157\075\310\272\146\014\343\374\275\270\111\301\166\211  $\label{eq:condition} $$ \frac{375}{300}250\\275\\211\\243\\147\\057\\306\\237\\274\\161\\031\\140$ \270\055\351\054\311\220\166\146\173\224\342\257\170\326\145\123 \135\074\326\234\262\317\051\003\371\057\244\120\262\324\110\316 \005\062\125\212\375\262\144\114\016\344\230\007\165\333\177\337 \271\010\125\140\205\060\051\371\173\110\244\151\206\343\065\077  $\label{eq:condition} $$ \036\206\135\172\172\025\275\357\000\216\025\042\124\027\000\220$ \046\223\274\016\111\150\221\277\370\107\323\235\225\102\301\016 \115\337\157\046\317\303\030\041\142\146\103\160\326\325\300\007 \341\002\003\001\000\001\243\102\060\100\060\016\006\003\125\035  $\label{eq:condition} $$ \017\001\001\377\004\004\003\002\001\006\060\017\006\003\125\035 $$$ \023\001\001\377\004\005\060\003\001\001\377\060\035\006\003\125

\035\016\004\026\004\024\125\344\201\321\021\200\276\330\211\271 \010\243\061\371\241\044\011\026\271\160\060\015\006\011\052\206 \110\206\367\015\001\001\005\005\000\003\202\001\001\000\073\233  $\label{eq:continuous} $$ \frac{217}126\\233\\060\\347\\123\\231\\174\\172\\171\\247\\115\\227\\327\\031\\225$  $\label{eq:condition} $$ \220\373\006\037\312\063\174\106\143\217\226\146\044\372\100\033$ \041\047\312\346\162\163\362\117\376\061\231\375\310\014\114\150 \123\306\200\202\023\230\372\266\255\332\135\075\361\316\156\366  $\label{eq:condition} $$ \025\021\224\202\014\356\077\225\257\021\253\017\327\057\336\037$ \003\217\127\054\036\311\273\232\032\104\225\353\030\117\246\037 \315\175\127\020\057\233\004\011\132\204\265\156\330\035\072\341 \326\236\321\154\171\136\171\034\024\305\343\320\114\223\073\145  $\label{eq:condition} $$ \074\355\337\075\276\246\345\225\032\303\265\031\303\275\136\133$ \273\377\043\357\150\031\313\022\223\047\134\003\055\157\060\320 \036\266\032\254\336\132\367\321\252\250\047\246\376\171\201\304 \171\231\063\127\272\022\260\251\340\102\154\223\312\126\336\376 \155\204\013\010\213\176\215\352\327\230\041\306\363\347\074\171 \057\136\234\321\114\025\215\341\354\042\067\314\232\103\013\227 \334\200\220\215\263\147\233\157\110\010\025\126\317\277\361\053 \174\136\232\166\351\131\220\305\174\203\065\021\145\121 **END** 

CKA NSS MOZILLA CA POLICY CK BBOOL CK TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "Entrust.net Premium 2048 Secure Server CA"

# Issuer: CN=Entrust.net Certification Authority (2048), OU=(c) 1999 Entrust.net Limited,OU=www.entrust.net/CPS\_2048 incorp. by ref. (limits liab.),O=Entrust.net

# Serial Number: 946069240 (0x3863def8)

# Subject: CN=Entrust.net Certification Authority (2048), OU=(c) 1999 Entrust.net Limited,OU=www.entrust.net/CPS\_2048 incorp. by ref. (limits liab.),O=Entrust.net

# Not Valid Before: Fri Dec 24 17:50:51 1999 # Not Valid After: Tue Jul 24 14:15:12 2029

# Fingerprint (SHA-256):

6D:C4:71:72:E0:1C:BC:B0:BF:62:58:0D:89:5F:E2:B8:AC:9A:D4:F8:73:80:1E:0C:10:B9:C8:37:D2:1E:B1:77

# Fingerprint (SHA1): 50:30:06:09:1D:97:D4:F5:AE:39:F7:CB:E7:92:7D:7D:65:2D:34:31

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Entrust.net Premium 2048 Secure Server CA"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ 120\060\006\011\035\227\324\365\256\071\367\313\347\222\175\175$ \145\055\064\061

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \356\051\061\274\062\176\232\346\350\265\367\121\264\064\161\220 $$$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

```
\060\201\264\061\024\060\022\006\003\125\004\012\023\013\105\156
\164\162\165\163\164\056\156\145\164\061\100\060\076\006\003\125
\004\013\024\067\167\167\167\056\145\156\164\162\165\163\164\056
\label{eq:condition} $$ \frac{156}145\\164\\057\\103\\120\\123\\137\\062\\060\\064\\070\\040\\151\\156\\143
\label{eq:condition} $$ \frac{157}{162}\frac{0.056}{0.40}\frac{142}{171}\frac{0.40}{162}\frac{145}{146}\frac{0.56}{0.40}\frac{0.50}{154}\frac{151}{151} $$
\155\151\164\163\040\154\151\141\142\056\051\061\045\060\043\006
\003\125\004\013\023\034\050\143\051\040\061\071\071\071\0701\040\105
\145\144\061\063\060\061\006\003\125\004\003\023\052\105\156\164
\162\165\163\164\056\156\145\164\040\103\145\162\164\151\146\151
 \\ 143 \\ 141 \\ 164 \\ 151 \\ 157 \\ 156 \\ 040 \\ 101 \\ 165 \\ 164 \\ 150 \\ 157 \\ 162 \\ 151 \\ 164 \\ 171 \\
\040\050\062\060\064\070\051
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\070\143\336\370
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Baltimore CyberTrust Root"
# Issuer: CN=Baltimore CyberTrust Root,OU=CyberTrust,O=Baltimore,C=IE
# Serial Number: 33554617 (0x20000b9)
# Subject: CN=Baltimore CyberTrust Root,OU=CyberTrust,O=Baltimore,C=IE
# Not Valid Before: Fri May 12 18:46:00 2000
# Not Valid After: Mon May 12 23:59:00 2025
# Fingerprint (SHA-256):
16:AF:57:A9:F6:76:B0:AB:12:60:95:AA:5E:BA:DE:F2:2A:B3:11:19:D6:44:AC:95:CD:4B:93:DB:F3:F2:6A:EB
# Fingerprint (SHA1): D4:DE:20:D0:5E:66:FC:53:FE:1A:50:88:2C:78:DB:28:52:CA:E4:74
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Baltimore CyberTrust Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\label{eq:condition} $$ \060\132\061\013\060\011\006\003\125\004\006\023\002\111\105\061 $$
\022\060\020\006\003\125\004\012\023\011\102\141\154\164\151\155
\157\162\145\061\023\060\021\006\003\125\004\013\023\012\103\171
\142\145\162\124\162\165\163\164\061\042\060\040\006\003\125\004
\003\023\031\102\141\154\164\151\155\157\162\145\040\103\171\142
\145\162\124\162\165\163\164\040\122\157\157\164
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
```

 $\label{eq:condition} $$ \000132\001\006\003\125\004\0006\023\002\111\105\061\022\060\020\006\003\125\004\012\023\011\102\141\154\164\151\155\157\162\145\061\023\060\021\006\003\125\0004\013\023\012\103\171\142\145\162\124\162\165\163\164\040\1022\157\162\145\040\103\171\142\145\162\124\162\165\163\164\040\122\157\157\164$ 

**END** 

 ${\tt CKA\_SERIAL\_NUMBER\ MULTILINE\_OCTAL}$ 

\002\004\002\000\000\271

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\202\003\167\060\202\002\137\240\003\002\001\002\002\004\002$ \000\000\271\060\015\006\011\052\206\110\206\367\015\001\001\005  $\label{eq:condition} $$ \005\000\060\132\061\013\060\011\006\003\125\004\006\023\002\111 $$$ \151\155\157\162\145\061\023\060\021\006\003\125\004\013\023\012 \103\171\142\145\162\124\162\165\163\164\061\042\060\040\006\003 \125\004\003\023\031\102\141\154\164\151\155\157\162\145\040\103 \171\142\145\162\124\162\165\163\164\040\122\157\157\164\060\036  $\label{eq:condition} $$ \027\015\060\060\060\065\061\062\061\070\064\066\060\060\132\027 $$$ \015\062\065\060\065\061\062\062\063\065\071\060\060\132\060\132 \061\013\060\011\006\003\125\004\006\023\002\111\105\061\022\060  $\label{eq:condition} $$ \020\006\003\125\004\012\023\011\102\141\154\164\151\155\157\162$ \145\061\023\060\021\006\003\125\004\013\023\012\103\171\142\145 \162\124\162\165\163\164\061\042\060\040\006\003\125\004\003\023 \031\102\141\154\164\151\155\157\162\145\040\103\171\142\145\162 \124\162\165\163\164\040\122\157\157\164\060\202\001\042\060\015  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001 $$$ \017\000\060\202\001\012\002\202\001\001\000\243\004\273\042\253 \230\075\127\350\046\162\232\265\171\324\051\342\341\350\225\200 \261\260\343\133\216\053\051\232\144\337\241\135\355\260\011\005 \155\333\050\056\316\142\242\142\376\264\210\332\022\353\070\353 \041\235\300\101\053\001\122\173\210\167\323\034\217\307\272\271 \210\265\152\011\347\163\350\021\100\247\321\314\312\142\215\055 \345\217\013\246\120\322\250\120\303\050\352\365\253\045\207\212 \232\226\034\251\147\270\077\014\325\367\371\122\023\057\302\033 \325\160\160\360\217\300\022\312\006\313\232\341\331\312\063\172 \167\326\370\354\271\361\150\104\102\110\023\322\300\302\244\256 \136\140\376\266\246\005\374\264\335\007\131\002\324\131\030\230 \143\365\245\143\340\220\014\175\135\262\006\172\363\205\352\353 \324\003\256\136\204\076\137\377\025\355\151\274\371\071\066\162 \165\317\167\122\115\363\311\220\054\271\075\345\311\043\123\077 \037\044\230\041\134\007\231\051\275\306\072\354\347\156\206\072 \153\227\164\143\063\275\150\030\061\360\170\215\166\277\374\236 \216\135\052\206\247\115\220\334\047\032\071\002\003\001\000\001 \243\105\060\103\060\035\006\003\125\035\016\004\026\004\024\345 \235\131\060\202\107\130\314\254\372\010\124\066\206\173\072\265 \004\115\360\060\022\006\003\125\035\023\001\001\377\004\010\060

\006\001\001\377\002\001\003\060\016\006\003\125\035\017\001\001 \377\004\004\003\002\001\006\060\015\006\011\052\206\110\206\367 \157\121\150\102\005\240\335\273\117\047\045\204\003\275\367\144 \375\055\327\060\343\244\020\027\353\332\051\051\266\171\077\166 \366\031\023\043\270\020\012\371\130\244\324\141\160\275\004\141 \152\022\212\027\325\012\275\305\274\060\174\326\351\014\045\215 \206\100\117\354\314\243\176\070\306\067\021\117\355\335\150\061 \216\114\322\263\001\164\356\276\165\136\007\110\032\177\160\377 \026\134\204\300\171\205\270\005\375\177\276\145\021\243\017\300 \002\264\370\122\067\071\004\325\251\061\172\030\277\240\052\364 \022\231\367\243\105\202\343\074\136\365\235\236\265\310\236\174 \056\310\244\236\116\010\024\113\155\375\160\155\153\032\143\275 \144\346\037\267\316\360\362\237\056\273\033\267\362\120\210\163 \222\302\342\343\026\215\232\062\002\253\216\030\335\351\020\021 \356\176\065\253\220\257\076\060\224\172\320\063\075\247\145\017 \365\374\216\236\142\317\107\104\054\001\135\273\035\265\062\322 \107\322\070\056\320\376\201\334\062\152\036\265\356\074\325\374 \347\201\035\031\303\044\102\352\143\071\251

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "Baltimore CyberTrust Root"

# Issuer: CN=Baltimore CyberTrust Root,OU=CyberTrust,O=Baltimore,C=IE

# Serial Number: 33554617 (0x20000b9)

# Subject: CN=Baltimore CyberTrust Root,OU=CyberTrust,O=Baltimore,C=IE

# Not Valid Before: Fri May 12 18:46:00 2000 # Not Valid After : Mon May 12 23:59:00 2025

# Fingerprint (SHA-256):

16:AF:57:A9:F6:76:B0:AB:12:60:95:AA:5E:BA:DE:F2:2A:B3:11:19:D6:44:AC:95:CD:4B:93:DB:F3:F2:6A:EB

# Fingerprint (SHA1): D4:DE:20:D0:5E:66:FC:53:FE:1A:50:88:2C:78:DB:28:52:CA:E4:74

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Baltimore CyberTrust Root"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ 324\336\040\320\136\146\374\123\376\032\120\210\054\170\333\050$$ 

\122\312\344\164

**END** 

 ${\sf CKA\_CERT\_MD5\_HASH\ MULTILINE\_OCTAL}$ 

 $\label{eq:condition} $$ \254\266\224\245\234\027\340\327\221\122\233\261\227\006\246\344$$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\132\061\013\060\011\006\003\125\004\006\023\002\111\105\061 \022\060\020\006\003\125\004\012\023\011\102\141\154\164\151\155

```
\157\162\145\061\023\060\021\006\003\125\004\013\023\012\103\171
\142\145\162\124\162\165\163\164\061\042\060\040\006\003\125\004
\003\023\031\102\141\154\164\151\155\157\162\145\040\103\171\142
\145\162\124\162\165\163\164\040\122\157\157\164
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\002\000\000\271
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Entrust Root Certification Authority"
# Issuer: CN=Entrust Root Certification Authority, OU="(c) 2006 Entrust, Inc.", OU=www.entrust.net/CPS is
incorporated by reference,O="Entrust, Inc.",C=US
# Serial Number: 1164660820 (0x456b5054)
# Subject: CN=Entrust Root Certification Authority, OU="(c) 2006 Entrust, Inc.", OU=www.entrust.net/CPS is
incorporated by reference,O="Entrust, Inc.",C=US
# Not Valid Before: Mon Nov 27 20:23:42 2006
# Not Valid After: Fri Nov 27 20:53:42 2026
# Fingerprint (SHA-256):
73:C1:76:43:4F:1B:C6:D5:AD:F4:5B:0E:76:E7:27:28:7C:8D:E5:76:16:C1:E6:E6:14:1A:2B:2C:BC:7D:8E:4C
# Fingerprint (SHA1): B3:1E:B1:B7:40:E3:6C:84:02:DA:DC:37:D4:4D:F5:D4:67:49:52:F9
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "Entrust Root Certification Authority"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA SUBJECT MULTILINE OCTAL
\060\201\260\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\026\060\024\006\003\125\004\012\023\015\105\156\164\162\165
\163\164\054\040\111\156\143\056\061\071\060\067\006\003\125\004
\013\023\060\167\167\167\056\145\156\164\162\165\163\164\056\156
\145\164\057\103\120\123\040\151\163\040\151\156\143\157\162\160
\label{eq:condition} $$ \frac{157}{162}\frac{141}{164}\frac{145}{144}\frac{040}{142}\frac{171}{040}\frac{162}{145}\frac{146}{145}\frac{162}{145}$
\156\143\145\061\037\060\035\006\003\125\004\013\023\026\050\143
\051\040\062\060\060\066\040\105\156\164\162\165\163\164\054\040
\111\156\143\056\061\055\060\053\006\003\125\004\003\023\044\105
\156\164\162\165\163\164\040\122\157\157\164\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
```

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\004\105\153\120\124

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

\060\202\004\221\060\202\003\171\240\003\002\001\002\002\004\105 \153\120\124\060\015\006\011\052\206\110\206\367\015\001\001\005  $\label{eq:condition} $$ \005\000\060\201\260\061\013\060\011\006\003\125\004\006\023\002$ \125\123\061\026\060\024\006\003\125\004\012\023\015\105\156\164 \162\165\163\164\054\040\111\156\143\056\061\071\060\067\006\003 \125\004\013\023\060\167\167\167\056\145\156\164\162\165\163\164 \056\156\145\164\057\103\120\123\040\151\163\040\151\156\143\157 \162\160\157\162\141\164\145\144\040\142\171\040\162\145\146\145 \162\145\156\143\145\061\037\060\035\006\003\125\004\013\023\026 \050\143\051\040\062\060\060\066\040\105\156\164\162\165\163\164  $\label{eq:condition} $$ \054\040\111\156\143\056\061\055\060\053\006\003\125\004\003\023 $$$ \044\105\156\164\162\165\163\164\040\122\157\157\164\040\103\145 \162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150 \157\162\151\164\171\060\036\027\015\060\066\061\061\062\067\062 \060\062\063\064\062\132\027\015\062\066\061\061\062\067\062\060 \065\063\064\062\132\060\201\260\061\013\060\011\006\003\125\004 \006\023\002\125\123\061\026\060\024\006\003\125\004\012\023\015 \105\156\164\162\165\163\164\054\040\111\156\143\056\061\071\060 \067\006\003\125\004\013\023\060\167\167\167\056\145\156\164\162 \165\163\164\056\156\145\164\057\103\120\123\040\151\163\040\151  $\label{eq:local_$ \145\146\145\162\145\156\143\145\061\037\060\035\006\003\125\004  $\label{eq:condition} $$ \0.013\0.023\0.026\0.050\1.43\0.051\0.062\0.060\0.066\0.066\0.060\0.066\0.06$ \165\163\164\054\040\111\156\143\056\061\055\060\053\006\003\125 \004\003\023\044\105\156\164\162\165\163\164\040\122\157\157\164 \040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101 \165\164\150\157\162\151\164\171\060\202\001\042\060\015\006\011  $\label{eq:condition} $$ \052\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000 $$$ \060\202\001\012\002\202\001\001\000\266\225\266\103\102\372\306 \155\052\157\110\337\224\114\071\127\005\356\303\171\021\101\150 \066\355\354\376\232\001\217\241\070\050\374\367\020\106\146\056

\115\036\032\261\032\116\306\321\300\225\210\260\311\377\061\213 \063\003\333\267\203\173\076\040\204\136\355\262\126\050\247\370 \340\271\100\161\067\305\313\107\016\227\052\150\300\042\225\142 \025\333\107\331\365\320\053\377\202\113\311\255\076\336\114\333 \220\200\120\077\011\212\204\000\354\060\012\075\030\315\373\375  $\label{eq:condition} $$ \052\131\232\043\225\027\054\105\236\037\156\103\171\155\014\134$ \230\376\110\247\305\043\107\134\136\375\156\347\036\264\366\150 \105\321\206\203\133\242\212\215\261\343\051\200\376\045\161\210  $\verb|255|276|274|217|254|122|226|113|252|121|215|344|023|061|031|350|$ \116\115\237\333\254\263\152\325\274\071\124\161\312\172\177 \220\335\175\035\200\331\201\273\131\046\302\021\376\346\223\342  $\label{eq:condition} $$ \367\200\344\145\373\064\067\016\051\200\160\115\257\070\206\056$$ \236\177\127\257\236\027\256\353\034\313\050\041\137\266\034\330 \347\242\004\042\371\323\332\330\313\002\003\001\000\001\243\201 \260\060\201\255\060\016\006\003\125\035\017\001\001\377\004\004 \003\002\001\006\060\017\006\003\125\035\023\001\001\377\004\005  $\label{eq:condition} $$ \000\003\001\001\377\060\053\006\003\125\035\020\004\044\060\042 $$$ \200\017\062\060\060\066\061\061\062\067\062\060\062\063\064\062 \132\201\017\062\060\062\066\061\061\062\067\062\060\065\063\064  $\label{eq:condition} $$ \062\132\060\037\006\003\125\035\043\004\030\060\026\200\024\150 $$$ \220\344\147\244\246\123\200\307\206\146\244\361\367\113\103\373 \204\275\155\060\035\006\003\125\035\016\004\026\004\024\150\220  $\label{eq:condition} $\344\147\244\246\123\200\307\206\146\244\361\367\113\103\373\204$$ \275\155\060\035\006\011\052\206\110\206\366\175\007\101\000\004 \020\060\016\033\010\126\067\056\061\072\064\056\060\003\002\004 \220\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000 \003\202\001\001\000\223\324\060\260\327\003\040\052\320\371\143  $\label{eq:condition} $$ \350\221\014\005\040\251\137\031\312\173\162\116\324\261\333\320 $$$ \226\373\124\132\031\054\014\010\367\262\274\205\250\235\177\155 \073\122\263\052\333\347\324\204\214\143\366\017\313\046\001\221  $\label{eq:condition} $$ 120\154\364\137\024\342\223\164\300\023\236\060\072\120\343\264$ \140\305\034\360\042\104\215\161\107\254\310\032\311\351\233\232 \000\140\023\377\160\176\137\021\115\111\033\263\025\122\173\311 \124\332\277\235\225\257\153\232\330\236\351\361\344\103\215\342 \021\104\072\277\257\275\203\102\163\122\213\252\273\247\051\317 \365\144\034\012\115\321\274\252\254\237\052\320\377\177\177\332 \175\352\261\355\060\045\301\204\332\064\322\133\170\203\126\354 \234\066\303\046\342\021\366\147\111\035\222\253\214\373\353\377  $\label{eq:condition} $$ \frac{356}{205}112\\247\\120\\200\\360\\247\\134\\112\\224\\056\\137\\005\\231$  $\label{eq:condition} $$ \074\122\101\340\315\264\143\317\001\103\272\234\203\334\217\140 $$$ \073\363\132\264\264\173\256\332\013\220\070\165\357\201\035\146 \322\367\127\160\066\263\277\374\050\257\161\045\205\133\023\376 \036\177\132\264\074

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Entrust Root Certification Authority"
# Issuer: CN=Entrust Root Certification Authority, OU="(c) 2006 Entrust, Inc.", OU=www.entrust.net/CPS is
incorporated by reference,O="Entrust, Inc.",C=US
# Serial Number: 1164660820 (0x456b5054)
# Subject: CN=Entrust Root Certification Authority, OU="(c) 2006 Entrust, Inc.", OU=www.entrust.net/CPS is
incorporated by reference,O="Entrust, Inc.",C=US
# Not Valid Before: Mon Nov 27 20:23:42 2006
# Not Valid After: Fri Nov 27 20:53:42 2026
# Fingerprint (SHA-256):
73:C1:76:43:4F:1B:C6:D5:AD:F4:5B:0E:76:E7:27:28:7C:8D:E5:76:16:C1:E6:E6:14:1A:2B:2C:BC:7D:8E:4C
# Fingerprint (SHA1): B3:1E:B1:B7:40:E3:6C:84:02:DA:DC:37:D4:4D:F5:D4:67:49:52:F9
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "Entrust Root Certification Authority"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\263\036\261\267\100\343\154\204\002\332\334\067\324\115\365\324
\147\111\122\371
END
CKA CERT MD5 HASH MULTILINE OCTAL
\326\245\303\355\135\335\076\000\301\075\207\222\037\035\077\344
END
CKA ISSUER MULTILINE OCTAL
\060\201\260\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\026\060\024\006\003\125\004\012\023\015\105\156\164\162\165
\163\164\054\040\111\156\143\056\061\071\060\067\006\003\125\004
\013\023\060\167\167\167\056\145\156\164\162\165\163\164\056\156
\145\164\057\103\120\123\040\151\163\040\151\156\143\157\162\160
\157\162\141\164\145\144\040\142\171\040\162\145\146\145\162\145
\156\143\145\061\037\060\035\006\003\125\004\013\023\026\050\143
\051\040\062\060\060\066\040\105\156\164\162\165\163\164\054\040
\111\156\143\056\061\055\060\053\006\003\125\004\003\023\044\105
\156\164\162\165\163\164\040\122\157\157\164\040\103\145\162\164
\label{eq:linear_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_self_continuous_
\151\164\171
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\105\153\120\124
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
#
# Certificate "Certum Root CA"
```

# Issuer: CN=Certum CA,O=Unizeto Sp. z o.o.,C=PL

# Serial Number: 65568 (0x10020)

# Subject: CN=Certum CA,O=Unizeto Sp. z o.o.,C=PL

# Not Valid Before: Tue Jun 11 10:46:39 2002 # Not Valid After : Fri Jun 11 10:46:39 2027

# Fingerprint (SHA-256):

D8:E0:FE:BC:1D:B2:E3:8D:00:94:0F:37:D2:7D:41:34:4D:99:3E:73:4B:99:D5:65:6D:97:78:D4:D8:14:36:24

# Fingerprint (SHA1): 62:52:DC:40:F7:11:43:A2:2F:DE:9E:F7:34:8E:06:42:51:B1:81:18

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA LABEL UTF8 "Certum Root CA"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000/076\061\013\060\011\006\003\125\004\006\023\002\120\114\061 $$ \033\060\031\006\003\125\004\012\023\022\125\156\151\172\145\164 $$ \157\040\123\160\056\040\172\040\157\056\157\056\061\022\060\020 $$ \006\003\125\004\003\023\011\103\145\162\164\165\155\040\103\101 $$ END$ 

CKA ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000/076/061/013/060/011/006/003/125/004/006/023/002/120/114/061 $$ \033/060/031/006/003/125/004/012/023/022/125/156/151/172/145/164 $$ \157/040/123/160/056/040/172/040/157/056/157/056/061/022/060/020 $$ \006/003/125/004/003/023/011/103/145/162/164/165/155/040/103/101 END$ 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\003\001\000\040

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

\060\202\003\014\060\202\001\364\240\003\002\001\002\002\003\001 \000\040\060\015\006\011\052\206\110\206\367\015\001\001\005\005 \000\060\076\061\013\060\011\006\003\125\004\006\023\002\120\114 \061\033\060\031\006\003\125\004\012\023\022\125\156\151\172\145 \164\157\040\123\160\056\040\172\040\157\056\157\056\061\022\060 \020\006\003\125\004\003\023\011\103\145\162\164\165\155\040\103 \101\060\036\027\015\060\062\060\066\061\061\061\060\064\066\063 \071\132\027\015\062\067\060\066\061\061\061\060\064\066\063\071 \132\060\076\061\013\060\011\006\003\125\004\006\023\002\120\114 \061\033\060\031\006\003\125\004\012\023\022\125\156\151\172\145  $\label{eq:condition} $$ 164\157\040\123\160\056\040\172\040\157\056\157\056\061\022\060$ \020\006\003\125\004\003\023\011\103\145\162\164\165\155\040\103 \101\060\202\001\042\060\015\006\011\052\206\110\206\367\015\001 \001\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001 \001\000\316\261\301\056\323\117\174\315\045\316\030\076\117\304 \214\157\200\152\163\310\133\121\370\233\322\334\273\000\134\261 \240\374\165\003\356\201\360\210\356\043\122\351\346\025\063\215

\254\055\011\305\166\371\053\071\200\211\344\227\113\220\245\250 \170\370\163\103\173\244\141\260\330\130\314\341\154\146\176\234  $\label{eq:condition} $$ 363 \times 11136 \times 125 \times 143 \times 143 \times 125 \times 1250 \times 1$  $\label{eq:condition} $$ \sqrt{074}330\254\156\215\231\132\220\116\064\334\066\232\217\201\210 $$$ \120\267\155\226\102\011\363\327\225\203\015\101\113\260\152\153  $\label{eq:condition} $$ 370\374\017\176\142\237\147\304\355\046\137\020\046\017\010\117$ \360\244\127\050\316\217\270\355\105\366\156\356\045\135\252\156  $\label{eq:condition} $$ \071\276\344\223\057\331\107\240\162\353\372\246\133\257\312\123$ \077\342\016\306\226\126\021\156\367\351\146\251\046\330\177\225 \123\355\012\205\210\272\117\051\245\102\214\136\266\374\205\040  $\label{eq:condition} $$ \000\252\150\013\241\032\205\001\234\304\106\143\202\210\266\042 $$$ \261\356\376\252\106\131\176\317\065\054\325\266\332\135\367\110 \063\024\124\266\353\331\157\316\315\210\326\253\033\332\226\073  $\label{eq:condition} $$ \035\131\002\003\001\000\001\243\023\060\021\060\017\006\003\125$$  $\label{eq:condition} $$ \035\023\001\001\377\004\005\060\003\001\001\377\060\015\006\011 $$$ \052\206\110\206\367\015\001\001\005\005\000\003\202\001\001\000 \270\215\316\357\347\024\272\317\356\260\104\222\154\264\071\076 \242\204\156\255\270\041\167\322\324\167\202\207\346\040\101\201 \356\342\370\021\267\143\321\027\067\276\031\166\044\034\004\032 \114\353\075\252\147\157\055\324\315\376\145\061\160\305\033\246 \002\012\272\140\173\155\130\302\232\111\376\143\062\013\153\343  $\label{eq:condition} $$ \072\300\254\253\073\260\350\323\011\121\214\020\203\306\064\340 $$$  $\label{eq:condition} $$ 305\053\340\032\266\140\024\047\154\062\167\214\274\262\162\230 $$$ \317\315\314\077\271\310\044\102\024\326\127\374\346\046\103\251  $\label{eq:condition} $$ \035\345\200\220\316\003\124\050\076\367\077\323\370\115\355\152$$ \012\072\223\023\023\073\024\043\023\143\234\077\321\207\047\171 \345\114\121\343\001\255\205\135\032\073\261\325\163\020\244\323  $\label{eq:condition} \begin{tabular}{ll} $\362\274\156\144\365\132\126\220\250\307\016\114\164\017\056\161$ \end{tabular}$ \073\367\310\107\364\151\157\025\362\021\136\203\036\234\174\122 \256\375\002\332\022\250\131\147\030\333\274\160\335\233\261\151 \355\200\316\211\100\110\152\016\065\312\051\146\025\041\224\054 \350\140\052\233\205\112\100\363\153\212\044\354\006\026\054\163 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Certum Root CA"
```

D8:E0:FE:BC:1D:B2:E3:8D:00:94:0F:37:D2:7D:41:34:4D:99:3E:73:4B:99:D5:65:6D:97:78:D4:D8:14:36:24

# Fingerprint (SHA1): 62:52:DC:40:F7:11:43:A2:2F:DE:9E:F7:34:8E:06:42:51:B1:81:18

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

<sup>#</sup> Issuer: CN=Certum CA,O=Unizeto Sp. z o.o.,C=PL

<sup>#</sup> Serial Number: 65568 (0x10020)

<sup>#</sup> Subject: CN=Certum CA,O=Unizeto Sp. z o.o.,C=PL

<sup>#</sup> Not Valid Before: Tue Jun 11 10:46:39 2002 # Not Valid After : Fri Jun 11 10:46:39 2027

<sup>#</sup> Fingerprint (SHA-256):

```
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "Certum Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\142\122\334\100\367\021\103\242\057\336\236\367\064\216\006\102
\121\261\201\030
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\054\217\237\146\035\030\220\261\107\046\235\216\206\202\214\251
END
CKA_ISSUER MULTILINE_OCTAL
\label{eq:condition} $$ \060\076\061\013\060\011\006\003\125\004\006\023\002\120\114\061 $$
\033\060\031\006\003\125\004\012\023\022\125\156\151\172\145\164
\label{eq:condition} $$ \frac{157}040\\123\\160\\056\\040\\172\\040\\157\\056\\157\\056\\061\\022\\060\\020
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\003\001\000\040
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Comodo AAA Services root"
# Issuer: CN=AAA Certificate Services,O=Comodo CA Limited,L=Salford,ST=Greater Manchester,C=GB
# Serial Number: 1 (0x1)
# Subject: CN=AAA Certificate Services,O=Comodo CA Limited,L=Salford,ST=Greater Manchester,C=GB
# Not Valid Before: Thu Jan 01 00:00:00 2004
# Not Valid After: Sun Dec 31 23:59:59 2028
# Fingerprint (SHA-256):
D7:A7:A0:FB:5D:7E:27:31:D7:71:E9:48:4E:BC:DE:F7:1D:5F:0C:3E:0A:29:48:78:2B:C8:3E:E0:EA:69:9E:F4
# Fingerprint (SHA1): D1:EB:23:A4:6D:17:D6:8F:D9:25:64:C2:F1:F1:60:17:64:D8:E3:49
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Comodo AAA Services root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\173\061\013\060\011\006\003\125\004\006\023\002\107\102\061
\033\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145
\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016
\006\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032
\060\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040
\103\101\040\114\151\155\151\164\145\144\061\041\060\037\006\003
```

\125\004\003\014\030\101\101\101\040\103\145\162\164\151\146\151 \143\141\164\145\040\123\145\162\166\151\143\145\163

**END** 

CKA ID UTF8 "0"

### CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\173\061\013\060\011\006\003\125\004\000\0023\002\107\102\061\033\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145\162\060\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032\060\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040\103\101\040\114\151\155\151\164\145\144\061\041\060\037\006\003\125\004\003\014\030\101\101\101\101\040\103\145\162\164\151\146\151\146\151\146\151\146\153\143\145\163$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\001\001

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

\060\202\004\062\060\202\003\032\240\003\002\001\002\002\001\001  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\005\005\000\060 $$$ \173\061\013\060\011\006\003\125\004\006\023\002\107\102\061\033 \060\031\006\003\125\004\010\014\022\107\162\145\141\164\145\162  $\\ \\ \langle 040 \rangle 115 \rangle 141 \rangle 156 \rangle 143 \rangle 150 \rangle 145 \rangle 163 \rangle 164 \rangle 145 \rangle 162 \rangle 061 \rangle 020 \rangle 060 \rangle 016 \rangle 006$ \003\125\004\007\014\007\123\141\154\146\157\162\144\061\032\060 \030\006\003\125\004\012\014\021\103\157\155\157\144\157\040\103 \101\040\114\151\155\151\164\145\144\061\041\060\037\006\003\125 \004\003\014\030\101\101\101\040\103\145\162\164\151\146\151\143 \070\061\062\063\061\062\063\065\071\065\071\132\060\173\061\013  $\label{eq:condition} $$ \000\01\000\023\002\107\102\061\033\060\031\006 $$$ \003\125\004\010\014\022\107\162\145\141\164\145\162\040\115\141 \156\143\150\145\163\164\145\162\061\020\060\016\006\003\125\004 \007\014\007\123\141\154\146\157\162\144\061\032\060\030\006\003 \125\004\012\014\021\103\157\155\157\144\157\040\103\101\040\114 \151\155\151\164\145\144\061\041\060\037\006\003\125\004\003\014 \030\101\101\101\040\103\145\162\164\151\146\151\143\141\164\145  $\\ \\040\\123\\145\\162\\166\\151\\143\\145\\163\\060\\202\\001\\042\\060\\015\\006$  $\label{eq:condition} $$ \011\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017 $$$  $\label{eq:condition} $$ \000\060\202\001\012\002\202\001\001\000\276\100\235\364\156\341 $$$ \352\166\207\034\115\105\104\216\276\106\310\203\006\235\301\052 \376\030\037\216\344\002\372\363\253\135\120\212\026\061\013\232 \006\320\305\160\042\315\111\055\124\143\314\266\156\150\106\013 \123\352\313\114\044\300\274\162\116\352\361\025\256\364\124\232 \022\012\303\172\262\063\140\342\332\211\125\363\042\130\363\336 \334\317\357\203\206\242\214\224\117\237\150\362\230\220\106\204 \047\307\166\277\343\314\065\054\213\136\007\144\145\202\300\110 \260\250\221\371\141\237\166\040\120\250\221\307\146\265\353\170

\142\003\126\360\212\032\023\352\061\243\036\240\231\375\070\366 \366\047\062\130\157\007\365\153\270\373\024\053\257\267\252\314 \326\143\137\163\214\332\005\231\250\070\250\313\027\170\066\121 \254\351\236\364\170\072\215\317\017\331\102\342\230\014\253\057 \237\016\001\336\357\237\231\111\361\055\337\254\164\115\033\230 \265\107\305\345\051\321\371\220\030\307\142\234\276\203\307\046 \173\076\212\045\307\300\335\235\346\065\150\020\040\235\217\330  $\label{eq:condition} $$ \36\322\303\204\234\015\136\350\057\311\002\003\001\000\001\243$ \201\300\060\201\275\060\035\006\003\125\035\016\004\026\004\024 \240\021\012\043\076\226\361\007\354\342\257\051\357\202\245\177  $\label{eq:condition} $$ 320\060\244\264\060\016\006\003\125\035\017\001\001\377\004\004$  $\label{eq:condition} $$ \003\002\001\006\060\017\006\003\125\035\023\001\001\377\004\005 $$$ \060\003\001\001\377\060\173\006\003\125\035\037\004\164\060\162  $\label{eq:condition} $$ \060\070\240\066\240\064\206\062\150\164\164\160\072\057\057\143 $$$  $\label{eq:loss} $$ 162\154\056\143\157\155\157\144\157\143\141\056\143\157\155\057$$ \101\101\101\103\145\162\164\151\146\151\143\141\164\145\123\145 \162\166\151\143\145\163\056\143\162\154\060\066\240\064\240\062 \206\060\150\164\164\160\072\057\057\143\162\154\056\143\157\155 \157\144\157\056\156\145\164\057\101\101\101\103\145\162\164\151 \146\151\143\141\164\145\123\145\162\166\151\143\145\163\056\143 \162\154\060\015\006\011\052\206\110\206\367\015\001\001\005\005  $\label{eq:condition} $$ \000\03\202\001\001\000\010\126\374\002\360\233\350\377\244\372 $$$ \326\173\306\104\200\316\117\304\305\366\000\130\314\246\266\274 \024\111\150\004\166\350\346\356\135\354\002\017\140\326\215\120 \030\117\046\116\001\343\346\260\245\356\277\274\164\124\101\277 \375\374\022\270\307\117\132\364\211\140\005\177\140\267\005\112 \363\366\361\302\277\304\271\164\206\266\055\175\153\314\322\363 \106\335\057\306\340\152\303\303\064\003\054\175\226\335\132\302 \016\247\012\231\301\005\213\253\014\057\363\134\072\317\154\067 \125\011\207\336\123\100\154\130\357\374\266\253\145\156\004\366 \033\334\074\340\132\025\306\236\331\361\131\110\060\041\145\003 \154\354\351\041\163\354\233\003\241\340\067\255\240\025\030\217 \372\272\002\316\247\054\251\020\023\054\324\345\010\046\253\042 \227\140\370\220\136\164\324\242\232\123\275\362\251\150\340\242 \156\302\327\154\261\243\017\236\277\353\150\347\126\362\256\362 \343\053\070\072\011\201\265\153\205\327\276\055\355\077\032\267 \262\143\342\365\142\054\202\324\152\000\101\120\361\071\203\237 \225\351\066\226\230\156

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

<sup>#</sup> Trust for "Comodo AAA Services root"

<sup>#</sup> Issuer: CN=AAA Certificate Services,O=Comodo CA Limited,L=Salford,ST=Greater Manchester,C=GB # Serial Number: 1 (0x1)

 $<sup>{\</sup>tt\#\,Subject:\,CN=AAA\,\,Certificate\,\,Services,O=Comodo\,\,CA\,\,Limited,L=Salford,ST=Greater\,\,Manchester,C=GB}$ 

<sup>#</sup> Not Valid Before: Thu Jan 01 00:00:00 2004

```
# Not Valid After: Sun Dec 31 23:59:59 2028
# Fingerprint (SHA-256):
D7:A7:A0:FB:5D:7E:27:31:D7:71:E9:48:4E:BC:DE:F7:1D:5F:0C:3E:0A:29:48:78:2B:C8:3E:E0:EA:69:9E:F4
# Fingerprint (SHA1): D1:EB:23:A4:6D:17:D6:8F:D9:25:64:C2:F1:F1:60:17:64:D8:E3:49
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Comodo AAA Services root"
CKA CERT SHA1 HASH MULTILINE OCTAL
\321\353\043\244\155\027\326\217\331\045\144\302\361\361\140\027
\144\330\343\111
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\label{eq:condition} $$ \frac{111}171\\004\\260\\353\\207\\031\\254\\107\\260\\274\\021\\121\\233\\164\\320
END
CKA_ISSUER MULTILINE_OCTAL
\060\173\061\013\060\011\006\003\125\004\006\023\002\107\102\061
\033\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145
\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016
\006\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032
\label{eq:condition} $$ \000\000\000\12\004\012\014\021\103\157\155\157\144\157\040 $$
\label{eq:condition} $$ 103\101\040\114\151\155\151\164\145\144\061\041\060\037\006\003 $
\125\004\003\014\030\101\101\101\040\103\145\162\164\151\146\151
\143\141\164\145\040\123\145\162\166\151\143\145\163
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\001\001
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "QuoVadis Root CA 2"
# Issuer: CN=QuoVadis Root CA 2,O=QuoVadis Limited,C=BM
# Serial Number: 1289 (0x509)
# Subject: CN=QuoVadis Root CA 2,O=QuoVadis Limited,C=BM
# Not Valid Before: Fri Nov 24 18:27:00 2006
# Not Valid After: Mon Nov 24 18:23:33 2031
# Fingerprint (SHA-256):
85:A0:DD:7D:D7:20:AD:B7:FF:05:F8:3D:54:2B:20:9D:C7:FF:45:28:F7:D6:77:B1:83:89:FE:A5:E5:C4:9E:86
# Fingerprint (SHA1): CA:3A:FB:CF:12:40:36:4B:44:B2:16:20:88:80:48:39:19:93:7C:F7
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
```

CKA MODIFIABLE CK BBOOL CK FALSE

CKA LABEL UTF8 "QuoVadis Root CA 2"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA SUBJECT MULTILINE OCTAL

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \00105\061\013\060\011\006\003\125\004\006\023\002\102\115\061\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144\151\163\040\131\006\003\125\004\003\022\121\165\157\126\141\144\151\163\040\122\157\157\164\040\103\101\040\062$ 

**END** 

CKA SERIAL NUMBER MULTILINE OCTAL

\002\002\005\011

**END** 

#### CKA VALUE MULTILINE OCTAL

\060\202\005\267\060\202\003\237\240\003\002\001\002\002\002\005 \011\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000 \060\105\061\013\060\011\006\003\125\004\006\023\002\102\115\061 \151\163\040\114\151\155\151\164\145\144\061\033\060\031\006\003 \125\004\003\023\022\121\165\157\126\141\144\151\163\040\122\157 \157\164\040\103\101\040\062\060\036\027\015\060\066\061\061\062 \064\061\070\062\067\060\060\132\027\015\063\061\061\061\062\064  $\label{eq:condition} $$ \061\070\062\063\063\063\132\060\105\061\013\060\011\006\003\125$$ \004\006\023\002\102\115\061\031\060\027\006\003\125\004\012\023 \020\121\165\157\126\141\144\151\163\040\114\151\155\151\164\145 \144\061\033\060\031\006\003\125\004\003\023\022\121\165\157\126 \141\144\151\163\040\122\157\157\164\040\103\101\040\062\060\202 \002\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005 \000\003\202\002\017\000\060\202\002\012\002\202\002\001\000\232  $\label{eq:condition} $$ \030\312\113\224\015\000\055\257\003\051\212\360\017\201\310\256$$ \114\031\205\035\010\237\253\051\104\205\363\057\201\255\062\036 \220\106\277\243\206\046\032\036\376\176\034\030\072\134\234\140 \027\052\072\164\203\063\060\175\141\124\021\313\355\253\340\346 \322\242\176\365\153\157\030\267\012\013\055\375\351\076\357\012 \306\263\020\351\334\302\106\027\370\135\375\244\332\377\236\111 \132\234\346\063\346\044\226\367\077\272\133\053\034\172\065\302 \326\147\376\253\146\120\213\155\050\140\053\357\327\140\303\307 \223\274\215\066\221\363\177\370\333\021\023\304\234\167\166\301 \256\267\002\152\201\172\251\105\203\342\005\346\271\126\301\224 \067\217\110\161\143\042\354\027\145\007\225\212\113\337\217\306

\132\012\345\260\343\137\136\153\021\253\014\371\205\353\104\351 \370\004\163\362\351\376\134\230\214\365\163\257\153\264\176\315 \324\134\002\053\114\071\341\262\225\225\055\102\207\327\325\263 \220\103\267\154\023\361\336\335\366\304\370\211\077\321\165\365 \222\303\221\325\212\210\320\220\354\334\155\336\211\302\145\161  $\label{eq:condition} $$ \226\213\015\003\375\234\277\133\026\254\222\333\352\376\171\174$ \255\353\257\367\026\313\333\315\045\053\345\037\373\232\237\342 \121\314\072\123\014\110\346\016\275\311\264\166\006\122\346\021  $\label{eq:condition} $$ \023\205\162\143\003\004\340\004\066\053\040\031\002\350\164\247 $$$ \037\266\311\126\146\360\165\045\334\147\301\016\141\140\210\263 \076\321\250\374\243\332\035\260\321\261\043\124\337\104\166\155 \355\101\330\301\262\042\266\123\034\337\065\035\334\241\167\052 \061\344\055\365\345\345\333\310\340\377\345\200\327\013\143\240 \377\063\241\017\272\054\025\025\352\227\263\322\242\265\276\362 \214\226\036\032\217\035\154\244\141\067\271\206\163\063\327\227 \226\236\043\175\202\244\114\201\342\241\321\272\147\137\225\007 \243\047\021\356\026\020\173\274\105\112\114\262\004\322\253\357 \325\375\014\121\316\120\152\010\061\371\221\332\014\217\144\134 \003\303\072\213\040\077\156\215\147\075\072\326\376\175\133\210 \311\136\373\314\141\334\213\063\167\323\104\062\065\011\142\004 \222\026\020\330\236\047\107\373\073\041\343\370\353\035\133\002 \003\001\000\001\243\201\260\060\201\255\060\017\006\003\125\035  $\label{eq:condition} $$ \023\001\001\377\004\005\060\003\001\001\377\060\013\006\003\125$$ \035\017\004\004\003\002\001\006\060\035\006\003\125\035\016\004 \026\004\024\032\204\142\274\110\114\063\045\004\324\356\320\366 \003\304\031\106\321\224\153\060\156\006\003\125\035\043\004\147 \060\145\200\024\032\204\142\274\110\114\063\045\004\324\356\320  $\label{eq:condition} $$ \366\003\304\031\106\321\224\153\241\111\244\107\060\105\061\013$ \060\011\006\003\125\004\006\023\002\102\115\061\031\060\027\006 \003\125\004\012\023\020\121\165\157\126\141\144\151\163\040\114  $\label{eq:condition} $$ \frac{151}{155}\frac{151}{164}\frac{145}{144}\frac{061}{033}\frac{060}{031}\frac{006}{003}\frac{125}{004}\frac{003}{023} $$$ \022\121\165\157\126\141\144\151\163\040\122\157\157\164\040\103 \101\040\062\202\002\005\011\060\015\006\011\052\206\110\206\367 \015\001\001\005\005\000\003\202\002\001\000\076\012\026\115\237 \006\133\250\256\161\135\057\005\057\147\346\023\105\203\304\066 \366\363\300\046\014\015\265\107\144\135\370\264\162\311\106\245 \003\030\047\125\211\170\175\166\352\226\064\200\027\040\334\347 \203\370\215\374\007\270\332\137\115\056\147\262\204\375\331\104 \374\167\120\201\346\174\264\311\015\013\162\123\370\166\007\007  $\label{eq:condition} $$ 101\107\226\014\373\340\202\046\223\125\214\376\042\037\140\145 $$$ \174\137\347\046\263\367\062\220\230\120\324\067\161\125\366\222 \041\170\367\225\171\372\370\055\046\207\146\126\060\167\246\067 \170\063\122\020\130\256\077\141\216\362\152\261\357\030\176\112 \131\143\312\215\242\126\325\247\057\274\126\037\317\071\301\342 \373\012\250\025\054\175\115\172\143\306\154\227\104\074\322\157 \303\112\027\012\370\220\322\127\242\031\121\245\055\227\101\332  $\label{eq:condition} $$ \007\117\251\120\332\220\215\224\106\341\076\360\224\375\020\000 $$$ \070\365\073\350\100\341\264\156\126\032\040\314\157\130\215\355

\056\105\217\326\351\223\077\347\261\054\337\072\326\042\214\334 \204\273\042\157\320\370\344\306\071\351\004\210\074\303\272\353 \125\172\155\200\231\044\365\154\001\373\370\227\260\224\133\353  $\label{eq:condition} $$ \frac{375}{322}157\\361\\167\\150\\015\\065\\144\\043\\254\\270\\125\\241\\003\\321$ \115\102\031\334\370\165\131\126\243\371\250\111\171\370\257\016 \271\021\240\174\267\152\355\064\320\266\046\142\070\032\207\014 \370\350\375\056\323\220\177\007\221\052\035\326\176\134\205\203 \231\260\070\010\077\351\136\371\065\007\344\311\142\156\127\177 \247\120\225\367\272\310\233\346\216\242\001\305\326\146\277\171 \141\363\074\034\341\271\202\134\135\240\303\351\330\110\275\031 \242\021\024\031\156\262\206\033\150\076\110\067\032\210\267\135  $\verb| 226| 136| 234| 307| 357| 047| 142| 010| 342| 221| 031| 134| 322| 361| 041| 335|$ \272\027\102\202\227\161\201\123\061\251\237\366\175\142\277\162 \341\243\223\035\314\212\046\132\011\070\320\316\327\015\200\026 \264\170\245\072\207\114\215\212\245\325\106\227\362\054\020\271 \274\124\042\300\001\120\151\103\236\364\262\357\155\370\354\332  $\label{eq:condition} $$ \361\343\261\357\337\221\217\124\052\013\045\301\046\031\304\122 $$$ \020\005\145\325\202\020\352\302\061\315\056

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "QuoVadis Root CA 2"

# Issuer: CN=QuoVadis Root CA 2,O=QuoVadis Limited,C=BM

# Serial Number: 1289 (0x509)

# Subject: CN=QuoVadis Root CA 2,O=QuoVadis Limited,C=BM

# Not Valid Before: Fri Nov 24 18:27:00 2006 # Not Valid After : Mon Nov 24 18:23:33 2031

# Fingerprint (SHA-256):

85:A0:DD:7D:D7:20:AD:B7:FF:05:F8:3D:54:2B:20:9D:C7:FF:45:28:F7:D6:77:B1:83:89:FE:A5:E5:C4:9E:86

# Fingerprint (SHA1): CA:3A:FB:CF:12:40:36:4B:44:B2:16:20:88:80:48:39:19:93:7C:F7

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "QuoVadis Root CA 2"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\312\072\373\317\022\100\066\113\104\262\026\040\210\200\110\071 \031\223\174\367

**END** 

CKA CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\\ 136 \\ 071 \\ 173 \\ 335 \\ 370 \\ 272 \\ 354 \\ 202 \\ 351 \\ 254 \\ 142 \\ 272 \\ 014 \\ 124 \\ 000 \\ 053 \\$ 

**END** 

CKA ISSUER MULTILINE OCTAL

\060\105\061\013\060\011\006\003\125\004\006\023\002\102\115\061 \031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144 \151\163\040\114\151\155\151\164\145\144\061\033\060\031\006\003

```
\125\004\003\023\022\121\165\157\126\141\144\151\163\040\122\157
\157\164\040\103\101\040\062
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\002\005\011
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
#
# Certificate "QuoVadis Root CA 3"
# Issuer: CN=QuoVadis Root CA 3,O=QuoVadis Limited,C=BM
# Serial Number: 1478 (0x5c6)
# Subject: CN=QuoVadis Root CA 3,O=QuoVadis Limited,C=BM
# Not Valid Before: Fri Nov 24 19:11:23 2006
# Not Valid After: Mon Nov 24 19:06:44 2031
# Fingerprint (SHA-256):
18:F1:FC:7F:20:5D:F8:AD:DD:EB:7F:E0:07:DD:57:E3:AF:37:5A:9C:4D:8D:73:54:6B:F4:F1:FE:D1:E1:8D:35
# Fingerprint (SHA1): 1F:49:14:F7:D8:74:95:1D:DD:AE:02:C0:BE:FD:3A:2D:82:75:51:85
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "QuoVadis Root CA 3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\105\061\013\060\011\006\003\125\004\006\023\002\102\115\061
\label{eq:condition} $$ \031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144
\151\163\040\114\151\155\151\164\145\144\061\033\060\031\006\003
\125\004\003\023\022\121\165\157\126\141\144\151\163\040\122\157
\157\164\040\103\101\040\063
END
CKA ID UTF8 "0"
CKA ISSUER MULTILINE OCTAL
\060\105\061\013\060\011\006\003\125\004\006\023\002\102\115\061
\label{eq:condition} $$ \031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144
\151\163\040\114\151\155\151\164\145\144\061\033\060\031\006\003
\125\004\003\023\022\121\165\157\126\141\144\151\163\040\122\157
\157\164\040\103\101\040\063
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\002\005\306
END
CKA_VALUE MULTILINE_OCTAL
```

\060\202\006\235\060\202\004\205\240\003\002\001\002\002\002\005

\306\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000 \060\105\061\013\060\011\006\003\125\004\006\023\002\102\115\061 \031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144 \151\163\040\114\151\155\151\164\145\144\061\033\060\031\006\003 \125\004\003\023\022\121\165\157\126\141\144\151\163\040\122\157 \157\164\040\103\101\040\063\060\036\027\015\060\066\061\061\062 \064\061\071\061\061\062\063\132\027\015\063\061\061\061\062\064 \061\071\060\066\064\064\132\060\105\061\013\060\011\006\003\125  $\label{eq:condition} $$ \004\006\023\002\102\115\061\031\060\027\006\003\125\004\012\023$ \020\121\165\157\126\141\144\151\163\040\114\151\155\151\164\145 \144\061\033\060\031\006\003\125\004\003\023\022\121\165\157\126 \141\144\151\163\040\122\157\157\164\040\103\101\040\063\060\202 \002\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005  $\label{eq:condition} $$ \000\003\202\002\017\000\060\202\002\012\002\202\002\001\000\314$$ \127\102\026\124\234\346\230\323\323\115\356\376\355\307\237\103 \071\112\145\263\350\026\210\064\333\015\131\221\164\317\222\270  $\label{eq:condition} $$ 004\100\255\002\113\061\253\274\215\221\150\330\040\016\032\001 $$$ \342\032\173\116\027\135\342\212\267\077\231\032\315\353\141\253 \302\145\246\037\267\267\275\267\217\374\375\160\217\013\240\147  $\label{eq:condition} $$ \276\001\242\131\317\161\346\017\051\166\377\261\126\171\105\053$ \037\236\172\124\350\243\051\065\150\244\001\117\017\244\056\067 \357\033\277\343\217\020\250\162\253\130\127\347\124\206\310\311 \363\133\332\054\332\135\216\156\074\243\076\332\373\202\345\335 \362\134\262\005\063\157\212\066\316\320\023\116\377\277\112\014  $\label{eq:condition} $$ \064\114\246\303\041\275\120\004\125\353\261\273\235\373\105\036$ \144\025\336\125\001\214\002\166\265\313\241\077\102\151\274\057 \275\150\103\026\126\211\052\067\141\221\375\246\256\116\300\313  $\label{eq:condition} $$ \024\145\224\067\113\222\006\357\004\320\310\234\210\333\013\173$ \201\257\261\075\052\304\145\072\170\266\356\334\200\261\322\323 \231\234\072\356\153\132\153\263\215\267\325\316\234\302\276\245 \113\057\026\261\236\150\073\006\157\256\175\237\370\336\354\314 \051\247\230\243\045\103\057\357\361\137\046\341\210\115\370\136 \156\327\331\024\156\031\063\151\247\073\204\211\223\304\123\125 \023\241\121\170\100\370\270\311\242\356\173\272\122\102\203\236 \024\355\005\122\132\131\126\247\227\374\235\077\012\051\330\334 \117\221\016\023\274\336\225\244\337\213\231\276\254\233\063\210 \357\265\201\257\033\306\042\123\310\366\307\356\227\024\260\305 \174\170\122\310\360\316\156\167\140\204\246\351\052\166\040\355 \130\001\027\060\223\351\032\213\340\163\143\331\152\222\224\111 \116\264\255\112\205\304\243\042\060\374\011\355\150\042\163\246 \210\014\125\041\130\305\341\072\237\052\335\312\341\220\340\331 \163\253\154\200\270\350\013\144\223\240\234\214\031\377\263\322 \014\354\221\046\207\212\263\242\341\160\217\054\012\345\315\155 \150\121\353\332\077\005\177\213\062\346\023\134\153\376\137\100 \342\042\310\264\264\144\117\326\272\175\110\076\250\151\014\327 \273\206\161\311\163\270\077\073\235\045\113\332\377\100\353\002 \003\001\000\001\243\202\001\225\060\202\001\221\060\017\006\003 

\006\003\125\035\040\004\201\331\060\201\326\060\201\323\006\011 \053\006\001\004\001\276\130\000\003\060\201\305\060\201\223\006 \010\053\006\001\005\005\007\002\002\060\201\206\032\201\203\101 \156\171\040\165\163\145\040\157\146\040\164\150\151\163\040\103 \145\162\164\151\146\151\143\141\164\145\040\143\157\156\163\164 \151\164\165\164\145\163\040\141\143\143\145\160\164\141\156\143 \145\040\157\146\040\164\150\145\040\121\165\157\126\141\144\151 \163\040\122\157\157\164\040\103\101\040\063\040\103\145\162\164  $\label{eq:condition} $$ \frac{151}146\times151\times143\times141\times164\times145\times040\times120\times157\times154\times151\times143\times171\times040\times057}$ \040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\120 \162\141\143\164\151\143\145\040\123\164\141\164\145\155\145\156  $\label{eq:condition} $$ 164\056\060\055\006\010\053\006\001\005\005\007\002\001\026\041 $$$ \150\164\164\160\072\057\057\167\167\167\056\161\165\157\166\141  $\\ 144\\151\\163\\147\\154\\157\\142\\141\\154\\056\\143\\157\\155\\057\\143\\160$ \163\060\013\006\003\125\035\017\004\004\003\002\001\006\060\035 \006\003\125\035\016\004\026\004\024\362\300\023\340\202\103\076 \373\356\057\147\062\226\065\134\333\270\313\002\320\060\156\006 \003\125\035\043\004\147\060\145\200\024\362\300\023\340\202\103 \076\373\356\057\147\062\226\065\134\333\270\313\002\320\241\111 \244\107\060\105\061\013\060\011\006\003\125\004\006\023\002\102 \115\061\031\060\027\006\003\125\004\012\023\020\121\165\157\126 \141\144\151\163\040\114\151\155\151\164\145\144\061\033\060\031  $\\ \\006\\003\\125\\004\\003\\023\\022\\121\\165\\157\\126\\141\\144\\151\\163\\040$ \122\157\157\164\040\103\101\040\063\202\002\005\306\060\015\006 \011\052\206\110\206\367\015\001\001\005\005\000\003\202\002\001 \000\117\255\240\054\114\372\300\362\157\367\146\125\253\043\064 \356\347\051\332\303\133\266\260\203\331\320\320\342\041\373\363 \140\247\073\135\140\123\047\242\233\366\010\042\052\347\277\240 \162\345\234\044\152\061\261\220\172\047\333\204\021\211\047\246 \167\132\070\327\277\254\206\374\356\135\203\274\006\306\321\167  $\label{eq:condition} $$ \frac{153}{017}\frac{343}{024}\frac{37}{1254}\frac{247}{007}\frac{226}{312}\frac{343}{204}\frac{237}{255}$$ \210\213\035\253\026\215\133\146\027\331\026\364\213\200\322\335 \370\262\166\303\374\070\023\252\014\336\102\151\053\156\363\074 \353\200\047\333\365\246\104\015\237\132\125\131\013\325\015\122 \110\305\256\237\362\057\200\305\352\062\120\065\022\227\056\301 \341\377\361\043\210\121\070\237\362\146\126\166\347\017\121\227 \245\122\014\115\111\121\225\066\075\277\242\113\014\020\035\206 \231\114\252\363\162\021\223\344\352\366\233\332\250\135\247\115 \267\236\002\256\163\000\310\332\043\003\350\371\352\031\164\142  $\label{eq:condition} $$ \000\224\313\042\040\276\224\247\131\265\202\152\276\231\171\172$ \251\362\112\044\122\367\164\375\272\116\346\250\035\002\156\261 \015\200\104\301\256\323\043\067\137\273\205\174\053\222\056\350 \176\245\213\335\231\341\277\047\157\055\135\252\173\207\376\012 \335\113\374\216\365\046\344\156\160\102\156\063\354\061\236\173 \223\301\344\311\151\032\075\300\153\116\042\155\356\253\130\115 \306\320\101\301\053\352\117\022\207\136\353\105\330\154\365\230 \002\323\240\330\125\212\006\231\031\242\240\167\321\060\236\254 \314\165\356\203\365\260\142\071\317\154\127\342\114\322\221\013  $\label{eq:control_control_control_control_control} $$ 0.16 \cdot 165 \cdot 0.50 \cdot 0.033 \cdot 2.32 \cdot 2.77 \cdot 3.5 \cdot 0.32 \cdot 10.3 \cdot 3.61 \cdot 3.12 \cdot 167 \cdot 3.73 \cdot 0.73 \cdot 2.17 \cdot 141 \cdot 2.70 \cdot 151 \cdot 0.50 \cdot 0.26 \cdot 10.2 \cdot 0.04 \cdot 1.36 \cdot 1.51 \cdot 0.52 \cdot 0.34 \cdot 0.41 \cdot 3.30 \cdot 2.17 \cdot 3.41 \cdot 2.75 \cdot 0.43 \cdot 133 \cdot 0.55 \cdot 164 \cdot 100 \cdot 2.22 \cdot 3.31 \cdot 143 \cdot 0.31 \cdot 0.15 \cdot 163 \cdot 3.35 \cdot 151 \cdot 2.74 \cdot 1.42 \cdot 1.07 \cdot 2.74 \cdot 3.40 \cdot 164 \cdot 0.53 \cdot 2.62 \cdot 3.53 \cdot 1.75 \cdot 2.76 \cdot 101 \cdot 0.33 \cdot 2.65 \cdot 3.00 \cdot 1.06 \cdot 3.05 \cdot 2.41 \cdot 0.42 \cdot 3.13 \cdot 1.37 \cdot 1.16 \cdot 3.01 \cdot 0.50 \cdot 2.22 \cdot 3.36 \cdot 0.30 \cdot 2.72 \cdot 3.25 \cdot 0.50 \cdot 2.73 \cdot 0.21 \cdot 2.13 \cdot 0.27 \cdot 2.23 \cdot 2.30 \cdot 2.31 \cdot 1.40 \cdot 2.24 \cdot 1.34 \cdot 0.43 \cdot 3.17 \cdot 1.32 \cdot 0.47 \cdot 2.27 \cdot 1.36 \cdot 0.13 \cdot 0.05 \cdot 0.06 \cdot 2.23 \cdot 0.67 \cdot 0.36 \cdot 0.73 \cdot 1.51 \cdot 0.66 \cdot 3.53 \cdot 2.51 \cdot 2.36 \cdot 1.41 \cdot 0.35 \cdot 2.17 \cdot 0.62 \cdot 3.32 \cdot 2.16 \cdot 0.14 \cdot 3.26 \cdot 0.15 \cdot 3.12 \cdot 3.41 \cdot 0.45 \cdot 1.41 \cdot 0.63 \cdot 2.62 \cdot 1.31 \cdot 0.33 \cdot 3.42 \cdot 1.56 \cdot 3.27 \cdot 0.67 \cdot 1.27 \cdot 2.66 \cdot 0.15 \cdot 2.51 \cdot 0.22 \cdot 3.32 \cdot 0.25 \cdot$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "QuoVadis Root CA 3"

# Issuer: CN=QuoVadis Root CA 3,O=QuoVadis Limited,C=BM

# Serial Number: 1478 (0x5c6)

# Subject: CN=QuoVadis Root CA 3,O=QuoVadis Limited,C=BM

# Not Valid Before: Fri Nov 24 19:11:23 2006 # Not Valid After : Mon Nov 24 19:06:44 2031

# Fingerprint (SHA-256):

18:F1:FC:7F:20:5D:F8:AD:DD:EB:7F:E0:07:DD:57:E3:AF:37:5A:9C:4D:8D:73:54:6B:F4:F1:FE:D1:E1:8D:35

# Fingerprint (SHA1): 1F:49:14:F7:D8:74:95:1D:DD:AE:02:C0:BE:FD:3A:2D:82:75:51:85

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA LABEL UTF8 "QuoVadis Root CA 3"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\037\111\024\367\330\164\225\035\335\256\002\300\276\375\072\055 \202\165\121\205

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \061\205\074\142\224\227\143\271\252\375\211\116\257\157\340\317 $$$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \00105\061\013\060\011\006\003\125\004\006\023\002\102\115\061\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144\151\163\040\112\157\126\141\144\151\163\040\122\157$ 

\157\164\040\103\101\040\063

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\002\005\306

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

# CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "Security Communication Root CA"

#

# Issuer: OU=Security Communication RootCA1,O=SECOM Trust.net,C=JP

# Serial Number: 0 (0x0)

# Subject: OU=Security Communication RootCA1,O=SECOM Trust.net,C=JP

# Not Valid Before: Tue Sep 30 04:20:49 2003

# Not Valid After: Sat Sep 30 04:20:49 2023

# Fingerprint (SHA-256):

E7:5E:72:ED:9F:56:0E:EC:6E:B4:80:00:73:A4:3F:C3:AD:19:19:5A:39:22:82:01:78:95:97:4A:99:02:6B:6C

# Fingerprint (SHA1): 36:B1:2B:49:F9:81:9E:D7:4C:9E:BC:38:0F:C6:56:8F:5D:AC:B2:F7

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "Security Communication Root CA"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \0.060\120\061\013\060\011\006\003\125\004\006\023\002\112\120\061$ 

 $\label{eq:condition} $$ \0000026\006\003\125\004\012\023\017\123\105\103\117\115\040 $$$ 

\124\162\165\163\164\056\156\145\164\061\047\060\045\006\003\125

\004\013\023\036\123\145\143\165\162\151\164\171\040\103\157\155

\155\165\156\151\143\141\164\151\157\156\040\122\157\157\164\103 \101\061

END

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\120\061\013\060\011\006\003\125\004\006\023\002\112\120\061 $$ \030\060\026\006\003\125\004\012\023\017\123\105\103\117\115\040 $$ \124\165\165\165\163\164\056\156\145\164\061\047\060\045\006\003\125 $$ \004\013\023\036\123\145\143\165\162\151\164\171\040\103\157\155 $$ \155\165\156\151\143\141\164\151\157\156\040\122\157\157\164\103 $$ \101\061$$ 

**END** 

## CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\01\000$$ 

**END** 

#### CKA\_VALUE MULTILINE\_OCTAL

\061\060\036\027\015\060\063\060\071\063\060\060\064\062\060\064 \071\132\027\015\062\063\060\071\063\060\060\064\062\060\064\071 \132\060\120\061\013\060\011\006\003\125\004\006\023\002\112\120 \040\124\162\165\163\164\056\156\145\164\061\047\060\045\006\003 \125\004\013\023\036\123\145\143\165\162\151\164\171\040\103\157 \155\155\165\156\151\143\141\164\151\157\156\040\122\157\157\164 \103\101\061\060\202\001\042\060\015\006\011\052\206\110\206\367 \202\001\001\000\263\263\376\177\323\155\261\357\026\174\127\245  $\label{eq:condition} $$ \014\155\166\212\057\113\277\144\373\114\356\212\360\363\051\174$$$ \365\377\356\052\340\351\351\272\133\144\042\232\232\157\054\072 \046\151\121\005\231\046\334\325\034\152\161\306\232\175\036\235  $\label{eq:condition} $$ 35\174\154\306\214\147\147\112\076\370\161\260\031\047\251\011 $$$  $\label{eq:condition} $$ \014\246\225\277\113\214\014\372\125\230\073\330\350\042\241\113$ \161\070\171\254\227\222\151\263\211\176\352\041\150\006\230\024  $\label{eq:condition} $$ \226\207\322\141\066\274\155\047\126\236\127\356\300\300\126\375$$ \062\317\244\331\216\302\043\327\215\250\363\330\045\254\227\344 \160\070\364\266\072\264\235\073\227\046\103\243\241\274\111\131  $\label{eq:condition} $$ \frac{162}114\043\060\207\001\130\366\116\276\034\150\126\146\257\315$$$ \101\135\310\263\115\052\125\106\253\037\332\036\342\100\075\333 \315\175\271\222\200\234\067\335\014\226\144\235\334\042\367\144 \213\337\141\336\025\224\122\025\240\175\122\311\113\250\041\311 \306\261\355\313\303\225\140\321\017\360\253\160\370\337\313\115 \176\354\326\372\253\331\275\177\124\362\245\351\171\372\331\326 \166\044\050\163\002\003\001\000\001\243\077\060\075\060\035\006 \003\125\035\016\004\026\004\024\240\163\111\231\150\334\205\133 \145\343\233\050\057\127\237\275\063\274\007\110\060\013\006\003 \125\035\017\004\004\003\002\001\006\060\017\006\003\125\035\023 \001\001\377\004\005\060\003\001\001\377\060\015\006\011\052\206  $\label{eq:condition} $$ \frac{110}{206}\frac{367}{015}\frac{001}{001}\frac{005}{005}\frac{000}{003}\frac{202}{001}\frac{001}{000}\frac{150}{100} $$$ \251\250\273\344\117\135\171\263\005\265\027\263\140\023\353\306 \222\135\340\321\323\152\376\373\276\233\155\277\307\005\155\131 \040\304\034\360\267\332\204\130\002\143\372\110\026\357\117\245 \013\367\112\230\362\077\236\033\255\107\153\143\316\010\107\353 \122\077\170\234\257\115\256\370\325\117\317\232\230\052\020\101 \071\122\304\335\331\233\016\357\223\001\256\262\056\312\150\102  $\\ \\ 044\\102\\154\\260\\263\\072\\076\\315\\351\\332\\110\\304\\025\\313\\351\\371$  $\label{eq:condition} $$ \007\017\222\120\111\212\335\061\227\137\311\351\067\252\073\131 $$$ \145\227\224\062\311\263\237\076\072\142\130\305\111\255\142\016 \161\245\062\252\057\306\211\166\103\100\023\023\147\075\242\124 \045\020\313\361\072\362\331\372\333\111\126\273\246\376\247\101 \065\303\340\210\141\311\210\307\337\066\020\042\230\131\352\260 \112\373\126\026\163\156\254\115\367\042\241\117\255\035\172\055 \105\047\345\060\301\136\362\332\023\313\045\102\121\225\107\003 \214\154\041\314\164\102\355\123\377\063\213\217\017\127\001\026 \057\317\246\356\311\160\042\024\275\375\276\154\013\003 **END** 

```
CKA_NSS_MOZILLA_CA_POLICY CK_BBOOL CK_TRUE
CKA_NSS_SERVER_DISTRUST_AFTER CK_BBOOL CK_FALSE
CKA_NSS_EMAIL_DISTRUST_AFTER CK_BBOOL CK_FALSE
# Trust for "Security Communication Root CA"
# Issuer: OU=Security Communication RootCA1,O=SECOM Trust.net,C=JP
# Serial Number: 0 (0x0)
# Subject: OU=Security Communication RootCA1,O=SECOM Trust.net,C=JP
# Not Valid Before: Tue Sep 30 04:20:49 2003
# Not Valid After: Sat Sep 30 04:20:49 2023
# Fingerprint (SHA-256):
E7:5E:72:ED:9F:56:0E:EC:6E:B4:80:00:73:A4:3F:C3:AD:19:19:5A:39:22:82:01:78:95:97:4A:99:02:6B:6C
# Fingerprint (SHA1): 36:B1:2B:49:F9:81:9E:D7:4C:9E:BC:38:0F:C6:56:8F:5D:AC:B2:F7
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "Security Communication Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\label{eq:condition} $$ \066\261\053\111\371\201\236\327\114\236\274\070\017\306\126\217 $$
\135\254\262\367
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\361\274\143\152\124\340\265\047\365\315\347\032\343\115\156\112
END
CKA ISSUER MULTILINE OCTAL
\060\120\061\013\060\011\006\003\125\004\006\023\002\112\120\061
\124\162\165\163\164\056\156\145\164\061\047\060\045\006\003\125
\004\013\023\036\123\145\143\165\162\151\164\171\040\103\157\155
\155\165\156\151\143\141\164\151\157\156\040\122\157\157\164\103
\101\061
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\001\000
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Camerfirma Chambers of Commerce Root"
```

# Issuer: CN=Chambers of Commerce Root,OU=http://www.chambersign.org,O=AC Camerfirma SA CIF A82743287,C=EU

# Serial Number: 0 (0x0)

# Subject: CN=Chambers of Commerce Root, OU=http://www.chambersign.org, O=AC Camerfirma SA CIF

A82743287,C=EU

# Not Valid Before: Tue Sep 30 16:13:43 2003

# Not Valid After: Wed Sep 30 16:13:44 2037

# Fingerprint (SHA-256):

0C:25:8A:12:A5:67:4A:EF:25:F2:8B:A7:DC:FA:EC:EE:A3:48:E5:41:E6:F5:CC:4E:E6:3B:71:B3:61:60:6A:C3

# Fingerprint (SHA1): 6E:3A:55:A4:19:0C:19:5C:93:84:3C:C0:DB:72:2E:31:30:61:F0:B1

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "Camerfirma Chambers of Commerce Root"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \000\17006\003\125\004\006\023\002\105\125\061 $$ \047\060\045\006\003\125\004\012\023\036\101\103\040\103\141\155 $$ \145\162\146\151\162\155\141\040\123\101\040\103\111\106\040\101 $$ \070\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004 $$ \013\023\032\150\164\164\160\072\057\167\167\167\167\056\143\150 $$ \141\155\142\145\162\163\151\147\156\056\157\162\147\061\042\060 $$ \040\006\003\125\004\003\023\031\103\150\141\155\142\145\162\163 $$ \040\157\146\040\103\157\155\145\162\143\145\040\122\157\157 $$$ 

\164

**END** 

CKA ID UTF8 "0"

### CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:control} $$ \000\17\061\013\060\011\006\003\125\004\006\023\002\105\125\061 $$ \047\060\045\006\003\125\004\012\023\036\101\103\040\103\141\155 $$ \145\162\146\151\162\155\141\040\123\101\040\103\111\106\040\101 $$ \070\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004 $$ \013\023\032\150\164\164\166\072\057\057\167\167\167\167\056\143\150 $$ \141\155\142\145\162\163\151\147\156\056\157\162\147\061\042\060 $$ \040\006\003\125\004\003\023\031\103\150\141\155\142\145\162\157\155 $$ \145\162\143\145\040\122\157\155 $$ \164$$$$ 

**END** 

CKA SERIAL NUMBER MULTILINE OCTAL

\002\001\000

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\200\4\275\060\202\003\245\240\003\002\001\0002\0001\0000\\ \000\015\006\011\005\2\206\110\206\367\015\001\001\005\0005\0000\060\\ \177\061\013\060\011\006\003\125\004\006\023\002\105\125\061\047\\ \060\045\006\003\125\004\012\023\036\101\103\040\103\141\155\145\\ \162\146\151\162\155\141\040\123\101\040\103\111\106\040\101\070\\ \062\067\064\063\062\070\067\061\043\060\041\006\003\125\004\013\\ \023\032\150\164\164\166\072\057\057\167\167\167\167\056\143\150\141\\ \155\142\145\162\163\032\031\103\150\141\155\142\145\162\163\040\\ \006\003\125\004\003\023\031\103\150\141\155\142\145\162\163\040\\ \end{tabular}$ 

\157\146\040\103\157\155\155\145\162\143\145\040\122\157\157\164 \060\036\027\015\060\063\060\071\063\060\061\066\061\063\064\063 \132\027\015\063\067\060\071\063\060\061\066\061\063\064\064\132 \060\177\061\013\060\011\006\003\125\004\006\023\002\105\125\061 \047\060\045\006\003\125\004\012\023\036\101\103\040\103\141\155 \145\162\146\151\162\155\141\040\123\101\040\103\111\106\040\101 \070\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004 \013\023\032\150\164\164\160\072\057\057\167\167\167\056\143\150 \141\155\142\145\162\163\151\147\156\056\157\162\147\061\042\060 \040\006\003\125\004\003\023\031\103\150\141\155\142\145\162\163 \040\157\146\040\103\157\155\155\145\162\143\145\040\122\157\157  $\label{eq:condition} $$ 164\060\202\001\040\060\015\006\011\052\206\110\206\367\015\001$ \001\001\005\000\003\202\001\015\000\060\202\001\010\002\202\001 \001\000\267\066\125\345\245\135\030\060\340\332\211\124\221\374 \310\307\122\370\057\120\331\357\261\165\163\145\107\175\033\133 \272\165\305\374\241\210\044\372\057\355\312\010\112\071\124\304 \121\172\265\332\140\352\070\074\201\262\313\361\273\331\221\043 \077\110\001\160\165\251\005\052\255\037\161\363\311\124\075\035 \006\152\100\076\263\014\205\356\134\033\171\302\142\304\270\066 \216\065\135\001\014\043\004\107\065\252\233\140\116\240\146\075 \313\046\012\234\100\241\364\135\230\277\161\253\245\000\150\052 \355\203\172\017\242\024\265\324\042\263\200\260\074\014\132\121  $\label{eq:condition} $$ \frac{151}055\frac{30}{230}\frac{361}{256}\frac{342}{225}\frac{346}{366}\frac{107}{250} $$$ \326\014\017\260\130\130\333\303\146\067\236\233\221\124\063\067 \322\224\034\152\110\311\311\362\245\332\245\014\043\367\043\016 \234\062\125\136\161\234\204\005\121\232\055\375\346\116\052\064 \132\336\312\100\067\147\014\124\041\125\167\332\012\014\314\227 \256\200\334\224\066\112\364\076\316\066\023\036\123\344\254\116 \072\005\354\333\256\162\234\070\213\320\071\073\211\012\076\167 \376\165\002\001\003\243\202\001\104\060\202\001\100\060\022\006  $\label{eq:condition} $$ \03125\035\023\001\001\377\004\010\060\006\001\001\377\002\001 $$$ \014\060\074\006\003\125\035\037\004\065\060\063\060\061\240\057 \240\055\206\053\150\164\164\160\072\057\057\143\162\154\056\143 \150\141\155\142\145\162\163\151\147\156\056\157\162\147\057\143 \150\141\155\142\145\162\163\162\157\157\164\056\143\162\154\060 \035\006\003\125\035\016\004\026\004\024\343\224\365\261\115\351 \333\241\051\133\127\213\115\166\006\166\341\321\242\212\060\016  $\label{eq:condition} $$ \006\003\125\035\017\001\001\377\004\004\003\002\001\006\060\021 $$$  $\label{eq:condition} $$ \006\011\140\206\110\001\206\370\102\001\001\004\004\003\002\000 $$$  $\label{eq:condition} $$ \007\060\047\006\003\125\035\021\004\040\060\036\201\034\143\150 $$$ \141\155\142\145\162\163\162\157\157\164\100\143\150\141\155\142 \145\162\163\151\147\156\056\157\162\147\060\047\006\003\125\035 \022\004\040\060\036\201\034\143\150\141\155\142\145\162\163\162 \157\157\164\100\143\150\141\155\142\145\162\163\151\147\156\056 \157\162\147\060\130\006\003\125\035\040\004\121\060\117\060\115 \006\013\053\006\001\004\001\201\207\056\012\003\001\060\076\060 \074\006\010\053\006\001\005\005\007\002\001\026\060\150\164\164 \160\072\057\057\143\160\163\056\143\150\141\155\142\145\162\163

\151\147\156\056\157\162\147\057\143\160\163\057\143\150\141\155 \142\145\162\163\162\157\157\164\056\150\164\155\154\060\015\006 \011\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001  $\label{eq:condition} $$ \000\014\101\227\302\032\206\300\042\174\237\373\220\363\032\321 $$$  $\label{eq:condition} $$ \003\261\357\023\371\041\137\004\234\332\311\245\215\047\154\226 $$$ \207\221\276\101\220\001\162\223\347\036\175\137\366\211\306\135 \247\100\011\075\254\111\105\105\334\056\215\060\150\262\011\272 \373\303\057\314\272\013\337\077\167\173\106\175\072\022\044\216 \226\217\074\005\012\157\322\224\050\035\155\014\300\056\210\042 \325\330\317\035\023\307\360\110\327\327\005\247\317\307\107\236 \073\074\064\310\200\117\324\024\273\374\015\120\367\372\263\354  $\label{eq:condition} $$ 102\137\251\335\155\310\364\165\317\173\301\162\046\261\001\034$ \134\054\375\172\116\264\001\305\005\127\271\347\074\252\005\331 \210\351\007\106\101\316\357\101\201\256\130\337\203\242\256\312 \327\167\037\347\000\074\235\157\216\344\062\011\035\115\170\064 \170\064\074\224\233\046\355\117\161\306\031\172\275\040\042\110 \132\376\113\175\003\267\347\130\276\306\062\116\164\036\150\335 \250\150\133\263\076\356\142\175\331\200\350\012\165\172\267\356 \264\145\232\041\220\340\252\320\230\274\070\265\163\074\213\370 \334

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE

CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# For Email Distrust After: Mon Mar 01 00:00:00 2021

CKA\_NSS\_EMAIL\_DISTRUST\_AFTER MULTILINE\_OCTAL

\062\061\060\063\060\061\060\060\060\060\060\060\132

**END** 

# Trust for "Camerfirma Chambers of Commerce Root"

# Issuer: CN=Chambers of Commerce Root,OU=http://www.chambersign.org,O=AC Camerfirma SA CIF A82743287,C=EU

# Serial Number: 0 (0x0)

# Subject: CN=Chambers of Commerce Root,OU=http://www.chambersign.org,O=AC Camerfirma SA CIF A82743287,C=EU

# Not Valid Before: Tue Sep 30 16:13:43 2003

# Not Valid After: Wed Sep 30 16:13:44 2037

# Fingerprint (SHA-256):

0C:25:8A:12:A5:67:4A:EF:25:F2:8B:A7:DC:FA:EC:EE:A3:48:E5:41:E6:F5:CC:4E:E6:3B:71:B3:61:60:6A:C3

# Fingerprint (SHA1): 6E:3A:55:A4:19:0C:19:5C:93:84:3C:C0:DB:72:2E:31:30:61:F0:B1

 ${\tt CKA\_CLASS\ CK\_OBJECT\_CLASS\ CKO\_NSS\_TRUST}$ 

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Camerfirma Chambers of Commerce Root"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\156\072\125\244\031\014\031\134\223\204\074\300\333\162\056\061

\060\141\360\261

**END** 

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\260\001\356\024\331\257\051\030\224\166\216\361\151\063\052\204
END
CKA ISSUER MULTILINE OCTAL
\060\177\061\013\060\011\006\003\125\004\006\023\002\105\125\061
\047\060\045\006\003\125\004\012\023\036\101\103\040\103\141\155
\145\162\146\151\162\155\141\040\123\101\040\103\111\106\040\101
\label{eq:condition} $$ \070\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004
\013\023\032\150\164\164\160\072\057\057\167\167\167\167\056\143\150
\141\155\142\145\162\163\151\147\156\056\157\162\147\061\042\060
\\ \\ 040\\ \\ 003\\ \\ 125\\ \\ 004\\ \\ 003\\ \\ 023\\ \\ 031\\ \\ 103\\ \\ 150\\ \\ 141\\ \\ 155\\ \\ 142\\ \\ 145\\ \\ 162\\ \\ 163
\\ \langle 040 \rangle 157 \rangle 146 \langle 040 \rangle 103 \rangle 157 \rangle 155 \rangle 145 \rangle 162 \rangle 143 \rangle 145 \rangle 040 \rangle 122 \rangle 157 \rangle 
\164
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\000
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "Camerfirma Global Chambersign Root"
# Issuer: CN=Global Chambersign Root,OU=http://www.chambersign.org,O=AC Camerfirma SA CIF
A82743287,C=EU
# Serial Number: 0 (0x0)
# Subject: CN=Global Chambersign Root,OU=http://www.chambersign.org,O=AC Camerfirma SA CIF
A82743287,C=EU
# Not Valid Before: Tue Sep 30 16:14:18 2003
# Not Valid After: Wed Sep 30 16:14:18 2037
# Fingerprint (SHA-256):
EF:3C:B4:17:FC:8E:BF:6F:97:87:6C:9E:4E:CE:39:DE:1E:A5:FE:64:91:41:D1:02:8B:7D:11:C0:B2:29:8C:ED
# Fingerprint (SHA1): 33:9B:6B:14:50:24:9B:55:7A:01:87:72:84:D9:E0:2F:C3:D2:D8:E9
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Camerfirma Global Chambersign Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\175\061\013\060\011\006\003\125\004\006\023\002\105\125\061
\047\060\045\006\003\125\004\012\023\036\101\103\040\103\141\155
\145\162\146\151\162\155\141\040\123\101\040\103\111\106\040\101
\070\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004
\label{eq:condition} $$ \032\032\150\164\164\160\072\057\057\167\167\167\056\143\150 $$
\141\155\142\145\162\163\151\147\156\056\157\162\147\061\040\060
```

\036\006\003\125\004\003\023\027\107\154\157\142\141\154\040\103 \150\141\155\142\145\162\163\151\147\156\040\122\157\157\164 END

CKA ID UTF8 "0"

## CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\175\061\013\060\011\006\003\125\004\006\023\002\105\125\061\047\060\045\006\003\125\004\012\023\036\101\103\040\103\141\155\142\146\151\162\155\141\040\123\101\040\103\111\106\040\101\070\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004\003\125\004\164\164\160\072\057\057\167\167\167\167\056\143\150\141\155\142\145\162\163\151\147\156\056\157\142\141\154\040\103\150\141\155\142\145\162\163\151\147\156\040\122\157\157\164\ END$ 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL \002\001\000

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

\060\202\004\305\060\202\003\255\240\003\002\001\002\002\001\000  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\005\005\000\060 $$$ \175\061\013\060\011\006\003\125\004\006\023\002\105\125\061\047 \060\045\006\003\125\004\012\023\036\101\103\040\103\141\155\145  $\label{eq:condition} $$ 162\146\151\162\155\141\040\123\101\040\103\111\106\040\101\070$$ \062\067\064\063\062\070\067\061\043\060\041\006\003\125\004\013 \023\032\150\164\164\160\072\057\057\167\167\167\056\143\150\141 \155\142\145\162\163\151\147\156\056\157\162\147\061\040\060\036 \006\003\125\004\003\023\027\107\154\157\142\141\154\040\103\150 \141\155\142\145\162\163\151\147\156\040\122\157\157\164\060\036 \027\015\060\063\060\071\063\060\061\066\061\064\061\070\132\027 \015\063\067\060\071\063\060\061\066\061\064\061\070\132\060\175 \045\006\003\125\004\012\023\036\101\103\040\103\141\155\145\162 \146\151\162\155\141\040\123\101\040\103\111\106\040\101\070\062 \067\064\063\062\070\067\061\043\060\041\006\003\125\004\013\023 \032\150\164\164\160\072\057\057\167\167\167\056\143\150\141\155 \142\145\162\163\151\147\156\056\157\162\147\061\040\060\036\006 \003\125\004\003\023\027\107\154\157\142\141\154\040\103\150\141 \155\142\145\162\163\151\147\156\040\122\157\157\164\060\202\001  $\\ \langle 040 \rangle 060 \rangle 015 \rangle 006 \rangle 011 \rangle 052 \rangle 206 \rangle 110 \rangle 206 \rangle 367 \rangle 015 \rangle 001 \rangle 001 \rangle 005 \rangle 000$  $\label{eq:condition} $$ \003\202\001\015\000\060\202\001\010\002\202\001\001\000\242\160 $$$ \242\320\237\102\256\133\027\307\330\175\317\024\203\374\117\311  $\verb|241|267|023|257|212|327|236|076|004|012|222|213|140|126|372|264|$ \062\057\210\115\241\140\010\364\267\011\116\240\111\057\111\326 \323\337\235\227\132\237\224\004\160\354\077\131\331\267\314\146 \213\230\122\050\011\002\337\305\057\204\215\172\227\167\277\354 \100\235\045\162\253\265\077\062\230\373\267\267\374\162\204\345 \065\207\371\125\372\243\037\016\157\056\050\335\151\240\331\102 \020\306\370\265\104\302\320\103\177\333\274\344\242\074\152\125

\170\012\167\251\330\352\031\062\267\057\376\134\077\033\356\261 \230\354\312\255\172\151\105\343\226\017\125\366\346\355\165\352 \145\350\062\126\223\106\211\250\045\212\145\006\356\153\277\171 \007\320\361\267\257\355\054\115\222\273\300\250\137\247\147\175 \004\362\025\010\160\254\222\326\175\004\322\063\373\114\266\013  $\label{eq:condition} $$ \013\373\032\311\304\215\003\251\176\134\362\120\253\022\245\241 $$$ \317\110\120\245\357\322\310\032\023\372\260\177\261\202\034\167 \152\017\137\334\013\225\217\357\103\176\346\105\011\045\002\001 \003\243\202\001\120\060\202\001\114\060\022\006\003\125\035\023 \001\001\377\004\010\060\006\001\001\377\002\001\014\060\077\006 \003\125\035\037\004\070\060\066\060\064\240\062\240\060\206\056  $\label{eq:condition} $$ \frac{150}{164}\frac{164}{160}\frac{072}{057}\frac{143}{162}\frac{154}{056}\frac{143}{150}\frac{141}{155}\frac{142}{162} $$$ \145\162\163\151\147\156\056\157\162\147\057\143\150\141\155\142 \145\162\163\151\147\156\162\157\157\164\056\143\162\154\060\035  $\label{eq:condition} $$ \006\003\125\035\016\004\026\004\024\103\234\066\237\260\236\060 $$$ \115\306\316\137\255\020\253\345\003\245\372\251\024\060\016\006 \011\140\206\110\001\206\370\102\001\001\004\004\003\002\000\007 \060\052\006\003\125\035\021\004\043\060\041\201\037\143\150\141  $\label{eq:locality} $$ \frac{155}{142}\frac{163}{151}\frac{147}{156}\frac{162}{157}\frac{157}{164}\frac{100}{143}\frac{150}{141}$$$ \155\142\145\162\163\151\147\156\056\157\162\147\060\052\006\003 \125\035\022\004\043\060\041\201\037\143\150\141\155\142\145\162  $\label{eq:local_$ \163\151\147\156\056\157\162\147\060\133\006\003\125\035\040\004 \124\060\122\060\120\006\013\053\006\001\004\001\201\207\056\012 \001\001\060\101\060\077\006\010\053\006\001\005\005\007\002\001 \026\063\150\164\164\160\072\057\057\143\160\163\056\143\150\141 \155\142\145\162\163\151\147\156\056\157\162\147\057\143\160\163 \057\143\150\141\155\142\145\162\163\151\147\156\162\157\157\164 \056\150\164\155\154\060\015\006\011\052\206\110\206\367\015\001 \047\221\341\355\355\376\150\177\141\135\345\101\145\117\062\361 \030\005\224\152\034\336\037\160\333\076\173\062\002\064\265\014 \154\241\212\174\245\364\217\377\324\330\255\027\325\055\004\321 \077\130\200\342\201\131\210\276\300\343\106\223\044\376\220\275 \046\242\060\055\350\227\046\127\065\211\164\226\030\366\025\342 \257\044\031\126\002\002\262\272\017\024\352\306\212\146\301\206  $\label{eq:condition} $$ 105\125\213\276\222\276\234\244\004\307\111\074\236\350\051\172$ \211\327\376\257\377\150\365\245\027\220\275\254\231\314\245\206  $\label{eq:condition} $$ \frac{127}{011}147}106\\333\\326\\026\\302\\106\\361\\344\\251\\120\\365\\217\\321$ \222\025\323\137\076\306\000\111\072\156\130\262\321\321\047\015 \045\310\062\370\040\021\315\175\062\063\110\224\124\114\335\334 \171\304\060\237\353\216\270\125\265\327\210\134\305\152\044\075 \262\323\005\003\121\306\007\357\314\024\162\164\075\156\162\316  $\label{eq:condition} $$ \030\050\214\112\240\167\345\011\053\105\104\107\254\267\147\177$ \001\212\005\132\223\276\241\301\377\370\347\016\147\244\107\111 \166\135\165\220\032\365\046\217\360

**END** 

CKA NSS MOZILLA CA POLICY CK BBOOL CK TRUE

CKA NSS SERVER DISTRUST AFTER CK BBOOL CK FALSE

# For Email Distrust After: Mon Mar 01 00:00:00 2021

 $CKA\_NSS\_EMAIL\_DISTRUST\_AFTER\ MULTILINE\_OCTAL$ 

\062\061\060\063\060\061\060\060\060\060\060\060\132

**END** 

# Trust for "Camerfirma Global Chambersign Root"

# Issuer: CN=Global Chambersign Root,OU=http://www.chambersign.org,O=AC Camerfirma SA CIF

A82743287,C=EU

# Serial Number: 0 (0x0)

# Subject: CN=Global Chambersign Root,OU=http://www.chambersign.org,O=AC Camerfirma SA CIF

A82743287.C=EU

# Not Valid Before: Tue Sep 30 16:14:18 2003

# Not Valid After: Wed Sep 30 16:14:18 2037

# Fingerprint (SHA-256):

EF:3C:B4:17:FC:8E:BF:6F:97:87:6C:9E:4E:CE:39:DE:1E:A5:FE:64:91:41:D1:02:8B:7D:11:C0:B2:29:8C:ED

# Fingerprint (SHA1): 33:9B:6B:14:50:24:9B:55:7A:01:87:72:84:D9:E0:2F:C3:D2:D8:E9

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Camerfirma Global Chambersign Root"

CKA CERT SHA1 HASH MULTILINE OCTAL

 $\\ \ \langle 063 \rangle 233 \rangle 153 \rangle 024 \rangle 120 \rangle 044 \rangle 233 \rangle 125 \rangle 172 \rangle 001 \rangle 207 \rangle 162 \rangle 204 \rangle 331 \rangle 340 \rangle 057 \rangle 162 \rangle 162$ 

\303\322\330\351

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\305\346\173\277\006\320\117\103\355\304\172\145\212\373\153\031

END

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\175\061\013\060\011\006\003\125\004\006\023\002\105\125\061 $$$ 

 $\\ \\ 047 \\ 060 \\ 045 \\ 006 \\ 003 \\ 125 \\ 004 \\ 012 \\ 023 \\ 036 \\ 101 \\ 103 \\ 040 \\ 103 \\ 141 \\ 155 \\$ 

\145\162\146\151\162\155\141\040\123\101\040\103\111\106\040\101

 $\label{eq:condition} $$ \070\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004 $$$ 

 $\label{eq:condition} $$ \032\032\150\164\164\160\072\057\057\167\167\167\056\143\150$$ 

\141\155\142\145\162\163\151\147\156\056\157\162\147\061\040\060

 $\\ \begin{tabular}{l} $$ \006\003\125\004\003\023\027\107\154\157\142\141\154\040\103 \\ \end{tabular}$ 

 $\label{eq:local_state} $$ \frac{150}{141}\frac{155}{142}\frac{162}{163}\frac{151}{147}\frac{156}{040}\frac{122}{157}\frac{164}{164}$$$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\verb|002|001|000|$ 

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

```
#
```

# Certificate "XRamp Global CA Root"

#

# Issuer: CN=XRamp Global Certification Authority,O=XRamp Security Services

Inc,OU=www.xrampsecurity.com,C=US

# Serial Number:50:94:6c:ec:18:ea:d5:9c:4d:d5:97:ef:75:8f:a0:ad

# Subject: CN=XRamp Global Certification Authority,O=XRamp Security Services

Inc,OU=www.xrampsecurity.com,C=US

# Not Valid Before: Mon Nov 01 17:14:04 2004

# Not Valid After: Mon Jan 01 05:37:19 2035

# Fingerprint (SHA-256):

CE:CD:DC:90:50:99:D8:DA:DF:C5:B1:D2:09:B7:37:CB:E2:C1:8C:FB:2C:10:C0:FF:0B:CF:0D:32:86:FC:1A:A2

# Fingerprint (SHA1): B8:01:86:D1:EB:9C:86:A5:41:04:CF:30:54:F3:4C:52:B7:E5:58:C6

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "XRamp Global CA Root"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA\_SUBJECT MULTILINE\_OCTAL

\060\201\202\061\013\060\011\006\003\125\004\006\023\002\125\123

 $\label{eq:condition} $$ \061\036\060\034\006\003\125\004\013\023\025\167\167\167\056\170 $$$ 

 $\label{eq:local_$ 

\061\044\060\042\006\003\125\004\012\023\033\130\122\141\155\160

 $\\ \\ 040\\ \\ 123\\ 145\\ 143\\ 165\\ 162\\ 151\\ 164\\ 171\\ 040\\ 123\\ 145\\ 162\\ 166\\ 151\\ 143$ 

\145\163\040\111\156\143\061\055\060\053\006\003\125\004\003\023

\044\130\122\141\155\160\040\107\154\157\142\141\154\040\103\145

\157\162\151\164\171

**END** 

CKA\_ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\201\202\061\013\060\011\006\003\125\0004\006\023\002\125\123$ 

\162\141\155\160\163\145\143\165\162\151\164\171\056\143\157\155

\061\044\060\042\006\003\125\004\012\023\033\130\122\141\155\160

 $\\ \\ 040\\ \\ 123\\ 145\\ 143\\ 165\\ 162\\ 151\\ 164\\ 171\\ 040\\ 123\\ 145\\ 162\\ 166\\ 151\\ 143$ 

\145\163\040\111\156\143\061\055\060\053\006\003\125\004\003\023

 $\\ \\ 044\\130\\122\\141\\155\\160\\040\\107\\154\\157\\142\\141\\154\\040\\103\\145$ 

\157\162\151\164\171

**END** 

#### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\120\224\154\354\030\352\325\234\115\325\227\357\165\217 \240\255

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \0.060\202\003\030\240\003\002\001\002\002\020\120 $$$ 

\224\154\354\030\352\325\234\115\325\227\357\165\217\240\255\060 \015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\201 \202\061\013\060\011\006\003\125\004\006\023\002\125\123\061\036 \060\034\006\003\125\004\013\023\025\167\167\167\056\170\162\141 \155\160\163\145\143\165\162\151\164\171\056\143\157\155\061\044 \060\042\006\003\125\004\012\023\033\130\122\141\155\160\040\123 \145\143\165\162\151\164\171\040\123\145\162\166\151\143\145\163 \040\111\156\143\061\055\060\053\006\003\125\004\003\023\044\130 \151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162 \151\164\171\060\036\027\015\060\064\061\061\060\061\061\067\061  $\\ \begin{tabular}{l} $064 \ 060 \ 064 \ 132 \ 027 \ 015 \ 063 \ 065 \ 060 \ 061 \ 060 \ 061 \ 060 \ 065 \ 063 \ 067 \ 060 \ 061 \ 061 \$ \061\071\132\060\201\202\061\013\060\011\006\003\125\004\006\023 \002\125\123\061\036\060\034\006\003\125\004\013\023\025\167\167  $\label{eq:condition} $$ \frac{167}{056}\frac{170}{162}\frac{141}{155}\frac{160}{163}\frac{145}{143}\frac{165}{162}\frac{151}{164}\frac{171}{056} $$$ \143\157\155\061\044\060\042\006\003\125\004\012\023\033\130\122  $\\ 141\\155\\160\\040\\123\\145\\143\\165\\162\\151\\164\\171\\040\\123\\145\\162$ \166\151\143\145\163\040\111\156\143\061\055\060\053\006\003\125 \004\003\023\044\130\122\141\155\160\040\107\154\157\142\141\154  $\label{eq:condition} $$ 040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101$ \165\164\150\157\162\151\164\171\060\202\001\042\060\015\006\011 \052\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000  $\label{eq:condition} $$ \060\202\001\012\002\202\001\001\000\230\044\036\275\025\264\272$ \337\307\214\245\047\266\070\013\151\363\266\116\250\054\056\041 \035\134\104\337\041\135\176\043\164\376\136\176\264\112\267\246 \255\037\256\340\006\026\342\233\133\331\147\164\153\135\200\217 \051\235\206\033\331\234\015\230\155\166\020\050\130\344\145\260 \177\112\230\171\237\340\303\061\176\200\053\265\214\300\100\073 \021\206\320\313\242\206\066\140\244\325\060\202\155\331\156\320 \017\022\004\063\227\137\117\141\132\360\344\371\221\253\347\035  $\label{eq:condition} $$ \073\274\350\317\364\153\055\064\174\342\110\141\034\216\363\141 $$$ \104\314\157\240\112\251\224\260\115\332\347\251\064\172\162\070 \250\101\314\074\224\021\175\353\310\246\214\267\206\313\312\063 \073\331\075\067\213\373\172\076\206\054\347\163\327\012\127\254 \144\233\031\353\364\017\004\010\212\254\003\027\031\144\364\132 \045\042\215\064\054\262\366\150\035\022\155\323\212\036\024\332 \304\217\246\342\043\205\325\172\015\275\152\340\351\354\354\027 \273\102\033\147\252\045\355\105\203\041\374\301\311\174\325\142  $\label{eq:condition} $$ \076\372\362\305\055\323\375\324\145\002\003\001\000\001\243\201 $$$ \237\060\201\234\060\023\006\011\053\006\001\004\001\202\067\024 \002\004\006\036\004\000\103\000\101\060\013\006\003\125\035\017 \004\004\003\002\001\206\060\017\006\003\125\035\023\001\001\377 \004\005\060\003\001\001\377\060\035\006\003\125\035\016\004\026 \004\024\306\117\242\075\006\143\204\011\234\316\142\344\004\254 \215\134\265\351\266\033\060\066\006\003\125\035\037\004\057\060 \055\060\053\240\051\240\047\206\045\150\164\164\160\072\057\057 \143\162\154\056\170\162\141\155\160\163\145\143\165\162\151\164 \171\056\143\157\155\057\130\107\103\101\056\143\162\154\060\020

\006\011\053\006\001\004\001\202\067\025\001\004\003\002\001\001 \060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003  $\label{eq:condition} $$ \202\001\001\000\221\025\071\003\001\033\147\373\112\034\371\012$  $\\ 140\\133\\241\\332\\115\\227\\142\\371\\044\\123\\047\\327\\202\\144\\116\\220$  $\label{eq:condition} $$ \056\303\111\033\053\232\334\374\250\170\147\065\361\035\360\021 $$$ \275\267\110\343\020\366\015\337\077\322\311\266\252\125\244\110 \272\002\333\336\131\056\025\133\073\235\026\175\107\327\067\352  $\label{eq:condition} $$ \frac{137}{115}\frac{6}{022}\frac{273}{037}\frac{241}{201}\frac{106}{040}\frac{243}{054}\frac{155}{155} $$$ \251\236\001\176\077\051\316\000\223\337\375\311\222\163\211\211 \144\236\347\053\344\034\221\054\322\271\316\175\316\157\061\231 \323\346\276\322\036\220\360\011\024\171\134\043\253\115\322\332  $\\ \\ 041\\ 037\\ 115\\ 231\\ 171\\ 235\\ 341\\ 317\\ 047\\ 237\\ 020\\ 233\\ 034\\ 210\\ 015\\ 260$ \212\144\101\061\270\016\154\220\044\244\233\134\161\217\272\273 \176\034\033\333\152\200\017\041\274\351\333\246\267\100\364\262 \213\251\261\344\357\232\032\320\075\151\231\356\250\050\243\341 \074\263\360\262\021\234\317\174\100\346\335\347\103\175\242\330 \072\265\251\215\362\064\231\304\324\020\341\006\375\011\204\020 \073\356\304\114\364\354\047\174\102\302\164\174\202\212\011\311 \264\003\045\274

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "XRamp Global CA Root"

# Issuer: CN=XRamp Global Certification Authority,O=XRamp Security Services

Inc,OU=www.xrampsecurity.com,C=US

# Serial Number:50:94:6c:ec:18:ea:d5:9c:4d:d5:97:ef:75:8f:a0:ad

# Subject: CN=XRamp Global Certification Authority,O=XRamp Security Services

Inc,OU=www.xrampsecurity.com,C=US

# Not Valid Before: Mon Nov 01 17:14:04 2004

# Not Valid After: Mon Jan 01 05:37:19 2035

# Fingerprint (SHA-256):

CE:CD:DC:90:50:99:D8:DA:DF:C5:B1:D2:09:B7:37:CB:E2:C1:8C:FB:2C:10:C0:FF:0B:CF:0D:32:86:FC:1A:A2

# Fingerprint (SHA1): B8:01:86:D1:EB:9C:86:A5:41:04:CF:30:54:F3:4C:52:B7:E5:58:C6

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "XRamp Global CA Root"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \270\001\206\321\353\234\206\245\101\004\317\060\124\363\114\122 $$$ 

\267\345\130\306

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\241\013\104\263\312\020\330\000\156\235\017\330\017\222\012\321

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\201\202\061\013\060\011\006\003\125\004\006\023\002\125\123 \061\036\060\034\006\003\125\004\013\023\025\167\167\167\056\170 \162\141\155\160\163\145\143\165\162\151\164\171\056\143\157\155  $\label{eq:condition} $$ \004\004\004\004\003\125\004\012\023\033\130\122\141\155\160 $$$  $\\ \\ 040\\ \\ 123\\ 145\\ 143\\ 165\\ 162\\ 151\\ 164\\ 171\\ 040\\ 123\\ 145\\ 162\\ 166\\ 151\\ 143$ \145\163\040\111\156\143\061\055\060\053\006\003\125\004\003\023 \044\130\122\141\155\160\040\107\154\157\142\141\154\040\103\145 \157\162\151\164\171 **END** CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL  $\label{eq:condition} $$ \002\020\120\224\154\354\030\352\325\234\115\325\227\357\165\217 $$$ \240\255 **END** CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE # Certificate "Go Daddy Class 2 CA" # Issuer: OU=Go Daddy Class 2 Certification Authority,O="The Go Daddy Group, Inc.",C=US # Serial Number: 0 (0x0) # Subject: OU=Go Daddy Class 2 Certification Authority,O="The Go Daddy Group, Inc.",C=US # Not Valid Before: Tue Jun 29 17:06:20 2004 # Not Valid After: Thu Jun 29 17:06:20 2034 # Fingerprint (SHA-256): C3:84:6B:F2:4B:9E:93:CA:64:27:4C:0E:C6:7C:1E:CC:5E:02:4F:FC:AC:D2:D7:40:19:35:0E:81:FE:54:6A:E4 # Fingerprint (SHA1): 27:96:BA:E6:3F:18:01:E2:77:26:1B:A0:D7:77:70:02:8F:20:EE:E4 CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE CKA\_TOKEN CK\_BBOOL CK\_TRUE CKA\_PRIVATE CK\_BBOOL CK\_FALSE CKA MODIFIABLE CK BBOOL CK FALSE CKA\_LABEL UTF8 "Go Daddy Class 2 CA" CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA SUBJECT MULTILINE OCTAL \060\143\061\013\060\011\006\003\125\004\006\023\002\125\123\061  $\\ \\ \langle 041 \rangle 060 \rangle 037 \rangle 006 \rangle 003 \rangle 125 \rangle 004 \rangle 012 \rangle 023 \rangle 030 \rangle 124 \rangle 150 \rangle 145 \rangle 040 \rangle 107 \rangle 157 \rangle 126 \rangle 127 \rangle 127$ \040\104\141\144\144\171\040\107\162\157\165\160\054\040\111\156 \143\056\061\061\060\057\006\003\125\004\013\023\050\107\157\040 \162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150 \157\162\151\164\171 **END** CKA\_ID UTF8 "0" CKA\_ISSUER MULTILINE\_OCTAL \060\143\061\013\060\011\006\003\125\004\006\023\002\125\123\061

 $\label{eq:control} $$ \041\060\037\006\003\125\004\012\023\030\124\150\145\040\107\157\040\104\141\144\144\171\040\107\162\157\165\160\054\040\111\156\143\056\061\061\060\057\006\003\125\004\013\023\050\107\157\040\104\141\144\144\171\040\103\154\141\163\163\040\062\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171$$ 

**END** 

 ${\tt CKA\_SERIAL\_NUMBER\ MULTILINE\_OCTAL}$ 

\002\001\000

**END** 

### CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \0.000\0.0$ \060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060 \143\061\013\060\011\006\003\125\004\006\023\002\125\123\061\041  $\label{eq:condition} $$ \000\03\125\004\012\023\030\124\150\145\040\107\157\040 $$$ \104\141\144\144\171\040\107\162\157\165\160\054\040\111\156\143  $\label{eq:condition} $$ \056\061\060\057\006\003\125\004\013\023\050\107\157\040\104$ \141\144\144\171\040\103\154\141\163\163\040\062\040\103\145\162 \164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157 \162\151\164\171\060\036\027\015\060\064\060\066\062\071\061\067 \060\066\062\060\132\027\015\063\064\060\066\062\071\061\067\060 \066\062\060\132\060\143\061\013\060\011\006\003\125\004\006\023  $\label{eq:condition} $$ \002\125\123\061\041\060\037\006\003\125\004\012\023\030\124\150 $$$ \145\040\107\157\040\104\141\144\144\171\040\107\162\157\165\160 \054\040\111\156\143\056\061\061\060\057\006\003\125\004\013\023 \050\107\157\040\104\141\144\144\171\040\103\154\141\163\163\040 \062\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040 \101\165\164\150\157\162\151\164\171\060\202\001\040\060\015\006 \011\052\206\110\206\367\015\001\001\001\005\000\003\202\001\015 \000\060\202\001\010\002\202\001\001\000\336\235\327\352\127\030  $\label{eq:condition} $$ \frac{111}241\frac{33}{353}\frac{327}{137}\frac{000}{352}\frac{35}{377}\frac{344}{357}\frac{147}{034} $$$ \364\145\150\263\127\161\240\136\167\273\355\233\111\351\160\200 \075\126\030\143\010\157\332\362\314\320\077\177\002\124\042\124 \020\330\262\201\324\300\165\075\113\177\307\167\303\076\170\253 \032\003\265\040\153\057\152\053\261\305\210\176\304\273\036\260 \301\330\105\047\157\252\067\130\367\207\046\327\330\055\366\251 \027\267\037\162\066\116\246\027\077\145\230\222\333\052\156\135 \242\376\210\340\013\336\177\345\215\025\341\353\313\072\325\342  $\label{eq:condition} $$ \022\242\023\055\330\216\257\137\022\075\240\010\005\010\266\134$$$ \245\145\070\004\105\231\036\243\140\140\164\305\101\245\162\142 \033\142\305\037\157\137\032\102\276\002\121\145\250\256\043\030 \152\374\170\003\251\115\177\200\303\372\253\132\374\241\100\244 \312\031\026\376\262\310\357\136\163\015\356\167\275\232\366\171 \230\274\261\007\147\242\025\015\335\240\130\306\104\173\012\076 \142\050\137\272\101\007\123\130\317\021\176\070\164\305\370\377 \265\151\220\217\204\164\352\227\033\257\002\001\003\243\201\300 \060\201\275\060\035\006\003\125\035\016\004\026\004\024\322\304 \260\322\221\324\114\021\161\263\141\313\075\241\376\335\250\152

\324\343\060\201\215\006\003\125\035\043\004\201\205\060\201\202 \200\024\322\304\260\322\221\324\114\021\161\263\141\313\075\241  $\label{eq:condition} $$ 376\335\250\152\324\343\241\147\244\145\060\143\061\013\060\011 $$$  $\label{eq:condition} $$ \006\003\125\004\006\023\002\125\123\061\041\060\037\006\003\125$ \004\012\023\030\124\150\145\040\107\157\040\104\141\144\144\171  $\\ \langle 040 \rangle 107 \rangle 162 \rangle 157 \rangle 165 \rangle 160 \rangle 054 \rangle 040 \rangle 111 \rangle 156 \rangle 143 \rangle 056 \rangle 061 \rangle 060 \rangle 057 \rangle 060 \rangle$ \006\003\125\004\013\023\050\107\157\040\104\141\144\144\171\040  $\\ 141\\164\\151\\157\\156\\040\\101\\165\\164\\150\\157\\162\\151\\164\\171\\202$ \001\000\060\014\006\003\125\035\023\004\005\060\003\001\001\377  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\005\005\000\003$ \202\001\001\000\062\113\363\262\312\076\221\374\022\306\241\007 \214\216\167\240\063\006\024\134\220\036\030\367\010\246\075\012  $\label{eq:condition} $$ \031\371\207\200\021\156\151\344\226\027\060\377\064\221\143\162 $$$ \070\356\314\034\001\243\035\224\050\244\061\366\172\304\124\327 \366\345\061\130\003\242\314\316\142\333\224\105\163\265\277\105 \311\044\265\325\202\002\255\043\171\151\215\270\266\115\316\317 \114\312\063\043\350\034\210\252\235\213\101\156\026\311\040\345 \211\236\315\073\332\160\367\176\231\046\040\024\124\045\253\156 \163\205\346\233\041\235\012\154\202\016\250\370\302\014\372\020 \036\154\226\357\207\015\304\017\141\213\255\356\203\053\225\370 \216\222\204\162\071\353\040\352\203\355\203\315\227\156\010\274 \164\112\377\127\032\207\017\165\110\056\317\121\151\027\240\002  $\label{eq:condition} $$ \022\141\225\325\321\100\262\020\114\356\304\254\020\103\246\245$ \236\012\325\225\142\232\015\317\210\202\305\062\014\344\053\237 \105\346\015\237\050\234\261\271\052\132\127\255\067\017\257\035 \177\333\275\237

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Go Daddy Class 2 CA"
```

C3:84:6B:F2:4B:9E:93:CA:64:27:4C:0E:C6:7C:1E:CC:5E:02:4F:FC:AC:D2:D7:40:19:35:0E:81:FE:54:6A:E4

# Fingerprint (SHA1): 27:96:BA:E6:3F:18:01:E2:77:26:1B:A0:D7:77:70:02:8F:20:EE:E4

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Go Daddy Class 2 CA"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

<sup>#</sup> Issuer: OU=Go Daddy Class 2 Certification Authority,O="The Go Daddy Group, Inc.",C=US

<sup>#</sup> Serial Number: 0 (0x0)

<sup>#</sup> Subject: OU=Go Daddy Class 2 Certification Authority,O="The Go Daddy Group, Inc.",C=US

<sup>#</sup> Not Valid Before: Tue Jun 29 17:06:20 2004

<sup>#</sup> Not Valid After: Thu Jun 29 17:06:20 2034

<sup>#</sup> Fingerprint (SHA-256):

```
\047\226\272\346\077\030\001\342\167\046\033\240\327\167\160\002
\217\040\356\344
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\221\336\006\045\253\332\375\062\027\014\273\045\027\052\204\147
END
CKA ISSUER MULTILINE OCTAL
\060\143\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\041\060\037\006\003\125\004\012\023\030\124\150\145\040\107\157
\040\104\141\144\144\171\040\107\162\157\165\160\054\040\111\156
\label{eq:condition} $$ 143\056\061\060\057\006\003\125\004\013\023\050\107\157\040 $$
\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150
\157\162\151\164\171
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\001\000
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Starfield Class 2 CA"
# Issuer: OU=Starfield Class 2 Certification Authority,O="Starfield Technologies, Inc.",C=US
# Serial Number: 0 (0x0)
# Subject: OU=Starfield Class 2 Certification Authority,O="Starfield Technologies, Inc.",C=US
# Not Valid Before: Tue Jun 29 17:39:16 2004
# Not Valid After: Thu Jun 29 17:39:16 2034
# Fingerprint (SHA-256):
14:65:FA:20:53:97:B8:76:FA:A6:F0:A9:95:8E:55:90:E4:0F:CC:7F:AA:4F:B7:C2:C8:67:75:21:FB:5F:B6:58
# Fingerprint (SHA1): AD:7E:1C:28:B0:64:EF:8F:60:03:40:20:14:C3:D0:E3:37:0E:B5:8A
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Starfield Class 2 CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\label{eq:condition} $$ \060\150\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$
\045\060\043\006\003\125\004\012\023\034\123\164\141\162\146\151
\145\154\144\040\124\145\143\150\156\157\154\157\147\151\145\163
\054\040\111\156\143\056\061\062\060\060\006\003\125\004\013\023
\051\123\164\141\162\146\151\145\154\144\040\103\154\141\163\163
\040\062\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171
```

**END** 

CKA ID UTF8 "0"

## CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000150\061\013\060\011\006\003\125\004\006\023\002\125\123\061\045\060\043\006\003\125\004\012\023\034\123\164\141\162\146\151\145\154\157\154\157\147\151\145\163\054\040\111\156\143\056\061\062\060\060\006\003\125\004\013\023\051\123\164\141\162\146\151\145\154\144\040\103\154\141\163\163\040\062\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\157\162\151\164\171$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\001\000

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\004\017\060\202\002\367\240\003\002\001\002\002\001\000  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\005\005\000\060 $$$ \150\061\013\060\011\006\003\125\004\006\023\002\125\123\061\045 \060\043\006\003\125\004\012\023\034\123\164\141\162\146\151\145  $\label{eq:condition} $$ \frac{154}144\\040\\124\\145\\143\\150\\156\\157\\154\\157\\147\\151\\145\\163\\054$ \040\111\156\143\056\061\062\060\060\006\003\125\004\013\023\051 \123\164\141\162\146\151\145\154\144\040\103\154\141\163\163\040  $\\ \backslash 062 \backslash 040 \backslash 103 \backslash 145 \backslash 162 \backslash 164 \backslash 151 \backslash 146 \backslash 151 \backslash 143 \backslash 141 \backslash 164 \backslash 151 \backslash 157 \backslash 156 \backslash 040$ \101\165\164\150\157\162\151\164\171\060\036\027\015\060\064\060 \066\062\071\061\067\063\071\061\066\132\027\015\063\064\060\066 \062\071\061\067\063\071\061\066\132\060\150\061\013\060\011\006 \003\125\004\006\023\002\125\123\061\045\060\043\006\003\125\004 \150\156\157\154\157\147\151\145\163\054\040\111\156\143\056\061 \062\060\060\006\003\125\004\013\023\051\123\164\141\162\146\151 \145\154\144\040\103\154\141\163\163\040\062\040\103\145\162\164 \151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162 \151\164\171\060\202\001\040\060\015\006\011\052\206\110\206\367 \015\001\001\001\005\000\003\202\001\015\000\060\202\001\010\002 \202\001\001\000\267\062\310\376\351\161\246\004\205\255\014\021 \144\337\316\115\357\310\003\030\207\077\241\253\373\074\246\237 \360\303\241\332\324\330\156\053\123\220\373\044\244\076\204\360 \236\350\137\354\345\047\104\365\050\246\077\173\336\340\052\360  $\label{eq:condition} $$ \frac{310}{257}123 \cdot 057 \cdot 236 \cdot 312 \cdot 005 \cdot 001 \cdot 223 \cdot 036 \cdot 217 \cdot 146 \cdot 034 \cdot 071 \cdot 247 \cdot 115 \cdot 071 \cdot$ \372\132\266\163\004\045\146\353\167\177\347\131\306\112\231\045 \024\124\353\046\307\363\177\031\325\060\160\217\257\260\106\052 \377\255\353\051\355\327\237\252\004\207\243\324\371\211\245\064 \137\333\103\221\202\066\331\146\074\261\270\271\202\375\234\072 \076\020\310\073\357\006\145\146\172\233\031\030\075\377\161\121 \074\060\056\137\276\075\167\163\262\135\006\154\303\043\126\232 \053\205\046\222\034\247\002\263\344\077\015\257\010\171\202\270 \066\075\352\234\323\065\263\274\151\312\365\314\235\350\375\144 \215\027\200\063\156\136\112\135\231\311\036\207\264\235\032\300

\325\156\023\065\043\136\337\233\137\075\357\326\367\166\302\352 \076\273\170\015\034\102\147\153\004\330\370\326\332\157\213\362  $\label{eq:condition} $$104\240\001\253\002\001\003\243\201\305\060\201\302\060\035\006$  $\label{eq:condition} $$ \03125\035\016\004\026\004\024\277\137\267\321\316\335\037\206 $$$ \364\133\125\254\334\327\020\302\016\251\210\347\060\201\222\006  $\label{eq:condition} $$ \03125\035\043\004\201\212\060\201\207\200\024\277\137\267\321 $$$ \316\335\037\206\364\133\125\254\334\327\020\302\016\251\210\347 \241\154\244\152\060\150\061\013\060\011\006\003\125\004\006\023 \002\125\123\061\045\060\043\006\003\125\004\012\023\034\123\164 \141\162\146\151\145\154\144\040\124\145\143\150\156\157\154\157 \147\151\145\163\054\040\111\156\143\056\061\062\060\060\006\003 \125\004\013\023\051\123\164\141\162\146\151\145\154\144\040\103 \154\141\163\163\040\062\040\103\145\162\164\151\146\151\143\141 \164\151\157\156\040\101\165\164\150\157\162\151\164\171\202\001  $\label{eq:condition} $$ \000\060\014\006\003\125\035\023\004\005\060\003\001\001\377\060 $$$ \015\006\011\052\206\110\206\367\015\001\001\005\005\000\003\202  $\label{eq:condition} $$ \001\000\005\235\077\210\235\321\311\032\125\241\254\151\363$ \363\131\332\233\001\207\032\117\127\251\241\171\011\052\333\367 \057\262\036\314\307\136\152\330\203\207\241\227\357\111\065\076  $\label{eq:condition} $$ 167\006\101\130\142\277\216\130\270\012\147\077\354\263\335\041 $$$ \146\037\311\124\372\162\314\075\114\100\330\201\257\167\236\203 \172\273\242\307\365\064\027\216\331\021\100\364\374\054\052\115  $\\ \langle 025 \rangle 177 \rangle 247 \rangle 142 \rangle 135 \rangle 056 \rangle 045 \rangle 323 \rangle 000 \rangle 013 \rangle 040 \rangle 032 \rangle 035 \rangle 150 \rangle 371 \rangle 027 \rangle$ \270\364\275\213\355\050\131\335\115\026\213\027\203\310\262\145  $\label{eq:condition} $$ 307 \times 172 \times 245 \times 252 \times 127 \times 123 \times 125 \times 335 \times 127 \times 44 \times 123 \times 100 \times 101 \times 125 \times$ \013\150\360\364\373\164\276\126\135\172\171\365\371\035\205\343 \055\225\276\365\161\220\103\314\215\037\232\000\012\207\051\351 \125\042\130\000\043\352\343\022\103\051\133\107\010\335\214\101 \152\145\006\250\345\041\252\101\264\225\041\225\271\175\321\064 \253\023\326\255\274\334\342\075\071\315\275\076\165\160\241\030  $\label{eq:condition} $$ \frac{131}003\frac{311}042\frac{264}{217}\frac{324}{325}\frac{6052}{327}\frac{245}{266}\frac{324}{012}\frac{155}{156} $$$ \370\267\100\021\106\232\037\171\016\142\277\017\227\354\340\057 \037\027\224

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Starfield Class 2 CA"
```

<sup>#</sup> Issuer: OU=Starfield Class 2 Certification Authority,O="Starfield Technologies, Inc.",C=US

<sup>#</sup> Serial Number: 0 (0x0)

<sup>#</sup> Subject: OU=Starfield Class 2 Certification Authority,O="Starfield Technologies, Inc.",C=US

<sup>#</sup> Not Valid Before: Tue Jun 29 17:39:16 2004

<sup>#</sup> Not Valid After: Thu Jun 29 17:39:16 2034

<sup>#</sup> Fingerprint (SHA-256):

<sup>14:65:</sup>FA:20:53:97:B8:76:FA:A6:F0:A9:95:8E:55:90:E4:0F:CC:7F:AA:4F:B7:C2:C8:67:75:21:FB:5F:B6:58

<sup>#</sup> Fingerprint (SHA1): AD:7E:1C:28:B0:64:EF:8F:60:03:40:20:14:C3:D0:E3:37:0E:B5:8A

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

```
CKA TOKEN CK BBOOL CK TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Starfield Class 2 CA"
CKA CERT SHA1 HASH MULTILINE OCTAL
\255\176\034\050\260\144\357\217\140\003\100\040\024\303\320\343
\067\016\265\212
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\062\112\113\273\310\143\151\233\276\164\232\306\335\035\106\044
END
CKA_ISSUER MULTILINE_OCTAL
\060\150\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\\ \\ 045\\ \\ 060\\ 043\\ \\ 006\\ \\ 003\\ \\ 125\\ \\ 004\\ \\ 012\\ \\ 023\\ \\ 034\\ \\ 123\\ \\ 164\\ \\ 141\\ \\ 162\\ \\ 146\\ \\ 151
\label{eq:condition} $$ \frac{145\\154\\144\\040\\124\\145\\143\\150\\156\\157\\154\\157\\147\\151\\145\\163
\054\040\111\156\143\056\061\062\060\060\006\003\125\004\013\023
\040\062\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\001\000
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "DigiCert Assured ID Root CA"
# Issuer: CN=DigiCert Assured ID Root CA,OU=www.digicert.com,O=DigiCert Inc,C=US
# Serial Number:0c:e7:e0:e5:17:d8:46:fe:8f:e5:60:fc:1b:f0:30:39
# Subject: CN=DigiCert Assured ID Root CA,OU=www.digicert.com,O=DigiCert Inc,C=US
# Not Valid Before: Fri Nov 10 00:00:00 2006
# Not Valid After: Mon Nov 10 00:00:00 2031
# Fingerprint (SHA-256):
3E:90:99:B5:01:5E:8F:48:6C:00:BC:EA:9D:11:1E:E7:21:FA:BA:35:5A:89:BC:F1:DF:69:56:1E:3D:C6:32:5C
# Fingerprint (SHA1): 05:63:B8:63:0D:62:D7:5A:BB:C8:AB:1E:4B:DF:B5:A8:99:B2:4D:43
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "DigiCert Assured ID Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\145\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145
```

 $\label{eq:continuous} $$ 162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023 $$ 020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157 $$ 155\061\044\060\042\006\003\125\004\003\023\033\104\151\147\151 $$ 103\145\162\164\040\101\163\165\162\145\144\040\111\104\040 $$ 122\157\157\164\040\103\101 $$$ 

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \00145\061\013\060\011\006\003\125\004\006\023\002\125\123\061\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157\155\061\044\060\042\006\003\125\004\003\023\033\104\151\147\151\103\145\162\164\040\101\163\163\165\162\145\144\040\111\104\040\122\157\157\164\040\103\101$ 

**END** 

### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\014\347\340\345\027\330\106\376\217\345\140\374\033\360 \060\071

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\003\267\060\202\002\237\240\003\002\001\002\002\002\014 \347\340\345\027\330\106\376\217\345\140\374\033\360\060\071\060 \015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\145 \061\013\060\011\006\003\125\004\006\023\002\125\123\061\025\060 \023\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164 \040\111\156\143\061\031\060\027\006\003\125\004\013\023\020\167  $\label{eq:condition} $$ 167\167\056\144\151\147\151\143\145\162\164\056\143\157\155\061$$ \044\060\042\006\003\125\004\003\023\033\104\151\147\151\103\145 \162\164\040\101\163\163\165\162\145\144\040\111\104\040\122\157 \157\164\040\103\101\060\036\027\015\060\066\061\061\061\060\060 \060\060\060\060\060\132\027\015\063\061\061\061\061\060\060\060 \060\060\060\060\132\060\145\061\013\060\011\006\003\125\004\006 \023\002\125\123\061\025\060\023\006\003\125\004\012\023\014\104 \151\147\151\103\145\162\164\040\111\156\143\061\031\060\027\006 \003\125\004\013\023\020\167\167\167\056\144\151\147\151\143\145 \162\164\056\143\157\155\061\044\060\042\006\003\125\004\003\023 \033\104\151\147\151\103\145\162\164\040\101\163\163\165\162\145  $\label{eq:condition} $$ 144\040\111\104\040\122\157\157\164\040\103\101\060\202\001\042 $$$ \060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003 \202\001\017\000\060\202\001\012\002\202\001\001\000\255\016\025 \316\344\103\200\134\261\207\363\267\140\371\161\022\245\256\334 \046\224\210\252\364\316\365\040\071\050\130\140\014\370\200\332 \251\025\225\062\141\074\265\261\050\204\212\212\334\237\012\014 \203\027\172\217\220\254\212\347\171\123\134\061\204\052\366\017 \230\062\066\166\314\336\335\074\250\242\357\152\373\041\362\122 \141\337\237\040\327\037\342\261\331\376\030\144\322\022\133\137 \371\130\030\065\274\107\315\241\066\371\153\177\324\260\070\076

\301\033\303\214\063\331\330\057\030\376\050\017\263\247\203\326 \303\156\104\300\141\065\226\026\376\131\234\213\166\155\327\361  $\verb|242|113|015|053|377|013|162|332|236|140|320|216|220|065|306|170|$ \125\207\040\241\317\345\155\012\310\111\174\061\230\063\154\042 \351\207\320\062\132\242\272\023\202\021\355\071\027\235\231\072 \162\241\346\372\244\331\325\027\061\165\256\205\175\042\256\077 \001\106\206\366\050\171\310\261\332\344\127\027\304\176\034\016 \260\264\222\246\126\263\275\262\227\355\252\247\360\267\305\250 \077\225\026\320\377\241\226\353\010\137\030\167\117\002\003\001 \000\001\243\143\060\141\060\016\006\003\125\035\017\001\001\377  $\label{eq:condition} $$ \004\004\003\002\001\206\060\017\006\003\125\035\023\001\001\377 $$$  $\\ \\004\\\\005\\\\060\\\\003\\\\001\\\\001\\\\377\\\\060\\\\035\\\\006\\\\003\\\\125\\\\035\\\\016\\\\004\\\\026$ \004\024\105\353\242\257\364\222\313\202\061\055\121\213\247\247  $\\ \langle 041 \rangle 235 \rangle 363 \rangle 155 \rangle 310 \rangle 017 \rangle 060 \rangle 037 \rangle 006 \rangle 003 \rangle 125 \rangle 035 \rangle 043 \rangle 004 \rangle 030 \rangle 060$  $\label{eq:condition} $$ \026\200\024\105\353\242\257\364\222\313\202\061\055\121\213\247 $$$ \247\041\235\363\155\310\017\060\015\006\011\052\206\110\206\367  $\label{eq:condition} $$ \001\001\005\005\000\003\202\001\001\000\242\016\274\337\342 $$$ \355\360\343\162\163\172\144\224\277\367\162\146\330\062\344\102 \165\142\256\207\353\362\325\331\336\126\263\237\314\316\024\050 \271\015\227\140\134\022\114\130\344\323\075\203\111\105\130\227 \065\151\032\250\107\352\126\306\171\253\022\330\147\201\204\337  $\label{eq:condition} $$ \frac{177}011\\074\\224\\346\\270\\046\\054\\040\\275\\075\\263\\050\\211\\367\\137$ \377\042\342\227\204\037\351\145\357\207\340\337\301\147\111\263 \135\353\262\011\052\353\046\355\170\276\175\077\053\363\267\046 \065\155\137\211\001\266\111\133\237\001\005\233\253\075\045\301 \314\266\177\302\361\157\206\306\372\144\150\353\201\055\224\353 \102\267\372\214\036\335\142\361\276\120\147\267\154\275\363\361  $\label{eq:condition} $$ \037\153\014\066\007\026\177\067\174\251\133\155\172\361\022\106 $$$ \140\203\327\047\004\276\113\316\227\276\303\147\052\150\021\337 \200\347\014\063\146\277\023\015\024\156\363\177\037\143\020\036 \372\215\033\045\155\154\217\245\267\141\001\261\322\243\046\241 \020\161\235\255\342\303\371\303\231\121\267\053\007\010\316\056 \346\120\262\247\372\012\105\057\242\360\362

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "DigiCert Assured ID Root CA"
```

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

<sup>#</sup> Issuer: CN=DigiCert Assured ID Root CA,OU=www.digicert.com,O=DigiCert Inc,C=US

<sup>#</sup> Serial Number:0c:e7:e0:e5:17:d8:46:fe:8f:e5:60:fc:1b:f0:30:39

<sup>#</sup> Subject: CN=DigiCert Assured ID Root CA,OU=www.digicert.com,O=DigiCert Inc,C=US

<sup>#</sup> Not Valid Before: Fri Nov 10 00:00:00 2006

<sup>#</sup> Not Valid After: Mon Nov 10 00:00:00 2031

<sup>#</sup> Fingerprint (SHA-256):

<sup>3</sup>E:90:99:B5:01:5E:8F:48:6C:00:BC:EA:9D:11:1E:E7:21:FA:BA:35:5A:89:BC:F1:DF:69:56:1E:3D:C6:32:5C

<sup>#</sup> Fingerprint (SHA1): 05:63:B8:63:0D:62:D7:5A:BB:C8:AB:1E:4B:DF:B5:A8:99:B2:4D:43

```
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "DigiCert Assured ID Root CA"
CKA CERT SHA1 HASH MULTILINE OCTAL
\label{eq:condition} $$ \005\143\270\143\015\142\327\132\273\310\253\036\113\337\265\250 $$
\231\262\115\103
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\207\316\013\173\052\016\111\000\341\130\161\233\067\250\223\162
END
CKA_ISSUER MULTILINE_OCTAL
\060\145\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\label{eq:condition} $$ \025\06\003\006\003\125\004\012\023\014\104\151\147\151\103\145 $$
\label{eq:condition} $$ 162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157
\label{eq:condition} $$ \frac{155}{061}\frac{044}{060}\frac{042}{006}\frac{125}{004}\frac{003}{023}\frac{33}{104}\frac{151}{147}\frac{151}{151} 
\103\145\162\164\040\101\163\163\165\162\145\144\040\111\104\040
\122\157\157\164\040\103\101
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\020\014\347\340\345\027\330\106\376\217\345\140\374\033\360
\060\071
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "DigiCert Global Root CA"
# Issuer: CN=DigiCert Global Root CA,OU=www.digicert.com,O=DigiCert Inc,C=US
# Serial Number:08:3b:e0:56:90:42:46:b1:a1:75:6a:c9:59:91:c7:4a
# Subject: CN=DigiCert Global Root CA,OU=www.digicert.com,O=DigiCert Inc,C=US
# Not Valid Before: Fri Nov 10 00:00:00 2006
# Not Valid After: Mon Nov 10 00:00:00 2031
# Fingerprint (SHA-256):
43:48:A0:E9:44:4C:78:CB:26:5E:05:8D:5E:89:44:B4:D8:4F:96:62:BD:26:DB:25:7F:89:34:A4:43:C7:01:61
# Fingerprint (SHA1): A8:98:5D:3A:65:E5:E5:C4:B2:D7:D6:6D:40:C6:DD:2F:B1:9C:54:36
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "DigiCert Global Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\label{eq:condition} $$ \060\141\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$
```

CKA TOKEN CK BBOOL CK TRUE

 $\label{eq:control} $$ \025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157\155\006\006\003\125\004\003\023\027\104\151\147\151\103\145\162\164\040\107\154\157\142\141\154\040\122\157\157\164\040\103\101$ 

**END** 

CKA ID UTF8 "0"

## CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000141\0013\006\0011\006\003\125\004\00023\002\125\123\061\025\006\0023\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164\040\111\156\143\061\031\060\0027\006\003\125\004\013\023\027\104\151\147\151\155\061\040\060\036\006\003\125\004\003\023\027\104\151\147\151\103\145\162\164\040\107\154\157\142\141\154\040\122\157\157\164\040\103\101$ 

**END** 

## CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\010\073\340\126\220\102\106\261\241\165\152\311\131\221 \307\112

**END** 

#### CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \060\202\003\257\060\202\002\227\240\003\002\001\002\002\002\001\002$ \073\340\126\220\102\106\261\241\165\152\311\131\221\307\112\060 \015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\141 \061\013\060\011\006\003\125\004\006\023\002\125\123\061\025\060 \023\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164 \040\111\156\143\061\031\060\027\006\003\125\004\013\023\020\167 \167\167\056\144\151\147\151\143\145\162\164\056\143\157\155\061 \040\060\036\006\003\125\004\003\023\027\104\151\147\151\103\145  $\label{eq:local_$ \132\060\141\061\013\060\011\006\003\125\004\006\023\002\125\123 \061\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103 \145\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013 \023\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143 \157\155\061\040\060\036\006\003\125\004\003\023\027\104\151\147  $\verb| 151| 103| 145| 162| 164| 040| 107| 154| 157| 142| 141| 154| 040| 122| 157| 157|$  $\label{eq:condition} $$ 164\040\103\101\060\202\001\042\060\015\006\011\052\206\110\206$ \367\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012 \002\202\001\001\000\342\073\341\021\162\336\250\244\323\243\127 \252\120\242\217\013\167\220\311\242\245\356\022\316\226\133\001 \011\040\314\001\223\247\116\060\267\123\367\103\304\151\000\127 \235\342\215\042\335\207\006\100\000\201\011\316\316\033\203\277 \337\315\073\161\106\342\326\146\307\005\263\166\047\026\217\173 \236\036\225\175\356\267\110\243\010\332\326\257\172\014\071\006 \145\177\112\135\037\274\027\370\253\276\356\050\327\164\177\172

\170\231\131\205\150\156\134\043\062\113\277\116\300\350\132\155 \343\160\277\167\020\277\374\001\366\205\331\250\104\020\130\062  $\verb| 251| 165| 030| 325| 321| 242| 276| 107| 342| 047| 152| 364| 232| 063| 370| 111|$  $\label{eq:condition} $$ \010\140\213\324\137\264\072\204\277\241\252\112\114\175\076\317 $$$ \117\137\154\166\136\240\113\067\221\236\334\042\346\155\316\024 \032\216\152\313\376\315\263\024\144\027\307\133\051\236\062\277 \362\356\372\323\013\102\324\253\267\101\062\332\014\324\357\370 \201\325\273\215\130\077\265\033\350\111\050\242\160\332\061\004 \335\367\262\026\362\114\012\116\007\250\355\112\075\136\265\177 \243\220\303\257\047\002\003\001\000\001\243\143\060\141\060\016  $\label{eq:condition} $$ \006\003\125\035\017\001\001\377\004\004\003\002\001\206\060\017 $$$  $\\ \\006\\003\\125\\035\\023\\001\\001\\377\\004\\005\\060\\003\\001\\001\\377\\060$ \035\006\003\125\035\016\004\026\004\024\003\336\120\065\126\321 \114\273\146\360\243\342\033\033\303\227\262\075\321\125\060\037  $\label{eq:condition} $$ \006\003\125\035\043\004\030\060\026\200\024\003\336\120\065\126$ \321\114\273\146\360\243\342\033\033\303\227\262\075\321\125\060  $\label{eq:condition} $$ \0.015\0.06\0.01\0.05\0.005\0.003\0.001\0.005\0.005\0.003\0.003\0.005\0.005\0.003\0.005\$ \001\001\000\313\234\067\252\110\023\022\012\372\335\104\234\117 \122\260\364\337\256\004\365\171\171\010\243\044\030\374\113\053 \204\300\055\271\325\307\376\364\301\037\130\313\270\155\234\172 \164\347\230\051\253\021\265\343\160\240\241\315\114\210\231\223 \214\221\160\342\253\017\034\276\223\251\377\143\325\344\007\140  $\label{eq:condition} $$ 323\243\277\235\133\011\361\325\216\343\123\364\216\143\372\077$ \247\333\264\146\337\142\146\326\321\156\101\215\362\055\265\352 \167\112\237\235\130\342\053\131\300\100\043\355\055\050\202\105 \076\171\124\222\046\230\340\200\110\250\067\357\360\326\171\140 \026\336\254\350\016\315\156\254\104\027\070\057\111\332\341\105  $\\ \begin{tabular}{l} $0.76 \times 0.52 \times 2.71 \times 0.66 \times 1.23 \times 1.7072 \times 1.20 \times 0.64 \times 1.27 \times 1.20 \times 0.64 \times 1.27 \times 1.20 \times 1.20$ \141\041\030\325\004\255\170\074\054\072\200\153\247\353\257\025 \024\351\330\211\301\271\070\154\342\221\154\212\377\144\271\167  $\label{eq:condition} $$ \045\127\060\300\033\044\243\341\334\351\337\107\174\265\264\044$ \010\005\060\354\055\275\013\277\105\277\120\271\251\363\353\230 \001\022\255\310\210\306\230\064\137\215\012\074\306\351\325\225 \225\155\336

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "DigiCert Global Root CA"
```

<sup>#</sup> Issuer: CN=DigiCert Global Root CA,OU=www.digicert.com,O=DigiCert Inc,C=US

<sup>#</sup> Serial Number:08:3b:e0:56:90:42:46:b1:a1:75:6a:c9:59:91:c7:4a

<sup>#</sup> Subject: CN=DigiCert Global Root CA,OU=www.digicert.com,O=DigiCert Inc,C=US

<sup>#</sup> Not Valid Before: Fri Nov 10 00:00:00 2006

<sup>#</sup> Not Valid After: Mon Nov 10 00:00:00 2031

<sup>#</sup> Fingerprint (SHA-256):

<sup>43:48:</sup>A0:E9:44:4C:78:CB:26:5E:05:8D:5E:89:44:B4:D8:4F:96:62:BD:26:DB:25:7F:89:34:A4:43:C7:01:61

<sup>#</sup> Fingerprint (SHA1): A8:98:5D:3A:65:E5:C4:B2:D7:D6:6D:40:C6:DD:2F:B1:9C:54:36

```
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "DigiCert Global Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\250\230\135\072\145\345\345\304\262\327\326\155\100\306\335\057
\261\234\124\066
END
CKA CERT MD5 HASH MULTILINE OCTAL
\label{eq:condition} $$ \frac{171}344\251\204\015\175\072\226\327\300\117\342\103\114\211\056}
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\141\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$
\label{eq:condition} $$ \025\06\003\006\003\125\004\012\023\014\104\151\147\151\103\145 $$
\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\label{eq:condition} $$ \020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157 $$
\155\061\040\060\036\006\003\125\004\003\023\027\104\151\147\151
\103\145\162\164\040\107\154\157\142\141\154\040\122\157\157\164
\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\label{eq:condition} $$ \002\020\010\073\340\126\220\102\106\261\241\165\152\311\131\221 $$
\307\112
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "DigiCert High Assurance EV Root CA"
# Issuer: CN=DigiCert High Assurance EV Root CA,OU=www.digicert.com,O=DigiCert Inc,C=US
# Serial Number:02:ac:5c:26:6a:0b:40:9b:8f:0b:79:f2:ae:46:25:77
# Subject: CN=DigiCert High Assurance EV Root CA,OU=www.digicert.com,O=DigiCert Inc,C=US
# Not Valid Before: Fri Nov 10 00:00:00 2006
# Not Valid After: Mon Nov 10 00:00:00 2031
# Fingerprint (SHA-256):
74:31:E5:F4:C3:C1:CE:46:90:77:4F:0B:61:E0:54:40:88:3B:A9:A0:1E:D0:0B:A6:AB:D7:80:6E:D3:B1:18:CF
# Fingerprint (SHA1): 5F:B7:EE:06:33:E2:59:DB:AD:0C:4C:9A:E6:D3:8F:1A:61:C7:DC:25
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "DigiCert High Assurance EV Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
```

 $\label{eq:condition} $$ \000154\061\013\060\011\006\003\125\004\006\023\002\125\123\061\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164\040\111\156\143\166\143\157\155\061\053\060\051\006\003\125\004\003\023\042\104\151\147\151\103\145\162\164\040\110\151\147\150\040\101\163\163\165\162\141\156\143\145\040\105\126\040\122\157\157\164\040\103\101$ END$ 

CKA ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \00154\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$ \025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145 $$ \162\164\040\111\156\143\160\1031\060\027\006\003\125\004\013\023 $$ \020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157 $$ \155\061\053\060\051\006\003\125\004\003\023\042\104\151\147\151 $$ \103\145\162\164\040\110\151\147\150\040\101\163\163\165\162\141 $$ \156\143\145\040\105\126\040\122\157\157\164\040\103\101 $$$ 

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\003\305\060\202\002\255\240\003\002\001\002\002\020\002 \254\134\046\152\013\100\233\217\013\171\362\256\106\045\167\060 \015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\154 \061\013\060\011\006\003\125\004\006\023\002\125\123\061\025\060 \040\111\156\143\061\031\060\027\006\003\125\004\013\023\020\167 \167\167\056\144\151\147\151\143\145\162\164\056\143\157\155\061  $\label{eq:condition} $$ \053\060\051\006\003\125\004\003\023\042\104\151\147\151\103\145$ \162\164\040\110\151\147\150\040\101\163\163\165\162\141\156\143 \145\040\105\126\040\122\157\157\164\040\103\101\060\036\027\015 \060\011\006\003\125\004\006\023\002\125\123\061\025\060\023\006 \003\125\004\012\023\014\104\151\147\151\103\145\162\164\040\111 \156\143\061\031\060\027\006\003\125\004\013\023\020\167\167\167  $\label{eq:condition} $$ \056\144\151\147\151\143\145\162\164\056\143\157\155\061\053\060$$$  $\label{eq:condition} $$ \003\023\042\104\151\147\151\103\145\162\164 $$$ \040\110\151\147\150\040\101\163\163\165\162\141\156\143\145\040 \105\126\040\122\157\157\164\040\103\101\060\202\001\042\060\015 \006\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001 \017\000\060\202\001\012\002\202\001\001\000\306\314\345\163\346 \373\324\273\345\055\055\062\246\337\345\201\077\311\315\045\111 \266\161\052\303\325\224\064\147\242\012\034\260\137\151\246\100 \261\304\267\262\217\320\230\244\251\101\131\072\323\334\224\326 \074\333\164\070\244\112\314\115\045\202\367\112\245\123\022\070

\356\363\111\155\161\221\176\143\266\253\246\137\303\244\204\370 \117\142\121\276\370\305\354\333\070\222\343\006\345\010\221\014 \304\050\101\125\373\313\132\211\025\176\161\350\065\277\115\162  $\label{eq:condition} $$ \011\075\276\072\070\120\133\167\061\033\215\263\307\044\105\232$ \247\254\155\000\024\132\004\267\272\023\353\121\012\230\101\101  $\\ \\ 042\\116\\145\\141\\207\\201\\101\\1120\\246\\171\\134\\211\\336\\031\\112\\127$ \325\056\346\135\034\123\054\176\230\315\032\006\026\244\150\163 \320\064\004\023\134\241\161\323\132\174\125\333\136\144\341\067 \207\060\126\004\345\021\264\051\200\022\361\171\071\210\242\002 \021\174\047\146\267\210\267\170\362\312\012\250\070\253\012\144  $\label{eq:condition} $$ 302\277\146\135\225\204\301\241\045\036\207\135\032\120\013\040 $$$  $\label{eq:condition} $$ \022\314\101\273\156\013\121\070\270\113\313\002\003\001\000\001$ \243\143\060\141\060\016\006\003\125\035\017\001\001\377\004\004  $\label{eq:condition} $$ \003\002\001\206\060\017\006\003\125\035\023\001\001\377\004\005 $$$ \261\076\303\151\003\370\277\107\001\324\230\046\032\010\002\357 \143\144\053\303\060\037\006\003\125\035\043\004\030\060\026\200 \024\261\076\303\151\003\370\277\107\001\324\230\046\032\010\002 \357\143\144\053\303\060\015\006\011\052\206\110\206\367\015\001  $\label{eq:condition} $$ \001\005\000\003\202\001\001\000\034\032\006\227\334\327\234$ \237\074\210\146\006\010\127\041\333\041\107\370\052\147\252\277 \030\062\166\100\020\127\301\212\363\172\331\021\145\216\065\372 \236\374\105\265\236\331\114\061\113\270\221\350\103\054\216\263 \170\316\333\343\123\171\161\326\345\041\224\001\332\125\207\232 \044\144\366\212\146\314\336\234\067\315\250\064\261\151\233\043 \310\236\170\042\053\160\103\343\125\107\061\141\031\357\130\305 \205\057\116\060\366\240\061\026\043\310\347\342\145\026\063\313  $\label{eq:condition} $$ \277\032\033\240\075\370\312\136\213\061\213\140\010\211\055\014$$ \006\134\122\267\304\371\012\230\321\025\137\237\022\276\174\066 \143\070\275\104\244\177\344\046\053\012\304\227\151\015\351\214  $\label{eq:condition} $\342\300\020\127\270\310\166\022\221\125\362\110\151\330\274\052$ \002\133\017\104\324\040\061\333\364\272\160\046\135\220\140\236 \274\113\027\011\057\264\313\036\103\150\311\007\047\301\322\134 \367\352\041\271\150\022\234\074\234\277\236\374\200\134\233\143 \315\354\107\252\045\047\147\240\067\363\000\202\175\124\327\251 \370\351\056\023\243\167\350\037\112

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

<sup>#</sup> Trust for "DigiCert High Assurance EV Root CA"

<sup>#</sup> Issuer: CN=DigiCert High Assurance EV Root CA,OU=www.digicert.com,O=DigiCert Inc,C=US

<sup>#</sup> Serial Number:02:ac:5c:26:6a:0b:40:9b:8f:0b:79:f2:ae:46:25:77

<sup>#</sup> Subject: CN=DigiCert High Assurance EV Root CA,OU=www.digicert.com,O=DigiCert Inc,C=US

<sup>#</sup> Not Valid Before: Fri Nov 10 00:00:00 2006

<sup>#</sup> Not Valid After: Mon Nov 10 00:00:00 2031

<sup>#</sup> Fingerprint (SHA-256):

```
# Fingerprint (SHA1): 5F:B7:EE:06:33:E2:59:DB:AD:0C:4C:9A:E6:D3:8F:1A:61:C7:DC:25
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "DigiCert High Assurance EV Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\137\267\356\006\063\342\131\333\255\014\114\232\346\323\217\032
\141\307\334\045
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\324\164\336\127\134\071\262\323\234\205\203\305\300\145\111\212
END
CKA_ISSUER MULTILINE_OCTAL
\060\154\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\label{eq:condition} $$ \025\06\003\006\003\125\004\012\023\014\104\151\147\151\103\145 $$
\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\label{eq:condition} $$ \020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157 $$
\label{eq:condition} $$ \frac{155}{061}\frac{053}{060}\frac{003}{125}\frac{004}{003}\frac{023}{042}\frac{104}{151}\frac{147}{151} $
\103\145\162\164\040\110\151\147\150\040\101\163\163\165\162\141
\156\143\145\040\105\126\040\122\157\157\164\040\103\101
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\020\002\254\134\046\152\013\100\233\217\013\171\362\256\106
\045\167
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "SwissSign Platinum CA - G2"
# Issuer: CN=SwissSign Platinum CA - G2,O=SwissSign AG,C=CH
# Serial Number:4e:b2:00:67:0c:03:5d:4f
# Subject: CN=SwissSign Platinum CA - G2,O=SwissSign AG,C=CH
# Not Valid Before: Wed Oct 25 08:36:00 2006
# Not Valid After: Sat Oct 25 08:36:00 2036
# Fingerprint (SHA-256):
3B:22:2E:56:67:11:E9:92:30:0D:C0:B1:5A:B9:47:3D:AF:DE:F8:C8:4D:0C:EF:7D:33:17:B4:C1:82:1D:14:36
# Fingerprint (SHA1): 56:E0:FA:C0:3B:8F:18:23:55:18:E5:D3:11:CA:E8:C2:43:31:AB:66
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "SwissSign Platinum CA - G2"
```

74:31:E5:F4:C3:C1:CE:46:90:77:4F:0B:61:E0:54:40:88:3B:A9:A0:1E:D0:0B:A6:AB:D7:80:6E:D3:B1:18:CF

# CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000111061\013\060\011\006\003\125\004\006\023\002\103\110\061\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123\151\147\156\040\120\154\141\164\151\156\165\155\040\103\101\040\055\040\107\062$ 

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000111\006\003\125\004\006\023\002\103\110\061\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123\151\147\156\040\120\154\141\164\151\156\165\155\040\103\101\040\055\040\107\062$ 

**END** 

#### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\010\116\262\000\147\014\003\135\117

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\301\060\202\003\251\240\003\002\001\002\002\010\116 \262\000\147\014\003\135\117\060\015\006\011\052\206\110\206\367 \006\023\002\103\110\061\025\060\023\006\003\125\004\012\023\014 \123\167\151\163\163\123\151\147\156\040\101\107\061\043\060\041 \006\003\125\004\003\023\032\123\167\151\163\163\123\151\147\156 \040\120\154\141\164\151\156\165\155\040\103\101\040\055\040\107  $\label{eq:condition} $$ \062\060\036\027\015\060\066\061\060\062\065\060\070\063\066\060 $$$ \060\132\027\015\063\066\061\060\062\065\060\070\063\066\060\060 \132\060\111\061\013\060\011\006\003\125\004\006\023\002\103\110  $\label{eq:condition} $$ \061\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163$ \123\151\147\156\040\101\107\061\043\060\041\006\003\125\004\003 \023\032\123\167\151\163\163\123\151\147\156\040\120\154\141\164 \151\156\165\155\040\103\101\040\055\040\107\062\060\202\002\042 \060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003 \202\002\017\000\060\202\002\012\002\202\002\001\000\312\337\242 \002\342\332\370\374\007\026\261\336\140\252\336\226\134\144\037  $\label{eq:condition} $$ 307\057\176\317\147\372\104\102\326\166\143\225\256\353\257\162$  $\label{eq:condition} $$ \040\212\105\107\206\142\170\206\326\040\071\046\364\256\243\375 $$$ \043\347\245\234\265\042\041\031\267\067\223\042\300\120\234\202 \173\324\325\004\104\134\313\264\302\237\222\276\044\330\173\147  $\\042\\342\\151\\137\\345\\005\\170\\324\\207\\331\\161\\160\\063\\045\\123\\264$ \207\073\051\220\050\066\232\125\104\060\150\244\203\227\177\015 \036\234\166\377\025\235\140\227\000\215\212\205\003\354\200\276 \352\054\156\020\121\222\314\176\325\243\063\330\326\111\336\130 \052\257\366\026\353\113\173\220\062\227\271\272\235\130\361\370 \127\111\004\036\242\135\006\160\335\161\333\371\335\213\232\033 \214\317\075\243\115\316\313\174\366\273\234\240\372\011\316\043

\142\262\351\015\037\342\162\050\217\237\254\150\040\175\157\073 \250\205\061\011\177\013\307\350\145\351\343\170\016\011\147\060 \213\064\202\373\135\340\314\235\201\155\142\356\010\036\004\054 \116\233\354\376\251\117\137\375\151\170\357\011\037\241\264\277 \372\363\357\220\036\114\005\213\036\352\172\221\172\303\327\345 \373\060\274\154\033\020\130\230\367\032\137\320\051\062\003\023 \106\115\141\152\205\114\122\164\057\006\037\173\021\342\204\227 \306\231\363\155\177\327\147\203\176\023\150\330\161\050\132\330 \316\335\350\020\024\232\376\155\043\207\156\216\132\160\074\325 \215\011\000\247\252\274\260\061\067\155\310\204\024\036\133\275  $\label{eq:condition} $$ 105\143\040\153\113\164\214\275\333\072\016\301\317\132\026\217 $$$ \245\230\362\166\211\262\023\022\073\013\167\167\254\273\345\074 \051\112\222\162\312\141\032\053\136\114\342\203\164\167\372\065 \110\172\205\115\215\232\123\304\337\170\312\227\221\110\053\105  $\label{eq:condition} $$ \031\367\034\032\242\355\030\272\012\275\203\372\157\274\215 $$$ \127\223\073\324\324\246\316\036\361\240\261\316\253\375\053\050 \232\117\033\327\303\162\333\244\304\277\135\114\365\335\173\226 \151\356\150\200\346\347\230\272\066\267\376\156\355\053\275\040 \370\145\031\332\125\011\176\045\334\376\141\142\162\371\176\030  $\label{eq:condition} $$ \002\357\143\264\320\373\257\345\073\143\214\147\217\002\003\001 $$$ \000\001\243\201\254\060\201\251\060\016\006\003\125\035\017\001 \001\377\004\004\003\002\001\006\060\017\006\003\125\035\023\001  $\label{eq:condition} $$ \001\377\004\005\000\003\001\001\377\060\035\006\003\125\035\016 $$$ \004\026\004\024\120\257\314\007\207\025\107\157\070\305\264\145 \321\336\225\252\351\337\234\314\060\037\006\003\125\035\043\004  $\label{eq:condition} $$ \030\060\026\200\024\120\257\314\007\207\025\107\157\070\305\264 $$$ \145\321\336\225\252\351\337\234\314\060\106\006\003\125\035\040  $\\ \\004\\077\\060\\075\\060\\073\\006\\011\\140\\205\\164\\001\\131\\001\\001\\001$ \040\150\164\164\160\072\057\057\162\145\160\157\163\151\164\157  $\label{eq:loss} $$ 162\171\056\163\167\151\163\163\163\151\147\156\056\143\157\155$$ \057\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000 \003\202\002\001\000\010\205\246\365\026\014\374\104\032\301\143 \340\371\125\106\010\374\160\034\102\050\226\216\267\305\301\101 \165\116\011\161\171\345\155\226\312\113\245\210\140\320\060\164 \270\312\010\334\264\060\236\100\007\026\153\145\225\167\001\256 \244\267\065\013\201\332\161\025\251\164\027\070\173\130\312\371  $\label{eq:condition} $$ \057\373\300\145\166\215\133\001\271\175\336\202\075\144\270\276$  $\label{eq:condition} $$ \024\164\243\012\124\323\054\225\030\027\065\365\121\153\077\217$ \242\226\141\071\170\153\113\345\246\240\370\123\337\121\020\223 \142\347\200\057\342\321\340\274\216\066\106\167\063\354\270\373 \216\232\054\211\115\061\021\017\046\236\004\273\267\004\215\013 \362\271\374\132\235\073\026\267\057\310\230\253\376\212\120\131 \056\243\073\374\051\135\213\301\113\311\342\212\023\035\261\277 \273\102\035\122\335\116\330\024\136\020\306\061\007\357\161\047 \367\033\071\011\334\202\352\213\263\225\206\136\375\365\332\135 \061\246\340\061\266\224\346\104\111\164\305\026\345\367\037\003  $\label{eq:condition} $$ 141\050\305\310\313\022\240\102\113\371\153\210\010\215\264\062$ 

\030\363\165\237\304\177\000\117\005\225\234\243\027\002\303\263 \123\233\252\040\071\051\053\146\372\235\257\136\263\222\322\265 \246\341\032\371\055\101\151\201\024\264\264\265\355\211\075\316  $\label{eq:condition} $$ \373\251\235\065\102\104\261\034\024\163\201\317\052\001\065\232$  $\label{eq:condition} $$ \061\325\05\217\155\204\337\200\115\127\343\077\305\204\165\332 $$$ \211\306\060\273\353\217\313\042\010\240\256\252\361\003\154\072 \113\115\011\245\016\162\306\126\153\041\102\116\043\045\024\150 \256\166\012\174\014\007\160\144\371\232\057\366\005\071\046\306 \014\217\031\177\103\136\156\364\133\025\057\333\141\135\346\147 \057\077\010\224\371\140\264\230\061\332\164\361\204\223\161\115 \137\373\140\130\321\373\304\301\155\211\242\273\040\037\235\161 \221\313\062\233\023\075\076\175\222\122\065\254\222\224\242\323 \030\302\174\307\352\257\166\005\026\335\147\047\302\176\034\007 \042\041\363\100\012\033\064\007\104\023\302\204\152\216\337\031 \132\277\177\353\035\342\032\070\321\134\257\107\222\153\200\265 \060\245\311\215\330\253\061\201\037\337\302\146\067\323\223\251 \205\206\171\145\322

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "SwissSign Platinum CA G2"
- # Issuer: CN=SwissSign Platinum CA G2,O=SwissSign AG,C=CH
- # Serial Number:4e:b2:00:67:0c:03:5d:4f
- # Subject: CN=SwissSign Platinum CA G2,O=SwissSign AG,C=CH
- # Not Valid Before: Wed Oct 25 08:36:00 2006
- # Not Valid After: Sat Oct 25 08:36:00 2036
- # Fingerprint (SHA-256):
- 3B:22:2E:56:67:11:E9:92:30:0D:C0:B1:5A:B9:47:3D:AF:DE:F8:C8:4D:0C:EF:7D:33:17:B4:C1:82:1D:14:36
- # Fingerprint (SHA1): 56:E0:FA:C0:3B:8F:18:23:55:18:E5:D3:11:CA:E8:C2:43:31:AB:66

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "SwissSign Platinum CA - G2"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\126\340\372\300\073\217\030\043\125\030\345\323\021\312\350\302\103\061\253\146

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \frac{311}230\\047\\167\\050\\036\\075\\016\\025\\074\\204\\000\\270\\205\\003\\346$  END

CKA\_ISSUER MULTILINE\_OCTAL

```
\156\165\155\040\103\101\040\055\040\107\062
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\010\116\262\000\147\014\003\135\117
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "SwissSign Gold CA - G2"
# Issuer: CN=SwissSign Gold CA - G2,O=SwissSign AG,C=CH
# Serial Number:00:bb:40:1c:43:f5:5e:4f:b0
# Subject: CN=SwissSign Gold CA - G2,O=SwissSign AG,C=CH
# Not Valid Before: Wed Oct 25 08:30:35 2006
# Not Valid After: Sat Oct 25 08:30:35 2036
# Fingerprint (SHA-256):
62:DD:0B:E9:B9:F5:0A:16:3E:A0:F8:E7:5C:05:3B:1E:CA:57:EA:55:C8:68:8F:64:7C:68:81:F2:C8:35:7B:95
# Fingerprint (SHA1): D8:C5:38:8A:B7:30:1B:1B:6E:D4:7A:E6:45:25:3A:6F:9F:1A:27:61
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "SwissSign Gold CA - G2"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA_SUBJECT MULTILINE_OCTAL
\060\105\061\013\060\011\006\003\125\004\006\023\002\103\110\061
\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123
\151\147\156\040\101\107\061\037\060\035\006\003\125\004\003\023
\026\123\167\151\163\163\123\151\147\156\040\107\157\154\144\040
\103\101\040\055\040\107\062
END
CKA ID UTF8 "0"
CKA ISSUER MULTILINE OCTAL
\060\105\061\013\060\011\006\003\125\004\006\023\002\103\110\061
\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123
\151\147\156\040\101\107\061\037\060\035\006\003\125\004\003\023
\label{eq:condition} $$ \026\123\167\151\163\163\123\151\147\156\040\107\157\154\144\040 $$
\103\101\040\055\040\107\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\011\000\273\100\034\103\365\136\117\260
END
CKA_VALUE MULTILINE_OCTAL
\060\202\005\272\060\202\003\242\240\003\002\001\002\002\011\000
\273\100\034\103\365\136\117\260\060\015\006\011\052\206\110\206
```

\367\015\001\001\005\005\000\060\105\061\013\060\011\006\003\125 \004\006\023\002\103\110\061\025\060\023\006\003\125\004\012\023 \014\123\167\151\163\163\123\151\147\156\040\101\107\061\037\060 \035\006\003\125\004\003\023\026\123\167\151\163\163\123\151\147 \156\040\107\157\154\144\040\103\101\040\055\040\107\062\060\036 \027\015\060\066\061\060\062\065\060\070\063\060\063\065\132\027 \015\063\066\061\060\062\065\060\070\063\060\063\065\132\060\105 \061\013\060\011\006\003\125\004\006\023\002\103\110\061\025\060  $\label{eq:condition} $$ \003\004\012\023\014\123\167\151\163\163\123\151\147 $$$ \156\040\101\107\061\037\060\035\006\003\125\004\003\023\026\123 \167\151\163\163\123\151\147\156\040\107\157\154\144\040\103\101  $\label{eq:condition} $$ \040\055\040\107\062\060\202\002\042\060\015\006\011\052\206\110 $$$ \206\367\015\001\001\001\005\000\003\202\002\017\000\060\202\002  $\label{eq:condition} $$ \012\002\202\002\001\000\257\344\356\176\213\044\016\022\156\251 $$$  $\label{eq:condition} $$ 120\055\026\104\073\222\222\134\312\270\135\204\222\102\023\052$ \274\145\127\202\100\076\127\044\315\120\213\045\052\267\157\374 \357\242\320\300\037\002\044\112\023\226\217\043\023\346\050\130 \000\243\107\307\006\247\204\043\053\273\275\226\053\177\125\314 \213\301\127\037\016\142\145\017\335\075\126\212\163\332\256\176  $\label{eq:condition} $$ \frac{155}{272}201 \cdot 034 \cdot 176 \cdot 102 \cdot 214 \cdot 040 \cdot 065 \cdot 331 \cdot 103 \cdot 115 \cdot 204 \cdot 372 \cdot 204 \cdot 333 \cdot 103 \cdot 115 \cdot 204 \cdot 372 \cdot 204 \cdot 333 \cdot 103 \cdot 115 \cdot 204 \cdot 372 \cdot 204 \cdot 333 \cdot 103 \cdot 115 \cdot 204 \cdot 372 \cdot 204 \cdot 333 \cdot 103 \cdot 115 \cdot 204 \cdot 372 \cdot 204 \cdot 333 \cdot 103 \cdot 115 \cdot 204 \cdot 372 \cdot 204 \cdot 333 \cdot 103 \cdot 115 \cdot 204 \cdot 372 \cdot 204 \cdot 333 \cdot 103 \cdot 115 \cdot 204 \cdot 372 \cdot 204 \cdot 333 \cdot 103 \cdot 115 \cdot 204 \cdot 372 \cdot 204 \cdot 333 \cdot 103 \cdot 115 \cdot 204 \cdot 372 \cdot 204 \cdot 333 \cdot 103 \cdot 115 \cdot 204 \cdot 372 \cdot 204 \cdot 333 \cdot 103 \cdot 115 \cdot 204 \cdot 372 \cdot 204 \cdot 333 \cdot 103 \cdot 115 \cdot 204 \cdot 372 \cdot 204 \cdot 333 \cdot 103 \cdot 115 \cdot 204 \cdot 372 \cdot 204 \cdot$ \122\054\363\016\047\167\013\153\277\021\057\162\170\237\056\330 \076\346\030\067\132\052\162\371\332\142\220\222\225\312\037\234  $\label{eq:condition} $$ \frac{351}{263}074\\053\\313\\363\\001\\023\\277\\132\\317\\301\\265\\012\\140\\275$ \335\265\231\144\123\270\240\226\263\157\342\046\167\221\214\340 \142\020\002\237\064\017\244\325\222\063\121\336\276\215\272\204 \172\140\074\152\333\237\053\354\336\336\001\077\156\115\345\120 \206\313\264\257\355\104\100\305\312\132\214\332\322\053\174\250 \356\276\246\345\012\252\016\245\337\005\122\267\125\307\042\135 \062\152\227\227\143\023\333\311\333\171\066\173\205\072\112\305 \122\211\371\044\347\235\167\251\202\377\125\034\245\161\151\053 \321\002\044\362\263\046\324\153\332\004\125\345\301\012\307\155 \060\067\220\052\344\236\024\063\136\026\027\125\305\133\265\313 \064\211\222\361\235\046\217\241\007\324\306\262\170\120\333\014 \014\013\174\013\214\101\327\271\351\335\214\210\367\243\115\262 \062\314\330\027\332\315\267\316\146\235\324\375\136\377\275\227 \076\051\165\347\176\247\142\130\257\045\064\245\101\307\075\274 \015\120\312\003\003\017\010\132\037\225\163\170\142\277\257\162  $\label{eq:condition} $$ \024\151\016\245\345\003\016\170\216\046\050\102\360\007\013\142 $$$  $\label{eq:condition} $$ \040\020\147\071\106\372\251\003\314\004\070\172\146\357\040\203$ \265\214\112\126\216\221\000\374\216\134\202\336\210\240\303\342 \150\156\175\215\357\074\335\145\364\135\254\121\357\044\200\256 \252\126\227\157\371\255\175\332\141\077\230\167\074\245\221\266  $\label{eq:condition} $$ \034\214\046\332\145\242\011\155\301\342\124\343\271\312\114\114$ \200\217\167\173\140\232\036\337\266\362\110\036\016\272\116\124 \155\230\340\341\242\032\242\167\120\317\304\143\222\354\107\031 \235\353\346\153\316\301\002\003\001\000\001\243\201\254\060\201 \251\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001  $\label{eq:condition} $$ \006\000\17\006\003\125\035\023\001\001\377\004\005\060\003\001 $$$ 

\001\377\060\035\006\003\125\035\016\004\026\004\024\133\045\173 \226\244\145\121\176\270\071\363\300\170\146\136\350\072\347\360 \356\060\037\006\003\125\035\043\004\030\060\026\200\024\133\045 \173\226\244\145\121\176\270\071\363\300\170\146\136\350\072\347 \360\356\060\106\006\003\125\035\040\004\077\060\075\060\073\006  $\label{eq:condition} $$ \011\140\205\164\001\131\001\002\001\001\060\056\060\054\006\010 $$$ \053\006\001\005\005\007\002\001\026\040\150\164\164\160\072\057  $\begin{tabular}{l} $$ \begin{tabular}{l} $\begin{tabular}{l} $\b$ \163\163\151\147\156\056\143\157\155\057\060\015\006\011\052\206 \110\206\367\015\001\001\005\005\000\003\202\002\001\000\047\272 \343\224\174\361\256\300\336\027\346\345\330\325\365\124\260\203  $\label{eq:condition} $$ 364\273\315\136\005\173\117\237\165\146\257\074\350\126\176\374$$$ \162\170\070\003\331\053\142\033\000\271\370\351\140\315\314\316 \201\053\343\203\204\346\042\207\216\175\340\356\002\231\141\270 \036\364\270\053\210\022\026\204\302\061\223\070\226\061\246\271  $\label{eq:condition} $$ \073\123\077\303\044\223\126\133\151\222\354\305\301\273\070\000 $$$ \343\354\027\251\270\334\307\174\001\203\237\062\107\272\122\042 \064\035\062\172\011\126\247\174\045\066\251\075\113\332\300\202 \157\012\273\022\310\207\113\047\021\371\036\055\307\223\077\236 \333\137\046\153\122\331\056\212\361\024\306\104\215\025\251\267 \277\275\336\246\032\356\256\055\373\110\167\027\376\273\354\257  $\label{eq:condition} $$ \030\365\052\121\360\071\204\227\225\154\156\033\303\053\304\164$$$ \140\171\045\260\012\047\337\337\136\322\071\317\105\175\102\113  $\label{eq:condition} $$ 37\263\054\036\305\306\135\312\125\072\240\234\151\232\217\332$ \357\262\260\074\237\207\154\022\053\145\160\025\122\061\032\044 \317\157\061\043\120\037\214\117\217\043\303\164\101\143\034\125 \250\024\335\076\340\121\120\317\361\033\060\126\016\222\260\202 \205\330\203\313\042\144\274\055\270\045\325\124\242\270\006\352 \255\222\244\044\240\301\206\265\112\023\152\107\317\056\013\126 \225\124\313\316\232\333\152\264\246\262\333\101\010\206\047\167 \367\152\240\102\154\013\070\316\327\165\120\062\222\302\337\053 \060\042\110\320\325\101\070\045\135\244\351\135\237\306\224\165 \320\105\375\060\227\103\217\220\253\012\307\206\163\140\112\151 \055\336\245\170\327\006\332\152\236\113\076\167\072\040\023\042 \001\320\277\150\236\143\140\153\065\115\013\155\272\241\075\300 \223\340\177\043\263\125\255\162\045\116\106\371\322\026\357\260 \144\301\001\236\351\312\240\152\230\016\317\330\140\362\057\111  $\label{eq:condition} $$ \270\344\102\341\070\065\026\364\310\156\117\367\201\126\350\272 $$$ \243\276\043\257\256\375\157\003\340\002\073\060\166\372\033\155 \101\317\001\261\351\270\311\146\364\333\046\363\072\244\164\362 \111\044\133\311\260\320\127\301\372\076\172\341\227\311 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

<sup>#</sup> Trust for "SwissSign Gold CA - G2"

```
# Serial Number:00:bb:40:1c:43:f5:5e:4f:b0
# Subject: CN=SwissSign Gold CA - G2,O=SwissSign AG,C=CH
# Not Valid Before: Wed Oct 25 08:30:35 2006
# Not Valid After: Sat Oct 25 08:30:35 2036
# Fingerprint (SHA-256):
62:DD:0B:E9:B9:F5:0A:16:3E:A0:F8:E7:5C:05:3B:1E:CA:57:EA:55:C8:68:8F:64:7C:68:81:F2:C8:35:7B:95
# Fingerprint (SHA1): D8:C5:38:8A:B7:30:1B:1B:6E:D4:7A:E6:45:25:3A:6F:9F:1A:27:61
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "SwissSign Gold CA - G2"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\330\305\070\212\267\060\033\033\156\324\172\346\105\045\072\157
\237\032\047\141
END
CKA CERT MD5 HASH MULTILINE OCTAL
\044\167\331\250\221\321\073\372\210\055\302\377\370\315\063\223
END
CKA ISSUER MULTILINE OCTAL
\060\105\061\013\060\011\006\003\125\004\006\023\002\103\110\061
\151\147\156\040\101\107\061\037\060\035\006\003\125\004\003\023
\026\123\167\151\163\163\123\151\147\156\040\107\157\154\144\040
\103\101\040\055\040\107\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\label{eq:condition} $$ \002\011\000\273\100\034\103\365\136\117\260$
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "SwissSign Silver CA - G2"
# Issuer: CN=SwissSign Silver CA - G2,O=SwissSign AG,C=CH
# Serial Number:4f:1b:d4:2f:54:bb:2f:4b
# Subject: CN=SwissSign Silver CA - G2,O=SwissSign AG,C=CH
# Not Valid Before: Wed Oct 25 08:32:46 2006
# Not Valid After: Sat Oct 25 08:32:46 2036
# Fingerprint (SHA-256):
BE:6C:4D:A2:BB:B9:BA:59:B6:F3:93:97:68:37:42:46:C3:C0:05:99:3F:A9:8F:02:0D:1D:ED:BE:D4:8A:81:D5
# Fingerprint (SHA1): 9B:AA:E5:9F:56:EE:21:CB:43:5A:BE:25:93:DF:A7:F0:40:D1:1D:CB
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
```

# Issuer: CN=SwissSign Gold CA - G2,O=SwissSign AG,C=CH

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "SwissSign Silver CA - G2"

 ${\tt CKA\_CERTIFICATE\_TYPE\ CK\_CERTIFICATE\_TYPE\ CKC\_X\_509}$ 

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \00107\061\013\060\011\006\003\125\004\006\023\002\103\110\061\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123\151\147\156\040\123\151\154\166\145\162\040\103\101\040\055\040\107\062$ 

**END** 

CKA ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000107\061\013\060\011\006\003\125\004\006\023\002\103\110\061\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123\151\147\156\040\123\151\154\166\145\162\040\103\101\040\055\040\107\062$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\010\117\033\324\057\124\273\057\113

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\275\060\202\003\245\240\003\002\001\002\002\010\117 \033\324\057\124\273\057\113\060\015\006\011\052\206\110\206\367 \015\001\001\005\005\000\060\107\061\013\060\011\006\003\125\004 \006\023\002\103\110\061\025\060\023\006\003\125\004\012\023\014 \123\167\151\163\163\123\151\147\156\040\101\107\061\041\060\037 \006\003\125\004\003\023\030\123\167\151\163\163\123\151\147\156 \040\123\151\154\166\145\162\040\103\101\040\055\040\107\062\060  $\label{eq:condition} $$ \0.036\0.027\0.015\0.060\0.060\0.062\0.065\0.060\0.070\0.063\0.062\0.064\0.066\0.032$ \027\015\063\066\061\060\062\065\060\070\063\062\064\066\132\060 \107\061\013\060\011\006\003\125\004\006\023\002\103\110\061\025 \060\023\006\003\125\004\012\023\014\123\167\151\163\163\123\151 \147\156\040\101\107\061\041\060\037\006\003\125\004\003\023\030 \123\167\151\163\163\123\151\147\156\040\123\151\154\166\145\162 \040\103\101\040\055\040\107\062\060\202\002\042\060\015\006\011 \052\206\110\206\367\015\001\001\001\005\000\003\202\002\017\000  $\label{eq:condition} $$ \002\002\002\002\000\000\304\361\207\177\323\170\061 $$$ \367\070\311\370\303\231\103\274\307\367\274\067\347\116\161\272 \113\217\245\163\035\134\156\230\256\003\127\256\070\067\103\057  $\label{eq:condition} $$ \027\075\037\310\316\150\020\301\170\256\031\003\053\020\372\054$$$ \171\203\366\350\271\150\271\125\362\004\104\247\071\371\374\004 \213\036\361\242\115\047\371\141\173\272\267\345\242\023\266\353 \141\076\320\154\321\346\373\372\136\355\035\264\236\240\065\133 \241\222\313\360\111\222\376\205\012\005\076\346\331\013\342\117 \273\334\225\067\374\221\351\062\065\042\321\037\072\116\047\205 \235\260\025\224\062\332\141\015\107\115\140\102\256\222\107\350

\203\132\120\130\351\212\213\271\135\241\334\335\231\112\037\066 \147\273\110\344\203\266\067\353\110\072\257\017\147\217\027\007 \350\004\312\357\152\061\207\324\300\266\371\224\161\173\147\144 \270\266\221\112\102\173\145\056\060\152\014\365\220\356\225\346 \362\315\202\354\331\241\112\354\366\262\113\345\105\205\346\155 \170\223\004\056\234\202\155\066\251\304\061\144\037\206\203\013 \052\364\065\012\170\311\125\317\101\260\107\351\060\237\231\276 \141\250\006\204\271\050\172\137\070\331\033\251\070\260\203\177 \163\301\303\073\110\052\202\017\041\233\270\314\250\065\303\204 \033\203\263\076\276\244\225\151\001\072\211\000\170\004\331\311 \364\231\031\253\126\176\133\213\206\071\025\221\244\020\054\011  $\label{eq:condition} $$ \062\200\140\263\223\300\052\266\030\013\235\176\215\111\362\020 $$$ \112\177\371\325\106\057\031\222\243\231\247\046\254\273\214\074 \346\016\274\107\007\334\163\121\361\160\144\057\010\371\264\107  $\label{eq:condition} $$ \051\067\205\222\150\146\274\203\070\376\173 $$$ \071\056\323\120\360\037\373\136\140\266\251\246\372\047\101\361 \233\030\162\362\365\204\164\112\311\147\304\124\256\110\144\337 \214\321\156\260\035\341\007\217\010\036\231\234\161\351\114\330 \245\367\107\022\037\164\321\121\236\206\363\302\242\043\100\013 \163\333\113\246\347\163\006\214\301\240\351\301\131\254\106\372 \346\057\370\317\161\234\106\155\271\304\025\215\070\171\003\105 \110\357\304\135\327\010\356\207\071\042\206\262\015\017\130\103 \367\161\251\110\056\375\352\326\037\002\003\001\000\001\243\201 \254\060\201\251\060\016\006\003\125\035\017\001\001\377\004\004 \003\002\001\006\060\017\006\003\125\035\023\001\001\377\004\005 \060\003\001\001\377\060\035\006\003\125\035\016\004\026\004\024 \027\240\315\301\344\101\266\072\133\073\313\105\235\275\034\302 \230\372\206\130\060\037\006\003\125\035\043\004\030\060\026\200 \024\027\240\315\301\344\101\266\072\133\073\313\105\235\275\034 \302\230\372\206\130\060\106\006\003\125\035\040\004\077\060\075  $\label{eq:condition} $$ \000\073\006\011\140\205\164\001\131\001\003\001\001\000\0056\060 $$$ \054\006\010\053\006\001\005\005\007\002\001\026\040\150\164\164 \160\072\057\057\162\145\160\157\163\151\164\157\162\171\056\163 \167\151\163\163\163\151\147\156\056\143\157\155\057\060\015\006 \011\052\206\110\206\367\015\001\001\005\005\000\003\202\002\001 \000\163\306\201\340\047\322\055\017\340\225\060\342\232\101\177 \120\054\137\137\142\141\251\206\152\151\030\014\164\111\326\135 \204\352\101\122\030\157\130\255\120\126\040\152\306\275\050\151 \130\221\334\221\021\065\251\072\035\274\032\245\140\236\330\037  $\label{eq:condition} $$ \frac{177}105\\221\\151\\331\\176\\273\\170\\162\\301\\006\\017\\052\\316\\217\\205$ \160\141\254\240\315\013\270\071\051\126\204\062\116\206\273\075 \304\052\331\327\037\162\356\376\121\241\042\101\261\161\002\143  $\label{eq:condition} $$ \032\202\260\142\253\136\127\022\037\337\313\335\165\240\300\135$ \171\220\214\033\340\120\346\336\061\376\230\173\160\137\245\220 \330\255\370\002\266\157\323\140\335\100\113\042\305\075\255\072 \172\237\032\032\107\221\171\063\272\202\334\062\151\003\226\156 \037\113\360\161\376\343\147\162\240\261\277\134\213\344\372\231 \042\307\204\271\033\215\043\227\077\355\045\340\317\145\273\365

\141\004\357\335\036\262\132\101\042\132\241\237\135\054\350\133 \311\155\251\014\014\170\252\140\306\126\217\001\132\014\150\274 \151\031\171\304\037\176\227\005\277\305\351\044\121\136\324\325 \113\123\355\331\043\132\066\003\145\243\301\003\255\101\060\363  $\label{eq:condition} $$ 106\033\205\220\257\145\265\325\261\344\026\133\170\165\035\227 $$$  $\label{eq:condition} $$ \frac{172\155\131\251\052\217\173\336\303\207\211\020\231\111\163\170}{1}$$ \310\075\275\121\065\164\052\325\361\176\151\033\052\273\073\275  $\label{eq:condition} $$ \045\270\232\132\075\162\141\220\146\207\356\014\326\115\324\021 $$$ \164\013\152\376\013\003\374\243\125\127\211\376\112\313\256\133 \027\005\310\362\215\043\061\123\070\322\055\152\077\202\271\215  $\label{eq:condition} $$ \010\152\367\136\101\164\156\303\021\176\007\254\051\140\221\077 $$$  $\label{eq:condition} $$ \070\312\127\020\015\275\060\057\307\245\346\101\240\332\256\005$$ \207\232\240\244\145\154\114\011\014\211\272\270\323\271\300\223 \212\060\372\215\345\232\153\025\001\116\147\252\332\142\126\076  $\label{eq:condition} $$ \204\010\146\322\304\066\175\247\076\020\374\210\340\324\200\345 $$$ \000\275\252\363\116\006\243\172\152\371\142\162\343\011\117\353 \233\016\001\043\361\237\273\174\334\334\154\021\227\045\262\362 \264\143\024\322\006\052\147\214\203\365\316\352\007\330\232\152 \036\354\344\012\273\052\114\353\011\140\071\316\312\142\330\056 \156

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "SwissSign Silver CA - G2"
```

BE:6C:4D:A2:BB:B9:BA:59:B6:F3:93:97:68:37:42:46:C3:C0:05:99:3F:A9:8F:02:0D:1D:ED:BE:D4:8A:81:D5

# Fingerprint (SHA1): 9B:AA:E5:9F:56:EE:21:CB:43:5A:BE:25:93:DF:A7:F0:40:D1:1D:CB

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "SwissSign Silver CA - G2"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\233\252\345\237\126\356\041\313\103\132\276\045\223\337\247\360

\100\321\035\313

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\340\006\241\311\175\317\311\374\015\300\126\165\226\330\142\023

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\107\061\013\060\011\006\003\125\004\006\023\002\103\110\061$ 

<sup>#</sup> Issuer: CN=SwissSign Silver CA - G2,O=SwissSign AG,C=CH

<sup>#</sup> Serial Number:4f:1b:d4:2f:54:bb:2f:4b

<sup>#</sup> Subject: CN=SwissSign Silver CA - G2,O=SwissSign AG,C=CH

<sup>#</sup> Not Valid Before: Wed Oct 25 08:32:46 2006

<sup>#</sup> Not Valid After: Sat Oct 25 08:32:46 2036

<sup>#</sup> Fingerprint (SHA-256):

```
\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123
\151\147\156\040\101\107\061\041\060\037\006\003\125\004\003\023
\030\123\167\151\163\163\123\151\147\156\040\123\151\154\166\145
\162\040\103\101\040\055\040\107\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\010\117\033\324\057\124\273\057\113
END
{\tt CKA\_TRUST\_SERVER\_AUTH\ CK\_TRUST\ CKT\_NSS\_TRUSTED\_DELEGATOR}
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "SecureTrust CA"
# Issuer: CN=SecureTrust CA,O=SecureTrust Corporation,C=US
# Serial Number:0c:f0:8e:5c:08:16:a5:ad:42:7f:f0:eb:27:18:59:d0
# Subject: CN=SecureTrust CA,O=SecureTrust Corporation,C=US
# Not Valid Before: Tue Nov 07 19:31:18 2006
# Not Valid After: Mon Dec 31 19:40:55 2029
# Fingerprint (SHA-256):
F1:C1:B5:0A:E5:A2:0D:D8:03:0E:C9:F6:BC:24:82:3D:D3:67:B5:25:57:59:B4:E7:1B:61:FC:E9:F7:37:5D:73
# Fingerprint (SHA1): 87:82:C6:C3:04:35:3B:CF:D2:96:92:D2:59:3E:7D:44:D9:34:FF:11
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "SecureTrust CA"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA_SUBJECT MULTILINE_OCTAL
\060\110\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\040\060\036\006\003\125\004\012\023\027\123\145\143\165\162\145
\124\162\165\163\164\040\103\157\162\160\157\162\141\164\151\157
\156\061\027\060\025\006\003\125\004\003\023\016\123\145\143\165
\162\145\124\162\165\163\164\040\103\101
END
CKA ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\label{eq:condition} $$ \060\110\061\013\060\011\006\003\125\004\006\023\002\125\123\061\
\040\060\036\006\003\125\004\012\023\027\123\145\143\165\162\145
\124\162\165\163\164\040\103\157\162\160\157\162\141\164\151\157
\156\061\027\060\025\006\003\125\004\003\023\016\123\145\143\165
\162\145\124\162\165\163\164\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\014\360\216\134\010\026\245\255\102\177\360\353\047\030
\131\320
```

#### **END**

#### CKA VALUE MULTILINE OCTAL

\060\202\003\270\060\202\002\240\240\003\002\001\002\002\002\014 \360\216\134\010\026\245\255\102\177\360\353\047\030\131\320\060 \015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\110 \061\013\060\011\006\003\125\004\006\023\002\125\123\061\040\060 \036\006\003\125\004\012\023\027\123\145\143\165\162\145\124\162 \165\163\164\040\103\157\162\160\157\162\141\164\151\157\156\061 \027\060\025\006\003\125\004\003\023\016\123\145\143\165\162\145 \124\162\165\163\164\040\103\101\060\036\027\015\060\066\061\061 \060\067\061\071\063\061\061\070\132\027\015\062\071\061\062\063  $\label{eq:condition} $$ \061\061\071\064\060\065\065\132\060\110\061\013\060\011\006\003$ \125\004\006\023\002\125\123\061\040\060\036\006\003\125\004\012 \023\027\123\145\143\165\162\145\124\162\165\163\164\040\103\157  $\label{eq:condition} $$ 162\160\157\162\141\164\151\157\156\061\027\060\025\006\003\125$$ \004\003\023\016\123\145\143\165\162\145\124\162\165\163\164\040  $\label{eq:condition} $$ 103\101\060\202\001\042\060\015\006\011\052\206\110\206\367\015 $$$ \001\001\001\005\000\003\202\001\017\000\060\202\001\012\002\202 \001\001\000\253\244\201\345\225\315\365\366\024\216\302\117\312 \324\342\170\225\130\234\101\341\015\231\100\044\027\071\221\063 \146\351\276\341\203\257\142\134\211\321\374\044\133\141\263\340 \021\021\101\034\035\156\360\270\273\370\336\247\201\272\246\110  $\label{eq:condition} $$ 306 \times 237 \times 276 \times 216 \times 251 \times 076 \times 270 \times 224 \times 355 \times 051 \times 032 \times 216 \times 076 \times 076$ \322\003\035\003\357\155\015\147\034\127\327\006\255\312\310\365 \376\016\257\146\045\110\004\226\013\135\243\272\026\303\010\117 \321\106\370\024\134\362\310\136\001\231\155\375\210\314\206\250 \301\157\061\102\154\122\076\150\313\363\031\064\337\273\207\030  $\label{eq:condition} $$ 126\200\046\304\320\334\300\157\337\336\240\302\221\026\240\144 $$$ \021\113\104\274\036\366\347\372\143\336\146\254\166\244\161\243 \354\066\224\150\172\167\244\261\347\016\057\201\172\342\265\162  $\label{eq:condition} $$ \206\357\242\153\213\360\017\333\323\131\077\272\162\274\104\044 $$$ \234\343\163\263\367\257\127\057\102\046\235\251\164\272\000\122 \362\113\315\123\174\107\013\066\205\016\146\251\010\227\026\064 \127\301\146\367\200\343\355\160\124\307\223\340\056\050\025\131 \207\272\273\002\003\001\000\001\243\201\235\060\201\232\060\023 \006\011\053\006\001\004\001\202\067\024\002\004\006\036\004\000 \103\000\101\060\013\006\003\125\035\017\004\004\003\002\001\206  $\label{eq:condition} $$ \000\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001\$ \377\060\035\006\003\125\035\016\004\026\004\024\102\062\266\026 \372\004\375\376\135\113\172\303\375\367\114\100\035\132\103\257 \060\064\006\003\125\035\037\004\055\060\053\060\051\240\047\240 \045\206\043\150\164\164\160\072\057\057\143\162\154\056\163\145 \143\165\162\145\164\162\165\163\164\056\143\157\155\057\123\124 \103\101\056\143\162\154\060\020\006\011\053\006\001\004\001\202  $\label{eq:condition} $$ \067\025\001\004\003\002\001\000\060\015\006\011\052\206\110\206$ \367\015\001\001\005\005\000\003\202\001\001\000\060\355\117\112 \341\130\072\122\162\133\265\246\243\145\030\246\273\121\073\167 \351\235\352\323\237\134\340\105\145\173\015\312\133\342\160\120  $\label{eq:control_co$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "SecureTrust CA"
- # Issuer: CN=SecureTrust CA,O=SecureTrust Corporation,C=US
- # Serial Number:0c:f0:8e:5c:08:16:a5:ad:42:7f:f0:eb:27:18:59:d0
- # Subject: CN=SecureTrust CA,O=SecureTrust Corporation,C=US
- # Not Valid Before: Tue Nov 07 19:31:18 2006
- # Not Valid After: Mon Dec 31 19:40:55 2029
- # Fingerprint (SHA-256):

F1:C1:B5:0A:E5:A2:0D:D8:03:0E:C9:F6:BC:24:82:3D:D3:67:B5:25:57:59:B4:E7:1B:61:FC:E9:F7:37:5D:73

# Fingerprint (SHA1): 87:82:C6:C3:04:35:3B:CF:D2:96:92:D2:59:3E:7D:44:D9:34:FF:11

CKA CLASS CK OBJECT CLASS CKO NSS TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "SecureTrust CA"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \207\202\306\303\004\065\073\317\322\226\222\322\131\076\175\104\331\064\377\021$ 

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ 334 \cdot 62 \cdot 303 \cdot 247 \cdot 155 \cdot 045 \cdot 127 \cdot 307 \cdot 150 \cdot 011 \cdot 235 \cdot 352 \cdot 055 \cdot 251 \cdot 242 \cdot 321$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \0001100610130600111006003125\\0040060023002125123\\061040060036125004\\012023027123\\145143\\165162\\145124\\162\\165\\163\\164\\040\\103\\157\\162\\160\\157\\162\\141\\164\\151\\157\\156\\061\\027\\060\\025\\006\\003\\125\\004\\003\\023\\016\\123\\145\\143\\165\\162\\145\\124\\162\\165\\163\\164\\040\\103\\101$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

```
\002\020\014\360\216\134\010\026\245\255\102\177\360\353\047\030
\131\320
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
#
# Certificate "Secure Global CA"
# Issuer: CN=Secure Global CA,O=SecureTrust Corporation,C=US
# Serial Number:07:56:22:a4:e8:d4:8a:89:4d:f4:13:c8:f0:f8:ea:a5
# Subject: CN=Secure Global CA,O=SecureTrust Corporation,C=US
# Not Valid Before: Tue Nov 07 19:42:28 2006
# Not Valid After: Mon Dec 31 19:52:06 2029
# Fingerprint (SHA-256):
42:00:F5:04:3A:C8:59:0E:BB:52:7D:20:9E:D1:50:30:29:FB:CB:D4:1C:A1:B5:06:EC:27:F1:5A:DE:7D:AC:69
# Fingerprint (SHA1): 3A:44:73:5A:E5:81:90:1F:24:86:61:46:1E:3B:9C:C4:5F:F5:3A:1B
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "Secure Global CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\112\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\label{eq:condition} $$ \0040\003\006\003\125\004\012\023\027\123\145\143\165\162\145 
\124\162\165\163\164\040\103\157\162\160\157\162\141\164\151\157
\156\061\031\060\027\006\003\125\004\003\023\020\123\145\143\165
\162\145\040\107\154\157\142\141\154\040\103\101
END
CKA ID UTF8 "0"
CKA ISSUER MULTILINE OCTAL
\060\112\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\040\060\036\006\003\125\004\012\023\027\123\145\143\165\162\145
\124\162\165\163\164\040\103\157\162\160\157\162\141\164\151\157
\156\061\031\060\027\006\003\125\004\003\023\020\123\145\143\165
\162\145\040\107\154\157\142\141\154\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\007\126\042\244\350\324\212\211\115\364\023\310\360\370
\352\245
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\274\060\202\002\244\240\003\002\001\002\002\020\007
\126\042\244\350\324\212\211\115\364\023\310\360\370\352\245\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\112
```

\061\013\060\011\006\003\125\004\006\023\002\125\123\061\040\060 \036\006\003\125\004\012\023\027\123\145\143\165\162\145\124\162 \165\163\164\040\103\157\162\160\157\162\141\164\151\157\156\061 \031\060\027\006\003\125\004\003\023\020\123\145\143\165\162\145 \040\107\154\157\142\141\154\040\103\101\060\036\027\015\060\066 \061\061\060\067\061\071\064\062\062\070\132\027\015\062\071\061 \062\063\061\061\071\065\062\060\066\132\060\112\061\013\060\011 \006\003\125\004\006\023\002\125\123\061\040\060\036\006\003\125 \103\157\162\160\157\162\141\164\151\157\156\061\031\060\027\006 \003\125\004\003\023\020\123\145\143\165\162\145\040\107\154\157  $\label{eq:condition} $$ 142\141\154\040\103\101\060\202\001\042\060\015\006\011\052\206$ \110\206\367\015\001\001\001\005\000\003\202\001\017\000\060\202  $\label{eq:condition} $$ \001\012\002\202\001\001\000\257\065\056\330\254\154\125\151\006$  $\label{eq:condition} $$ 161\345\023\150\044\263\117\330\314\041\107\370\361\140\070\211 $$$ \211\003\351\275\352\136\106\123\011\334\134\365\132\350\367\105  $\label{eq:condition} $$ \052\002\353\061\141\327\051\063\114\316\307\174\012\067\176\017 $$$ \272\062\230\341\035\227\257\217\307\334\311\070\226\363\333\032 \374\121\355\150\306\320\156\244\174\044\321\256\102\310\226\120 \143\056\340\376\165\376\230\247\137\111\056\225\343\071\063\144 \216\036\244\137\220\322\147\074\262\331\376\101\271\125\247\011 \216\162\005\036\213\335\104\205\202\102\320\111\300\035\140\360  $\label{eq:condition} $$ \frac{321}027\\054\\225\\353\\366\\245\\301\\222\\243\\305\\302\\247\\010\\140\\015$ \140\004\020\226\171\236\026\064\346\251\266\372\045\105\071\310 \036\145\371\223\365\252\361\122\334\231\230\075\245\206\032\014 \065\063\372\113\245\004\006\025\034\061\200\357\252\030\153\302 \173\327\332\316\371\063\040\325\365\275\152\063\055\201\004\373 \260\134\324\234\243\342\134\035\343\251\102\165\136\173\324\167 \357\071\124\272\311\012\030\033\022\231\111\057\210\113\375\120 \142\321\163\347\217\172\103\002\003\001\000\001\243\201\235\060 \201\232\060\023\006\011\053\006\001\004\001\202\067\024\002\004 \006\036\004\000\103\000\101\060\013\006\003\125\035\017\004\004 \003\002\001\206\060\017\006\003\125\035\023\001\001\377\004\005 \060\003\001\001\377\060\035\006\003\125\035\016\004\026\004\024 \257\104\004\302\101\176\110\203\333\116\071\002\354\354\204\172 \346\316\311\244\060\064\006\003\125\035\037\004\055\060\053\060 \051\240\047\240\045\206\043\150\164\164\160\072\057\057\143\162 \154\056\163\145\143\165\162\145\164\162\165\163\164\056\143\157  $\label{eq:condition} $$ \frac{155}057\\123\\107\\103\\101\\056\\143\\162\\154\\060\\020\\006\\011\\053\\006$ \052\206\110\206\367\015\001\001\005\005\000\003\202\001\001\000 \143\032\010\100\175\244\136\123\015\167\330\172\256\037\015\013 \121\026\003\357\030\174\310\343\257\152\130\223\024\140\221\262 \204\334\210\116\276\071\212\072\363\346\202\211\135\001\067\263 \253\044\244\025\016\222\065\132\112\104\136\116\127\372\165\316 \037\110\316\146\364\074\100\046\222\230\154\033\356\044\106\014  $\label{eq:condition} $$ \027\263\122\245\333\245\221\221\317\067\323\157\347\047\010\072$ \116\031\037\072\247\130\134\027\317\171\077\213\344\247\323\046

 $\label{eq:control} $$ \043\235\046\017\130\151\374\107\176\262\320\215\213\223\277\051\117\103\151\164\166\147\113\317\007\214\346\002\367\265\341\264\103\265\113\055\024\237\371\334\046\015\277\246\107\164\006\330\210\321\072\051\060\204\316\322\071\200\142\033\250\307\127\111\274\152\125\121\147\025\112\276\065\007\344\325\165\230\067\171\060\024\333\051\235\154\305\151\314\107\125\242\060\367\314\134\177\302\303\230\034\153\116\026\200\353\172\170\145\105\242\000\032\257\014\015\125\144\064\110\270\222\271\361\264\120\051\362\117\043\037\332\154\254\037\104\341\335\043\170\121\133\307\026\ END$ 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Secure Global CA"
- # Issuer: CN=Secure Global CA,O=SecureTrust Corporation,C=US
- # Serial Number:07:56:22:a4:e8:d4:8a:89:4d:f4:13:c8:f0:f8:ea:a5
- # Subject: CN=Secure Global CA,O=SecureTrust Corporation,C=US
- # Not Valid Before: Tue Nov 07 19:42:28 2006
- # Not Valid After: Mon Dec 31 19:52:06 2029
- # Fingerprint (SHA-256):
- 42:00:F5:04:3A:C8:59:0E:BB:52:7D:20:9E:D1:50:30:29:FB:CB:D4:1C:A1:B5:06:EC:27:F1:5A:DE:7D:AC:69
- # Fingerprint (SHA1): 3A:44:73:5A:E5:81:90:1F:24:86:61:46:1E:3B:9C:C4:5F:F5:3A:1B
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA PRIVATE CK BBOOL CK FALSE
- CKA MODIFIABLE CK BBOOL CK FALSE
- CKA\_LABEL UTF8 "Secure Global CA"
- CKA CERT SHA1 HASH MULTILINE OCTAL
- \072\104\163\132\345\201\220\037\044\206\141\106\036\073\234\304 \137\365\072\033

END

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\317\364\047\015\324\355\334\145\026\111\155\075\332\277\156\336

**END** 

CKA ISSUER MULTILINE OCTAL

\060\112\061\013\060\011\006\003\125\004\006\023\002\125\123\061 \040\060\036\003\125\004\012\023\027\123\145\143\165\162\145

 $\label{eq:locality} $$ \frac{124\\162\\165\\163\\164\\040\\103\\157\\162\\160\\157\\162\\141\\164\\151\\157$ 

\156\061\031\060\027\006\003\125\004\003\023\020\123\145\143\165

\162\145\040\107\154\157\142\141\154\040\103\101

**END** 

 ${\tt CKA\_SERIAL\_NUMBER\ MULTILINE\_OCTAL}$ 

\002\020\007\126\042\244\350\324\212\211\115\364\023\310\360\370 \352\245

END

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

# CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "COMODO Certification Authority"

#

# Issuer: CN=COMODO Certification Authority,O=COMODO CA Limited,L=Salford,ST=Greater

Manchester.C=GB

# Serial Number:4e:81:2d:8a:82:65:e0:0b:02:ee:3e:35:02:46:e5:3d

# Subject: CN=COMODO Certification Authority,O=COMODO CA Limited,L=Salford,ST=Greater

Manchester, C=GB

# Not Valid Before: Fri Dec 01 00:00:00 2006

# Not Valid After: Mon Dec 31 23:59:59 2029

# Fingerprint (SHA-256):

0C:2C:D6:3D:F7:80:6F:A3:99:ED:E8:09:11:6B:57:5B:F8:79:89:F0:65:18:F9:80:8C:86:05:03:17:8B:AF:66:18:F9:80:8C:86:18:F9:80:18:F9:80:18:F9:80:8C:80:18:F9:70:18:F9:70:18:F

# Fingerprint (SHA1): 66:31:BF:9E:F7:4F:9E:B6:C9:D5:A6:0C:BA:6A:BE:D1:F7:BD:EF:7B

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "COMODO Certification Authority"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA\_SUBJECT MULTILINE\_OCTAL

\060\201\201\061\013\060\011\006\003\125\004\006\023\002\107\102

\145\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060

\016\006\003\125\004\007\023\007\123\141\154\146\157\162\144\061

 $\label{eq:condition} $$ \032\060\030\006\003\125\004\012\023\021\103\117\115\117\104\117$ 

 $\label{eq:condition} $$ \003\125\004\003\023\036\103\117\115\117\104\117\040\103\145\162$$ 

 $\\ 164 \\ 151 \\ 146 \\ 151 \\ 143 \\ 141 \\ 164 \\ 151 \\ 157 \\ 156 \\ 040 \\ 101 \\ 165 \\ 164 \\ 150 \\ 157 \\$ 

\162\151\164\171

**END** 

CKA\_ID UTF8 "0"

## CKA ISSUER MULTILINE OCTAL

 $\label{eq:control} $$ \000\201\201\061\013\060\011\006\003\125\004\010\023\022\107\162\145\141\164\145\162\061\020\060\0115\141\156\143\150\145\163\164\145\162\061\020\060\016\006\003\125\004\007\023\007\123\141\154\146\157\162\144\061\032\060\030\006\003\125\004\012\023\021\103\117\115\117\104\117\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\116\201\055\212\202\145\340\013\002\356\076\065\002\106 \345\075

#### **END**

#### CKA VALUE MULTILINE OCTAL

\060\202\004\035\060\202\003\005\240\003\002\001\002\002\020\116 \201\055\212\202\145\340\013\002\356\076\065\002\106\345\075\060 \015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\201 \201\061\013\060\011\006\003\125\004\006\023\002\107\102\061\033 \060\031\006\003\125\004\010\023\022\107\162\145\141\164\145\162 \040\115\141\156\143\150\145\163\164\145\162\061\020\060\016\006  $\\ \\003\\125\\004\\007\\023\\007\\123\\141\\154\\146\\157\\162\\144\\061\\032\\060$ \030\006\003\125\004\012\023\021\103\117\115\117\104\117\040\103 \101\040\114\151\155\151\164\145\144\061\047\060\045\006\003\125  $\\ \\004\\ \\003\\ \\023\\ \\036\\ \\103\\ \\117\\ \\115\\ \\117\\ \\104\\ \\117\\ \\040\\ \\103\\ \\145\\ \\162\\ \\164\\ \\151$ \146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151 \164\171\060\036\027\015\060\066\061\062\060\061\060\060\060 \060\060\132\027\015\062\071\061\062\063\061\062\063\065\071\065 \071\132\060\201\201\061\013\060\011\006\003\125\004\006\023\002  $\label{eq:condition} $$ 107\102\061\033\060\031\006\003\125\004\010\023\022\107\162\145$$ \141\164\145\162\040\115\141\156\143\150\145\163\164\145\162\061 \020\060\016\006\003\125\004\007\023\007\123\141\154\146\157\162  $\label{eq:condition} $$ 144\061\032\060\030\006\003\125\004\012\023\021\103\117\115\117$ \104\117\040\103\101\040\114\151\155\151\164\145\144\061\047\060 \045\006\003\125\004\003\023\036\103\117\115\117\104\117\040\103 \150\157\162\151\164\171\060\202\001\042\060\015\006\011\052\206 \110\206\367\015\001\001\001\005\000\003\202\001\017\000\060\202 \001\012\002\202\001\001\000\320\100\213\213\162\343\221\033\367 \121\301\033\124\004\230\323\251\277\301\346\212\135\073\207\373 \273\210\316\015\343\057\077\006\226\360\242\051\120\231\256\333 \073\241\127\260\164\121\161\315\355\102\221\115\101\376\251\310 \330\152\206\167\104\273\131\146\227\120\136\264\324\054\160\104  $\label{eq:condition} $$ \frac{317}{332} \frac{067}{225} \frac{102}{151} \frac{074}{060} \frac{304}{161} \frac{263}{122} \frac{360}{041} \frac{115}{241}$ \330\272\071\174\034\236\243\044\235\362\203\026\230\252\026\174 \103\233\025\133\267\256\064\221\376\324\142\046\030\106\232\077 \353\301\371\361\220\127\353\254\172\015\213\333\162\060\152\146 \325\340\106\243\160\334\150\331\377\004\110\211\167\336\265\351 \373\147\155\101\351\274\071\275\062\331\142\002\361\261\250\075 \156\067\234\342\057\342\323\242\046\213\306\270\125\103\210\341  $\\ \\043\\ \\076\\ \\245\\ \\322\\ \\044\\ \\071\\ \\152\\ \\107\\ \\253\\ \\000\\ \\324\\ \\241\\ \\263\\ \\251\\ \\045\\ \\376$  $\label{eq:condition} $$ \015\077\247\035\272\323\121\301\013\244\332\254\070\357\125\120 $$$  $\\ \\044\\005\\145\\106\\223\\064\\117\\055\\215\\255\\306\\324\\041\\031\\322\\216$ \312\005\141\161\007\163\107\345\212\031\022\275\004\115\316\116 \234\245\110\254\273\046\367\002\003\001\000\001\243\201\216\060 \201\213\060\035\006\003\125\035\016\004\026\004\024\013\130\345 \213\306\114\025\067\244\100\251\060\251\041\276\107\066\132\126  $\label{eq:condition} $$ 377 \cdot 060 \cdot 016 \cdot 006 \cdot 003 \cdot 125 \cdot 035 \cdot 017 \cdot 001 \cdot 001 \cdot 377 \cdot 004 \cdot 004 \cdot 003 \cdot 002 \cdot 001$ \006\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001 \001\377\060\111\006\003\125\035\037\004\102\060\100\060\076\240 \074\240\072\206\070\150\164\164\160\072\057\057\143\162\154\056

\143\157\155\157\144\157\143\141\056\143\157\155\057\103\117\115 \117\104\117\103\145\162\164\151\146\151\143\141\164\151\157\156 \101\165\164\150\157\162\151\164\171\056\143\162\154\060\015\006  $\label{eq:condition} $$ \011\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001$  $\label{eq:condition} $$ \000\076\230\236\233\366\033\351\327\071\267\170\256\035\162\030 $$$ \111\323\207\344\103\202\353\077\311\252\365\250\265\357\125\174 \041\122\145\371\325\015\341\154\364\076\214\223\163\221\056\002  $\label{eq:condition} $$ 304\116\007\161\157\300\217\070\141\010\250\036\201\012\300\057$$$ \040\057\101\213\221\334\110\105\274\361\306\336\272\166\153\063 \310\000\055\061\106\114\355\347\235\317\210\224\377\063\300\126 \350\044\206\046\270\330\070\070\337\052\153\335\022\314\307\077  $\label{eq:condition} $$ 107\027\114\242\302\006\226\011\326\333\376\077\074\106\101\337 $$$ \130\342\126\017\074\073\301\034\223\065\331\070\122\254\356\310 \354\056\060\116\224\065\264\044\037\113\170\151\332\362\002\070 \314\225\122\223\360\160\045\131\234\040\147\304\356\371\213\127 \141\364\222\166\175\077\204\215\125\267\350\345\254\325\361\365  $\label{eq:condition} $$ \031\126\246\132\373\220\034\257\223\353\345\034\324\147\227\135$$ \004\016\276\013\203\246\027\203\271\060\022\240\305\063\025\005 \271\015\373\307\005\166\343\330\112\215\374\064\027\243\306\041 \050\276\060\105\061\036\307\170\276\130\141\070\254\073\342\001 \145

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "COMODO Certification Authority"
- # Issuer: CN=COMODO Certification Authority,O=COMODO CA Limited,L=Salford,ST=Greater Manchester,C=GB
- # Serial Number:4e:81:2d:8a:82:65:e0:0b:02:ee:3e:35:02:46:e5:3d
- # Subject: CN=COMODO Certification Authority,O=COMODO CA Limited,L=Salford,ST=Greater Manchester.C=GB
- # Not Valid Before: Fri Dec 01 00:00:00 2006
- # Not Valid After: Mon Dec 31 23:59:59 2029
- # Fingerprint (SHA-256):
- 0C:2C:D6:3D:F7:80:6F:A3:99:ED:E8:09:11:6B:57:5B:F8:79:89:F0:65:18:F9:80:8C:86:05:03:17:8B:AF:66
- # Fingerprint (SHA1): 66:31:BF:9E:F7:4F:9E:B6:C9:D5:A6:0C:BA:6A:BE:D1:F7:BD:EF:7B

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

 $CKA\_PRIVATE\ CK\_BBOOL\ CK\_FALSE$ 

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "COMODO Certification Authority"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\146\061\277\236\367\117\236\266\311\325\246\014\272\152\276\321 \367\275\357\173

END

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\134\110\334\367\102\162\354\126\224\155\034\314\161\065\200\165

```
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\201\201\061\013\060\011\006\003\125\004\006\023\002\107\102
\label{eq:condition} $$ \061\03\060\031\006\003\125\004\010\023\022\107\162\145\141\164 $$
\145\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060
\016\006\003\125\004\007\023\007\123\141\154\146\157\162\144\061
\032\060\030\006\003\125\004\012\023\021\103\117\115\117\104\117
\\ \\ 040\\ \\ 103\\ \\ 101\\ \\ 040\\ \\ 114\\ \\ 151\\ \\ 155\\ \\ 151\\ \\ 164\\ \\ 145\\ \\ 144\\ \\ 061\\ \\ 047\\ \\ 060\\ \\ 045\\ \\ 006
\003\125\004\003\023\036\103\117\115\117\104\117\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\020\116\201\055\212\202\145\340\013\002\356\076\065\002\106
\345\075
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Network Solutions Certificate Authority"
# Issuer: CN=Network Solutions Certificate Authority,O=Network Solutions L.L.C.,C=US
# Serial Number:57:cb:33:6f:c2:5c:16:e6:47:16:17:e3:90:31:68:e0
# Subject: CN=Network Solutions Certificate Authority,O=Network Solutions L.L.C.,C=US
# Not Valid Before: Fri Dec 01 00:00:00 2006
# Not Valid After: Mon Dec 31 23:59:59 2029
# Fingerprint (SHA-256):
15:F0:BA:00:A3:AC:7A:F3:AC:88:4C:07:2B:10:11:A0:77:BD:77:C0:97:F4:01:64:B2:F8:59:8A:BD:83:86:0C
# Fingerprint (SHA1): 74:F8:A3:C3:EF:E7:B3:90:06:4B:83:90:3C:21:64:60:20:E5:DF:CE
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Network Solutions Certificate Authority"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\142\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\041\060\037\006\003\125\004\012\023\030\116\145\164\167\157\162
\153\040\123\157\154\165\164\151\157\156\163\040\114\056\114\056
\103\056\061\060\060\056\006\003\125\004\003\023\047\116\145\164
\167\157\162\153\040\123\157\154\165\164\151\157\156\163\040\103
```

\162\151\164\171

CKA\_ID UTF8 "0"

**END** 

\145\162\164\151\146\151\143\141\164\145\040\101\165\164\150\157

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000142\0013\006\003\125\004\0006\023\002\125\123\061\041\060\037\006\003\125\004\012\023\030\116\145\164\167\157\162\153\040\123\157\156\163\040\114\056\114\056\103\056\061\060\0056\006\003\125\0004\003\023\047\116\145\164\167\157\156\163\040\103\145\162\151\146\151\143\141\164\145\040\101\165\164\150\157\162\151\164\171$ 

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

\002\020\127\313\063\157\302\134\026\346\107\026\027\343\220\061 \150\340

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\202\003\346\060\202\002\316\240\003\002\001\002\002\002\127 $$$ \313\063\157\302\134\026\346\107\026\027\343\220\061\150\340\060  $\label{eq:condition} $$ \0.015\0.06\0.01\0.05\0.005\0.0000\0.000\0.000\0.0000\0.000\0.0000\0.0000\0.0000\0.0000\0.0000\0.0000\0.0000\0.0000\0.$ \061\013\060\011\006\003\125\004\006\023\002\125\123\061\041\060 \037\006\003\125\004\012\023\030\116\145\164\167\157\162\153\040 \123\157\154\165\164\151\157\156\163\040\114\056\114\056\103\056 \061\060\060\056\006\003\125\004\003\023\047\116\145\164\167\157 \162\153\040\123\157\154\165\164\151\157\156\163\040\103\145\162 \164\171\060\036\027\015\060\066\061\062\060\061\060\060\060 \060\060\132\027\015\062\071\061\062\063\061\062\063\065\071\065 \071\132\060\142\061\013\060\011\006\003\125\004\006\023\002\125 \123\061\041\060\037\006\003\125\004\012\023\030\116\145\164\167  $\label{eq:local_$ \114\056\103\056\061\060\060\056\006\003\125\004\003\023\047\116 \145\164\167\157\162\153\040\123\157\154\165\164\151\157\156\163  $\\ \\ 040\\ \\ 103\\ \\ 145\\ \\ 162\\ \\ 164\\ \\ 151\\ \\ 146\\ \\ 151\\ \\ 143\\ \\ 141\\ \\ 164\\ \\ 145\\ \\ 040\\ \\ 101\\ \\ 165\\ \\ 164$ \150\157\162\151\164\171\060\202\001\042\060\015\006\011\052\206 \110\206\367\015\001\001\001\005\000\003\202\001\017\000\060\202 \001\012\002\202\001\001\000\344\274\176\222\060\155\306\330\216 \053\013\274\106\316\340\047\226\336\336\371\372\022\323\074\063 \163\263\004\057\274\161\214\345\237\266\042\140\076\137\135\316 \011\377\202\014\033\232\121\120\032\046\211\335\325\141\135\031 \334\022\017\055\012\242\103\135\027\320\064\222\040\352\163\317  $\label{eq:condition} $$ \070\054\006\046\011\172\162\367\372\120\062\370\302\223\323\151 $$$ \242\043\316\101\261\314\344\325\037\066\321\212\072\370\214\143 \342\024\131\151\355\015\323\177\153\350\270\003\345\117\152\345 \230\143\151\110\005\276\056\377\063\266\351\227\131\151\370\147 \031\256\223\141\226\104\025\323\162\260\077\274\152\175\354\110 \177\215\303\253\252\161\053\123\151\101\123\064\265\260\271\305  $\label{eq:condition} $$ \006\012\304\260\105\365\101\135\156\211\105\173\075\073\046\214 $$$ \164\302\345\322\321\175\262\021\324\373\130\062\042\232\200\311 \334\375\014\351\177\136\003\227\316\073\000\024\207\047\160\070 \251\216\156\263\047\166\230\121\340\005\343\041\253\032\325\205

\042\074\051\265\232\026\305\200\250\364\273\153\060\217\057\106 \002\242\261\014\042\340\323\002\003\001\000\001\243\201\227\060  $\label{eq:condition} $$ \201\224\060\035\006\003\125\035\016\004\026\004\024\041\060\311 $$$ \373\000\327\116\230\332\207\252\052\320\247\056\261\100\061\247 \114\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001  $\label{eq:condition} $$ \006\000\17\006\003\125\035\023\001\001\377\004\005\060\003\001 $$$ \001\377\060\122\006\003\125\035\037\004\113\060\111\060\107\240 \105\240\103\206\101\150\164\164\160\072\057\057\143\162\154\056 \156\145\164\163\157\154\163\163\163\154\056\143\157\155\057\116\145 \164\167\157\162\153\123\157\154\165\164\151\157\156\163\103\145 \001\001\005\005\000\003\202\001\001\000\273\256\113\347\267\127 \353\177\252\055\267\163\107\205\152\301\344\245\035\344\347\074 \351\364\131\145\167\265\172\133\132\215\045\066\340\172\227\056 \070\300\127\140\203\230\006\203\237\271\166\172\156\120\340\272 \210\054\374\105\314\030\260\231\225\121\016\354\035\270\210\377 \207\120\034\202\302\343\340\062\200\277\240\013\107\310\303\061 \357\231\147\062\200\117\027\041\171\014\151\134\336\136\064\256  $\label{eq:condition} $$ \002\265\046\352\120\337\177\030\145\054\311\362\143\341\251\007 $$$ \376\174\161\037\153\063\044\152\036\005\367\005\150\300\152\022  $\label{eq:condition} $$ \frac{313}056\\136\\141\\313\\256\\050\\323\\176\\302\\264\\146\\221\\046\\137\\074$  $\label{eq:condition} $$ \056\044\137\313\130\017\353\050\354\257\021\226\363\334\173\157$$ \300\247\210\362\123\167\263\140\136\256\256\050\332\065\054\157  $\\ \\064\\105\\323\\046\\341\\336\\354\\133\\117\\047\\153\\026\\174\\275\\104\\004$ \030\202\263\211\171\027\020\161\075\172\242\026\116\365\001\315 \244\154\145\150\241\111\166\134\103\311\330\274\066\147\154\245 \224\265\324\314\271\275\152\065\126\041\336\330\303\353\373\313 \244\140\114\260\125\240\240\173\127\262

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Network Solutions Certificate Authority"
```

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Network Solutions Certificate Authority"

<sup>#</sup> Issuer: CN=Network Solutions Certificate Authority,O=Network Solutions L.L.C.,C=US

<sup>#</sup> Serial Number:57:cb:33:6f:c2:5c:16:e6:47:16:17:e3:90:31:68:e0

<sup>#</sup> Subject: CN=Network Solutions Certificate Authority,O=Network Solutions L.L.C.,C=US

<sup>#</sup> Not Valid Before: Fri Dec 01 00:00:00 2006

<sup>#</sup> Not Valid After: Mon Dec 31 23:59:59 2029

<sup>#</sup> Fingerprint (SHA-256):

<sup>15:</sup>F0:BA:00:A3:AC:7A:F3:AC:88:4C:07:2B:10:11:A0:77:BD:77:C0:97:F4:01:64:B2:F8:59:8A:BD:83:86:0C

<sup>#</sup> Fingerprint (SHA1): 74:F8:A3:C3:EF:E7:B3:90:06:4B:83:90:3C:21:64:60:20:E5:DF:CE

```
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\label{eq:condition} $$ 164\370\243\303\357\347\263\220\006\113\203\220\074\041\144\140 $$
\040\345\337\316
END
CKA CERT MD5 HASH MULTILINE OCTAL
\323\363\246\026\300\372\153\035\131\261\055\226\115\016\021\056
END
CKA ISSUER MULTILINE OCTAL
\060\142\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\041\060\037\006\003\125\004\012\023\030\116\145\164\167\157\162
\153\040\123\157\154\165\164\151\157\156\163\040\114\056\114\056
\103\056\061\060\060\056\006\003\125\004\003\023\047\116\145\164
\167\157\162\153\040\123\157\154\165\164\151\157\156\163\040\103
\162\151\164\171
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\127\313\063\157\302\134\026\346\107\026\027\343\220\061
\150\340
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "COMODO ECC Certification Authority"
# Issuer: CN=COMODO ECC Certification Authority,O=COMODO CA Limited,L=Salford,ST=Greater
Manchester, C=GB
# Serial Number:1f:47:af:aa:62:00:70:50:54:4c:01:9e:9b:63:99:2a
# Subject: CN=COMODO ECC Certification Authority,O=COMODO CA Limited,L=Salford,ST=Greater
Manchester, C=GB
# Not Valid Before: Thu Mar 06 00:00:00 2008
# Not Valid After: Mon Jan 18 23:59:59 2038
# Fingerprint (SHA-256):
17:93:92:7A:06:14:54:97:89:AD:CE:2F:8F:34:F7:F0:B6:6D:0F:3A:E3:A3:B8:4D:21:EC:15:DB:BA:4F:AD:C7
# Fingerprint (SHA1): 9F:74:4E:9F:2B:4D:BA:EC:0F:31:2C:50:B6:56:3B:8E:2D:93:C3:11
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "COMODO ECC Certification Authority"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\205\061\013\060\011\006\003\125\004\006\023\002\107\102
```

\061\033\060\031\006\003\125\004\010\023\022\107\162\145\141\164 \145\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060  $\label{eq:condition} $$ \016\006\003\125\004\007\023\007\123\141\154\146\157\162\144\061\032\060\030\006\003\125\004\012\023\021\103\117\115\117\104\117\040\105\1006\003\125\004\003\023\042\103\117\115\117\104\117\040\105\103\103\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171$ 

**END** 

CKA ID UTF8 "0"

#### CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\201\205\061\013\060\011\006\003\125\004\010\023\022\107\162\145\141\164\145\162\060\031\25\004\010\125\163\164\145\162\061\020\060\016\006\003\125\004\007\023\007\123\141\154\146\157\162\144\061\032\060\030\006\003\125\004\012\023\021\103\117\115\117\104\117\040\103\101\040\114\151\155\151\164\145\144\061\053\060\051\006\003\125\004\003\023\042\103\117\115\117\104\117\040\105\103\103\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171$ 

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\037\107\257\252\142\000\160\120\124\114\001\236\233\143 \231\052

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

\107\257\252\142\000\160\120\124\114\001\236\233\143\231\052\060 \012\006\010\052\206\110\316\075\004\003\003\060\201\205\061\013 \003\125\004\010\023\022\107\162\145\141\164\145\162\040\115\141 \156\143\150\145\163\164\145\162\061\020\060\016\006\003\125\004  $\\ \\007\\ \\023\\ \\007\\ \\123\\ \\141\\ \\154\\ \\146\\ \\157\\ \\162\\ \\144\\ \\061\\ \\032\\ \\060\\ \\030\\ \\006\\ \\003$ \125\004\012\023\021\103\117\115\117\104\117\040\103\101\040\114 \151\155\151\164\145\144\061\053\060\051\006\003\125\004\003\023 \042\103\117\115\117\104\117\040\105\103\103\040\103\145\162\164 \151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162 \151\164\171\060\036\027\015\060\070\060\063\060\066\060\060\060 \060\060\060\132\027\015\063\070\060\061\061\070\062\063\065\071 \065\071\132\060\201\205\061\013\060\011\006\003\125\004\006\023  $\label{eq:condition} $$ \002\107\102\061\033\060\031\006\003\125\004\010\023\022\107\162 $$$ \145\141\164\145\162\040\115\141\156\143\150\145\163\164\145\162 \061\020\060\016\006\003\125\004\007\023\007\123\141\154\146\157 \117\104\117\040\103\101\040\114\151\155\151\164\145\144\061\053 \060\051\006\003\125\004\003\023\042\103\117\115\117\104\117\040 \105\103\103\040\103\145\162\164\151\146\151\143\141\164\151\157 \156\040\101\165\164\150\157\162\151\164\171\060\166\060\020\006 \007\052\206\110\316\075\002\001\006\005\053\201\004\000\042\003 \142\000\004\003\107\173\057\165\311\202\025\205\373\165\344\221

\026\324\253\142\231\365\076\122\013\006\316\101\000\177\227\341 \012\044\074\035\001\004\356\075\322\215\011\227\014\340\165\344 \372\373\167\212\052\365\003\140\113\066\213\026\043\026\255\011  $\label{eq:condition} $$ 161\364\112\364\050\120\264\376\210\034\156\077\154\057\057\011 $$$ \131\133\245\133\013\063\231\342\303\075\211\371\152\054\357\262 \323\006\351\243\102\060\100\060\035\006\003\125\035\016\004\026 \004\024\165\161\247\031\110\031\274\235\235\352\101\107\337\224  $\label{eq:condition} $$ 304\110\167\231\323\171\060\016\006\003\125\035\017\001\001\377 $$$ \004\004\003\002\001\006\060\017\006\003\125\035\023\001\001\377 \004\005\060\003\001\001\377\060\012\006\010\052\206\110\316\075  $\\ \langle 004 \rangle 003 \rangle 003 \rangle 150 \rangle 000 \rangle 060 \rangle 145 \rangle 002 \rangle 061 \rangle 000 \rangle 357 \rangle 003 \rangle 133 \rangle 172 \rangle 254$  $\label{eq:condition} $$ \267\170\012\162\267\210\337\377\265\106\024\011\012\372\240\346$$$ \175\010\306\032\207\275\030\250\163\275\046\312\140\014\235\316 \231\237\317\134\017\060\341\276\024\061\352\002\060\024\364\223  $\label{eq:condition} $$ \sqrt{074}111\247\063\172\220\106\107\263\143\175\023\233\116\267\157$$$ \030\067\200\123\376\335\040\340\065\232\066\321\307\001\271\346 \334\335\363\377\035\054\072\026\127\331\222\071\326

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "COMODO ECC Certification Authority"
- # Issuer: CN=COMODO ECC Certification Authority,O=COMODO CA Limited,L=Salford,ST=Greater Manchester,C=GB
- # Serial Number:1f:47:af:aa:62:00:70:50:54:4c:01:9e:9b:63:99:2a
- # Subject: CN=COMODO ECC Certification Authority,O=COMODO CA Limited,L=Salford,ST=Greater Manchester,C=GB
- # Not Valid Before: Thu Mar 06 00:00:00 2008
- # Not Valid After: Mon Jan 18 23:59:59 2038
- # Fingerprint (SHA-256):

17:93:92:7A:06:14:54:97:89:AD:CE:2F:8F:34:F7:F0:B6:6D:0F:3A:E3:A3:B8:4D:21:EC:15:DB:BA:4F:AD:C7

# Fingerprint (SHA1): 9F:74:4E:9F:2B:4D:BA:EC:0F:31:2C:50:B6:56:3B:8E:2D:93:C3:11

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "COMODO ECC Certification Authority"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \frac{174\142\377\164\235\061\123\136\150\112\325\170\252\036\277\043}{25} $$$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\201\205\061\013\060\011\006\003\125\004\006\023\002\107\102 \061\033\060\031\006\003\125\004\010\023\022\107\162\145\141\164

```
\145\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060
\016\006\003\125\004\007\023\007\123\141\154\146\157\162\144\061
\032\060\030\006\003\125\004\012\023\021\103\117\115\117\104\117
\\ \\ \langle 040 \rangle 103 \rangle 101 \rangle 040 \rangle 114 \rangle 151 \rangle 155 \rangle 151 \rangle 164 \rangle 145 \rangle 144 \rangle 061 \rangle 053 \rangle 060 \rangle 051 \rangle 006
\\ \\003\\125\\004\\003\\023\\042\\103\\117\\115\\117\\104\\117\\040\\105\\103\\103
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\037\107\257\252\142\000\160\120\124\114\001\236\233\143
\231\052
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
#
# Certificate "OISTE WISeKey Global Root GA CA"
# Issuer: CN=OISTE WISeKey Global Root GA CA,OU=OISTE Foundation Endorsed,OU=Copyright (c)
2005,O=WISeKey,C=CH
# Serial Number:41:3d:72:c7:f4:6b:1f:81:43:7d:f1:d2:28:54:df:9a
# Subject: CN=OISTE WISeKey Global Root GA CA,OU=OISTE Foundation Endorsed,OU=Copyright (c)
2005,O=WISeKey,C=CH
# Not Valid Before: Sun Dec 11 16:03:44 2005
# Not Valid After: Fri Dec 11 16:09:51 2037
# Fingerprint (SHA-256):
41:C9:23:86:6A:B4:CA:D6:B7:AD:57:80:81:58:2E:02:07:97:A6:CB:DF:4F:FF:78:CE:83:96:B3:89:37:D7:F5
# Fingerprint (SHA1): 59:22:A1:E1:5A:EA:16:35:21:F8:98:39:6A:46:46:B0:44:1B:0F:A9
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "OISTE WISeKey Global Root GA CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\201\212\061\013\060\011\006\003\125\004\006\023\002\103\110
\label{eq:condition} $$ \006\006\003\125\004\012\023\007\127\111\123\145\113 $$
\145\171\061\033\060\031\006\003\125\004\013\023\022\103\157\160
\171\162\151\147\150\164\040\050\143\051\040\062\060\060\065\061
\\ \\042\\060\\040\\006\\003\\125\\004\\013\\023\\031\\117\\111\\123\\124\\105\\040
\106\157\165\156\144\141\164\151\157\156\040\105\156\144\157\162
\163\145\144\061\050\060\046\006\003\125\004\003\023\037\117\111
\123\124\105\040\127\111\123\145\113\145\171\040\107\154\157\142
\label{eq:condition} $$ \frac{141}{154}040\frac{122}{157}\frac{157}{164}040\frac{107}{101}040\frac{103}{101} $$
END
CKA_ID UTF8 "0"
```

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:control} $$ \000\201\212\061\013\060\011\006\003\125\004\012\023\007\127\111\123\145\113\145\171\061\033\060\031\25\004\013\25\004\013\022\103\157\160\171\162\151\147\150\164\040\050\143\051\040\062\060\060\065\061\042\060\040\006\003\125\004\013\023\031\117\111\123\124\105\040\106\157\165\156\144\141\164\151\157\156\040\105\156\144\157\162\163\145\144\061\050\060\046\006\003\125\004\003\023\037\117\111\123\124\105\040\127\111\123\145\113\145\171\040\107\154\157\142\141\154\040\122\157\157\164\040\107\101\040\103\101$ 

#### **END**

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\020\101\075\162\307\364\153\037\201\103\175\361\322\050\124\337\232$$ 

#### **END**

# CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\202\003\361\060\202\002\331\240\003\002\001\002\002\002\101$ \075\162\307\364\153\037\201\103\175\361\322\050\124\337\232\060 \015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\201 \212\061\013\060\011\006\003\125\004\006\023\002\103\110\061\020 \060\016\006\003\125\004\012\023\007\127\111\123\145\113\145\171 \061\033\060\031\006\003\125\004\013\023\022\103\157\160\171\162  $\label{eq:condition} $$ \frac{151}147\\150\\164\\040\\050\\143\\051\\040\\062\\060\\060\\060\\060\\065\\061\\042\\060$ \040\006\003\125\004\013\023\031\117\111\123\124\105\040\106\157 \165\156\144\141\164\151\157\156\040\105\156\144\157\162\163\145 \144\061\050\060\046\006\003\125\004\003\023\037\117\111\123\124 \105\040\127\111\123\145\113\145\171\040\107\154\157\142\141\154  $\\ \langle 040 \rangle 122 \rangle 157 \rangle 164 \rangle 040 \rangle 107 \rangle 101 \rangle 040 \rangle 103 \rangle 101 \rangle 060 \rangle 036 \rangle 027 \rangle 015 \rangle 060$ \065\061\062\061\061\061\066\060\063\064\064\132\027\015\063\067 \061\062\061\061\061\066\060\071\065\061\132\060\201\212\061\013  $\label{eq:condition} $$ \000\011\006\003\125\004\006\023\002\103\110\061\020\060\016\006$ \003\125\004\012\023\007\127\111\123\145\113\145\171\061\033\060 \031\006\003\125\004\013\023\022\103\157\160\171\162\151\147\150 \164\040\050\143\051\040\062\060\060\065\061\042\060\040\006\003 \125\004\013\023\031\117\111\123\124\105\040\106\157\165\156\144 \141\164\151\157\156\040\105\156\144\157\162\163\145\144\061\050 \060\046\006\003\125\004\003\023\037\117\111\123\124\105\040\127  $\label{eq:condition} $$ 157\164\040\107\101\040\103\101\060\202\001\042\060\015\006\011 $$$  $\label{eq:condition} $$ \052\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000 $$$ \060\202\001\012\002\202\001\001\000\313\117\263\000\233\075\066 \335\371\321\111\152\153\020\111\037\354\330\053\262\306\370\062 \201\051\103\225\114\232\031\043\041\025\105\336\343\310\034\121 \125\133\256\223\350\067\377\053\153\351\324\352\276\052\335\250 \121\053\327\146\303\141\134\140\002\310\365\316\162\173\073\270 \362\116\145\010\232\315\244\152\031\301\001\273\163\246\327\366 \303\335\315\274\244\213\265\231\141\270\001\242\243\324\115\324 \005\075\221\255\370\264\010\161\144\257\160\361\034\153\176\366

\303\167\235\044\163\173\344\014\214\341\331\066\341\231\213\005 \231\013\355\105\061\011\312\302\000\333\367\162\240\226\252\225 \207\320\216\307\266\141\163\015\166\146\214\334\033\264\143\242 \237\177\223\023\060\361\241\047\333\331\377\054\125\210\221\240 \340\117\007\260\050\126\214\030\033\227\104\216\211\335\340\027  $\label{eq:condition} $$ \frac{347}{052}\frac{357}{217}\frac{071}{012}\frac{061}{204}\frac{330}{100}\frac{024}{111}\frac{17}{056}\frac{172}{120} $$$ \101\344\247\376\343\144\314\301\131\161\113\054\041\247\133\175 \340\035\321\056\201\233\303\330\150\367\275\226\033\254\160\261 \026\024\013\333\140\271\046\001\005\002\003\001\000\001\243\121 \060\117\060\013\006\003\125\035\017\004\004\003\002\001\206\060  $\label{eq:condition} $$ \000\003\125\003\016\004\026\004\024\263\003\176\256\066$$ \274\260\171\321\334\224\046\266\021\276\041\262\151\206\224\060  $\label{eq:condition} $$ \0000001\004\001\004\001\202\067\025\001\004\003\002\001 $$$  $\label{eq:condition} $$ \000\0015\006\011\052\206\110\206\367\015\001\001\005\0005\000 $$$ \003\202\001\001\000\113\241\377\013\207\156\263\371\301\103\261 \110\363\050\300\035\056\311\011\101\372\224\000\034\244\244\253 \111\117\217\075\036\357\115\157\275\274\244\366\362\046\060\311 \020\312\035\210\373\164\031\037\205\105\275\260\154\121\371\066 \176\333\365\114\062\072\101\117\133\107\317\350\013\055\266\304 \031\235\164\305\107\306\073\152\017\254\024\333\074\364\163\234 \251\005\337\000\334\164\170\372\370\065\140\131\002\023\030\174  $\label{eq:condition} $$ \274\373\115\260\040\155\103\273\140\060\172\147\063\134\305\231 $$$ \321\370\055\071\122\163\373\214\252\227\045\134\162\331\010\036  $\verb|253|116|074|343|201|061|237|003|246|373|300|376|051|210|125|332|$ \204\325\120\003\266\342\204\243\246\066\252\021\072\001\341\030 \113\326\104\150\263\075\371\123\164\204\263\106\221\106\226\000  $\label{eq:condition} $$ \267\200\054\266\341\343\020\342\333\242\347\050\217\001\226\142 $$$ \026\076\000\343\034\245\066\201\030\242\114\122\166\300\021\243 \156\346\035\272\343\132\276\066\123\305\076\165\217\206\151\051 \130\123\265\234\273\157\237\134\305\030\354\335\057\341\230\311 \374\276\337\012\015

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "OISTE WISeKey Global Root GA CA"
```

<sup>#</sup> Issuer: CN=OISTE WISeKey Global Root GA CA,OU=OISTE Foundation Endorsed,OU=Copyright (c) 2005,O=WISeKey,C=CH

<sup>#</sup> Serial Number:41:3d:72:c7:f4:6b:1f:81:43:7d:f1:d2:28:54:df:9a

<sup>#</sup> Subject: CN=OISTE WISeKey Global Root GA CA, OU=OISTE Foundation Endorsed, OU=Copyright (c) 2005, O=WISeKey, C=CH

<sup>#</sup> Not Valid Before: Sun Dec 11 16:03:44 2005 # Not Valid After : Fri Dec 11 16:09:51 2037

<sup>#</sup> Fingerprint (SHA-256):

<sup>41:</sup>C9:23:86:6A:B4:CA:D6:B7:AD:57:80:81:58:2E:02:07:97:A6:CB:DF:4F:FF:78:CE:83:96:B3:89:37:D7:F5

<sup>#</sup> Fingerprint (SHA1): 59:22:A1:E1:5A:EA:16:35:21:F8:98:39:6A:46:46:B0:44:1B:0F:A9

```
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "OISTE WISeKey Global Root GA CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\131\042\241\341\132\352\026\065\041\370\230\071\152\106\106\260
\104\033\017\251
END
CKA CERT MD5 HASH MULTILINE OCTAL
\274\154\121\063\247\351\323\146\143\124\025\162\033\041\222\223
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\201\212\061\013\060\011\006\003\125\004\006\023\002\103\110 $$
\label{eq:condition} $$ \0061\020\060\016\006\003\125\004\012\023\007\127\111\123\145\113
\145\171\061\033\060\031\006\003\125\004\013\023\022\103\157\160
\171\162\151\147\150\164\040\050\143\051\040\062\060\060\065\061
\042\060\040\006\003\125\004\013\023\031\117\111\123\124\105\040
\106\157\165\156\144\141\164\151\157\156\040\105\156\144\157\162
\123\124\105\040\127\111\123\145\113\145\171\040\107\154\157\142
\141\154\040\122\157\157\164\040\107\101\040\103\101
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\020\101\075\162\307\364\153\037\201\103\175\361\322\050\124
\337\232
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Certigna"
# Issuer: CN=Certigna,O=Dhimyotis,C=FR
# Serial Number:00:fe:dc:e3:01:0f:c9:48:ff
# Subject: CN=Certigna,O=Dhimyotis,C=FR
# Not Valid Before: Fri Jun 29 15:13:05 2007
# Not Valid After: Tue Jun 29 15:13:05 2027
# Fingerprint (SHA-256):
E3;B6;A2:DB;2E:D7;CE;48;84;2F;7A;C5;32;41;C7;B7;1D;54;14;4B;FB;40;C1;1F;3F;1D;0B;42;F5;EE;A1;2D
# Fingerprint (SHA1): B1:2E:13:63:45:86:A4:6F:1A:B2:60:68:37:58:2D:C4:AC:FD:94:97
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Certigna"
```

# CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA\_SUBJECT MULTILINE\_OCTAL

**END** 

CKA ID UTF8 "0"

#### CKA\_ISSUER MULTILINE\_OCTAL

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\011\000\376\334\343\001\017\311\110\377 $$$ 

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

\060\202\003\250\060\202\002\220\240\003\002\001\002\002\011\000 \376\334\343\001\017\311\110\377\060\015\006\011\052\206\110\206 \367\015\001\001\005\005\000\060\064\061\013\060\011\006\003\125 \004\006\023\002\106\122\061\022\060\020\006\003\125\004\012\014 \125\004\003\014\010\103\145\162\164\151\147\156\141\060\036\027 \015\060\067\060\066\062\071\061\065\061\063\060\065\132\027\015 \062\067\060\066\062\071\061\065\061\063\060\065\132\060\064\061 \013\060\011\006\003\125\004\006\023\002\106\122\061\022\060\020  $\label{eq:condition} $$ \006\003\125\004\012\014\011\104\150\151\155\171\157\164\151\163$ \061\021\060\017\006\003\125\004\003\014\010\103\145\162\164\151 \147\156\141\060\202\001\042\060\015\006\011\052\206\110\206\367 \202\001\001\000\310\150\361\311\326\326\263\064\165\046\202\036 \354\264\276\352\134\341\046\355\021\107\141\341\242\174\026\170 \100\041\344\140\236\132\310\143\341\304\261\226\222\377\030\155 \151\043\341\053\142\367\335\342\066\057\221\007\271\110\317\016 \354\171\266\054\347\064\113\160\010\045\243\074\207\033\031\362 \201\007\017\070\220\031\323\021\376\206\264\362\321\136\036\036 \226\315\200\154\316\073\061\223\266\362\240\320\251\225\022\175 \245\232\314\153\310\204\126\212\063\251\347\042\025\123\026\360 \314\027\354\127\137\351\242\012\230\011\336\343\137\234\157\334 \110\343\205\013\025\132\246\272\237\254\110\343\011\262\367\364  $\label{eq:condition} $$ \062\336\136\064\276\034\170\135\102\133\316\016\042\217\115\220 $$$ \327\175\062\030\263\013\054\152\277\216\077\024\021\211\040\016 \167\024\265\075\224\010\207\367\045\036\325\262\140\000\354\157 \052\050\045\156\052\076\030\143\027\045\077\076\104\040\026\366 \046\310\045\256\005\112\264\347\143\054\363\214\026\123\176\134 \373\021\032\010\301\106\142\237\042\270\361\302\215\151\334\372 \072\130\006\337\002\003\001\000\001\243\201\274\060\201\271\060

\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377 \060\035\006\003\125\035\016\004\026\004\024\032\355\376\101\071 \220\264\044\131\276\001\362\122\325\105\366\132\071\334\021\060 \144\006\003\125\035\043\004\135\060\133\200\024\032\355\376\101 \071\220\264\044\131\276\001\362\122\325\105\366\132\071\334\021 \241\070\244\066\060\064\061\013\060\011\006\003\125\004\006\023 \002\106\122\061\022\060\020\006\003\125\004\012\014\011\104\150 \014\010\103\145\162\164\151\147\156\141\202\011\000\376\334\343 \001\017\311\110\377\060\016\006\003\125\035\017\001\001\377\004  $\label{eq:condition} $$ \004\003\002\001\006\0021\006\011\140\206\110\001\206\370\102 $$$  $\label{eq:condition} $$ \001\004\004\003\002\000\007\060\015\006\011\052\206\110\206$ \367\015\001\001\005\005\000\003\202\001\001\000\205\003\036\222 \161\366\102\257\341\243\141\236\353\363\300\017\362\245\324\332 \225\346\326\276\150\066\075\176\156\037\114\212\357\321\017\041 \155\136\245\122\143\316\022\370\357\052\332\157\353\067\376\023  $\label{eq:condition} $$ \073\076\042\153\332\141\056\177\324\162\075\335\060$$ \341\036\114\100\031\214\017\327\234\321\203\060\173\230\131\334 \175\306\271\014\051\114\241\063\242\353\147\072\145\204\323\226 \342\355\166\105\160\217\265\053\336\371\043\326\111\156\074\024 \265\306\237\065\036\120\320\301\217\152\160\104\002\142\313\256  $\label{eq:condition} $$ \035\150\101\247\252\127\350\123\252\007\322\006\366\325\024\006$ \365\337\124\315\336\346\330\326\011\010\227\143\345\301\056\260 \267\104\046\300\046\300\257\125\060\236\073\325\066\052\031\004 \364\134\036\377\317\054\267\377\320\375\207\100\021\325\021\043 \273\110\300\041\251\244\050\055\375\025\370\260\116\053\364\060  $\label{eq:condition} $$ 133\041\374\021\221\064\276\101\357\173\235\227\165\377\227\225$ \300\226\130\057\352\273\106\327\273\344\331\056

END

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Certigna"
```

# Issuer: CN=Certigna,O=Dhimyotis,C=FR

# Serial Number:00:fe:dc:e3:01:0f:c9:48:ff

# Subject: CN=Certigna,O=Dhimyotis,C=FR

# Not Valid Before: Fri Jun 29 15:13:05 2007

# Not Valid After: Tue Jun 29 15:13:05 2027

# Fingerprint (SHA-256):

E3;B6;A2:DB;2E:D7;CE;48;84;2F;7A;C5;32;41;C7:B7;1D:54;14;4B;FB;40;C1;1F;3F;1D:0B;42;F5;EE;A1;2D

# Fingerprint (SHA1): B1:2E:13:63:45:86:A4:6F:1A:B2:60:68:37:58:2D:C4:AC:FD:94:97

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Certigna"

```
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\261\056\023\143\105\206\244\157\032\262\140\150\067\130\055\304
\254\375\224\227
END
CKA CERT MD5 HASH MULTILINE OCTAL
\253\127\246\133\175\102\202\031\265\330\130\046\050\136\375\377
END
CKA ISSUER MULTILINE OCTAL
\060\064\061\013\060\011\006\003\125\004\006\023\002\106\122\061
\022\060\020\006\003\125\004\012\014\011\104\150\151\155\171\157
\162\164\151\147\156\141
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\label{eq:condition} $$ \002\011\000\376\334\343\001\017\311\110\377 $$
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "ePKI Root Certification Authority"
# Issuer: OU=ePKI Root Certification Authority,O="Chunghwa Telecom Co., Ltd.",C=TW
# Serial Number:15:c8:bd:65:47:5c:af:b8:97:00:5e:e4:06:d2:bc:9d
# Subject: OU=ePKI Root Certification Authority, O="Chunghwa Telecom Co., Ltd.", C=TW
# Not Valid Before: Mon Dec 20 02:31:27 2004
# Not Valid After: Wed Dec 20 02:31:27 2034
# Fingerprint (SHA-256):
C0:A6:F4:DC:63:A2:4B:FD:CF:54:EF:2A:6A:08:2A:0A:72:DE:35:80:3E:2F:F5:FF:52:7A:E5:D8:72:06:DF:D5
# Fingerprint (SHA1): 67:65:0D:F1:7E:8E:7E:5B:82:40:A4:F4:56:4B:CF:E2:3D:69:C6:F0
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "ePKI Root Certification Authority"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\136\061\013\060\011\006\003\125\004\006\023\002\124\127\061
\043\060\041\006\003\125\004\012\014\032\103\150\165\156\147\150
\167\141\040\124\145\154\145\143\157\155\040\103\157\056\054\040
\114\164\144\056\061\052\060\050\006\003\125\004\013\014\041\145
\120\113\111\040\122\157\157\164\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
```

 $\label{eq:condition} $$ \060\13\060\01\106\003\125\004\006\023\002\124\127\061\043\060\041\006\003\125\004\012\014\032\103\150\165\156\147\150\167\141\040\124\145\154\145\143\157\155\040\103\157\056\054\040\114\164\144\056\061\052\060\050\006\003\125\004\013\014\041\145\120\113\111\040\122\157\157\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\ END$ 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\025\310\275\145\107\134\257\270\227\000\136\344\006\322 \274\235

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\260\060\202\003\230\240\003\002\001\002\002\020\025 \310\275\145\107\134\257\270\227\000\136\344\006\322\274\235\060  $\label{eq:condition} $$ \015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\136 $$$ \061\013\060\011\006\003\125\004\006\023\002\124\127\061\043\060  $\label{eq:condition} $$ \004\003\125\004\012\014\032\103\150\165\156\147\150\167\141 $$$ \040\124\145\154\145\143\157\155\040\103\157\056\054\040\114\164 \144\056\061\052\060\050\006\003\125\004\013\014\041\145\120\113  $\label{eq:condition} $$ \frac{111\040\122\157\157\164\040\103\145\162\164\151\146\151\143\141}{140\151\146\151\143\141} $$$ \164\151\157\156\040\101\165\164\150\157\162\151\164\171\060\036 \027\015\060\064\061\062\062\060\060\060\062\063\061\062\067\132\027 \061\013\060\011\006\003\125\004\006\023\002\124\127\061\043\060 \041\006\003\125\004\012\014\032\103\150\165\156\147\150\167\141 \040\124\145\154\145\143\157\155\040\103\157\056\054\040\114\164 \144\056\061\052\060\050\006\003\125\004\013\014\041\145\120\113  $\label{eq:condition} $$ \frac{111\040\122\157\157\164\040\103\145\162\164\151\146\151\143\141}{140\151\146\151\143\141} $$$ \164\151\157\156\040\101\165\164\150\157\162\151\164\171\060\202 \002\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005  $\label{eq:condition} $$ \000\003\202\002\017\000\060\202\002\012\002\202\002\001\000\341 $$$ \045\017\356\215\333\210\063\165\147\315\255\037\175\072\116\155 \235\323\057\024\363\143\164\313\001\041\152\067\352\204\120\007 \113\046\133\011\103\154\041\236\152\310\325\003\365\140\151\217 \314\360\042\344\037\347\367\152\042\061\267\054\025\362\340\376 \000\152\103\377\207\145\306\265\032\301\247\114\155\042\160\041 \212\061\362\227\164\211\011\022\046\034\236\312\331\022\242\225 \074\332\351\147\277\010\240\144\343\326\102\267\105\357\227\364 \366\365\327\265\112\025\002\130\175\230\130\113\140\274\315\327 \015\232\023\063\123\321\141\371\172\325\327\170\263\232\063\367 \000\206\316\035\115\224\070\257\250\354\170\121\160\212\134\020 \203\121\041\367\021\075\064\206\136\345\110\315\227\201\202\065 \114\031\354\145\366\153\305\005\241\356\107\023\326\263\041\047 \224\020\012\331\044\073\272\276\104\023\106\060\077\227\074\330 \327\327\152\356\073\070\343\053\324\227\016\271\033\347\007\111 \177\067\052\371\167\170\317\124\355\133\106\235\243\200\016\221 \103\301\326\133\137\024\272\237\246\215\044\107\100\131\277\162 \070\262\066\154\067\377\231\321\135\016\131\012\253\151\367\300

\262\004\105\172\124\000\256\276\123\366\265\347\341\370\074\243 \061\322\251\376\041\122\144\305\246\147\360\165\007\006\224\024 \201\125\306\047\344\001\217\027\301\152\161\327\276\113\373\224 \130\175\176\021\063\261\102\367\142\154\030\326\317\011\150\076 \177\154\366\036\217\142\255\245\143\333\011\247\037\042\102\101 \036\157\231\212\076\327\371\077\100\172\171\260\245\001\222\322 \235\075\010\025\245\020\001\055\263\062\166\250\225\015\263\172 \232\373\007\020\170\021\157\341\217\307\272\017\045\032\164\052 \166\145\366\072\317\217\142\027\031\173\012\050\315\032\322\203  $\label{eq:condition} $$ \036\041\307\054\277\276\377\141\150\267\147\033\273\170\115\215$$ \316\147\345\344\301\216\267\043\146\342\235\220\165\064\230\251 \066\053\212\232\224\271\235\354\314\212\261\370\045\211\134\132  $\label{eq:condition} $$ \266\057\214\037\155\171\044\247\122\150\303\204\065\342\146\215 $$$ \143\016\045\115\325\031\262\346\171\067\247\042\235\124\061\002 \003\001\000\001\243\152\060\150\060\035\006\003\125\035\016\004  $\label{eq:condition} $$ \026\004\024\036\014\367\266\147\362\341\222\046\011\105\300\125 $$$ \071\056\167\077\102\112\242\060\014\006\003\125\035\023\004\005 \060\003\001\001\377\060\071\006\004\147\052\007\000\004\061\060  $\label{eq:condition} $$ \0.057\0.005\0.055\0.02\0.01\0.000\0.01\0.005\0.053\0.16\0.03\0.02\0.032\0.05 $$$ \000\060\007\006\005\147\052\003\000\000\004\024\105\260\302\307 \012\126\174\356\133\170\014\225\371\030\123\301\246\034\330\020  $\label{eq:condition} $$ \0.060\0.15\0.06\0.11\0.05\0.06\0.11\0.206\0.367\0.15\0.01\0.01\0.005\0.005\0.003$ \202\002\001\000\011\263\203\123\131\001\076\225\111\271\361\201 \272\371\166\040\043\265\047\140\164\324\152\231\064\136\154\000 \123\331\237\362\246\261\044\007\104\152\052\306\245\216\170\022 \350\107\331\130\033\023\052\136\171\233\237\012\052\147\246\045  $\label{eq:condition} $$ \077\006\151\126\163\303\212\146\110\373\051\201\127\164\006\312 $$$ \234\352\050\350\070\147\046\053\361\325\265\077\145\223\370\066 \135\216\215\215\100\040\207\031\352\357\047\300\075\264\071\017  $\\ \\ 045\\ \\ 173\\ \\ 150\\ \\ 120\\ \\ 164\\ \\ 125\\ \\ 234\\ \\ 014\\ \\ 131\\ \\ 175\\ \\ 132\\ \\ 075\\ \\ 101\\ \\ 224\\ \\ 045\\ \\ 122\\ \\$ \010\340\107\054\025\061\031\325\277\007\125\306\273\022\265\227 \364\137\203\205\272\161\301\331\154\201\021\166\012\012\260\277 \202\227\367\352\075\372\372\354\055\251\050\224\073\126\335\322 \121\056\256\300\275\010\025\214\167\122\064\226\326\233\254\323 \035\216\141\017\065\173\233\256\071\151\013\142\140\100\040\066 \217\257\373\066\356\055\010\112\035\270\277\233\134\370\352\245  $\label{eq:condition} $$ \03\240\163\246\330\370\156\340\063\004\137\150\252\047\207\355 $$$ \331\301\220\234\355\275\343\152\065\257\143\337\253\030\331\272 \346\351\112\352\120\212\017\141\223\036\342\055\031\342\060\224 \065\222\135\016\266\007\257\031\200\217\107\220\121\113\056\115 \335\205\342\322\012\122\012\027\232\374\032\260\120\002\345\001 \243\143\067\041\114\104\304\233\121\231\021\016\163\234\006\217 \124\056\247\050\136\104\071\207\126\055\067\275\205\104\224\341 \376\064\072\175\270\351\051\334\166\251\310\060\370\024\161\200 \306\036\066\110\164\042\101\134\207\202\350\030\161\213\101\211 \104\347\176\130\133\250\270\215\023\351\247\154\303\107\355\263

 $\label{eq:condition} $$ \32\235\142\256\215\202\352\224\236\335\131\020\303\255\335\342 \115\343\061\325\307\354\350\362\260\376\222\036\026\012\032\374 \331\363\370\047\266\311\276\035\264\154\144\220\177\364\344\304 \133\327\067\256\102\016\335\244\032\157\174\210\124\305\026\156 \341\172\150\056\370\072\277\015\244\074\211\073\170\247\116\143 \203\004\041\010\147\215\362\202\111\320\133\375\261\315\017\203 \204\324\076\040\205\367\112\075\053\234\375\052\012\011\115\352 \201\370\021\234$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "ePKI Root Certification Authority"
- # Issuer: OU=ePKI Root Certification Authority,O="Chunghwa Telecom Co., Ltd.",C=TW
- # Serial Number:15:c8:bd:65:47:5c:af:b8:97:00:5e:e4:06:d2:bc:9d
- # Subject: OU=ePKI Root Certification Authority,O="Chunghwa Telecom Co., Ltd.",C=TW
- # Not Valid Before: Mon Dec 20 02:31:27 2004
- # Not Valid After: Wed Dec 20 02:31:27 2034
- # Fingerprint (SHA-256):

C0:A6:F4:DC:63:A2:4B:FD:CF:54:EF:2A:6A:08:2A:0A:72:DE:35:80:3E:2F:F5:FF:52:7A:E5:D8:72:06:DF:D5

# Fingerprint (SHA1): 67:65:0D:F1:7E:8E:7E:5B:82:40:A4:F4:56:4B:CF:E2:3D:69:C6:F0

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA LABEL UTF8 "ePKI Root Certification Authority"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\147\145\015\361\176\216\176\133\202\100\244\364\126\113\317\342 \075\151\306\360

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \033\056\000\312\046\006\220\075\255\376\157\025\150\323\153\263$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{lem:condition} $$ \0011\006\003\125\004\006\023\002\124\127\061 $$ \043\060\041\006\003\125\004\012\014\032\103\150\165\156\147\150 $$ \167\141\040\124\145\154\145\143\157\155\040\103\157\056\054\040 $$ \114\164\144\056\061\052\060\050\006\003\125\004\013\014\041\145 $$ \120\113\11\040\122\157\157\164\040\103\145\162\164\151\146\151 $$ \143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171 $$$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\020\025\310\275\145\107\134\257\270\227\000\136\344\006\322\274\235$ 

END

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

# CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

# Certificate "certSIGN ROOT CA"

# Issuer: OU=certSIGN ROOT CA,O=certSIGN,C=RO

# Serial Number:20:06:05:16:70:02

# Subject: OU=certSIGN ROOT CA,O=certSIGN,C=RO

# Not Valid Before: Tue Jul 04 17:20:04 2006 # Not Valid After: Fri Jul 04 17:20:04 2031

# Fingerprint (SHA-256):

EA:A9:62:C4:FA:4A:6B:AF:EB:E4:15:19:6D:35:1C:CD:88:8D:4F:53:F3:FA:8A:E6:D7:C4:66:A9:4E:60:42:BB

# Fingerprint (SHA1): FA:B7:EE:36:97:26:62:FB:2D:B0:2A:F6:BF:03:FD:E8:7C:4B:2F:9B

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA LABEL UTF8 "certSIGN ROOT CA"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

\060\073\061\013\060\011\006\003\125\004\006\023\002\122\117\061  $\label{eq:condition} $$ \021\060\017\006\003\125\004\012\023\010\143\145\162\164\123\111 $$$ \107\116\061\031\060\027\006\003\125\004\013\023\020\143\145\162 \164\123\111\107\116\040\122\117\117\124\040\103\101

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

\060\073\061\013\060\011\006\003\125\004\006\023\002\122\117\061 \021\060\017\006\003\125\004\012\023\010\143\145\162\164\123\111 \164\123\111\107\116\040\122\117\117\124\040\103\101

**END** 

# CKA SERIAL NUMBER MULTILINE OCTAL

\002\006\040\006\005\026\160\002

**END** 

# CKA VALUE MULTILINE OCTAL

\060\202\003\070\060\202\002\040\240\003\002\001\002\002\006\040  $\label{eq:condition} $$ \006\005\026\160\002\060\015\006\011\052\206\110\206\367\015\001 $$$  $\label{eq:condition} $$ \001\005\000\006\0073\061\013\060\011\006\003\125\004\006\023 $$$ \002\122\117\061\021\060\017\006\003\125\004\012\023\010\143\145 \162\164\123\111\107\116\061\031\060\027\006\003\125\004\013\023 \020\143\145\162\164\123\111\107\116\040\122\117\117\124\040\103 \101\060\036\027\015\060\066\060\067\060\064\061\067\062\060\060 \064\132\027\015\063\061\060\067\060\064\061\067\062\060\064 \132\060\073\061\013\060\011\006\003\125\004\006\023\002\122\117 \061\021\060\017\006\003\125\004\012\023\010\143\145\162\164\123 \111\107\116\061\031\060\027\006\003\125\004\013\023\020\143\145

\162\164\123\111\107\116\040\122\117\117\124\040\103\101\060\202 \001\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005 \000\003\202\001\017\000\060\202\001\012\002\202\001\001\000\267  $\label{eq:condition} $$ \063\271\176\310\045\112\216\265\333\264\050\033\252\127\220\350$$ \321\042\323\144\272\323\223\350\324\254\206\141\100\152\140\127  $\label{eq:condition} $$ \frac{150}{124}204\\115\\274\\152\\124\\002\\005\\377\\337\\233\\232\\052\\256\\135$ \007\217\112\303\050\177\357\373\053\372\171\361\307\255\360\020 \123\044\220\213\146\311\250\210\253\257\132\243\000\351\276\272 \106\356\133\163\173\054\027\202\201\136\142\054\241\002\145\263 \275\305\053\000\176\304\374\003\063\127\015\355\342\372\316\135 \105\326\070\315\065\266\262\301\320\234\201\112\252\344\262\001 \134\035\217\137\231\304\261\255\333\210\041\353\220\010\202\200 \363\060\243\103\346\220\202\256\125\050\111\355\133\327\251\020  $\label{eq:condition} $$ \070\016\376\217\114\133\233\106\352\101\365\260\010\164\303\320 $$$ \210\063\266\174\327\164\337\334\204\321\103\016\165\071\241\045 \100\050\352\170\313\016\054\056\071\235\214\213\156\026\034\057  $\\ \\ 046\\ \\ 202\\ \\ 020\\ \\ 342\\ \\ 343\\ \\ 145\\ \\ 224\\ \\ 012\\ \\ 004\\ \\ 300\\ \\ 136\\ \\ 367\\ \\ 135\\ \\ 133\\ \\ 370\\ \\ 020$ \342\320\272\172\113\373\336\067\000\000\032\133\050\343\322\234 \163\076\062\207\230\241\311\121\057\327\336\254\063\263\117\002 \001\377\004\005\060\003\001\001\377\060\016\006\003\125\035\017 \001\001\377\004\004\003\002\001\306\060\035\006\003\125\035\016  $\label{eq:condition} $$ \004\026\004\024\340\214\233\333\045\111\263\361\174\206\326\262$ \102\207\013\320\153\240\331\344\060\015\006\011\052\206\110\206 \367\015\001\001\005\005\000\003\202\001\001\000\076\322\034\211 \056\065\374\370\165\335\346\177\145\210\364\162\114\311\054\327 \062\116\363\335\031\171\107\275\216\073\133\223\017\120\111\044  $\label{eq:condition} $$ \023\153\024\006\162\357\011\323\241\241\343\100\204\311\347\030 $$$ \062\164\074\110\156\017\237\113\324\367\036\323\223\206\144\124 \227\143\162\120\325\125\317\372\040\223\002\242\233\303\043\223  $\label{eq:condition} $$ \frac{116}{026}125\frac{66}{240}160\frac{171}{155}\frac{315}{041}\frac{37}{317}\frac{57}{055}\frac{274}{031} $$$ \343\210\061\370\131\032\201\011\310\227\246\164\307\140\304\133 \314\127\216\262\165\375\033\002\011\333\131\157\162\223\151\367 \061\101\326\210\070\277\207\262\275\026\171\371\252\344\276\210 \045\335\141\047\043\034\265\061\007\004\066\264\032\220\275\240 \164\161\120\211\155\274\024\343\017\206\256\361\253\076\307\240 \011\314\243\110\321\340\333\144\347\222\265\317\257\162\103\160 \213\371\303\204\074\023\252\176\222\233\127\123\223\372\160\302  $\label{eq:condition} $$ \221\016\061\371\233\147\135\351\226\070\136\137\263\163\116\210 $$$  $\label{eq:condition} $$ \025\147\336\236\166\020\142\040\276\125\151\225\103\000\071\115$ \366\356\260\132\116\111\104\124\130\137\102\203

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

<sup>#</sup> Trust for "certSIGN ROOT CA"

<sup>#</sup> Issuer: OU=certSIGN ROOT CA,O=certSIGN,C=RO

```
# Not Valid Before: Tue Jul 04 17:20:04 2006
# Not Valid After: Fri Jul 04 17:20:04 2031
# Fingerprint (SHA-256):
EA:A9:62:C4:FA:4A:6B:AF:EB:E4:15:19:6D:35:1C:CD:88:8D:4F:53:F3:FA:8A:E6:D7:C4:66:A9:4E:60:42:BB
# Fingerprint (SHA1): FA:B7:EE:36:97:26:62:FB:2D:B0:2A:F6:BF:03:FD:E8:7C:4B:2F:9B
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "certSIGN ROOT CA"
CKA CERT SHA1 HASH MULTILINE OCTAL
\372\267\356\066\227\046\142\373\055\260\052\366\277\003\375\350
\174\113\057\233
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\030\230\300\326\351\072\374\371\260\365\014\367\113\001\104\027
END
CKA_ISSUER MULTILINE_OCTAL
\060\073\061\013\060\011\006\003\125\004\006\023\002\122\117\061
\021\060\017\006\003\125\004\012\023\010\143\145\162\164\123\111
\label{eq:condition} $$ 107\116\061\031\060\027\006\003\125\004\013\023\020\143\145\162 $$
\164\123\111\107\116\040\122\117\117\124\040\103\101
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\006\040\006\005\026\160\002
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "NetLock Arany (Class Gold) Ftanúsítvány"
# Issuer: CN=NetLock Arany (Class Gold) F..tan..s..tv..ny,OU=Tan..s..tv..nykiad..k (Certification
Services),O=NetLock Kft.,L=Budapest,C=HU
# Serial Number:49:41:2c:e4:00:10
# Subject: CN=NetLock Arany (Class Gold) F..tan..s..tv..ny,OU=Tan..s..tv..nykiad..k (Certification
Services),O=NetLock Kft.,L=Budapest,C=HU
# Not Valid Before: Thu Dec 11 15:08:21 2008
# Not Valid After: Wed Dec 06 15:08:21 2028
# Fingerprint (SHA-256):
6C:61:DA:C3:A2:DE:F0:31:50:6B:E0:36:D2:A6:FE:40:19:94:FB:D1:3D:F9:C8:D4:66:59:92:74:C4:46:EC:98
# Fingerprint (SHA1): 06:08:3F:59:3F:15:A1:04:A0:69:A4:6B:A9:03:D0:06:B7:97:09:91
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
```

# Serial Number: 20:06:05:16:70:02

# Subject: OU=certSIGN ROOT CA,O=certSIGN,C=RO

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "NetLock Arany (Class Gold) Ftanúsítvány"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:conversion} $$ \060\201\247\061\013\060\011\006\003\125\0004\0007\014\010\102\165\144\141\160\145\163\164\061\025\060\023\006\003\125\0004\012\014\014\116\145\164\114\157\143\153\040\113\146\164\056\061\067\060\065\006\003\125\0004\013\145\162\164\116\303\272\163\303\255\164\166\303\241\156\171\153\151\141\144\303\263\153\040\050\103\145\162\164\151\143\141\164\151\157\156\004\0123\145\162\166\151\143\145\163\051\061\065\060\063\006\003\125\0004\003\014\054\116\145\164\114\157\143\153\040\101\162\141\156\171\040\050\103\154\141\163\163\040\107\157\154\144\051\040\106\305\221\164\141\156\303\272\163\303\255\164\166\303\241\156\171$ 

**END** 

CKA ID UTF8 "0"

## CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000\201\247\061\013\060\011\006\003\125\0004\0007\014\010\102\165\144\141\160\145\163\164\061\025\060\023\006\003\125\0004\012\014\014\116\145\164\114\157\143\153\040\113\146\164\056\061\067\060\065\006\003\125\0004\013\145\162\164\151\144\156\171\153\151\141\144\303\263\153\040\050\103\145\162\164\151\143\141\164\151\157\156\004\0123\145\162\166\151\143\145\163\051\061\065\060\063\006\003\125\0004\003\014\054\116\145\163\163\040\107\157\154\144\051\040\106\305\221\164\141\156\303\272\163\303\255\164\166\303\241\156\171$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\006\111\101\054\344\000\020

**END** 

# CKA VALUE MULTILINE OCTAL

\027\015\060\070\061\062\061\061\061\065\060\070\062\061\132\027 \015\062\070\061\062\060\066\061\065\060\070\062\061\132\060\201 \247\061\013\060\011\006\003\125\004\006\023\002\110\125\061\021 \060\017\006\003\125\004\007\014\010\102\165\144\141\160\145\163 \164\061\025\060\023\006\003\125\004\012\014\014\116\145\164\114 \157\143\153\040\113\146\164\056\061\067\060\065\006\003\125\004 \013\014\056\124\141\156\303\272\163\303\255\164\166\303\241\156 \171\153\151\141\144\303\263\153\040\050\103\145\162\164\151\146 \151\143\141\164\151\157\156\040\123\145\162\166\151\143\145\163 \051\061\065\060\063\006\003\125\004\003\014\054\116\145\164\114 \157\143\153\040\101\162\141\156\171\040\050\103\154\141\163\163  $\label{eq:condition} $$ \040\107\157\154\144\051\040\106\305\221\164\141\156\303\272\163$ \303\255\164\166\303\241\156\171\060\202\001\042\060\015\006\011  $\label{eq:condition} $$ \052\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000 $$$  $\label{eq:condition} $$ \000\202\001\001\000\304\044\136\163\276\113\155$$ \024\303\241\364\343\227\220\156\322\060\105\036\074\356\147\331 \144\340\032\212\177\312\060\312\203\343\040\301\343\364\072\323 \224\137\032\174\133\155\277\060\117\204\047\366\237\037\111\274 \306\231\012\220\362\017\365\177\103\204\067\143\121\213\172\245 \160\374\172\130\315\216\233\355\303\106\154\204\160\135\332\363 \001\220\043\374\116\060\251\176\341\047\143\347\355\144\074\240 \270\311\063\143\376\026\220\377\260\270\375\327\250\300\300\224  $\label{eq:condition} $$ 103\013\266\325\131\246\236\126\320\044\037\160\171\257\333\071 $$$ \124\015\145\165\331\025\101\224\001\257\136\354\366\215\361\377 \255\144\376\040\232\327\134\353\376\246\037\010\144\243\213\166 \125\255\036\073\050\140\056\207\045\350\252\257\037\306\144\106 \040\267\160\177\074\336\110\333\226\123\267\071\167\344\032\342  $\label{eq:condition} $$ 307 \cdot 026 \cdot 204 \cdot 166 \cdot 227 \cdot 133 \cdot 057 \cdot 273 \cdot 031 \cdot 025 \cdot 205 \cdot 370 \cdot 151 \cdot 205 \cdot 365 \cdot 231 \cdot 025 \cdot 205 \cdot 205$ \247\251\362\064\247\251\266\246\003\374\157\206\075\124\174\166 \004\233\153\371\100\135\000\064\307\056\231\165\235\345\210\003 \252\115\370\003\322\102\166\300\033\002\003\000\250\213\243\105 \060\103\060\022\006\003\125\035\023\001\001\377\004\010\060\006 \001\001\377\002\001\004\060\016\006\003\125\035\017\001\001\377 \004\004\003\002\001\006\060\035\006\003\125\035\016\004\026\004 \024\314\372\147\223\360\266\270\320\245\300\036\363\123\375\214 \123\337\203\327\226\060\015\006\011\052\206\110\206\367\015\001 \001\013\005\000\003\202\001\001\000\253\177\356\034\026\251\234 \074\121\000\240\300\021\010\005\247\231\346\157\001\210\124\141 \156\361\271\030\255\112\255\376\201\100\043\224\057\373\165\174  $\begin{tabular}{l} $$ \begin{tabular}{l} $\begin{tabular}{l} $\b$ \353\201\372\142\241\073\132\142\323\224\145\304\341\346\155\202 \370\057\045\160\262\041\046\301\162\121\037\214\054\303\204\220 \303\132\217\272\317\364\247\145\245\353\230\321\373\005\262\106 \165\025\043\152\157\205\143\060\200\360\325\236\037\051\034\302  $\label{eq:condition} $$ \frac{154\260\120\131\135\220\133\073\250\015\060\317\277\175\177\316}{177\316}$$$ \361\235\203\275\311\106\156\040\246\371\141\121\272\041\057\173 \276\245\025\143\241\324\225\207\361\236\271\363\211\363\075\205 \270\270\333\276\265\271\051\371\332\067\005\000\111\224\003\204

 $\label{eq:continuous} $$ 104\347\277\103\061\317\165\213\045\321\364\246\144\365\222\366\253\005\353\075\351\245\013\066\142\332\314\006\137\066\213\266\136\061\270\052\373\136\366\161\337\104\046\236\304\346\015\221\264\056\165\225\200\121\152\113\060\246\260\142\241\223\361\233\330\316\304\143\165\077\131\107\261$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "NetLock Arany (Class Gold) Ftanúsítvány"

# Issuer: CN=NetLock Arany (Class Gold) F..tan..s..tv..ny,OU=Tan..s..tv..nykiad..k (Certification

Services),O=NetLock Kft.,L=Budapest,C=HU

# Serial Number:49:41:2c:e4:00:10

# Subject: CN=NetLock Arany (Class Gold) F..tan..s..tv..ny,OU=Tan..s..tv..nykiad..k (Certification

Services),O=NetLock Kft.,L=Budapest,C=HU

# Not Valid Before: Thu Dec 11 15:08:21 2008

# Not Valid After: Wed Dec 06 15:08:21 2028

# Fingerprint (SHA-256):

6C:61:DA:C3:A2:DE:F0:31:50:6B:E0:36:D2:A6:FE:40:19:94:FB:D1:3D:F9:C8:D4:66:59:92:74:C4:46:EC:98

# Fingerprint (SHA1): 06:08:3F:59:3F:15:A1:04:A0:69:A4:6B:A9:03:D0:06:B7:97:09:91

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "NetLock Arany (Class Gold) Ftanúsítvány"

 ${\tt CKA\_CERT\_SHA1\_HASH\ MULTILINE\_OCTAL}$ 

 $\\ \\006\\010\\077\\131\\077\\025\\241\\004\\240\\151\\244\\153\\251\\003\\320\\006$ 

\267\227\011\221

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\305\241\267\377\163\335\326\327\064\062\030\337\374\074\255\210

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\201\247\061\013\060\011\006\003\125\004\006\023\002\110\125 \061\021\060\017\006\003\125\004\007\014\010\102\165\144\141\160

\145\163\164\061\025\060\023\006\003\125\004\012\014\014\116\145

\143\103\104\001\023\000\023\000\003\123\004\012\014\014\110\143

\241\156\171\153\151\141\144\303\263\153\040\050\103\145\162\164

\151\146\151\143\141\164\151\157\156\040\123\145\162\166\151\143

\164\114\157\143\153\040\101\162\141\156\171\040\050\103\154\141

\163\163\040\107\157\154\144\051\040\106\305\221\164\141\156\303

\272\163\303\255\164\166\303\241\156\171

END

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\006\111\101\054\344\000\020

```
END
```

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "Hongkong Post Root CA 1"

#

# Issuer: CN=Hongkong Post Root CA 1,O=Hongkong Post,C=HK

# Serial Number: 1000 (0x3e8)

# Subject: CN=Hongkong Post Root CA 1,O=Hongkong Post,C=HK

# Not Valid Before: Thu May 15 05:13:14 2003 # Not Valid After : Mon May 15 04:52:29 2023

# Fingerprint (SHA-256):

F9:E6:7D:33:6C:51:00:2A:C0:54:C6:32:02:2D:66:DD:A2:E7:E3:FF:F1:0A:D0:61:ED:31:D8:BB:B4:10:CF:B2

# Fingerprint (SHA1): D6:DA:A8:20:8D:09:D2:15:4D:24:B5:2F:CB:34:6E:B2:58:B2:8A:58

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "Hongkong Post Root CA 1"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\107\061\013\060\011\006\003\125\004\006\023\002\110\113\061 $$$ 

 $\\ \\026\\060\\024\\006\\003\\125\\004\\012\\023\\015\\110\\157\\156\\147\\153\\157$ 

\156\147\040\120\157\163\164\061\040\060\036\006\003\125\004\003

 $\\ \langle 023 \rangle 027 \rangle 110 \rangle 157 \rangle 156 \rangle 147 \rangle 153 \rangle 157 \rangle 156 \rangle 147 \rangle 040 \rangle 120 \rangle 157 \rangle 163 \rangle 164 \rangle 040$ 

\122\157\157\164\040\103\101\040\061

END

CKA\_ID UTF8 "0"

## CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000107\061\013\060\0011\006\003\125\004\006\023\002\110\113\061\026\060\024\006\003\125\004\012\023\015\110\157\156\147\153\157\156\147\040\120\157\163\164\040\061\040\061\040\120\157\163\164\040\120\157\163\164\040\120\157\163\164\040\120\157\163\164\040\120\157\163\164\040\120\157\163\164\040\103\101\040\061$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\002\003\350$$ 

**END** 

## CKA VALUE MULTILINE OCTAL

\122\157\157\164\040\103\101\040\061\060\036\027\015\060\063\060 \065\061\065\060\065\061\063\061\064\132\027\015\062\063\060\065 \061\065\060\064\065\062\062\071\132\060\107\061\013\060\011\006 \003\125\004\006\023\002\110\113\061\026\060\024\006\003\125\004 \012\023\015\110\157\156\147\153\157\156\147\040\120\157\163\164  $\\ \backslash 061 \backslash 040 \backslash 060 \backslash 036 \backslash 006 \backslash 003 \backslash 125 \backslash 004 \backslash 003 \backslash 023 \backslash 027 \backslash 110 \backslash 157 \backslash 156 \backslash 147 \backslash 153$ \157\156\147\040\120\157\163\164\040\122\157\157\164\040\103\101 \040\061\060\202\001\042\060\015\006\011\052\206\110\206\367\015  $\label{eq:condition} $$ \001\001\005\000\003\202\001\017\000\060\202\001\012\002\202 $$$ \001\001\000\254\377\070\266\351\146\002\111\343\242\264\341\220 \371\100\217\171\371\342\275\171\376\002\275\356\044\222\035\042  $\label{eq:condition} $$ \32\205\162\151\376\327\077\011\324\335\221\265\002\234\320 $$$ \215\132\341\125\303\120\206\271\051\046\302\343\331\240\361\151  $\label{eq:condition} $$ \003\050\040\200\105\042\055\126\247\073\124\225\126\042\131\037 $$$  $\label{eq:condition} $$ \050\337\037\040\075\155\242\066\276\043\240\261\156\265\261\047 $$$ \077\071\123\011\352\253\152\350\164\262\302\145\134\216\277\174 \303\170\204\315\236\026\374\365\056\117\040\052\010\237\167\363 \305\036\304\232\122\146\036\110\136\343\020\006\217\042\230\341 \145\216\033\135\043\146\073\270\245\062\121\310\206\252\241\251 \236\177\166\224\302\246\154\267\101\360\325\310\006\070\346\324 \014\342\363\073\114\155\120\214\304\203\047\301\023\204\131\075 \236\165\164\266\330\002\136\072\220\172\300\102\066\162\354\152  $\label{eq:condition} $$ \frac{334}{357}\frac{304}{000}\frac{337}{023}\frac{300}{127}\frac{37}{046}\frac{310}{326}\frac{12}{171} $$$ \167\277\367\257\267\166\271\245\013\204\027\135\020\352\157\341 \253\225\021\137\155\074\243\134\115\203\133\362\263\031\212\200 \213\013\207\002\003\001\000\001\243\046\060\044\060\022\006\003 \125\035\023\001\001\377\004\010\060\006\001\001\377\002\001\003 \060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003 \202\001\001\000\016\106\325\074\256\342\207\331\136\201\213\002 \230\101\010\214\114\274\332\333\356\047\033\202\347\152\105\354 \026\213\117\205\240\363\262\160\275\132\226\272\312\156\155\356 \106\213\156\347\052\056\226\263\031\063\353\264\237\250\262\067 \356\230\250\227\266\056\266\147\047\324\246\111\375\034\223\145 \166\236\102\057\334\042\154\232\117\362\132\025\071\261\161\327 \053\121\350\155\034\230\300\331\052\364\241\202\173\325\311\101 \242\043\001\164\070\125\213\017\271\056\147\242\040\004\067\332 \234\013\323\027\041\340\217\227\171\064\157\204\110\002\040\063  $\label{eq:condition} $$ \033\346\064\104\237\221\160\364\200\136\204\103\302\051\322\154$$ \022\024\344\141\215\254\020\220\236\204\120\273\360\226\157\105 \237\212\363\312\154\117\372\021\072\025\025\106\303\315\037\203 \133\055\101\022\355\120\147\101\023\075\041\253\224\212\252\116 \174\301\261\373\247\326\265\047\057\227\253\156\340\035\342\321 \034\054\037\104\342\374\276\221\241\234\373\326\051\123\163\206 \237\123\330\103\016\135\326\143\202\161\035\200\164\312\366\342 \002\153\331\132

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE

# CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Hongkong Post Root CA 1"
# Issuer: CN=Hongkong Post Root CA 1,O=Hongkong Post,C=HK
# Serial Number: 1000 (0x3e8)
# Subject: CN=Hongkong Post Root CA 1,O=Hongkong Post,C=HK
# Not Valid Before: Thu May 15 05:13:14 2003
# Not Valid After: Mon May 15 04:52:29 2023
# Fingerprint (SHA-256):
F9:E6:7D:33:6C:51:00:2A:C0:54:C6:32:02:2D:66:DD:A2:E7:E3:FF:F1:0A:D0:61:ED:31:D8:BB:B4:10:CF:B2
# Fingerprint (SHA1): D6:DA:A8:20:8D:09:D2:15:4D:24:B5:2F:CB:34:6E:B2:58:B2:8A:58
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Hongkong Post Root CA 1"
CKA CERT SHA1 HASH MULTILINE OCTAL
\label{eq:condition} $$ 326\332\250\040\215\011\322\025\115\044\265\057\313\064\156\262
\130\262\212\130
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\250\015\157\071\170\271\103\155\167\102\155\230\132\314\043\312
END
CKA_ISSUER MULTILINE_OCTAL
\060\107\061\013\060\011\006\003\125\004\006\023\002\110\113\061
\026\060\024\006\003\125\004\012\023\015\110\157\156\147\153\157
\156\147\040\120\157\163\164\061\040\060\036\006\003\125\004\003
\023\027\110\157\156\147\153\157\156\147\040\120\157\163\164\040
\122\157\157\164\040\103\101\040\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\002\003\350
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
#
# Certificate "SecureSign RootCA11"
# Issuer: CN=SecureSign RootCA11,O="Japan Certification Services, Inc.",C=JP
# Serial Number: 1 (0x1)
# Subject: CN=SecureSign RootCA11,O="Japan Certification Services, Inc.",C=JP
# Not Valid Before: Wed Apr 08 04:56:47 2009
# Not Valid After: Sun Apr 08 04:56:47 2029
# Fingerprint (SHA-256):
```

# Fingerprint (SHA1): 3B:C4:9F:48:F8:F3:73:A0:9C:1E:BD:F8:5B:B1:C3:65:C7:D8:11:B3

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA LABEL UTF8 "SecureSign RootCA11"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

 $\label{lem:condition} $$\00130061\013\060\011\006\003\125\004\006\023\002\112\12\006\005\006\003\125\004\012\023\042\112\141\160\141\156\040\123\145\162\166\151\143\145\163\054\040\111\156\143\056\061\034\060\032\006\003\125\0004\003\023\023\123\145\143\165\162\145\123\151\147\156\040\122\157\157\164\103\101\061\061$ 

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{lem:condition} $$\00130061\013\060\011\006\003\125\004\006\023\002\112\12\006\005\006\003\125\004\012\023\042\112\141\160\141\156\040\123\145\162\166\151\143\145\163\054\040\111\156\143\056\061\034\060\032\006\003\125\0004\003\023\023\123\145\143\165\162\145\123\151\147\156\040\122\157\157\164\103\101\061\061$ 

**END** 

CKA SERIAL NUMBER MULTILINE OCTAL

\002\001\001

**END** 

### CKA VALUE MULTILINE OCTAL

\060\202\003\155\060\202\002\125\240\003\002\001\002\001\001  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\005\005\000\060 $$$ \130\061\013\060\011\006\003\125\004\006\023\002\112\120\061\053 \060\051\006\003\125\004\012\023\042\112\141\160\141\156\040\103 \145\162\164\151\146\151\143\141\164\151\157\156\040\123\145\162 \166\151\143\145\163\054\040\111\156\143\056\061\034\060\032\006 \003\125\004\003\023\023\123\145\143\165\162\145\123\151\147\156 \040\122\157\157\164\103\101\061\061\060\036\027\015\060\071\060 \064\060\070\060\064\065\066\064\067\132\027\015\062\071\060\064  $\label{eq:condition} $$ \060\070\060\064\065\066\064\067\132\060\130\061\013\060\011\006$ \012\023\042\112\141\160\141\156\040\103\145\162\164\151\146\151  $\\ 143 \\ 141 \\ 164 \\ 151 \\ 157 \\ 156 \\ 040 \\ 123 \\ 145 \\ 162 \\ 166 \\ 151 \\ 143 \\ 145 \\ 163 \\ 054 \\$ \040\111\156\143\056\061\034\060\032\006\003\125\004\003\023\023 \123\145\143\165\162\145\123\151\147\156\040\122\157\157\164\103 \101\061\061\060\202\001\042\060\015\006\011\052\206\110\206\367 \015\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002 \202\001\001\000\375\167\252\245\034\220\005\073\313\114\233\063 \213\132\024\105\244\347\220\026\321\337\127\322\041\020\244\027

\375\337\254\326\037\247\344\333\174\367\354\337\270\003\332\224 \130\375\135\162\174\214\077\137\001\147\164\025\226\343\002\074 \207\333\256\313\001\216\302\363\146\306\205\105\364\002\306\072 \265\142\262\257\372\234\277\244\346\324\200\060\230\363\015\266 \223\217\251\324\330\066\362\260\374\212\312\054\241\025\063\225 \061\332\300\033\362\356\142\231\206\143\077\277\335\223\052\203 \250\166\271\023\037\267\316\116\102\205\217\042\347\056\032\362  $\label{eq:condition} $$ \225\011\262\005\265\104\116\167\241\040\275\251\362\116\012\175$ \120\255\365\005\015\105\117\106\161\375\050\076\123\373\004\330 \055\327\145\035\112\033\372\317\073\260\061\232\065\156\310\213  $\label{eq:condition} $$ \006\323\000\221\362\224\010\145\114\261\064\006\000\172\211\342 $$$ \360\307\003\131\317\325\326\350\247\062\263\346\230\100\206\305 \315\047\022\213\314\173\316\267\021\074\142\140\007\043\076\053 \100\156\224\200\011\155\266\263\157\167\157\065\010\120\373\002 \207\305\076\211\002\003\001\000\001\243\102\060\100\060\035\006 \003\125\035\016\004\026\004\024\133\370\115\117\262\245\206\324  $\label{eq:condition} $$ \072\322\361\143\232\240\276\011\366\127\267\336\060\016\006\003$ \125\035\017\001\001\377\004\004\003\002\001\006\060\017\006\003 \125\035\023\001\001\377\004\005\060\003\001\001\377\060\015\006  $\label{eq:condition} $$ \011\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001$ \000\240\241\070\026\146\056\247\126\037\041\234\006\372\035\355  $\label{eq:condition} $$ \271\042\305\070\046\330\116\117\354\243\177\171\336\106\041\241 $$$ \207\167\217\007\010\232\262\244\305\257\017\062\230\013\174\146 \051\266\233\175\045\122\111\103\253\114\056\053\156\172\160\257  $\label{eq:condition} $$ \026\016\343\002\154\373\102\346\030\235\105\330\125\310\350\073$ \335\347\341\364\056\013\034\064\134\154\130\112\373\214\210\120 \137\225\034\277\355\253\042\265\145\263\205\272\236\017\270\255  $\label{eq:condition} $$ 345\172\033\212\120\072\035\275\015\274\173\124\120\013\271\102$ \257\125\240\030\201\255\145\231\357\276\344\234\277\304\205\253 \101\262\124\157\334\045\315\355\170\342\216\014\215\011\111\335 \122\312\177\201\376\331\153\323\367\021\355\045\337\370\347\371 \244\372\162\227\204\123\015\245\320\062\030\121\166\131\024\154 \017\353\354\137\200\214\165\103\203\303\205\230\377\114\236\055 \015\344\167\203\223\116\265\226\007\213\050\023\233\214\031\215 \101\047\111\100\356\336\346\043\104\071\334\241\042\326\272\003 \362

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "SecureSign RootCA11"
```

<sup>#</sup> Issuer: CN=SecureSign RootCA11,O="Japan Certification Services, Inc.",C=JP

<sup>#</sup> Serial Number: 1 (0x1)

<sup>#</sup> Subject: CN=SecureSign RootCA11,O="Japan Certification Services, Inc.",C=JP

<sup>#</sup> Not Valid Before: Wed Apr 08 04:56:47 2009 # Not Valid After : Sun Apr 08 04:56:47 2029

```
BF:0F:EE:FB:9E:3A:58:1A:D5:F9:E9:DB:75:89:98:57:43:D2:61:08:5C:4D:31:4F:6F:5D:72:59:AA:42:16:12
# Fingerprint (SHA1): 3B:C4:9F:48:F8:F3:73:A0:9C:1E:BD:F8:5B:B1:C3:65:C7:D8:11:B3
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "SecureSign RootCA11"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\073\304\237\110\370\363\163\240\234\036\275\370\133\261\303\145
\307\330\021\263
END
CKA CERT MD5 HASH MULTILINE OCTAL
\267\122\164\342\222\264\200\223\362\165\344\314\327\362\352\046
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\130\061\013\060\011\006\003\125\004\006\023\002\112\120\061\
\053\060\051\006\003\125\004\012\023\042\112\141\160\141\156\040
\162\166\151\143\145\163\054\040\111\156\143\056\061\034\060\032
\006\003\125\004\003\023\023\123\145\143\165\162\145\123\151\147
\156\040\122\157\157\164\103\101\061\061
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\001\001
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Microsec e-Szigno Root CA 2009"
# Issuer: E=info@e-szigno.hu,CN=Microsec e-Szigno Root CA 2009,O=Microsec Ltd.,L=Budapest,C=HU
# Serial Number:00:c2:7e:43:04:4e:47:3f:19
# Subject: E=info@e-szigno.hu,CN=Microsec e-Szigno Root CA 2009,O=Microsec Ltd.,L=Budapest,C=HU
# Not Valid Before: Tue Jun 16 11:30:18 2009
# Not Valid After: Sun Dec 30 11:30:18 2029
# Fingerprint (SHA-256):
3C:5F:81:FE:A5:FA:B8:2C:64:BF:A2:EA:EC:AF:CD:E8:E0:77:FC:86:20:A7:CA:E5:37:16:3D:F3:6E:DB:F3:78
# Fingerprint (SHA1): 89:DF:74:FE:5C:F4:0F:4A:80:F9:E3:37:7D:54:DA:91:E1:01:31:8E
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Microsec e-Szigno Root CA 2009"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
```

# Fingerprint (SHA-256):

#### CKA SUBJECT MULTILINE OCTAL

**END** 

CKA ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

**END** 

### CKA SERIAL NUMBER MULTILINE OCTAL

\002\011\000\302\176\103\004\116\107\077\031

**END** 

#### CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \0.002\0.004\0.12\0.002\0.002\0.002\0.003\0.002\0.001\0.002\0.001\0.002\0.001\0.000$ \302\176\103\004\116\107\077\031\060\015\006\011\052\206\110\206 \367\015\001\001\001\013\005\000\060\201\202\061\013\060\011\006\003 \125\004\006\023\002\110\125\061\021\060\017\006\003\125\004\007 \014\010\102\165\144\141\160\145\163\164\061\026\060\024\006\003 \125\004\012\014\015\115\151\143\162\157\163\145\143\040\114\164 \144\056\061\047\060\045\006\003\125\004\003\014\036\115\151\143 \162\157\163\145\143\040\145\055\123\172\151\147\156\157\040\122 \157\157\164\040\103\101\040\062\060\060\071\061\037\060\035\006 \011\052\206\110\206\367\015\001\011\001\026\020\151\156\146\157 \100\145\055\163\172\151\147\156\157\056\150\165\060\036\027\015  $\label{eq:condition} $$ \060\071\060\066\061\066\061\066\061\063\060\061\070\132\027\015\062$  $\label{eq:condition} $$ \071\061\062\063\060\061\063\060\061\070\132\060\201\202\061\$ \013\060\011\006\003\125\004\006\023\002\110\125\061\021\060\017  $\label{eq:condition} $$ \006\003\125\004\007\014\010\102\165\144\141\160\145\163\164\061 $$$ \026\060\024\006\003\125\004\012\014\015\115\151\143\162\157\163 \145\143\040\114\164\144\056\061\047\060\045\006\003\125\004\003 \014\036\115\151\143\162\157\163\145\143\040\145\055\123\172\151 \147\156\157\040\122\157\157\164\040\103\101\040\062\060\060\071 \061\037\060\035\006\011\052\206\110\206\367\015\001\011\001\026 \020\151\156\146\157\100\145\055\163\172\151\147\156\157\056\150

\165\060\202\001\042\060\015\006\011\052\206\110\206\367\015\001 \001\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001 \001\000\351\370\217\363\143\255\332\206\330\247\340\102\373\317 \221\336\246\046\370\231\245\143\160\255\233\256\312\063\100\175 \155\226\156\241\016\104\356\341\023\235\224\102\122\232\275\165 \205\164\054\250\016\035\223\266\030\267\214\054\250\317\373\134 \161\271\332\354\376\350\176\217\344\057\035\262\250\165\207\330 \267\241\345\073\317\231\112\106\320\203\031\175\300\241\022\034 \225\155\112\364\330\307\245\115\063\056\205\071\100\165\176\024 \174\200\022\230\120\307\101\147\270\240\200\141\124\246\154\116  $\label{eq:condition} $$ \037\340\235\016\007\351\311\272\063\347\376\300\125\050\054\002$  $\label{eq:condition} $$ \200\247\031\365\236\334\125\123\003\227\173\007\110\377\231\373$ \067\212\044\304\131\314\120\020\143\216\252\251\032\260\204\032  $\label{eq:condition} $$ \206\371\137\273\261\120\156\244\321\012\314\325\161\176\037\247 $$$ \033\174\365\123\156\042\137\313\053\346\324\174\135\256\326\302 \306\114\345\005\001\331\355\127\374\301\043\171\374\372\310\044 \203\225\363\265\152\121\001\320\167\326\351\022\241\371\032\203 \373\202\033\271\260\227\364\166\006\063\103\111\240\377\013\265 \372\265\002\003\001\000\001\243\201\200\060\176\060\017\006\003 \125\035\023\001\001\377\004\005\060\003\001\001\377\060\016\006 \003\125\035\017\001\001\377\004\004\003\002\001\006\060\035\006 \003\125\035\016\004\026\004\024\313\017\306\337\102\103\314\075 \313\265\110\043\241\032\172\246\052\273\064\150\060\037\006\003 \125\035\043\004\030\060\026\200\024\313\017\306\337\102\103\314 \075\313\265\110\043\241\032\172\246\052\273\064\150\060\033\006 \003\125\035\021\004\024\060\022\201\020\151\156\146\157\100\145 \055\163\172\151\147\156\157\056\150\165\060\015\006\011\052\206 \016\136\056\325\314\263\174\076\313\374\075\377\015\050\225\223 \004\310\277\332\315\171\270\103\220\360\244\276\357\362\357\041  $\verb|230|274|324|324|135|006|366|356|102|354|060|154|240|252|251|312|$ \361\257\212\372\077\013\163\152\076\352\056\100\176\037\256\124 \141\171\353\056\010\067\327\043\363\214\237\276\035\261\341\244 \165\333\240\342\124\024\261\272\034\051\244\030\366\022\272\242 \024\024\343\061\065\310\100\377\267\340\005\166\127\301\034\131 \362\370\277\344\355\045\142\134\204\360\176\176\037\263\276\371 \267\041\021\314\003\001\126\160\247\020\222\036\033\064\201\036 \255\234\032\303\004\074\355\002\141\326\036\006\363\137\072\207 \362\053\361\105\207\345\075\254\321\307\127\204\275\153\256\334 \330\371\266\033\142\160\013\075\066\311\102\362\062\327\172\141 \346\322\333\075\317\310\251\311\233\334\333\130\104\327\157\070 \257\177\170\323\243\255\032\165\272\034\301\066\174\217\036\155 \034\303\165\106\256\065\005\246\366\134\075\041\356\126\360\311 \202\042\055\172\124\253\160\303\175\042\145\202\160\226 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Microsec e-Szigno Root CA 2009"
# Issuer: E=info@e-szigno.hu,CN=Microsec e-Szigno Root CA 2009,O=Microsec Ltd.,L=Budapest,C=HU
# Serial Number:00:c2:7e:43:04:4e:47:3f:19
# Subject: E=info@e-szigno.hu,CN=Microsec e-Szigno Root CA 2009,O=Microsec Ltd.,L=Budapest,C=HU
# Not Valid Before: Tue Jun 16 11:30:18 2009
# Not Valid After: Sun Dec 30 11:30:18 2029
# Fingerprint (SHA-256):
3C:5F:81:FE:A5:FA:B8:2C:64:BF:A2:EA:EC:AF:CD:E8:E0:77:FC:86:20:A7:CA:E5:37:16:3D:F3:6E:DB:F3:78
# Fingerprint (SHA1): 89:DF:74:FE:5C:F4:0F:4A:80:F9:E3:37:7D:54:DA:91:E1:01:31:8E
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Microsec e-Szigno Root CA 2009"
CKA CERT SHA1 HASH MULTILINE OCTAL
\211\337\164\376\134\364\017\112\200\371\343\067\175\124\332\221
\341\001\061\216
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\370\111\364\003\274\104\055\203\276\110\151\175\051\144\374\261
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\202\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\021\060\017\006\003\125\004\007\014\010\102\165\144\141\160
\145\163\164\061\026\060\024\006\003\125\004\012\014\015\115\151
\143\162\157\163\145\143\040\114\164\144\056\061\047\060\045\006
\label{eq:condition} $$ \003\125\004\003\014\036\115\151\143\162\157\163\145\143\040\145
\055\123\172\151\147\156\157\040\122\157\157\164\040\103\101\040
\062\060\060\071\061\037\060\035\006\011\052\206\110\206\367\015
\label{eq:condition} $$ \001\01\001\026\020\151\156\146\157\100\145\055\163\172\151\147 $$
\156\157\056\150\165
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\011\000\302\176\103\004\116\107\077\031
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "GlobalSign Root CA - R3"
# Issuer: CN=GlobalSign,O=GlobalSign,OU=GlobalSign Root CA - R3
# Serial Number:04:00:00:00:00:01:21:58:53:08:a2
# Subject: CN=GlobalSign,O=GlobalSign,OU=GlobalSign Root CA - R3
# Not Valid Before: Wed Mar 18 10:00:00 2009
```

# Not Valid After: Sun Mar 18 10:00:00 2029

# Fingerprint (SHA-256):

CB:B5:22:D7:B7:F1:27:AD:6A:01:13:86:5B:DF:1C:D4:10:2E:7D:07:59:AF:63:5A:7C:F4:72:0D:C9:63:C5:3B

# Fingerprint (SHA1): D6:9B:56:11:48:F0:1C:77:C5:45:78:C1:09:26:DF:5B:85:69:76:AD

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "GlobalSign Root CA - R3"

CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509

CKA\_SUBJECT MULTILINE\_OCTAL

\060\114\061\040\060\036\006\003\125\004\013\023\027\107\154\157 \142\141\154\123\151\147\156\040\122\157\157\164\040\103\101\040

 $\label{eq:condition} $$ \055\040\122\063\061\023\060\021\006\003\125\004\012\023\012\107 $$$ 

 $\label{thm:linear_lin$ 

 $\\ \\004\\ \\003\\ \\023\\ \\012\\ \\107\\ \\154\\ \\157\\ \\142\\ \\141\\ \\154\\ \\123\\ \\151\\ \\147\\ \\156$ 

**END** 

CKA ID UTF8 "0"

## CKA ISSUER MULTILINE OCTAL

# CKA SERIAL NUMBER MULTILINE OCTAL

\002\013\004\000\000\000\000\001\041\130\123\010\242

**END** 

### CKA VALUE MULTILINE OCTAL

\060\202\003\137\060\202\002\107\240\003\002\001\002\002\013\004  $\label{eq:condition} $$ \000\000\000\001\041\130\123\010\242\060\015\006\011\052\206 $$$ \110\206\367\015\001\001\013\005\000\060\114\061\040\060\036\006 \003\125\004\013\023\027\107\154\157\142\141\154\123\151\147\156 \040\122\157\157\164\040\103\101\040\055\040\122\063\061\023\060 \021\006\003\125\004\012\023\012\107\154\157\142\141\154\123\151 \147\156\061\023\060\021\006\003\125\004\003\023\012\107\154\157 \142\141\154\123\151\147\156\060\036\027\015\060\071\060\063\061  $\label{eq:condition} $$ \070\061\060\060\060\060\060\132\027\015\062\071\060\063\061\070 $$$  $\label{eq:condition} $$ \061\060\060\060\060\060\132\060\114\061\040\060\036\006\003\125$$  $\\ \\004\\\\013\\\\023\\\\027\\\\107\\\\154\\\\157\\\\142\\\\141\\\\154\\\\123\\\\151\\\\147\\\\156\\\\040\\\\122$ \157\157\164\040\103\101\040\055\040\122\063\061\023\060\021\006 \003\125\004\012\023\012\107\154\157\142\141\154\123\151\147\156 \061\023\060\021\006\003\125\004\003\023\012\107\154\157\142\141 \154\123\151\147\156\060\202\001\042\060\015\006\011\052\206\110 \206\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001 \012\002\202\001\001\000\314\045\166\220\171\006\170\042\026\365 \300\203\266\204\312\050\236\375\005\166\021\305\255\210\162\374 \106\002\103\307\262\212\235\004\137\044\313\056\113\341\140\202

\106\341\122\253\014\201\107\160\154\335\144\321\353\365\054\243 \017\202\075\014\053\256\227\327\266\024\206\020\171\273\073\023  $\label{eq:condition} $$ \200\167\214\010\341\111\322\152\142\057\037\136\372\226\150\337 $$$ \211\047\225\070\237\006\327\076\311\313\046\131\015\163\336\260  $\label{eq:condition} $$ \frac{310}{351}046\\016\\203\\025\\306\\357\\133\\213\\322\\004\\140\\312\\111\\246$ \050\366\151\073\366\313\310\050\221\345\235\212\141\127\067\254 \164\024\334\164\340\072\356\162\057\056\234\373\320\273\277\365  $\label{eq:condition} $$ \075\000\341\006\063\350\202\053\256\123\246\072\026\163\214\335 $$$  $\label{eq:condition} $$101\016\040\072\300\264\247\241\351\262\117\220\056\062\140\351$$ \127\313\271\004\222\150\150\345\070\046\140\165\262\237\167\377 \221\024\357\256\040\111\374\255\100\025\110\321\002\061\141\031  $\label{eq:condition} $$ 136\270\227\357\255\167\267\144\232\172\277\137\301\023\357\233$ \142\373\015\154\340\124\151\026\251\003\332\156\351\203\223\161 \166\306\151\205\202\027\002\003\001\000\001\243\102\060\100\060 \017\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377  $\label{eq:condition} $$ \000\003\125\003\016\004\026\004\024\217\360\113\177\250 $$$ \056\105\044\256\115\120\372\143\232\213\336\342\335\033\274\060 \015\006\011\052\206\110\206\367\015\001\001\013\005\000\003\202  $\label{eq:condition} $$ \001\000\113\100\333\300\120\252\376\310\014\357\367\226\124 $$$ \105\111\273\226\000\011\101\254\263\023\206\206\050\007\063\312 \153\346\164\271\272\000\055\256\244\012\323\365\361\361\017\212  $\label{eq:condition} $$ \277\163\147\112\203\307\104\173\170\340\257\156\154\157\003\051 $$$ \216\063\071\105\303\216\344\271\127\154\252\374\022\226\354\123  $\label{eq:condition} $$ 306\055\344\044\154\271\224\143\373\334\123\150\147\126\076\203$ \270\317\065\041\303\311\150\376\316\332\302\123\252\314\220\212 \351\360\135\106\214\225\335\172\130\050\032\057\035\336\315\000  $\label{eq:condition} $$ \067\101\217\355\104\155\327\123\050\227\176\363\147\004\036\025$$ \327\212\226\264\323\336\114\047\244\114\033\163\163\166\364\027 \231\302\037\172\016\343\055\010\255\012\034\054\377\074\253\125  $\label{eq:condition} $$ \016\017\221\176\066\353\303\127\111\276\341\056\055\174\140\213$ \303\101\121\023\043\235\316\367\062\153\224\001\250\231\347\054 \063\037\072\073\045\322\206\100\316\073\054\206\170\311\141\057 \024\272\356\333\125\157\337\204\356\005\011\115\275\050\330\162 \316\323\142\120\145\036\353\222\227\203\061\331\263\265\312\107 \130\077\137

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

<sup>#</sup> Trust for "GlobalSign Root CA - R3"

<sup>#</sup> Issuer: CN=GlobalSign,O=GlobalSign,OU=GlobalSign Root CA - R3

<sup>#</sup> Serial Number:04:00:00:00:00:01:21:58:53:08:a2

<sup>#</sup> Subject: CN=GlobalSign,O=GlobalSign,OU=GlobalSign Root CA - R3

<sup>#</sup> Not Valid Before: Wed Mar 18 10:00:00 2009

<sup>#</sup> Not Valid After: Sun Mar 18 10:00:00 2029

<sup>#</sup> Fingerprint (SHA-256):

```
CB:B5:22:D7:B7:F1:27:AD:6A:01:13:86:5B:DF:1C:D4:10:2E:7D:07:59:AF:63:5A:7C:F4:72:0D:C9:63:C5:3B
# Fingerprint (SHA1): D6:9B:56:11:48:F0:1C:77:C5:45:78:C1:09:26:DF:5B:85:69:76:AD
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "GlobalSign Root CA - R3"
CKA CERT SHA1 HASH MULTILINE OCTAL
\326\233\126\021\110\360\034\167\305\105\170\301\011\046\337\133
\205\151\166\255
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\305\337\270\111\312\005\023\125\356\055\272\032\303\076\260\050
END
CKA_ISSUER MULTILINE_OCTAL
\060\114\061\040\060\036\006\003\125\004\013\023\027\107\154\157
\142\141\154\123\151\147\156\040\122\157\157\164\040\103\101\040
\055\040\122\063\061\023\060\021\006\003\125\004\012\023\012\107
\label{thm:linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_linear_lin
\004\003\023\012\107\154\157\142\141\154\123\151\147\156
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\label{eq:condition} $$ \002\01\004\000\000\000\000\001\041\130\123\010\242 $$
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Autoridad de Certificacion Firmaprofesional CIF A62634068"
# Issuer: CN=Autoridad de Certificacion Firmaprofesional CIF A62634068,C=ES
# Serial Number:53:ec:3b:ee:fb:b2:48:5f
# Subject: CN=Autoridad de Certificacion Firmaprofesional CIF A62634068,C=ES
# Not Valid Before: Wed May 20 08:38:15 2009
# Not Valid After: Tue Dec 31 08:38:15 2030
# Fingerprint (SHA-256):
# Fingerprint (SHA1): AE:C5:FB:3F:C8:E1:BF:C4:E5:4F:03:07:5A:9A:E8:00:B7:F7:B6:FA
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Autoridad de Certificacion Firmaprofesional CIF A62634068"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\121\061\013\060\011\006\003\125\004\006\023\002\105\123\061
```

 $\label{eq:condition} $$ 102\060\100\006\003\125\004\003\014\071\101\165\164\157\162\151\144\141\144\040\144\145\040\103\145\162\164\151\146\151\143\141\143\151\157\156\040\106\151\162\155\141\160\162\157\146\145\163\151\157\156\141\154\040\103\111\106\040\101\066\062\066\063\064\060\066\070$ 

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

**END** 

### CKA SERIAL NUMBER MULTILINE OCTAL

 $\\002\\010\\123\\354\\073\\356\\373\\262\\110\\137$ 

**END** 

## CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \060\202\006\024\060\202\003\374\240\003\002\001\002\002\010\123$ \354\073\356\373\262\110\137\060\015\006\011\052\206\110\206\367 \015\001\001\005\005\000\060\121\061\013\060\011\006\003\125\004  $\label{eq:condition} $$ \006\023\002\105\123\061\102\060\100\006\003\125\004\003\014\071 $$$ \101\165\164\157\162\151\144\141\144\040\144\145\040\103\145\162 \164\151\146\151\143\141\143\151\157\156\040\106\151\162\155\141 \160\162\157\146\145\163\151\157\156\141\154\040\103\111\106\040 \101\066\062\066\063\064\060\066\070\060\036\027\015\060\071\060 \065\062\060\060\070\063\070\061\065\132\027\015\063\060\061\062 \063\061\060\070\063\070\061\065\132\060\121\061\013\060\011\006 \003\125\004\006\023\002\105\123\061\102\060\100\006\003\125\004  $\\ \\003\\\\014\\\\071\\\\101\\\\165\\\\164\\\\157\\\\162\\\\151\\\\144\\\\141\\\\144\\\\040\\\\144\\\\145\\\\040$ \103\145\162\164\151\146\151\143\141\143\151\157\156\040\106\151 \162\155\141\160\162\157\146\145\163\151\157\156\141\154\040\103 \111\106\040\101\066\062\066\063\064\060\066\070\060\202\002\042 \060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003 \202\002\017\000\060\202\002\012\002\202\002\001\000\312\226\153 \216\352\370\373\361\242\065\340\177\114\332\340\303\122\327\175 \266\020\310\002\136\263\103\052\304\117\152\262\312\034\135\050 \232\170\021\032\151\131\127\257\265\040\102\344\213\017\346\337 \133\246\003\222\057\365\021\344\142\327\062\161\070\331\004\014 \161\253\075\121\176\017\007\337\143\005\134\351\277\224\157\301 \051\202\300\264\332\121\260\301\074\273\255\067\112\134\312\361 \113\066\016\044\253\277\303\204\167\375\250\120\364\261\347\306 \057\322\055\131\215\172\012\116\226\151\122\002\252\066\230\354 \374\372\024\203\014\067\037\311\222\067\177\327\201\055\345\304 \271\340\076\064\376\147\364\076\146\321\323\364\100\317\136\142 \064\017\160\006\076\040\030\132\316\367\162\033\045\154\223\164 \024\223\243\163\261\016\252\207\020\043\131\137\040\005\031\107

\355\150\216\222\022\312\135\374\326\053\262\222\074\040\317\341 \137\257\040\276\240\166\177\166\345\354\032\206\141\063\076\347 \173\264\077\240\017\216\242\271\152\157\271\207\046\157\101\154 \210\246\120\375\152\143\013\365\223\026\033\031\217\262\355\233 \233\311\220\365\001\014\337\031\075\017\076\070\043\311\057\217 \014\321\002\376\033\125\326\116\320\215\074\257\117\244\363\376 \257\052\323\005\235\171\010\241\313\127\061\264\234\310\220\262 \147\364\030\026\223\072\374\107\330\321\170\226\061\037\272\053  $\\014\\137\\135\\231\\255\\143\\211\\132\\044\\040\\166\\330\\337\\375\\253\\116$ \246\042\252\235\136\346\047\212\175\150\051\243\347\212\270\332 \021\273\027\055\231\235\023\044\106\367\305\342\330\237\216\177 \307\217\164\155\132\262\350\162\365\254\356\044\020\255\057\024 \332\377\055\232\106\161\107\276\102\337\273\001\333\364\177\323 \050\217\061\131\133\323\311\002\246\264\122\312\156\227\373\103 \305\010\046\157\212\364\273\375\237\050\252\015\325\105\363\023 \072\035\330\300\170\217\101\147\074\036\224\144\256\173\013\305  $\label{eq:condition} $$ \350\31\001\210\071\032\227\206\144\101\325\073\207\014\156\372 $$$ \017\306\275\110\024\277\071\115\324\236\101\266\217\226\035\143 \226\223\331\225\006\170\061\150\236\067\006\073\200\211\105\141  $\label{eq:condition} $$ \071\043\307\033\104\243\025\345\034\370\222\060\273\002\003\001 $$$ \000\001\243\201\357\060\201\354\060\022\006\003\125\035\023\001 \001\377\004\010\060\006\001\001\377\002\001\001\060\016\006\003 \125\035\016\004\026\004\024\145\315\353\253\065\036\000\076\176 \325\164\300\034\264\163\107\016\032\144\057\060\201\246\006\003 \125\035\040\004\201\236\060\201\233\060\201\230\006\004\125\035 \040\000\060\201\217\060\057\006\010\053\006\001\005\005\007\002 \001\026\043\150\164\164\160\072\057\057\167\167\167\056\146\151 \162\155\141\160\162\157\146\145\163\151\157\156\141\154\056\143 \157\155\057\143\160\163\060\134\006\010\053\006\001\005\005\007  $\label{eq:condition} $$ \002\002\060\120\036\116\000\120\000\141\000\163\000\145\000\157 $$$ \000\040\000\144\000\145\000\040\000\154\000\141\000\040\000\102 \000\157\000\156\000\141\000\156\000\157\000\166\000\141\000\040 \000\064\000\067\000\040\000\102\000\141\000\162\000\143\000\145 \000\154\000\157\000\156\000\141\000\040\000\060\000\070\000\060 \000\061\000\067\060\015\006\011\052\206\110\206\367\015\001\001 \005\005\000\003\202\002\001\000\027\175\240\371\264\335\305\305 \353\255\113\044\265\241\002\253\335\245\210\112\262\017\125\113 \053\127\214\073\345\061\335\376\304\062\361\347\133\144\226\066 \062\030\354\245\062\167\327\343\104\266\300\021\052\200\271\075 \152\156\174\233\323\255\374\303\326\243\346\144\051\174\321\341 \070\036\202\053\377\047\145\257\373\026\025\304\056\161\204\345 \265\377\372\244\107\275\144\062\273\366\045\204\242\047\102\365 \040\260\302\023\020\021\315\020\025\272\102\220\052\322\104\341 \226\046\353\061\110\022\375\052\332\311\006\317\164\036\251\113 \325\207\050\371\171\064\222\076\056\104\350\366\217\117\217\065 \077\045\263\071\334\143\052\220\153\040\137\304\122\022\116\227 \054\052\254\235\227\336\110\362\243\146\333\302\322\203\225\246

\146\247\236\045\017\351\013\063\221\145\012\132\303\331\124\022 \335\257\303\116\016\037\046\136\015\334\263\215\354\325\201\160 \336\322\117\044\005\363\154\116\365\114\111\146\215\321\377\322  $\label{eq:condition} $$ \013\045\101\110\376\121\204\306\102\257\200\004\317\320\176\144 $$$ \111\344\362\337\242\354\261\114\300\052\035\347\264\261\145\242 \304\274\361\230\364\252\160\007\143\264\270\332\073\114\372\100 \042\060\133\021\246\360\005\016\306\002\003\110\253\206\233\205 \335\333\335\352\242\166\200\163\175\365\234\004\304\105\215\347 \271\034\213\236\352\327\165\321\162\261\336\165\104\347\102\175 \342\127\153\175\334\231\274\075\203\050\352\200\223\215\305\114 \145\301\160\201\270\070\374\103\061\262\366\003\064\107\262\254 \373\042\006\313\036\335\027\107\034\137\146\271\323\032\242\332 \021\261\244\274\043\311\344\276\207\377\271\224\266\370\135\040  $\label{eq:condition} $$ \frac{324}137\sqrt{347}\sqrt{275}150\sqrt{173}145\sqrt{362}\sqrt{25}\sqrt{36322}\sqrt{72}\sqrt{251}\sqrt{55}\sqrt{351}$$ \330\153\044\254\227\130\104\107\255\131\030\361\041\145\160\336 \316\064\140\250\100\361\363\074\244\303\050\043\214\376\047\063  $\label{eq:condition} $$ 103\100\240\027\074\353\352\073\260\162\246\243\271\112\113\136$ \026\110\364\262\274\310\214\222\305\235\237\254\162\066\274\064  $\label{eq:condition} $$ \200\064\153\251\213\222\300\270\027\355\354\166\123\365\044\001 $$$ \214\263\042\350\113\174\125\306\235\372\243\024\273\145\205\156 \156\117\022\176\012\074\235\225

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Autoridad de Certificación Firmaprofesional CIF A62634068"
- # Issuer: CN=Autoridad de Certificacion Firmaprofesional CIF A62634068,C=ES
- # Serial Number:53:ec:3b:ee:fb:b2:48:5f
- # Subject: CN=Autoridad de Certificacion Firmaprofesional CIF A62634068,C=ES
- # Not Valid Before: Wed May 20 08:38:15 2009
- # Not Valid After: Tue Dec 31 08:38:15 2030
- # Fingerprint (SHA-256):

04:04:80:28:BF:1F:28:64:D4:8F:9A:D4:D8:32:94:36:6A:82:88:56:55:3F:3B:14:30:3F:90:14:7F:5D:40:EF

# Fingerprint (SHA1): AE:C5:FB:3F:C8:E1:BF:C4:E5:4F:03:07:5A:9A:E8:00:B7:F7:B6:FA

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Autoridad de Certificacion Firmaprofesional CIF A62634068"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\256\305\373\077\310\341\277\304\345\117\003\007\132\232\350\000\267\367\266\372

**END** 

CKA CERT MD5 HASH MULTILINE OCTAL

\163\072\164\172\354\273\243\226\246\302\344\342\310\233\300\303

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\121\061\013\060\011\006\003\125\004\006\023\002\105\123\061 \102\060\100\006\003\125\004\003\014\071\101\165\164\157\162\151 \144\141\144\040\144\145\040\103\145\162\164\151\146\151\143\141 \143\151\157\156\040\106\151\162\155\141\160\162\157\146\145\163 \151\157\156\141\154\040\103\111\106\040\101\066\062\066\063\064 \060\066\070 **END** CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL \002\010\123\354\073\356\373\262\110\137 **END** CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE # Certificate "Izenpe.com" # Issuer: CN=Izenpe.com,O=IZENPE S.A.,C=ES # Serial Number:00:b0:b7:5a:16:48:5f:bf:e1:cb:f5:8b:d7:19:e6:7d # Subject: CN=Izenpe.com,O=IZENPE S.A.,C=ES # Not Valid Before: Thu Dec 13 13:08:28 2007 # Not Valid After: Sun Dec 13 08:27:25 2037 # Fingerprint (SHA-256): 25:30:CC:8E:98:32:15:02:BA:D9:6F:9B:1F:BA:1B:09:9E:2D:29:9E:0F:45:48:BB:91:4F:36:3B:C0:D4:53:1F # Fingerprint (SHA1): 2F:78:3D:25:52:18:A7:4A:65:39:71:B5:2C:A2:9C:45:15:6F:E9:19 CKA CLASS CK OBJECT CLASS CKO CERTIFICATE CKA\_TOKEN CK\_BBOOL CK\_TRUE CKA PRIVATE CK BBOOL CK FALSE CKA MODIFIABLE CK BBOOL CK FALSE CKA\_LABEL UTF8 "Izenpe.com" CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA SUBJECT MULTILINE OCTAL \060\070\061\013\060\011\006\003\125\004\006\023\002\105\123\061 \024\060\022\006\003\125\004\012\014\013\111\132\105\116\120\105 \040\123\056\101\056\061\023\060\021\006\003\125\004\003\014\012 \111\172\145\156\160\145\056\143\157\155 **END** CKA ID UTF8 "0" CKA\_ISSUER MULTILINE\_OCTAL \060\070\061\013\060\011\006\003\125\004\006\023\002\105\123\061 \024\060\022\006\003\125\004\012\014\013\111\132\105\116\120\105 \040\123\056\101\056\061\023\060\021\006\003\125\004\003\014\012 \111\172\145\156\160\145\056\143\157\155 **END** CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL  $\label{eq:condition} $$ \020\000\260\267\132\026\110\137\277\341\313\365\213\327\031 $$$ \346\175

#### **END**

### CKA VALUE MULTILINE OCTAL

\060\202\005\361\060\202\003\331\240\003\002\001\002\002\000\000 \260\267\132\026\110\137\277\341\313\365\213\327\031\346\175\060 \015\006\011\052\206\110\206\367\015\001\001\013\005\000\060\070 \022\006\003\125\004\012\014\013\111\132\105\116\120\105\040\123 \056\101\056\061\023\060\021\006\003\125\004\003\014\012\111\172 \145\156\160\145\056\143\157\155\060\036\027\015\060\067\061\062 \061\063\061\063\060\070\062\070\132\027\015\063\067\061\062\061 \063\060\070\062\067\062\065\132\060\070\061\013\060\011\006\003 \014\013\111\132\105\116\120\105\040\123\056\101\056\061\023\060  $\label{eq:condition} $$ \004\003\125\004\003\014\012\111\172\145\156\160\145\056\143 $$$ \157\155\060\202\002\042\060\015\006\011\052\206\110\206\367\015 \001\001\001\005\000\003\202\002\017\000\060\202\002\012\002\202  $\label{eq:condition} $$ \002\001\000\311\323\172\312\017\036\254\247\206\350\026\145\152$ \261\302\033\105\062\161\225\331\376\020\133\314\257\347\245\171 \001\217\211\303\312\362\125\161\367\167\276\167\224\363\162\244  $\label{eq:condition} $$ \054\104\330\236\222\233\024\072\241\347\044\220\012\012\126\216$ \305\330\046\224\341\331\110\341\055\076\332\012\162\335\243\231 \025\332\201\242\207\364\173\156\046\167\211\130\255\326\353\014  $\label{eq:condition} $$ \262\101\172\163\156\155\333\172\170\101\351\010\210\022\176\207 $$$ \056\146\021\143\154\124\373\074\235\162\300\274\056\377\302\267 \335\015\166\343\072\327\367\264\150\276\242\365\343\201\156\301 \106\157\135\215\340\115\306\124\125\211\032\063\061\012\261\127 \271\243\212\230\303\354\073\064\305\225\101\151\176\165\302\074  $\label{eq:condition} $$ \040\305\141\272\121\107\240\040\220\223\241\220\113\363\116\174 $$$ \205\105\124\232\321\005\046\101\260\265\115\035\063\276\304\003 \310\045\174\301\160\333\073\364\011\055\124\047\110\254\057\341  $\label{eq:condition} $$ 304\254\076\310\313\222\114\123\071\067\043\354\323\001\371\340 $$$ \011\104\115\115\144\300\341\015\132\207\042\274\255\033\243\376 \046\265\025\363\247\374\204\031\351\354\241\210\264\104\151\204 \203\363\211\321\164\006\251\314\013\326\302\336\047\205\120\046 \312\027\270\311\172\207\126\054\032\001\036\154\276\023\255\020 \254\265\044\365\070\221\241\326\113\332\361\273\322\336\107\265 \361\274\201\366\131\153\317\031\123\351\215\025\313\112\313\251 \157\104\345\033\101\317\341\206\247\312\320\152\237\274\114\215  $\label{eq:condition} $$ \006\063\132\242\205\345\220\065\240\142\134\026\116\360\343\242\$ \372\003\032\264\054\161\263\130\054\336\173\013\333\032\017\353 \336\041\037\006\167\006\003\260\311\357\231\374\300\271\117\013 \206\050\376\322\271\352\343\332\245\303\107\151\022\340\333\360 \366\031\213\355\173\160\327\002\326\355\207\030\050\054\004\044 \114\167\344\110\212\032\306\073\232\324\017\312\372\165\322\001 \100\132\215\171\277\213\317\113\317\252\026\301\225\344\255\114 \212\076\027\221\324\261\142\345\202\345\200\004\244\003\176\215 \277\332\177\242\017\227\117\014\323\015\373\327\321\345\162\176 \034\310\167\377\133\232\017\267\256\005\106\345\361\250\026\354

\107\244\027\002\003\001\000\001\243\201\366\060\201\363\060\201 \260\006\003\125\035\021\004\201\250\060\201\245\201\017\151\156 \146\157\100\151\172\145\156\160\145\056\143\157\155\244\201\221  $\label{eq:condition} $$ \060\201\216\061\107\060\105\006\003\125\004\012\014\076\111\132 $$$ \105\116\120\105\040\123\056\101\056\040\055\040\103\111\106\040  $\label{eq:condition} $$ 101\060\061\063\066\066\060\055\122\115\145\162\143\056 $$$ \126\151\164\157\162\151\141\055\107\141\163\164\145\151\172\040 \124\061\060\065\065\040\106\066\062\040\123\070\061\103\060\101  $\\ \\006\\ \\003\\ \\125\\ \\004\\ \\011\\ \\014\\ \\072\\ \\101\\ \\166\\ \\144\\ \\141\\ \\040\\ \\144\\ \\145\\ \\154\\ \\040$ \115\145\144\151\164\145\162\162\162\141\156\145\157\040\105\164\157 \162\142\151\144\145\141\040\061\064\040\055\040\060\061\060\061  $\label{eq:condition} $$ \060\040\126\151\164\157\162\151\141\055\107\141\163\164\145\151 $$$ \172\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001  $\label{eq:condition} $$ \001\377\060\016\006\003\125\035\017\001\001\377\004\004\003\002$  $\label{eq:condition} $$ \001\006\003\005\006\003\125\035\016\004\026\004\024\035\034\145$ \016\250\362\045\173\264\221\317\344\261\261\346\275\125\164\154  $\label{eq:condition} $$ \005\06\015\006\011\052\206\110\206\367\015\001\001\013\005\000 $$$ \003\202\002\001\000\170\246\014\026\112\237\114\210\072\300\313 \016\245\026\175\237\271\110\137\030\217\015\142\066\366\315\031 \153\254\253\325\366\221\175\256\161\363\077\263\016\170\205\233 \225\244\047\041\107\102\112\174\110\072\365\105\174\263\014\216 \121\170\254\225\023\336\306\375\175\270\032\220\114\253\222\003  $\label{eq:condition} $$ 307\355\102\001\316\017\330\261\372\242\222\341\140\155\256\172$ \153\011\252\306\051\356\150\111\147\060\200\044\172\061\026\071 \133\176\361\034\056\335\154\011\255\362\061\301\202\116\271\273 \371\276\277\052\205\077\300\100\243\072\131\374\131\113\074\050 \044\333\264\025\165\256\015\210\272\056\163\300\275\130\207\345  $\label{eq:condition} $$ 102\362\353\136\356\036\060\042\231\313\067\321\304\041\154\201 $$$ \354\276\155\046\346\034\344\102\040\236\107\260\254\203\131\160 \054\065\326\257\066\064\264\315\073\370\062\250\357\343\170\211 \373\215\105\054\332\234\270\176\100\034\141\347\076\242\222\054 \113\362\315\372\230\266\051\377\363\362\173\251\037\056\240\223 \127\053\336\205\003\371\151\067\313\236\170\152\005\264\305\061 \170\211\354\172\247\205\341\271\173\074\336\276\036\171\204\316 \237\160\016\131\302\065\056\220\052\061\331\344\105\172\101\244 \056\023\233\064\016\146\173\111\253\144\227\320\106\303\171\235 \162\120\143\246\230\133\006\275\110\155\330\071\203\160\350\065 \360\005\321\252\274\343\333\310\002\352\174\375\202\332\302\133  $\label{eq:condition} $$ 122\065\256\230\072\255\272\065\223\043\247\037\110\335\065\106$ \230\262\020\150\344\245\061\302\012\130\056\031\201\020\311\120 \165\374\352\132\026\316\021\327\356\357\120\210\055\141\377\077  $\label{eq:condition} $$ 102\163\005\224\103\325\216\074\116\001\072\031\245\037\106\116$$ \167\320\135\345\201\042\041\207\376\224\175\204\330\223\255\326 \150\103\110\262\333\353\163\044\347\221\177\124\244\266\200\076 \235\243\074\114\162\302\127\304\240\324\314\070\047\316\325\006 \236\242\110\331\351\237\316\202\160\066\223\232\073\337\226\041 \343\131\267\014\332\221\067\360\375\131\132\263\231\310\151\154 

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\377\356\336\200\330\055\321\070\325\136\055\013\230\175\076\154
\333\374\046\210\307
END
CKA_NSS_MOZILLA_CA_POLICY CK_BBOOL CK_TRUE
CKA_NSS_SERVER_DISTRUST_AFTER CK_BBOOL CK_FALSE
CKA_NSS_EMAIL_DISTRUST_AFTER CK_BBOOL CK_FALSE
# Trust for "Izenpe.com"
# Issuer: CN=Izenpe.com,O=IZENPE S.A.,C=ES
# Serial Number:00:b0:b7:5a:16:48:5f:bf:e1:cb:f5:8b:d7:19:e6:7d
# Subject: CN=Izenpe.com,O=IZENPE S.A.,C=ES
# Not Valid Before: Thu Dec 13 13:08:28 2007
# Not Valid After: Sun Dec 13 08:27:25 2037
# Fingerprint (SHA-256):
25:30:CC:8E:98:32:15:02:BA:D9:6F:9B:1F:BA:1B:09:9E:2D:29:9E:0F:45:48:BB:91:4F:36:3B:C0:D4:53:1F
# Fingerprint (SHA1): 2F:78:3D:25:52:18:A7:4A:65:39:71:B5:2C:A2:9C:45:15:6F:E9:19
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "Izenpe.com"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\label{eq:condition} $$ \057\170\075\045\122\030\247\112\145\071\161\265\054\242\234\105$
\025\157\351\031
END
CKA CERT MD5 HASH MULTILINE OCTAL
\246\260\315\205\200\332\134\120\064\243\071\220\057\125\147\163
END
CKA ISSUER MULTILINE OCTAL
\060\070\061\013\060\011\006\003\125\004\006\023\002\105\123\061
\040\123\056\101\056\061\023\060\021\006\003\125\004\003\014\012
\111\172\145\156\160\145\056\143\157\155
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\000\260\267\132\026\110\137\277\341\313\365\213\327\031
\346\175
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Chambers of Commerce Root - 2008"
# Issuer: CN=Chambers of Commerce Root - 2008,O=AC Camerfirma S.A.,serialNumber=A82743287,L=Madrid
(see current address at www.camerfirma.com/address), C=EU
```

- # Serial Number:00:a3:da:42:7e:a4:b1:ae:da
- # Subject: CN=Chambers of Commerce Root 2008,O=AC Camerfirma S.A.,serialNumber=A82743287,L=Madrid (see current address at www.camerfirma.com/address),C=EU
- # Not Valid Before: Fri Aug 01 12:29:50 2008
- # Not Valid After: Sat Jul 31 12:29:50 2038
- # Fingerprint (SHA-256):
- 06:3E:4A:FA:C4:91:DF:D3:32:F3:08:9B:85:42:E9:46:17:D8:93:D7:FE:94:4E:10:A7:93:7E:E2:9D:96:93:C0
- # Fingerprint (SHA1): 78:6A:74:AC:76:AB:14:7F:9C:6A:30:50:BA:9E:A8:7E:FE:9A:CE:3C
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE
- CKA TOKEN CK BBOOL CK TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA LABEL UTF8 "Chambers of Commerce Root 2008"
- CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509
- CKA\_SUBJECT MULTILINE\_OCTAL
- $\label{eq:condition} $$ \060\201\256\061\013\060\011\006\003\125\004\006\023\002\105\125$
- $\label{eq:condition} $$ \061\103\060\101\006\003\125\004\007\023\072\115\141\144\162\151 $$$
- \144\040\050\163\145\145\040\143\165\162\162\145\156\164\040\141
- \144\144\162\145\163\163\040\141\164\040\167\167\167\056\143\141
- \155\145\162\146\151\162\155\141\056\143\157\155\057\141\144\144
- \162\145\163\163\051\061\022\060\020\006\003\125\004\005\023\011
- \101\070\062\067\064\063\062\070\067\061\033\060\031\006\003\125
- $\\ \\004\\ \\012\\ \\023\\ \\022\\ \\101\\ \\103\\ \\040\\ \\103\\ \\141\\ \\155\\ \\145\\ \\162\\ \\146\\ \\151\\ \\162\\ \\155$
- \141\040\123\056\101\056\061\051\060\047\006\003\125\004\003\023
- $\\ \langle 040 \rangle 103 \rangle 150 \rangle 141 \rangle 155 \rangle 142 \rangle 145 \rangle 162 \rangle 163 \rangle 040 \rangle 157 \rangle 146 \rangle 040 \rangle 103 \rangle 157 \rangle 155$
- \155\145\162\143\145\040\122\157\157\164\040\055\040\062\060\060\060\070

END

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:control} $$ \060\201\256\061\013\060\011\006\003\125\004\007\023\072\115\141\144\162\151\144\040\050\163\145\145\040\143\165\162\162\145\156\164\040\141\144\144\162\145\163\163\040\141\164\040\167\167\167\167\056\143\141\155\145\162\146\151\162\155\141\056\143\157\155\057\141\144\144\144\162\145\163\163\051\061\022\060\020\006\003\125\004\005\023\011\101\070\062\067\064\063\062\070\067\061\033\060\031\006\003\125\004\003\125\141\162\155\141\040\123\056\101\056\061\051\060\047\006\003\125\004\003\023\040\103\150\141\155\142\145\162\163\040\157\146\040\103\157\155\145\162\143\145\040\122\157\157\164\040\055\040\062\060\060\060\070$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\011\000\243\332\102\176\244\261\256\332

END

CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\202\007\117\060\202\005\067\240\003\002\001\0002\002\011\000 $$$ 

\243\332\102\176\244\261\256\332\060\015\006\011\052\206\110\206 \367\015\001\001\005\005\000\060\201\256\061\013\060\011\006\003 \125\004\006\023\002\105\125\061\103\060\101\006\003\125\004\007 \023\072\115\141\144\162\151\144\040\050\163\145\145\040\143\165 \162\162\145\156\164\040\141\144\144\162\145\163\163\040\141\164 \040\167\167\167\056\143\141\155\145\162\146\151\162\155\141\056 \143\157\155\057\141\144\144\162\145\163\163\051\061\022\060\020 \006\003\125\004\005\023\011\101\070\062\067\064\063\062\070\067 \061\033\060\031\006\003\125\004\012\023\022\101\103\040\103\141 \155\145\162\146\151\162\155\141\040\123\056\101\056\061\051\060 \047\006\003\125\004\003\023\040\103\150\141\155\142\145\162\163  $\\ \langle 040 \rangle 157 \rangle 146 \langle 040 \rangle 103 \rangle 157 \rangle 155 \rangle 145 \rangle 162 \rangle 143 \rangle 145 \rangle 040 \rangle 122 \rangle 157 \rangle$ \164\040\055\040\062\060\060\070\060\036\027\015\060\070\060\070 \060\061\061\062\062\071\065\060\132\027\015\063\070\060\067\063  $\label{eq:condition} $$ \061\062\062\071\065\060\132\060\201\256\061\013\060\011\006$ \003\125\004\006\023\002\105\125\061\103\060\101\006\003\125\004  $\\ \\007\\ \\023\\ \\072\\ \\115\\ \\141\\ \\144\\ \\162\\ \\151\\ \\144\\ \\040\\ \\050\\ \\163\\ \\145\\ \\145\\ \\040\\ \\143$ \165\162\162\145\156\164\040\141\144\144\162\145\163\163\040\141 \164\040\167\167\167\056\143\141\155\145\162\146\151\162\155\141  $\label{eq:condition} $$ \056\143\157\155\057\141\144\144\162\145\163\163\051\061\022\060$$$ \020\006\003\125\004\005\023\011\101\070\062\067\064\063\062\070 \067\061\033\060\031\006\003\125\004\012\023\022\101\103\040\103  $\\ 141\\155\\145\\162\\146\\151\\162\\155\\141\\040\\123\\056\\101\\056\\061\\051$ \060\047\006\003\125\004\003\023\040\103\150\141\155\142\145\162 \163\040\157\146\040\103\157\155\155\145\162\143\145\040\122\157 \157\164\040\055\040\062\060\060\070\060\202\002\042\060\015\006 \011\052\206\110\206\367\015\001\001\001\005\000\003\202\002\017 \000\060\202\002\012\002\202\002\001\000\257\000\313\160\067\053 \200\132\112\072\154\170\224\175\243\177\032\037\366\065\325\275 \333\313\015\104\162\076\046\262\220\122\272\143\073\050\130\157 \245\263\155\224\246\363\335\144\014\125\366\366\347\362\042\042 \200\136\341\142\306\266\051\341\201\154\362\277\345\175\062\152 \124\240\062\031\131\376\037\213\327\075\140\206\205\044\157\343 \021\263\167\076\040\226\065\041\153\263\010\331\160\056\144\367 \204\222\123\326\016\260\220\212\212\343\207\215\006\323\275\220 \016\342\231\241\033\206\016\332\232\012\273\013\141\120\006\122 \361\236\177\166\354\313\017\320\036\015\317\231\060\075\034\304 \105\020\130\254\326\323\350\327\345\352\305\001\007\167\326\121  $\label{eq:condition} $$ 346\003\177\212\110\245\115\150\165\271\351\274\236\116\031\161 $$$ \365\062\113\234\155\140\031\013\373\314\235\165\334\277\046\315 \217\223\170\071\171\163\136\045\016\312\134\353\167\022\007\313 \144\101\107\162\223\253\120\303\353\011\166\144\064\322\071\267 \166\021\011\015\166\105\304\251\256\075\152\257\265\175\145\057 \224\130\020\354\134\174\257\176\342\266\030\331\320\233\116\132  $\label{eq:condition} $$ \frac{37}{251}146 \frac{314}{074}\frac{306}{170}\frac{174}{247}\frac{34}{035}\frac{343}{316}\frac{16}{216} $$$ \123\276\005\336\140\017\153\345\032\333\077\343\341\041\311\051 \301\361\353\007\234\122\033\001\104\121\074\173\045\327\304\345 \122\124\135\045\007\312\026\040\270\255\344\101\356\172\010\376

\231\157\203\246\221\002\260\154\066\125\152\347\175\365\226\346 \312\201\326\227\361\224\203\351\355\260\261\153\022\151\036\254 \373\135\251\305\230\351\264\133\130\172\276\075\242\104\072\143 \131\324\013\045\336\033\117\275\345\001\236\315\322\051\325\237 \027\031\012\157\277\014\220\323\011\137\331\343\212\065\314\171 \132\115\031\067\222\267\304\301\255\257\364\171\044\232\262\001 \013\261\257\134\226\363\200\062\373\134\075\230\361\240\077\112 \336\276\257\224\056\331\125\232\027\156\140\235\143\154\270\143 \311\256\201\134\030\065\340\220\273\276\074\117\067\042\271\176 \353\317\236\167\041\246\075\070\201\373\110\332\061\075\053\343 \211\365\320\265\275\176\340\120\304\022\211\263\043\232\020\061 \205\333\256\157\357\070\063\030\166\021\002\003\001\000\001\243 \202\001\154\060\202\001\150\060\022\006\003\125\035\023\001\001  $\label{eq:condition} $$ \sqrt{377} 004 \times 010 \times 060 \times 001 \times 011 \times 020 \times 011 \times 014 \times 060 \times 035 \times 006 \times 011 \times 014 \times 010 \times 011 \times 014 \times 010 \times 011 \times 011$  $\label{eq:condition} $$ \035\016\004\026\004\024\371\044\254\017\262\265\370\171\300\372 $$$ \140\210\033\304\331\115\002\236\027\031\060\201\343\006\003\125 \035\043\004\201\333\060\201\330\200\024\371\044\254\017\262\265 \370\171\300\372\140\210\033\304\331\115\002\236\027\031\241\201 \264\244\201\261\060\201\256\061\013\060\011\006\003\125\004\006  $\label{eq:condition} $$ \023\02\105\125\061\103\060\101\006\003\125\004\007\023\072\115$$ \141\144\162\151\144\040\050\163\145\145\040\143\165\162\162\145 \156\164\040\141\144\144\162\145\163\163\040\141\164\040\167\167  $\label{eq:condition} $$ \frac{167 \cdot 056 \cdot 143 \cdot 141 \cdot 155 \cdot 145 \cdot 162 \cdot 146 \cdot 151 \cdot 162 \cdot 155 \cdot 141 \cdot 056 \cdot 143 \cdot 157 \cdot 155}{141 \cdot 155 \cdot 143 \cdot 143 \cdot 162 \cdot 163 \cdot 163$ \057\141\144\144\162\145\163\163\051\061\022\060\020\006\003\125 \004\005\023\011\101\070\062\067\064\063\062\070\067\061\033\060 \146\151\162\155\141\040\123\056\101\056\061\051\060\047\006\003 \040\103\157\155\155\145\162\143\145\040\122\157\157\164\040\055 \040\062\060\060\070\202\011\000\243\332\102\176\244\261\256\332  $\label{eq:condition} $$ \000\003\125\035\017\001\001\377\004\004\003\002\001\006$ \060\075\006\003\125\035\040\004\066\060\064\060\062\006\004\125 \035\040\000\060\052\060\050\006\010\053\006\001\005\005\007\002 \001\026\034\150\164\164\160\072\057\057\160\157\154\151\143\171 \056\143\141\155\145\162\146\151\162\155\141\056\143\157\155\060 \015\006\011\052\206\110\206\367\015\001\001\005\005\000\003\202 \002\001\000\220\022\257\042\065\302\243\071\360\056\336\351\265  $\label{eq:condition} $$ \frac{351}{170}\frac{174}{110}\frac{276}{077}\frac{175}{105}\frac{222}{136}\frac{351}{332}\frac{261}{031}\frac{374}{026} $$$  $\label{eq:condition} $$ \074\237\264\133\146\236\152\347\303\271\135\210\350\017\255\317$ \043\017\336\045\072\136\314\117\245\301\265\055\254\044\322\130 \007\336\242\317\151\204\140\063\350\020\015\023\251\043\320\205 \345\216\173\246\236\075\162\023\162\063\365\252\175\306\143\037 \010\364\376\001\177\044\317\053\054\124\011\336\342\053\155\222 \306\071\117\026\352\074\176\172\106\324\105\152\106\250\353\165 \202\126\247\253\240\174\150\023\063\366\235\060\360\157\047\071 \044\043\052\220\375\220\051\065\362\223\337\064\245\306\367\370 \357\214\017\142\112\174\256\323\365\124\370\215\266\232\126\207  $\label{eq:condition} $$ \026\202\072\063\253\132\042\010\367\202\272\352\056\340\107\232$ 

\264\265\105\243\005\073\331\334\056\105\100\073\352\334\177\350 \073\353\321\354\046\330\065\244\060\305\072\254\127\236\263\166  $\label{eq:condition} $$ 245\040\173\371\036\112\005\142\001\246\050\165\140\227\222\015$$  $\label{eq:condition} $$ \frac{156}076\frac{103}015\frac{222}025\frac{34}030\frac{42}{315}\frac{121}{231}\frac{240}051 $$ \032\074\137\212\062\063\133\060\307\211\057\107\230\017\243\003  $\label{eq:condition} $$ 306 366 361 254 337 062 360 331 201 032 344 234 275 366 200 024$ \360\321\054\271\205\365\330\243\261\310\245\041\345\034\023\227 \356\016\275\337\051\251\357\064\123\133\323\344\152\023\204\006 \266\062\002\304\122\256\042\322\334\262\041\102\032\332\100\360 \051\311\354\012\014\134\342\320\272\314\110\323\067\012\314\022  $\label{eq:condition} $$ \012\212\171\260\075\003\177\151\113\364\064\040\175\263\064\352 $$$ \216\113\144\365\076\375\263\043\147\025\015\004\270\360\055\301 \011\121\074\262\154\025\360\245\043\327\203\164\344\345\056\311 \376\230\047\102\306\253\306\236\260\320\133\070\245\233\120\336 \176\030\230\265\105\073\366\171\264\350\367\032\173\006\203\373 \320\213\332\273\307\275\030\253\010\157\074\200\153\100\077\031 \031\272\145\212\346\276\325\134\323\066\327\357\100\122\044\140 \070\147\004\061\354\217\363\202\306\336\271\125\363\073\061\221 \132\334\265\010\025\255\166\045\012\015\173\056\207\342\014\246 \006\274\046\020\155\067\235\354\335\170\214\174\200\305\360\331 \167\110\320

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Chambers of Commerce Root 2008"
- # Issuer: CN=Chambers of Commerce Root 2008,O=AC Camerfirma S.A.,serialNumber=A82743287,L=Madrid (see current address at www.camerfirma.com/address),C=EU
- # Serial Number:00:a3:da:42:7e:a4:b1:ae:da
- # Subject: CN=Chambers of Commerce Root 2008,O=AC Camerfirma S.A.,serialNumber=A82743287,L=Madrid (see current address at www.camerfirma.com/address),C=EU
- # Not Valid Before: Fri Aug 01 12:29:50 2008
- # Not Valid After: Sat Jul 31 12:29:50 2038
- # Fingerprint (SHA-256):

06:3E:4A:FA:C4:91:DF:D3:32:F3:08:9B:85:42:E9:46:17:D8:93:D7:FE:94:4E:10:A7:93:7E:E2:9D:96:93:C0

# Fingerprint (SHA1): 78:6A:74:AC:76:AB:14:7F:9C:6A:30:50:BA:9E:A8:7E:FE:9A:CE:3C

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Chambers of Commerce Root - 2008"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\170\152\164\254\166\253\024\177\234\152\060\120\272\236\250\176\376\232\316\074

END

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\136\200\236\204\132\016\145\013\027\002\363\125\030\052\076\327

```
END
CKA ISSUER MULTILINE OCTAL
\060\201\256\061\013\060\011\006\003\125\004\006\023\002\105\125
\label{eq:condition} $$ \061\103\060\101\006\003\125\004\007\023\072\115\141\144\162\151 $$
 \\ 144 \\ 040 \\ 050 \\ 163 \\ 145 \\ 145 \\ 040 \\ 143 \\ 165 \\ 162 \\ 162 \\ 145 \\ 156 \\ 164 \\ 040 \\ 141 \\ 141 \\ 142 \\ 143 \\ 143 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 144 \\ 1
\144\144\162\145\163\163\040\141\164\040\167\167\167\056\143\141
\155\145\162\146\151\162\155\141\056\143\157\155\057\141\144\144
\101\070\062\067\064\063\062\070\067\061\033\060\031\006\003\125
\004\012\023\022\101\103\040\103\141\155\145\162\146\151\162\155
\label{eq:condition} $$ 141\040\123\056\101\056\061\051\060\047\006\003\125\004\003\023
\\ \langle 040 \rangle 103 \rangle 150 \rangle 141 \rangle 155 \rangle 142 \rangle 145 \rangle 162 \rangle 163 \rangle 040 \rangle 157 \rangle 146 \rangle 040 \rangle 103 \rangle 157 \rangle 155 \rangle 162 \rangle 163 \rangle 
\155\145\162\143\145\040\122\157\157\164\040\055\040\062\060\060
\070
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\011\000\243\332\102\176\244\261\256\332
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Global Chambersign Root - 2008"
 # Issuer: CN=Global Chambersign Root - 2008,O=AC Camerfirma S.A.,serialNumber=A82743287,L=Madrid (see
current address at www.camerfirma.com/address),C=EU
# Serial Number:00:c9:cd:d3:e9:d5:7d:23:ce
# Subject: CN=Global Chambersign Root - 2008,O=AC Camerfirma S.A.,serialNumber=A82743287,L=Madrid
 (see current address at www.camerfirma.com/address),C=EU
# Not Valid Before: Fri Aug 01 12:31:40 2008
 # Not Valid After: Sat Jul 31 12:31:40 2038
# Fingerprint (SHA-256):
 13:63:35:43:93:34:A7:69:80:16:A0:D3:24:DE:72:28:4E:07:9D:7B:52:20:BB:8F:BD:74:78:16:EE:BE:BA:CA
# Fingerprint (SHA1): 4A:BD:EE:EC:95:0D:35:9C:89:AE:C7:52:A1:2C:5B:29:F6:D6:AA:0C
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
 CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Global Chambersign Root - 2008"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
```

CKA\_SUBJECT MULTILINE\_OCTAL

  $\label{eq:control_loss} $$ 162\145\163\163\051\061\022\060\020\006\003\125\004\005\023\011 $$ 101\070\062\067\064\063\062\070\067\061\033\060\031\006\003\125 $$ 004\012\023\022\101\103\040\103\141\155\145\162\146\151\162\155 $$ 141\040\123\056\101\056\061\047\060\045\006\003\125\004\003\023 $$ 036\107\154\157\142\141\154\040\103\150\141\155\142\145\162\163 $$ 151\147\156\040\122\157\157\164\040\055\040\062\060\060\070 $$ END$ 

CKA ID UTF8 "0"

### CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\201\254\061\013\060\011\006\003\125\004\0006\023\002\105\125\061\103\060\101\006\003\125\004\0007\023\072\115\141\144\162\151\144\040\050\163\145\145\040\143\162\162\145\156\164\040\141\1164\040\167\167\167\056\143\141\155\145\162\146\151\162\155\141\056\143\157\155\057\141\144\144\144\162\145\163\163\051\061\022\060\020\006\003\125\004\005\023\011\101\070\062\067\064\063\062\070\067\061\033\060\031\006\003\125\004\003\125\004\003\125\141\162\155\141\040\123\056\101\056\061\047\060\045\006\003\125\004\003\023\032\151\147\156\040\122\157\157\164\040\055\040\062\060\060\070\END$ 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\011\000\311\315\323\351\325\175\043\316

**END** 

#### CKA\_VALUE MULTILINE\_OCTAL

\060\202\007\111\060\202\005\061\240\003\002\001\002\002\011\000 \311\315\323\351\325\175\043\316\060\015\006\011\052\206\110\206 \367\015\001\001\005\005\000\060\201\254\061\013\060\011\006\003 \125\004\006\023\002\105\125\061\103\060\101\006\003\125\004\007 \023\072\115\141\144\162\151\144\040\050\163\145\145\040\143\165 \040\167\167\167\056\143\141\155\145\162\146\151\162\155\141\056 \143\157\155\057\141\144\144\162\145\163\163\051\061\022\060\020 \006\003\125\004\005\023\011\101\070\062\067\064\063\062\070\067 \061\033\060\031\006\003\125\004\012\023\022\101\103\040\103\141 \155\145\162\146\151\162\155\141\040\123\056\101\056\061\047\060 \045\006\003\125\004\003\023\036\107\154\157\142\141\154\040\103 \150\141\155\142\145\162\163\151\147\156\040\122\157\157\164\040  $\label{eq:condition} $$ \050/040/062/060/060/070/060/036/027/015/060/070/060/070/060/061 $$$ \062\063\061\064\060\132\060\201\254\061\013\060\011\006\003\125 \004\006\023\002\105\125\061\103\060\101\006\003\125\004\007\023 \072\115\141\144\162\151\144\040\050\163\145\145\040\143\165\162 \162\145\156\164\040\141\144\144\162\145\163\163\040\141\164\040 \167\167\167\056\143\141\155\145\162\146\151\162\155\141\056\143 \157\155\057\141\144\144\162\145\163\163\051\061\022\060\020\006 \003\125\004\005\023\011\101\070\062\067\064\063\062\070\067\061 \033\060\031\006\003\125\004\012\023\022\101\103\040\103\141\155

\145\162\146\151\162\155\141\040\123\056\101\056\061\047\060\045 \006\003\125\004\003\023\036\107\154\157\142\141\154\040\103\150 \141\155\142\145\162\163\151\147\156\040\122\157\157\164\040\055 \040\062\060\060\070\060\202\002\042\060\015\006\011\052\206\110 \206\367\015\001\001\001\005\000\003\202\002\017\000\060\202\002 \012\002\202\002\001\000\300\337\126\323\344\072\233\166\105\264 \023\333\377\301\266\031\213\067\101\030\225\122\107\353\027\235 \051\210\216\065\154\006\062\056\107\142\363\111\004\277\175\104  $\label{eq:condition} $$ \066\261\161\314\275\132\011\163\325\331\205\104\377\221\127\045 $$$ \337\136\066\216\160\321\134\161\103\035\331\332\357\134\322\373 \033\275\072\265\313\255\243\314\104\247\015\256\041\025\077\271 \172\133\222\165\330\244\022\070\211\031\212\267\200\322\342\062 \157\126\234\221\326\210\020\013\263\164\144\222\164\140\363\366  $\label{eq:condition} $$ \frac{317}030\\117\\140\\262\\043\\320\\307\\073\\316\\141\\113\\231\\217\\302\\014$ \320\100\262\230\334\015\250\116\243\271\012\256\140\240\255\105 \122\143\272\146\275\150\340\371\276\032\250\201\273\036\101\170 \165\323\301\376\000\125\260\207\124\350\047\220\065\035\114\063 \255\227\374\227\056\230\204\277\054\311\243\277\321\230\021\024 \355\143\370\312\230\210\130\027\231\355\105\003\227\176\074\206  $\label{eq:condition} $$ \036\210\214\276\362\221\204\217\145\064\330\000\114\175\267\061$$$ \027\132\051\172\012\030\044\060\243\067\265\172\251\001\175\046 \326\371\016\216\131\361\375\033\063\265\051\073\027\073\101\266  $\\ \\ 041\\335\\324\\300\\075\\245\\237\\237\\037\\103\\120\\311\\273\\274\\154\\172$ \227\230\356\315\214\037\373\234\121\256\213\160\275\047\237\161 \300\153\254\175\220\146\350\327\135\072\015\260\325\302\215\325 \310\235\235\301\155\320\320\277\121\344\343\370\303\070\066\256 \326\247\165\346\257\204\103\135\223\222\014\152\007\336\073\035 \230\042\326\254\301\065\333\243\240\045\377\162\265\166\035\336 \155\351\054\146\054\122\204\320\105\222\316\034\345\345\063\035 \334\007\123\124\243\252\202\073\232\067\057\334\335\240\144\351  $\label{eq:condition} $\346\335\275\256\374\144\205\035\074\247\311\006\336\204\377\153$ \350\153\032\074\305\242\263\102\373\213\011\076\137\010\122\307 \142\304\324\005\161\277\304\144\344\370\241\203\350\076\022\233 \250\036\324\066\115\057\161\366\215\050\366\203\251\023\322\141 \301\221\273\110\300\064\217\101\214\113\114\333\151\022\377\120 \224\234\040\203\131\163\355\174\241\362\361\375\335\367\111\323 \103\130\240\126\143\312\075\075\345\065\126\131\351\016\312\040 \314\053\113\223\051\017\002\003\001\000\001\243\202\001\152\060 \202\001\146\060\022\006\003\125\035\023\001\001\377\004\010\060 \004\024\271\011\312\234\036\333\323\154\072\153\256\355\124\361 \133\223\006\065\056\136\060\201\341\006\003\125\035\043\004\201 \331\060\201\326\200\024\271\011\312\234\036\333\323\154\072\153 \256\355\124\361\133\223\006\065\056\136\241\201\262\244\201\257  $\label{eq:condition} $$ \060\201\254\061\013\060\011\006\003\125\004\006\023\002\105\125$ \061\103\060\101\006\003\125\004\007\023\072\115\141\144\162\151 \144\040\050\163\145\145\040\143\165\162\162\145\156\164\040\141 \144\144\162\145\163\163\040\141\164\040\167\167\167\056\143\141

\155\145\162\146\151\162\155\141\056\143\157\155\057\141\144\144 \162\145\163\163\051\061\022\060\020\006\003\125\004\005\023\011 \101\070\062\067\064\063\062\070\067\061\033\060\031\006\003\125  $\label{eq:condition} $$ \004\012\023\022\101\103\040\103\141\155\145\162\146\151\162\155$$ \141\040\123\056\101\056\061\047\060\045\006\003\125\004\003\023  $\label{eq:condition} $$ \036\107\154\157\142\141\154\040\103\150\141\155\142\145\162\163$$ \151\147\156\040\122\157\157\164\040\055\040\062\060\060\070\202 \011\000\311\315\323\351\325\175\043\316\060\016\006\003\125\035 \017\001\001\377\004\004\003\002\001\006\060\075\006\003\125\035 \040\004\066\060\064\060\062\006\004\125\035\040\000\060\052\060 \050\006\010\053\006\001\005\005\007\002\001\026\034\150\164\164  $\label{eq:condition} $$ 160\072\057\057\160\157\154\151\143\171\056\143\141\155\145\162$ \146\151\162\155\141\056\143\157\155\060\015\006\011\052\206\110 \206\367\015\001\001\005\005\000\003\202\002\001\000\200\210\177  $\label{eq:condition} $$ 160\336\222\050\331\005\224\106\377\220\127\251\361\057\337\032$ \015\153\372\174\016\034\111\044\171\047\330\106\252\157\051\131 \122\210\160\022\352\335\075\365\233\123\124\157\341\140\242\250 \011\271\354\353\131\174\306\065\361\334\030\351\361\147\345\257 \272\105\340\011\336\312\104\017\302\027\016\167\221\105\172\063 \137\137\226\054\150\213\301\107\217\230\233\075\300\354\313\365 \325\202\222\204\065\321\276\066\070\126\162\061\133\107\055\252 \027\244\143\121\353\012\001\255\177\354\165\236\313\241\037\361  $\label{eq:condition} $$ \frac{177}022\\261\\271\\344\\144\\177\\147\\326\\043\\052\\364\\270\\071\\135\\230$ \350\041\247\341\275\075\102\032\164\232\160\257\150\154\120\135  $\label{eq:condition} $$ \frac{111}{317}\frac{377}{373}\frac{016}{135}\frac{346}{054}\frac{107}{327}\frac{201}{072}\frac{131}{000}\frac{265}{163}$ \153\143\040\366\061\105\010\071\016\364\160\176\100\160\132\077 \320\153\102\251\164\075\050\057\002\155\165\162\225\011\215\110 \143\306\306\043\127\222\223\136\065\301\215\371\012\367\054\235 \142\034\366\255\174\335\246\061\036\266\261\307\176\205\046\372 \244\152\265\332\143\060\321\357\223\067\262\146\057\175\005\367 \347\267\113\230\224\065\300\331\072\051\301\235\262\120\063\035 \112\251\132\246\311\003\357\355\364\347\250\156\212\264\127\204 \353\244\077\320\356\252\252\207\133\143\350\223\342\153\250\324 \270\162\170\153\033\355\071\344\135\313\233\252\207\325\117\116 \000\376\331\152\237\074\061\017\050\002\001\175\230\350\247\260 \242\144\236\171\370\110\362\025\251\314\346\310\104\353\077\170 \231\362\173\161\076\074\361\230\247\305\030\022\077\346\273\050  $\label{eq:condition} $$ \063\102\351\105\012\174\155\362\206\171\057\305\202\031\175\011 $$$ \211\174\262\124\166\210\256\336\301\363\314\341\156\333\061\326 \223\256\231\240\357\045\152\163\230\211\133\072\056\023\210\036 \277\300\222\224\064\033\343\047\267\213\036\157\102\377\347\351 \067\233\120\035\055\242\371\002\356\313\130\130\072\161\274\150 \343\252\301\257\034\050\037\242\334\043\145\077\201\352\256\231 \323\330\060\317\023\015\117\025\311\204\274\247\110\055\370\060 \043\167\330\106\113\171\155\366\214\355\072\177\140\021\170\364 \351\233\256\325\124\300\164\200\321\013\102\237\301 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE

# CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Global Chambersign Root 2008"
- # Issuer: CN=Global Chambersign Root 2008,O=AC Camerfirma S.A.,serialNumber=A82743287,L=Madrid (see current address at www.camerfirma.com/address),C=EU
- # Serial Number:00:c9:cd:d3:e9:d5:7d:23:ce
- # Subject: CN=Global Chambersign Root 2008,O=AC Camerfirma S.A.,serialNumber=A82743287,L=Madrid (see current address at www.camerfirma.com/address),C=EU
- # Not Valid Before: Fri Aug 01 12:31:40 2008
- # Not Valid After: Sat Jul 31 12:31:40 2038
- # Fingerprint (SHA-256):
- 13:63:35:43:93:34:A7:69:80:16:A0:D3:24:DE:72:28:4E:07:9D:7B:52:20:BB:8F:BD:74:78:16:EE:BE:BA:CA
- # Fingerprint (SHA1): 4A:BD:EE:EC:95:0D:35:9C:89:AE:C7:52:A1:2C:5B:29:F6:D6:AA:0C
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- CKA MODIFIABLE CK BBOOL CK FALSE
- CKA\_LABEL UTF8 "Global Chambersign Root 2008"
- CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL
- $\label{eq:condition} $$112\275\356\354\225\015\065\234\211\256\307\122\241\054\133\051$$
- \366\326\252\014

**END** 

## CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \236\200\377\170\001\014\056\301\066\275\376\226\220\156\010\363$ 

**END** 

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \060\201\254\061\013\060\011\006\003\125\004\006\023\002\105\125$$ 

\061\103\060\101\006\003\125\004\007\023\072\115\141\144\162\151

\144\040\050\163\145\145\040\143\165\162\162\145\156\164\040\141

 $\\ 144 \\ 144 \\ 162 \\ 145 \\ 163 \\ 163 \\ 040 \\ 141 \\ 164 \\ 040 \\ 167 \\ 167 \\ 167 \\ 056 \\ 143 \\ 141 \\ 164 \\ 167 \\ 1$ 

\155\145\162\146\151\162\155\141\056\143\157\155\057\141\144\144

\162\145\163\163\051\061\022\060\020\006\003\125\004\005\023\011

 $\label{eq:condition} $$101\070\062\067\064\063\062\070\067\061\033\060\031\006\003\125$$ 

 $\\ \begin{tabular}{l} $$ \004\012\023\022\101\103\040\103\141\155\145\162\146\151\162\155 \end{tabular}$ 

\141\040\123\056\101\056\061\047\060\045\006\003\125\004\003\023

 $\\ \begin{tabular}{l} $036\107\154\157\142\141\154\040\103\150\141\155\142\145\162\163 \\ \end{tabular}$ 

\151\147\156\040\122\157\157\164\040\055\040\062\060\060\070

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\011\000\311\315\323\351\325\175\043\316

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

 ${\tt CKA\_TRUST\_CODE\_SIGNING\ CK\_TRUST\ CKT\_NSS\_MUST\_VERIFY\_TRUST}$ 

CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

```
# Certificate "Go Daddy Root Certificate Authority - G2"
# Issuer: CN=Go Daddy Root Certificate Authority - G2,O="GoDaddy.com, Inc.",L=Scottsdale,ST=Arizona,C=US
# Serial Number: 0 (0x0)
# Subject: CN=Go Daddy Root Certificate Authority - G2,O="GoDaddy.com,
Inc.",L=Scottsdale,ST=Arizona,C=US
# Not Valid Before: Tue Sep 01 00:00:00 2009
# Not Valid After: Thu Dec 31 23:59:59 2037
# Fingerprint (SHA-256):
45:14:0B;32:47:EB;9C:C8:C5:B4:F0:D7:B5:30:91:F7:32:92:08:9E:6E:5A:63:E2:74:9D:D3:AC:A9:19:8E:DA
# Fingerprint (SHA1): 47:BE:AB:C9:22:EA:E8:0E:78:78:34:62:A7:9F:45:C2:54:FD:E6:8B
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
```

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA LABEL UTF8 "Go Daddy Root Certificate Authority - G2"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

\060\201\203\061\013\060\011\006\003\125\004\006\023\002\125\123  $\label{eq:condition} $$ \006\006\003\125\004\010\023\007\101\162\151\172\157 $$$ \156\141\061\023\060\021\006\003\125\004\007\023\012\123\143\157 \164\164\163\144\141\154\145\061\032\060\030\006\003\125\004\012  $\label{eq:condition} $$ \023\021\107\157\104\141\144\144\171\056\143\157\155\054\040\111 $$$ \156\143\056\061\061\060\057\006\003\125\004\003\023\050\107\157  $\\ \\ 040\\ \\ 104\\ \\ 141\\ \\ 144\\ \\ 144\\ \\ 171\\ \\ 040\\ \\ 122\\ \\ 157\\ \\ 157\\ \\ 164\\ \\ 040\\ \\ 103\\ \\ 145\\ \\ 162\\ \\ 164$ \151\146\151\143\141\164\145\040\101\165\164\150\157\162\151\164 \171\040\055\040\107\062

**END** 

CKA ID UTF8 "0"

# CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \060\201\203\061\013\060\011\006\003\125\004\006\023\002\125\123$ \061\020\060\016\006\003\125\004\010\023\007\101\162\151\172\157 \156\141\061\023\060\021\006\003\125\004\007\023\012\123\143\157 \164\164\163\144\141\154\145\061\032\060\030\006\003\125\004\012 \023\021\107\157\104\141\144\144\171\056\143\157\155\054\040\111 \156\143\056\061\061\060\057\006\003\125\004\003\023\050\107\157 \040\104\141\144\144\171\040\122\157\157\164\040\103\145\162\164 \151\146\151\143\141\164\145\040\101\165\164\150\157\162\151\164 \171\040\055\040\107\062

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\001\000

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\003\305\060\202\002\255\240\003\002\001\002\002\001\000 \060\015\006\011\052\206\110\206\367\015\001\001\013\005\000\060 \201\203\061\013\060\011\006\003\125\004\006\023\002\125\123\061 \020\060\016\006\003\125\004\010\023\007\101\162\151\172\157\156

\141\061\023\060\021\006\003\125\004\007\023\012\123\143\157\164 \164\163\144\141\154\145\061\032\060\030\006\003\125\004\012\023 \021\107\157\104\141\144\144\171\056\143\157\155\054\040\111\156 \143\056\061\061\060\057\006\003\125\004\003\023\050\107\157\040 \104\141\144\144\171\040\122\157\157\164\040\103\145\162\164\151 \146\151\143\141\164\145\040\101\165\164\150\157\162\151\164\171 \040\055\040\107\062\060\036\027\015\060\071\060\071\060\061\060 \060\060\060\060\060\132\027\015\063\067\061\062\063\061\062\063 \065\071\065\071\132\060\201\203\061\013\060\011\006\003\125\004 \006\023\002\125\123\061\020\060\016\006\003\125\004\010\023\007 \101\162\151\172\157\156\141\061\023\060\021\006\003\125\004\007 \006\003\125\004\012\023\021\107\157\104\141\144\144\171\056\143 \157\155\054\040\111\156\143\056\061\061\060\057\006\003\125\004  $\\ \\003\\023\\050\\107\\157\\040\\104\\141\\144\\144\\171\\040\\122\\157\\157\\164$ \040\103\145\162\164\151\146\151\143\141\164\145\040\101\165\164 \150\157\162\151\164\171\040\055\040\107\062\060\202\001\042\060 \015\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202 \001\017\000\060\202\001\012\002\202\001\001\000\277\161\142\010  $\label{eq:condition} $$ \361\372\131\064\367\033\311\030\243\367\200\111\130\351\042\203$ \023\246\305\040\103\001\073\204\361\346\205\111\237\047\352\366 \204\033\116\240\264\333\160\230\307\062\001\261\005\076\007\116  $\label{eq:condition} $$ 356 364 372 117 057 131 060 042 347 253 031 126 153 342 200 007$ \374\363\026\165\200\071\121\173\345\371\065\266\164\116\251\215 \202\023\344\266\077\251\003\203\372\242\276\212\025\152\177\336 \013\303\266\031\024\005\312\352\303\250\004\224\073\106\174\062 \015\363\000\146\042\310\215\151\155\066\214\021\030\267\323\262  $\label{eq:condition} $$ \034\140\264\070\372\002\214\316\323\335\106\007\336\012\076\353$ \135\174\310\174\373\260\053\123\244\222\142\151\121\045\005\141 \032\104\201\214\054\251\103\226\043\337\254\072\201\232\016\051  $\label{eq:condition} $$ 305 \times 34 \times 135 \times 36 \times 236 \times 236 \times 060 \times 12 \times 1316 \times 361 \times 210 \times 200$ \373\113\135\314\062\354\205\142\103\045\064\002\126\047\001\221 \264\073\160\052\077\156\261\350\234\210\001\175\237\324\371\333 \123\155\140\235\277\054\347\130\253\270\137\106\374\316\304\033 \003\074\011\353\111\061\134\151\106\263\340\107\002\003\001\000 \001\243\102\060\100\060\017\006\003\125\035\023\001\001\377\004 \005\060\003\001\001\377\060\016\006\003\125\035\017\001\001\377  $\label{eq:condition} $$ \024\072\232\205\007\020\147\050\266\357\366\275\005\101\156\040 $$$ \301\224\332\017\336\060\015\006\011\052\206\110\206\367\015\001 \001\013\005\000\003\202\001\001\000\231\333\135\171\325\371\227 \131\147\003\141\361\176\073\006\061\165\055\241\040\216\117\145 \207\264\367\246\234\274\330\351\057\320\333\132\356\317\164\214 \163\264\070\102\332\005\173\370\002\165\270\375\245\261\327\256 \366\327\336\023\313\123\020\176\212\106\321\227\372\267\056\053 \021\253\220\260\047\200\371\350\237\132\351\067\237\253\344\337 \154\263\205\027\235\075\331\044\117\171\221\065\326\137\004\353 \200\203\253\232\002\055\265\020\364\330\220\307\004\163\100\355

 $\label{eq:control} $$ \frac{342}045\cdot240\cdot251\cdot237\cdot354\cdot236\cdot253\cdot150\cdot022\cdot231\cdot127\cdot306\cdot217\cdot022\cdot072 \cdot011\cdot244\cdot275\cdot104\cdot375\cdot006\cdot025\cdot067\cdot301\cdot233\cdot344\cdot062\cdot243\cdot355\cdot070\cdot350 \cdot330\cdot144\cdot363\cdot054\cdot176\cdot024\cdot374\cdot002\cdot352\cdot237\cdot315\cdot377\cdot007\cdot150\cdot027\cdot333\cdot042\cdot220\cdot070\cdot055\cdot172\cdot215\cdot321\cdot124\cdot361\cdot151\cdot343\cdot137\cdot063\cdot312\cdot172\cdot075\cdot173\cdot012\cdot343\cdot312\cdot177\cdot137\cdot071\cdot345\cdot342\cdot165\cdot272\cdot305\cdot166\cdot030\cdot063\cdot316\cdot054\cdot360\cdot057\cdot114\cdot255\cdot367\cdot261\cdot347\cdot316\cdot117\cdot250\cdot304\cdot233\cdot112\cdot124\cdot006\cdot305\cdot177\cdot175\cdot325\cdot010\cdot017\cdot342\cdot034\cdot376\cdot176\cdot027\cdot270\cdot254\cdot136\cdot366\cdot324\cdot026\cdot262\cdot103\cdot011\cdot014\cdot115\cdot366\cdot247\cdot153\cdot264\cdot231\cdot204\cdot145\cdot312\cdot172\cdot210\cdot342\cdot342\cdot104\cdot276\cdot134\cdot367\cdot352\cdot034\cdot365$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "Go Daddy Root Certificate Authority - G2"

# Issuer: CN=Go Daddy Root Certificate Authority - G2,O="GoDaddy.com, Inc.",L=Scottsdale,ST=Arizona,C=US

# Serial Number: 0 (0x0)

# Subject: CN=Go Daddy Root Certificate Authority - G2,O="GoDaddy.com,

Inc.",L=Scottsdale,ST=Arizona,C=US

# Not Valid Before: Tue Sep 01 00:00:00 2009

# Not Valid After: Thu Dec 31 23:59:59 2037

# Fingerprint (SHA-256):

45:14:0B:32:47:EB:9C:C8:C5:B4:F0:D7:B5:30:91:F7:32:92:08:9E:6E:5A:63:E2:74:9D:D3:AC:A9:19:8E:DA

# Fingerprint (SHA1): 47:BE:AB:C9:22:EA:E8:0E:78:78:34:62:A7:9F:45:C2:54:FD:E6:8B

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA LABEL UTF8 "Go Daddy Root Certificate Authority - G2"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\107\276\253\311\042\352\350\016\170\170\064\142\247\237\105\302 \124\375\346\213

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \200\072\274\042\301\346\373\215\233\073\047\112\062\033\232\001 $$$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:control_co$ 

\171\040\055\040\107\062

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

```
\002\001\000
```

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "Starfield Root Certificate Authority - G2"

#

# Issuer: CN=Starfield Root Certificate Authority - G2,O="Starfield Technologies,

Inc.",L=Scottsdale,ST=Arizona,C=US

# Serial Number: 0 (0x0)

# Subject: CN=Starfield Root Certificate Authority - G2,O="Starfield Technologies,

Inc.",L=Scottsdale,ST=Arizona,C=US

# Not Valid Before: Tue Sep 01 00:00:00 2009

# Not Valid After: Thu Dec 31 23:59:59 2037

# Fingerprint (SHA-256):

2C:E1:CB:0B:F9:D2:F9:E1:02:99:3F:BE:21:51:52:C3:B2:DD:0C:AB:DE:1C:68:E5:31:9B:83:91:54:DB:B7:F5

# Fingerprint (SHA1): B5:1C:06:7C:EE:2B:0C:3D:F8:55:AB:2D:92:F4:FE:39:D4:E7:0F:0E

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "Starfield Root Certificate Authority - G2"

CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \0.060\201\217\061\013\060\011\006\003\125\004\006\023\002\125\123$ 

\061\020\060\016\006\003\125\004\010\023\007\101\162\151\172\157

\156\141\061\023\060\021\006\003\125\004\007\023\012\123\143\157

\023\034\123\164\141\162\146\151\145\154\144\040\124\145\143\150

\156\157\154\157\147\151\145\163\054\040\111\156\143\056\061\062

 $\label{eq:condition} $$ \000\006\003\125\004\003\023\051\123\164\141\162\146\151\145$$$ 

 $\label{eq:condition} $$ \frac{154\\144\\040\\122\\157\\157\\164\\040\\103\\145\\162\\164\\151\\146\\151\\143$ 

\107\062

END

CKA\_ID UTF8 "0"

CKA\_ISSUER MULTILINE\_OCTAL

\141\164\145\040\101\165\164\150\157\162\151\164\171\040\055\040 \107\062

**END** 

CKA SERIAL NUMBER MULTILINE OCTAL

\002\001\000

**END** 

CKA VALUE MULTILINE OCTAL

\060\202\003\335\060\202\002\305\240\003\002\001\002\002\001\000 \060\015\006\011\052\206\110\206\367\015\001\001\013\005\000\060 \201\217\061\013\060\011\006\003\125\004\006\023\002\125\123\061 \020\060\016\006\003\125\004\010\023\007\101\162\151\172\157\156 \141\061\023\060\021\006\003\125\004\007\023\012\123\143\157\164 \164\163\144\141\154\145\061\045\060\043\006\003\125\004\012\023  $\\ \\ 034\\ 123\\ 164\\ 141\\ 162\\ 146\\ 151\\ 145\\ 145\\ 144\\ 040\\ 124\\ 145\\ 143\\ 150\\ 156$ \157\154\157\147\151\145\163\054\040\111\156\143\056\061\062\060 \060\006\003\125\004\003\023\051\123\164\141\162\146\151\145\154  $\\ 144 \\ 040 \\ 122 \\ 157 \\ 157 \\ 164 \\ 040 \\ 103 \\ 145 \\ 162 \\ 164 \\ 151 \\ 146 \\ 151 \\ 143 \\ 141$ \164\145\040\101\165\164\150\157\162\151\164\171\040\055\040\107 \062\060\036\027\015\060\071\060\071\060\061\060\060\060\060\060  $\label{eq:condition} $$ \060\132\027\015\063\067\061\062\063\061\062\063\065\071\065\071$ \132\060\201\217\061\013\060\011\006\003\125\004\006\023\002\125 \123\061\020\060\016\006\003\125\004\010\023\007\101\162\151\172  $\label{eq:condition} $$ \frac{157}{156}\frac{141}{061}\frac{023}{060}\frac{003}{125}\frac{125}{004}\frac{007}{023}\frac{123}{143} $$ \157\164\164\163\144\141\154\145\061\045\060\043\006\003\125\004 \012\023\034\123\164\141\162\146\151\145\154\144\040\124\145\143 \150\156\157\154\157\147\151\145\163\054\040\111\156\143\056\061 \062\060\060\006\003\125\004\003\023\051\123\164\141\162\146\151 \145\154\144\040\122\157\157\164\040\103\145\162\164\151\146\151 \143\141\164\145\040\101\165\164\150\157\162\151\164\171\040\055 \040\107\062\060\202\001\042\060\015\006\011\052\206\110\206\367 \202\001\001\000\275\355\301\003\374\366\217\374\002\261\157\133 \237\110\331\235\171\342\242\267\003\141\126\030\303\107\266\327 \312\075\065\056\211\103\367\241\151\233\336\212\032\375\023\040 \234\264\111\167\062\051\126\375\271\354\214\335\042\372\162\334 \047\141\227\356\366\132\204\354\156\031\271\211\054\334\204\133 \325\164\373\153\137\305\211\245\020\122\211\106\125\364\270\165  $\label{eq:condition} $$ \034\346\177\344\124\256\113\370\125\162\127\002\031\370\027\161 $$$ \131\353\036\050\007\164\305\235\110\276\154\264\364\244\260\363 \144\067\171\222\300\354\106\136\177\341\155\123\114\142\257\315 \037\013\143\273\072\235\373\374\171\000\230\141\164\317\046\202 \100\143\363\262\162\152\031\015\231\312\324\016\165\314\067\373 \213\211\301\131\361\142\177\137\263\137\145\060\370\247\267\115 \166\132\036\166\136\064\300\350\226\126\231\212\263\360\177\244  $\label{eq:condition} $$ 315 \times 275 \times 334 \times 62 \times 61 \times 74 \times 221 \times 17 \times 340 \times 137 \times 252 \times 1317 \times 340 \times 137 \times 1$ \321\231\224\321\242\343\143\133\011\166\265\126\142\341\113\164 \035\226\324\046\324\010\004\131\320\230\016\016\346\336\374\303  $\label{eq:condition} $$354\037\220\361\002\003\001\000\001\243\102\060\100\060\017\006$ 

\003\125\035\023\001\001\377\004\005\060\003\001\001\377\060\016 \006\003\125\035\017\001\001\377\004\004\003\002\001\006\060\035 \006\003\125\035\016\004\026\004\024\174\014\062\037\247\331\060 \177\304\175\150\243\142\250\241\316\253\007\133\047\060\015\006 \011\052\206\110\206\367\015\001\001\013\005\000\003\202\001\001  $\label{eq:condition} $$ \000\021\131\372\045\117\003\157\224\231\073\232\037\202\205\071 $$$ \324\166\005\224\136\341\050\223\155\142\135\011\302\240\250\324 \260\165\070\361\064\152\235\344\237\212\206\046\121\346\054\321 \306\055\156\225\040\112\222\001\354\270\212\147\173\061\342\147 \056\214\225\003\046\056\103\235\112\061\366\016\265\014\273\267  $\label{eq:condition} $$ 342\067\177\042\272\000\243\016\173\122\373\153\273\073\304\323$  $\label{eq:condition} $$ \frac{171}121\frac{315}220\frac{364}147\frac{007}{031}\frac{310}{074}\frac{106}{172}\frac{015}{001}\frac{175}{175} $$$ \305\130\347\155\346\205\060\027\232\044\304\020\340\004\367\340 \362\177\324\252\012\377\102\035\067\355\224\345\144\131\022\040  $\label{eq:condition} $$ \frac{167}070\323\062\076\070\201\165\226\163\372\150\217\261\313\316}{217}$$ \037\305\354\372\234\176\317\176\261\361\007\055\266\374\277\312 \244\277\320\227\005\112\274\352\030\050\002\220\275\124\170\011 \041\161\323\321\175\035\331\026\260\251\141\075\320\012\000\042 \374\307\173\313\011\144\105\013\073\100\201\367\175\174\062\365 \230\312\130\216\175\052\356\220\131\163\144\371\066\164\136\045 \241\365\146\005\056\177\071\025\251\052\373\120\213\216\205\151 \364

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "Starfield Root Certificate Authority - G2"

# Issuer: CN=Starfield Root Certificate Authority - G2,O="Starfield Technologies,

Inc.",L=Scottsdale,ST=Arizona,C=US

# Serial Number: 0 (0x0)

# Subject: CN=Starfield Root Certificate Authority - G2,O="Starfield Technologies,

Inc.",L=Scottsdale,ST=Arizona,C=US

# Not Valid Before: Tue Sep 01 00:00:00 2009

# Not Valid After: Thu Dec 31 23:59:59 2037

# Fingerprint (SHA-256):

2C:E1:CB:0B:F9:D2:F9:E1:02:99:3F:BE:21:51:52:C3:B2:DD:0C:AB:DE:1C:68:E5:31:9B:83:91:54:DB:B7:F5

# Fingerprint (SHA1): B5:1C:06:7C:EE:2B:0C:3D:F8:55:AB:2D:92:F4:FE:39:D4:E7:0F:0E

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Starfield Root Certificate Authority - G2"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\265\034\006\174\356\053\014\075\370\125\253\055\222\364\376\071

\324\347\017\016

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

```
\326\071\201\306\122\176\226\151\374\374\312\146\355\005\362\226
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\201\217\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\020\060\016\006\003\125\004\010\023\007\101\162\151\172\157
\156\141\061\023\060\021\006\003\125\004\007\023\012\123\143\157
\164\164\163\144\141\154\145\061\045\060\043\006\003\125\004\012
\label{eq:condition} $$ \023\034\123\164\141\162\146\151\145\154\144\040\124\145\143\150$
\156\157\154\157\147\151\145\163\054\040\111\156\143\056\061\062
\060\060\006\003\125\004\003\023\051\123\164\141\162\146\151\145
 \\ 141\\164\\145\\040\\101\\165\\164\\150\\157\\162\\151\\164\\171\\040\\055\\040
\107\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\000
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "Starfield Services Root Certificate Authority - G2"
# Issuer: CN=Starfield Services Root Certificate Authority - G2,O="Starfield Technologies,
Inc.",L=Scottsdale,ST=Arizona,C=US
# Serial Number: 0 (0x0)
# Subject: CN=Starfield Services Root Certificate Authority - G2,O="Starfield Technologies,
Inc.",L=Scottsdale,ST=Arizona,C=US
# Not Valid Before: Tue Sep 01 00:00:00 2009
# Not Valid After: Thu Dec 31 23:59:59 2037
# Fingerprint (SHA-256):
56:8D:69:05:A2:C8:87:08:A4:B3:02:51:90:ED:CF:ED:B1:97:4A:60:6A:13:C6:E5:29:0F:CB:2A:E6:3E:DA:B5
# Fingerprint (SHA1): 92:5A:8F:8D:2C:6D:04:E0:66:5F:59:6A:FF:22:D8:63:E8:25:6F:3F
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Starfield Services Root Certificate Authority - G2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\230\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\020\060\016\006\003\125\004\010\023\007\101\162\151\172\157
\156\141\061\023\060\021\006\003\125\004\007\023\012\123\143\157
\164\164\163\144\141\154\145\061\045\060\043\006\003\125\004\012
\023\034\123\164\141\162\146\151\145\154\144\040\124\145\143\150
```

\156\157\154\157\147\151\145\163\054\040\111\156\143\056\061\073

\060\071\006\003\125\004\003\023\062\123\164\141\162\146\151\145\\154\144\040\123\145\162\166\151\143\145\163\040\122\157\157\164\\040\103\145\162\164\151\146\151\143\141\164\145\040\101\165\164\\150\157\162\151\164\171\040\055\040\107\062

**END** 

CKA ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

 $\label{eq:control} $$ \000\201\200\60\001\000\003\125\0004\0003\125\0004\000\0023\0007\101\162\151\172\157\156\141\061\023\060\0021\0006\0003\125\0004\0007\0023\0012\123\143\157\164\164\163\144\141\154\145\061\045\060\0043\0006\0003\125\0004\012\123\143\145\162\146\151\145\154\144\040\124\145\143\150\156\157\154\157\147\151\145\163\054\040\111\156\143\056\061\073\154\144\040\123\145\162\166\151\143\145\163\040\122\157\157\164\144\040\103\145\162\164\151\146\151\143\141\164\145\040\101\165\164\150\157\162\151\164\171\040\055\040\107\062$ 

**END** 

CKA SERIAL NUMBER MULTILINE OCTAL

\002\001\000

**END** 

### CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \060\202\003\357\060\202\002\327\240\003\002\001\0002\0001\000$ \060\015\006\011\052\206\110\206\367\015\001\001\013\005\000\060 \201\230\061\013\060\011\006\003\125\004\006\023\002\125\123\061  $\label{eq:condition} $$ \020\060\016\006\003\125\004\010\023\007\101\162\151\172\157\156 $$$ \141\061\023\060\021\006\003\125\004\007\023\012\123\143\157\164 \164\163\144\141\154\145\061\045\060\043\006\003\125\004\012\023 \034\123\164\141\162\146\151\145\154\144\040\124\145\143\150\156 \157\154\157\147\151\145\163\054\040\111\156\143\056\061\073\060  $\label{eq:condition} $$ \003\023\062\123\164\141\162\146\151\145\154 $$$ \144\040\123\145\162\166\151\143\145\163\040\122\157\157\164\040 \103\145\162\164\151\146\151\143\141\164\145\040\101\165\164\150 \157\162\151\164\171\040\055\040\107\062\060\036\027\015\060\071 \060\071\060\061\060\060\060\060\060\060\060\132\027\015\063\067\061 \062\063\061\062\063\065\071\065\071\132\060\201\230\061\013\060 \011\006\003\125\004\006\023\002\125\123\061\020\060\016\006\003  $\label{eq:condition} $$ \frac{125\\004\\010\\023\\007\\101\\162\\151\\172\\157\\156\\141\\061\\023\\060\\021$  $\\ \\006\\ \\003\\ \\125\\ \\004\\ \\007\\ \\023\\ \\012\\ \\123\\ \\143\\ \\157\\ \\164\\ \\164\\ \\163\\ \\144\\ \\141\\ \\154$ \145\061\045\060\043\006\003\125\004\012\023\034\123\164\141\162 \146\151\145\154\144\040\124\145\143\150\156\157\154\157\147\151 \145\163\054\040\111\156\143\056\061\073\060\071\006\003\125\004 \003\023\062\123\164\141\162\146\151\145\154\144\040\123\145\162 \166\151\143\145\163\040\122\157\157\164\040\103\145\162\164\151 \146\151\143\141\164\145\040\101\165\164\150\157\162\151\164\171 \040\055\040\107\062\060\202\001\042\060\015\006\011\052\206\110 \206\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001 \012\002\202\001\001\000\325\014\072\304\052\371\116\342\365\276

\031\227\137\216\210\123\261\037\077\313\317\237\040\023\155\051 \072\310\017\175\074\367\153\166\070\143\331\066\140\250\233\136 \134\000\200\262\057\131\177\366\207\371\045\103\206\347\151\033 \122\232\220\341\161\343\330\055\015\116\157\366\310\111\331\266  $\label{eq:condition} $$ \363\032\126\256\053\266\164\024\353\317\373\046\343\032\272\035$$ \226\056\152\073\130\224\211\107\126\377\045\240\223\160\123\203 \332\204\164\024\303\147\236\004\150\072\337\216\100\132\035\112  $\label{eq:condition} $$ \frac{317}{103}\frac{221}{073}\frac{347}{126}\frac{326}{000}\frac{160}{313}\frac{122}{356}\frac{173}{175}\frac{256}{256} $$$ \072\347\274\061\371\105\366\302\140\317\023\131\002\053\200\314 \064\107\337\271\336\220\145\155\002\317\054\221\246\246\347\336  $\label{eq:condition} $$ \205\030\111\174\146\116\243\072\155\251\265\356\064\056\272\015$$  $\label{eq:condition} $$ \003\270\063\337\107\353\261\153\215\045\331\233\316\201\321\105$ \106\062\226\160\207\336\002\016\111\103\205\266\154\163\273\144  $\label{eq:condition} $$ \frac{352}141\\101\\254\\311\\324\\124\\337\\207\\057\\307\\042\\262\\046\\314\\237$  $\label{eq:condition} $$ 131\124\150\237\374\276\052\057\304\125\034\165\100\140\027\205$$ \002\125\071\213\177\005\002\003\001\000\001\243\102\060\100\060 \060\016\006\003\125\035\017\001\001\377\004\004\003\002\001\006 \060\035\006\003\125\035\016\004\026\004\024\234\137\000\337\252  $\label{eq:condition} $$ \001\327\060\053\070\210\242\270\155\112\234\362\021\221\203\060 $$$ \015\006\011\052\206\110\206\367\015\001\001\013\005\000\003\202  $\label{eq:condition} $$ \001\000\113\066\246\204\167\151\335\073\031\237\147\043\010 $$$  $\label{eq:condition} $$ \frac{157}{016}\frac{141}{311}\frac{375}{204}\frac{334}{137}\frac{330}{066}\frac{201}{315}\frac{330}{033}\frac{101}{055}$$$ \237\140\335\307\032\150\331\321\156\206\341\210\043\317\023\336  $\label{eq:condition} $$103\317\342\064\263\004\235\037\051\325\277\370\136\310\325\301$$ \275\356\222\157\062\164\362\221\202\057\275\202\102\172\255\052 \267\040\175\115\274\172\125\022\302\025\352\275\367\152\225\056 \154\164\237\317\034\264\362\305\001\243\205\320\162\076\255\163 \253\013\233\165\014\155\105\267\216\224\254\226\067\265\240\320 \217\025\107\016\343\350\203\335\217\375\357\101\001\167\314\047 \251\142\205\063\362\067\010\357\161\317\167\006\336\310\031\035 \210\100\317\175\106\035\377\036\307\341\316\377\043\333\306\372 \215\125\116\251\002\347\107\021\106\076\364\375\275\173\051\046 \273\251\141\142\067\050\266\055\052\366\020\206\144\311\160\247 \322\255\267\051\160\171\352\074\332\143\045\237\375\150\267\060 \354\160\373\165\212\267\155\140\147\262\036\310\271\351\330\250 \157\002\213\147\015\115\046\127\161\332\040\374\301\112\120\215 \261\050\272

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

<sup>#</sup> Trust for "Starfield Services Root Certificate Authority - G2"

 $<sup>{\</sup>tt\#\,Issuer:\,CN=Starfield\,Services\,Root\,Certificate\,\,Authority\,-\,G2,O="Starfield\,\,Technologies,}$ 

Inc.",L=Scottsdale,ST=Arizona,C=US

<sup>#</sup> Serial Number: 0 (0x0)

<sup>#</sup> Subject: CN=Starfield Services Root Certificate Authority - G2,O="Starfield Technologies,

```
# Not Valid Before: Tue Sep 01 00:00:00 2009
# Not Valid After: Thu Dec 31 23:59:59 2037
# Fingerprint (SHA-256):
56:8D:69:05:A2:C8:87:08:A4:B3:02:51:90:ED:CF:ED:B1:97:4A:60:6A:13:C6:E5:29:0F:CB:2A:E6:3E:DA:B5
# Fingerprint (SHA1): 92:5A:8F:8D:2C:6D:04:E0:66:5F:59:6A:FF:22:D8:63:E8:25:6F:3F
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "Starfield Services Root Certificate Authority - G2"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\222\132\217\215\054\155\004\340\146\137\131\152\377\042\330\143
\350\045\157\077
END
CKA CERT MD5 HASH MULTILINE OCTAL
\027\065\164\257\173\141\034\353\364\371\074\342\356\100\371\242
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\201\230\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\020\060\016\006\003\125\004\010\023\007\101\162\151\172\157
\156\141\061\023\060\021\006\003\125\004\007\023\012\123\143\157
\164\164\163\144\141\154\145\061\045\060\043\006\003\125\004\012
\023\034\123\164\141\162\146\151\145\154\144\040\124\145\143\150
\156\157\154\157\147\151\145\163\054\040\111\156\143\056\061\073
\060\071\006\003\125\004\003\023\062\123\164\141\162\146\151\145
\154\144\040\123\145\162\166\151\143\145\163\040\122\157\157\164
\\ \\ 040\\ \\ 103\\ \\ 145\\ \\ 162\\ \\ 164\\ \\ 151\\ \\ 146\\ \\ 151\\ \\ 143\\ \\ 141\\ \\ 164\\ \\ 145\\ \\ 040\\ \\ 101\\ \\ 165\\ \\ 164
\150\157\162\151\164\171\040\055\040\107\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\000
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "AffirmTrust Commercial"
# Issuer: CN=AffirmTrust Commercial,O=AffirmTrust,C=US
# Serial Number:77:77:06:27:26:a9:b1:7c
# Subject: CN=AffirmTrust Commercial,O=AffirmTrust,C=US
# Not Valid Before: Fri Jan 29 14:06:06 2010
# Not Valid After: Tue Dec 31 14:06:06 2030
# Fingerprint (SHA-256):
03:76:AB:1D:54:C5:F9:80:3C:E4:B2:E2:01:A0:EE:7E:EF:7B:57:B6:36:E8:A9:3C:9B:8D:48:60:C9:6F:5F:A7
```

Inc.",L=Scottsdale,ST=Arizona,C=US

# Fingerprint (SHA1): F9:B5:B6:32:45:5F:9C:BE:EC:57:5F:80:DC:E9:6E:2C:C7:B2:78:B7

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "AffirmTrust Commercial"

CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509

CKA\_SUBJECT MULTILINE\_OCTAL

**END** 

CKA ID UTF8 "0"

## CKA\_ISSUER MULTILINE\_OCTAL

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\010\167\167\006\047\046\251\261\174

**END** 

## CKA VALUE MULTILINE OCTAL

\060\202\003\114\060\202\002\064\240\003\002\001\002\002\010\167 \167\006\047\046\251\261\174\060\015\006\011\052\206\110\206\367 \015\001\001\013\005\000\060\104\061\013\060\011\006\003\125\004 \006\023\002\125\123\061\024\060\022\006\003\125\004\012\014\013 \101\146\146\151\162\155\124\162\165\163\164\061\037\060\035\006 \003\125\004\003\014\026\101\146\146\151\162\155\124\162\165\163 \164\040\103\157\155\155\145\162\143\151\141\154\060\036\027\015 \061\060\060\061\062\071\061\064\060\066\060\066\132\027\015\063 \060\061\062\063\061\061\064\060\066\060\066\132\060\104\061\013 \060\011\006\003\125\004\006\023\002\125\123\061\024\060\022\006 \003\125\004\012\014\013\101\146\146\151\162\155\124\162\165\163 \164\061\037\060\035\006\003\125\004\003\014\026\101\146\146\151 \141\154\060\202\001\042\060\015\006\011\052\206\110\206\367\015 \001\001\001\005\000\003\202\001\017\000\060\202\001\012\002\202 \001\001\000\366\033\117\147\007\053\241\025\365\006\042\313\037 \001\262\343\163\105\006\104\111\054\273\111\045\024\326\316\303 \267\253\054\117\306\101\062\224\127\372\022\247\133\016\342\217 \037\036\206\031\247\252\265\055\271\137\015\212\302\257\205\065 \171\062\055\273\034\142\067\362\261\133\112\075\312\315\161\137 \351\102\276\224\350\310\336\371\042\110\144\306\345\253\306\053 \155\255\005\360\372\325\013\317\232\345\360\120\244\213\073\107

\245\043\133\172\172\370\063\077\270\357\231\227\343\040\301\326 \050\211\317\224\373\271\105\355\343\100\027\021\324\164\360\013  $\\ \begin{tabular}{l} $$ \begin{tabular}{l} $1342 \ 053 \ 046 \ 152 \ 233 \ 114 \ 127 \ 256 \ 254 \ 040 \ 076 \ 272 \ 105 \ 172 \ 005 \ 0$ \363\275\233\151\025\256\175\116\040\143\304\065\166\072\007\002 \311\067\375\307\107\356\350\361\166\035\163\025\362\227\244\265  $\label{eq:condition} $$ \frac{310}172\\171\\331\\102\\252\\053\\177\\134\\376\\316\\046\\117\\243\\146\\201$ \065\257\104\272\124\036\034\060\062\145\235\346\074\223\136\120 \116\172\343\072\324\156\314\032\373\371\322\067\256\044\052\253 \127\003\042\050\015\111\165\177\267\050\332\165\277\216\343\334 \016\171\061\002\003\001\000\001\243\102\060\100\060\035\006\003 \125\035\016\004\026\004\024\235\223\306\123\213\136\312\257\077 \237\036\017\345\231\225\274\044\366\224\217\060\017\006\003\125 \035\023\001\001\377\004\005\060\003\001\001\377\060\016\006\003 \125\035\017\001\001\377\004\004\003\002\001\006\060\015\006\011  $\label{eq:condition} $$ \052\206\110\206\367\015\001\001\013\005\000\003\202\001\001\000$ \130\254\364\004\016\315\300\015\377\012\375\324\272\026\137\051 \275\173\150\231\130\111\322\264\035\067\115\177\047\175\106\006 \135\103\306\206\056\076\163\262\046\175\117\223\251\266\304\052 \232\253\041\227\024\261\336\214\323\253\211\025\330\153\044\324 \361\026\256\330\244\134\324\177\121\216\355\030\001\261\223\143 \275\274\370\141\200\232\236\261\316\102\160\342\251\175\006\045 \175\047\241\376\157\354\263\036\044\332\343\113\125\032\000\073  $\label{eq:condition} $$ \065\264\073\331\327\135\060\375\201\023\211\362\302\006\053\355$$ \147\304\216\311\103\262\134\153\025\211\002\274\142\374\116\362 \265\063\252\262\157\323\012\242\120\343\366\073\350\056\104\302 \333\146\070\251\063\126\110\361\155\033\063\215\015\214\077\140 \067\235\323\312\155\176\064\176\015\237\162\166\213\033\237\162  $\label{eq:condition} $$ 375\122\065\101\105\002\226\057\034\262\232\163\111\041\261\111$ \107\105\107\264\357\152\064\021\311\115\232\314\131\267\326\002 \236\132\116\145\265\224\256\033\337\051\260\026\361\277\000\236  $\\ \\007\\ \\002\\ \\144\\ \\265\\ \\004\\ \\265\\ \\043\\ \\041\\ \\231\\ \\012\\ \\225\\ \\073\\ \\227\\ \\174\\ \\357$ **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "AffirmTrust Commercial"
```

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

<sup>#</sup> Issuer: CN=AffirmTrust Commercial,O=AffirmTrust,C=US

<sup>#</sup> Serial Number:77:77:06:27:26:a9:b1:7c

<sup>#</sup> Subject: CN=AffirmTrust Commercial,O=AffirmTrust,C=US

<sup>#</sup> Not Valid Before: Fri Jan 29 14:06:06 2010

<sup>#</sup> Not Valid After: Tue Dec 31 14:06:06 2030

<sup>#</sup> Fingerprint (SHA-256):

<sup>03:76:</sup>AB:1D:54:C5:F9:80:3C:E4:B2:E2:01:A0:EE:7E:EF:7B:57:B6:36:E8:A9:3C:9B:8D:48:60:C9:6F:5F:A7

<sup>#</sup> Fingerprint (SHA1): F9:B5:B6:32:45:5F:9C:BE:EC:57:5F:80:DC:E9:6E:2C:C7:B2:78:B7

```
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "AffirmTrust Commercial"
CKA CERT SHA1 HASH MULTILINE OCTAL
\371\265\266\062\105\137\234\276\354\127\137\200\334\351\156\054
\307\262\170\267
END
CKA CERT MD5 HASH MULTILINE OCTAL
\202\222\272\133\357\315\212\157\246\075\125\371\204\366\326\267
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\104\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$
\124\162\165\163\164\061\037\060\035\006\003\125\004\003\014\026
\145\162\143\151\141\154
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\010\167\167\006\047\046\251\261\174
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "AffirmTrust Networking"
# Issuer: CN=AffirmTrust Networking,O=AffirmTrust,C=US
# Serial Number:7c:4f:04:39:1c:d4:99:2d
# Subject: CN=AffirmTrust Networking,O=AffirmTrust,C=US
# Not Valid Before: Fri Jan 29 14:08:24 2010
# Not Valid After: Tue Dec 31 14:08:24 2030
# Fingerprint (SHA-256):
0A:81:EC:5A:92:97:77:F1:45:90:4A:F3:8D:5D:50:9F:66:B5:E2:C5:8F:CD:B5:31:05:8B:0E:17:F3:F0:B4:1B
# Fingerprint (SHA1): 29:36:21:02:8B:20:ED:02:F5:66:C5:32:D1:D6:ED:90:9F:45:00:2F
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "AffirmTrust Networking"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\104\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\024\060\022\006\003\125\004\012\014\013\101\146\146\151\162\155
\124\162\165\163\164\061\037\060\035\006\003\125\004\003\014\026
\101\146\146\151\162\155\124\162\165\163\164\040\116\145\164\167
\157\162\153\151\156\147
END
```

#### CKA ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

\060\104\061\013\060\011\006\003\125\004\006\023\002\125\123\061 \024\060\022\006\003\125\004\012\014\013\101\146\146\151\162\155 \124\162\165\163\164\061\037\060\035\006\003\125\004\003\014\026 \101\146\146\151\162\155\124\162\165\163\164\040\116\145\164\167 \157\162\153\151\156\147

**END** 

## CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\010\174\117\004\071\034\324\231\055

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\003\114\060\202\002\064\240\003\002\001\002\002\010\174 \117\004\071\034\324\231\055\060\015\006\011\052\206\110\206\367 \015\001\001\005\005\000\060\104\061\013\060\011\006\003\125\004 \006\023\002\125\123\061\024\060\022\006\003\125\004\012\014\013 \101\146\146\151\162\155\124\162\165\163\164\061\037\060\035\006 \003\125\004\003\014\026\101\146\146\151\162\155\124\162\165\163 \164\040\116\145\164\167\157\162\153\151\156\147\060\036\027\015  $\label{eq:condition} $$ \061\060\060\061\062\071\061\064\060\070\062\064\132\027\015\063$ \060\061\062\063\061\061\064\060\070\062\064\132\060\104\061\013 \060\011\006\003\125\004\006\023\002\125\123\061\024\060\022\006  $\label{eq:condition} $$ 003\125\004\012\014\013\101\146\146\151\162\155\124\162\165\163$ \164\061\037\060\035\006\003\125\004\003\014\026\101\146\146\151 \162\155\124\162\165\163\164\040\116\145\164\167\157\162\153\151 \156\147\060\202\001\042\060\015\006\011\052\206\110\206\367\015 \001\001\001\005\000\003\202\001\017\000\060\202\001\012\002\202  $\label{eq:condition} $$ \001\001\000\264\204\314\063\027\056\153\224\154\153\141\122\240 $$$ \353\243\317\171\224\114\345\224\200\231\313\125\144\104\145\217 \147\144\342\006\343\134\067\111\366\057\233\204\204\036\055\362 \140\235\060\116\314\204\205\342\054\317\036\236\376\066\253\063 \167\065\104\330\065\226\032\075\066\350\172\016\330\325\107\241 \152\151\213\331\374\273\072\256\171\132\325\364\326\161\273\232 \220\043\153\232\267\210\164\207\014\036\137\271\236\055\372\253 \123\053\334\273\166\076\223\114\010\010\214\036\242\043\034\324 \152\255\042\272\231\001\056\155\145\313\276\044\146\125\044\113 \100\104\261\033\327\341\302\205\300\336\020\077\075\355\270\374  $\label{eq:condition} $$ 361 \ 361 \ 361 \ 334 \ 277 \ 145 \ 227 \ 157 \ 331 \ 371 \ 100 \ 161 \ 215 \ 175 \ 275$ \225\324\316\276\240\136\047\043\336\375\246\320\046\016\000\051 \353\074\106\360\075\140\277\077\120\322\334\046\101\121\236\024 \067\102\004\243\160\127\250\033\207\355\055\372\173\356\214\012 \343\251\146\211\031\313\101\371\335\104\066\141\317\342\167\106 \310\175\366\364\222\201\066\375\333\064\361\162\176\363\014\026 \275\264\025\002\003\001\000\001\243\102\060\100\060\035\006\003 \100\264\260\172\120\020\120\164\304\310\275\060\017\006\003\125 \035\023\001\001\377\004\005\060\003\001\001\377\060\016\006\003 

\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001\000 \211\127\262\026\172\250\302\375\326\331\233\233\064\302\234\264 \062\024\115\247\244\337\354\276\247\276\370\103\333\221\067\316 \264\062\056\120\125\032\065\116\166\103\161\040\357\223\167\116 \025\160\056\207\303\301\035\155\334\313\265\047\324\054\126\321 \122\123\072\104\322\163\310\304\033\005\145\132\142\222\234\356 \101\215\061\333\347\064\352\131\041\325\001\172\327\144\270\144  $\label{eq:condition} $$ \071\315\311\355\257\355\113\003\110\247\240\231\001\200\334\145$$ \243\066\256\145\131\110\117\202\113\310\145\361\127\035\345\131 \056\012\077\154\330\321\365\345\011\264\154\124\000\012\340\025 \115\207\165\155\267\130\226\132\335\155\322\000\240\364\233\110 \276\303\067\244\272\066\340\174\207\205\227\032\025\242\336\056 \242\133\275\257\030\371\220\120\315\160\131\370\047\147\107\313  $\label{eq:condition} $$ 307\240\007\072\175\321\054\135\154\031\072\146\265\175\375\221 $$$ \157\202\261\276\010\223\333\024\107\361\242\067\307\105\236\074 \307\167\257\144\250\223\337\366\151\203\202\140\362\111\102\064 \355\132\000\124\205\034\026\066\222\014\134\372\246\255\277\333 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "AffirmTrust Networking"
- # Issuer: CN=AffirmTrust Networking,O=AffirmTrust,C=US
- # Serial Number:7c:4f:04:39:1c:d4:99:2d
- # Subject: CN=AffirmTrust Networking,O=AffirmTrust,C=US
- # Not Valid Before: Fri Jan 29 14:08:24 2010
- # Not Valid After: Tue Dec 31 14:08:24 2030
- # Fingerprint (SHA-256):

0A:81:EC:5A:92:97:77:F1:45:90:4A:F3:8D:5D:50:9F:66:B5:E2:C5:8F:CD:B5:31:05:8B:0E:17:F3:F0:B4:1B

# Fingerprint (SHA1): 29:36:21:02:8B:20:ED:02:F5:66:C5:32:D1:D6:ED:90:9F:45:00:2F

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "AffirmTrust Networking"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\051\066\041\002\213\040\355\002\365\146\305\062\321\326\355\220

\237\105\000\057

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\102\145\312\276\001\232\232\114\251\214\101\111\315\300\325\177 END

CKA\_ISSUER MULTILINE\_OCTAL

```
\157\162\153\151\156\147
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \002\010\174\117\004\071\034\324\231\055$
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "AffirmTrust Premium"
# Issuer: CN=AffirmTrust Premium,O=AffirmTrust,C=US
# Serial Number:6d:8c:14:46:b1:a6:0a:ee
# Subject: CN=AffirmTrust Premium,O=AffirmTrust,C=US
# Not Valid Before: Fri Jan 29 14:10:36 2010
# Not Valid After: Mon Dec 31 14:10:36 2040
# Fingerprint (SHA-256):
70:A7:3F:7F:37:6B:60:07:42:48:90:45:34:B1:14:82:D5:BF:0E:69:8E:CC:49:8D:F5:25:77:EB:F2:E9:3B:9A
# Fingerprint (SHA1): D8:A6:33:2C:E0:03:6F:B1:85:F6:63:4F:7D:6A:06:65:26:32:28:27
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "AffirmTrust Premium"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA_SUBJECT MULTILINE_OCTAL
\060\101\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\024\060\022\006\003\125\004\012\014\013\101\146\146\151\162\155
\151\165\155
END
CKA ID UTF8 "0"
CKA ISSUER MULTILINE OCTAL
\060\101\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\024\060\022\006\003\125\004\012\014\013\101\146\146\151\162\155
\124\162\165\163\164\061\034\060\032\006\003\125\004\003\014\023
\101\146\146\151\162\155\124\162\165\163\164\040\120\162\145\155
\151\165\155
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\010\155\214\024\106\261\246\012\356
END
CKA_VALUE MULTILINE_OCTAL
\060\202\005\106\060\202\003\056\240\003\002\001\002\002\010\155
```

\214\024\106\261\246\012\356\060\015\006\011\052\206\110\206\367

\015\001\001\001\014\005\000\060\101\061\013\060\011\006\003\125\004 \006\023\002\125\123\061\024\060\022\006\003\125\004\012\014\013 \101\146\146\151\162\155\124\162\165\163\164\061\034\060\032\006 \003\125\004\003\014\023\101\146\146\151\162\155\124\162\165\163 \164\040\120\162\145\155\151\165\155\060\036\027\015\061\060\060 \063\061\061\064\061\060\063\066\132\060\101\061\013\060\011\006 \003\125\004\006\023\002\125\123\061\024\060\022\006\003\125\004 \060\032\006\003\125\004\003\014\023\101\146\146\151\162\155\124 \162\165\163\164\040\120\162\145\155\151\165\155\060\202\002\042  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\001\005\000\003$ \202\002\017\000\060\202\002\012\002\202\002\001\000\304\022\337 \251\137\376\101\335\335\365\237\212\343\366\254\341\074\170\232 \274\330\360\177\172\240\063\052\334\215\040\133\256\055\157\347 \223\331\066\160\152\150\317\216\121\243\205\133\147\004\240\020  $\\ \\ 044\\157\\135\\050\\202\\301\\227\\127\\330\\110\\051\\023\\266\\341\\276\\221$ \115\337\205\014\123\030\232\036\044\242\117\217\360\242\205\013 \313\364\051\177\322\244\130\356\046\115\311\252\250\173\232\331 \372\070\336\104\127\025\345\370\214\310\331\110\342\015\026\047 \035\036\310\203\205\045\267\272\252\125\101\314\003\042\113\055 \221\215\213\346\211\257\146\307\351\377\053\351\074\254\332\322  $\label{eq:condition} $$ \263\303\341\150\234\211\370\172\000\126\336\364\125\225\154\373$ \272\144\335\142\213\337\013\167\062\353\142\314\046\232\233\273  $\verb|252|142|203|114|264|006|172|060|310|051|277|355|006|115|227|271|$  $\label{eq:condition} $$ \034\061\053\325\137\274\123\022\027\234\231\127\051\146\167$ \141\041\061\007\056\045\111\235\030\362\356\363\053\161\214\265  $\label{eq:condition} $$ \272\071\007\111\167\374\357\056\222\220\005\215\055\057\167\173$ \357\103\277\065\273\232\330\371\163\247\054\362\320\127\356\050 \116\046\137\217\220\150\011\057\270\370\334\006\351\056\232\076  $\label{eq:condition} $$ 121\247\321\042\304\012\247\070\110\154\263\371\377\175\253\206$ \127\343\272\326\205\170\167\272\103\352\110\177\366\330\276\043 \155\036\277\321\066\154\130\134\361\356\244\031\124\032\365\003 \322\166\346\341\214\275\074\263\323\110\113\342\310\370\177\222 \250\166\106\234\102\145\076\244\036\301\007\003\132\106\055\270 \227\363\267\325\262\125\041\357\272\334\114\000\227\373\024\225 \047\063\277\350\103\107\106\322\010\231\026\140\073\232\176\322  $\label{eq:condition} $\346\355\070\352\354\001\036\074\110\126\111\011\307\114\067\000$$ \236\210\016\300\163\341\157\146\351\162\107\060\076\020\345\013  $\label{eq:condition} $$ \003\311\232\102\000\154\305\224\176\141\304\212\337\177\202\032$ \013\131\304\131\062\167\263\274\140\151\126\071\375\264\006\173 \054\326\144\066\331\275\110\355\204\037\176\245\042\217\052\270 \102\364\202\267\324\123\220\170\116\055\032\375\201\157\104\327 \073\001\164\226\102\340\000\342\056\153\352\305\356\162\254\273 \277\376\352\252\250\370\334\366\262\171\212\266\147\002\003\001 \000\001\243\102\060\100\060\035\006\003\125\035\016\004\026\004  $\label{eq:condition} $$ \024\235\300\147\246\014\042\331\046\365\105\253\246\145\122\021 $$$ \047\330\105\254\143\060\017\006\003\125\035\023\001\001\377\004

\005\060\003\001\001\377\060\016\006\003\125\035\017\001\001\377 \004\004\003\002\001\006\060\015\006\011\052\206\110\206\367\015  $\label{eq:condition} $$ \001\01\014\005\000\003\202\002\001\000\263\127\115\020\142\116 $$$  $\label{eq:condition} $$ \072\344\254\352\270\034\257\062\043\310\263\111\132\121\234\166$$  $\label{eq:condition} $$ \050\215\171\252\127\106\027\325\365\122\366\267\104\350\010\104$ \277\030\204\322\013\200\315\305\022\375\000\125\005\141\207\101 \334\265\044\236\074\304\330\310\373\160\236\057\170\226\203\040  $\label{eq:condition} $$ \066\336\174\017\151\023\210\245\165\066\230\010\246\306\337\254$$$ \316\343\130\326\267\076\336\272\363\353\064\100\330\242\201\365 \170\077\057\325\245\374\331\242\324\136\004\016\027\255\376\101 \360\345\262\162\372\104\202\063\102\350\055\130\367\126\214\142  $\label{eq:condition} $$ \077\272\102\260\234\014\134\176\056\145\046\134\123\117\000\262$ \170\176\241\015\231\055\215\270\035\216\242\304\260\375\140\320  $\label{eq:condition} $$ \060\244\216\310\004\142\251\304\355\065\336\172\227\355\016\070$$$  $\label{eq:condition} $$ \frac{222}057\\223\\160\\245\\251\\234\\157\\247\\175\\023\\035\\176\\306\\010$ \110\261\136\147\353\121\010\045\351\346\045\153\122\051\221\234 \322\071\163\010\127\336\231\006\264\133\235\020\006\341\302\000 \250\270\034\112\002\012\024\320\301\101\312\373\214\065\041\175 \202\070\362\251\124\221\031\065\223\224\155\152\072\305\262\320 \273\211\206\223\350\233\311\017\072\247\172\270\241\360\170\106 \372\374\067\057\345\212\204\363\337\376\004\331\241\150\240\057 \044\342\011\225\006\325\225\312\341\044\226\353\174\366\223\005 \273\355\163\351\055\321\165\071\327\347\044\333\330\116\137\103 \217\236\320\024\071\277\125\160\110\231\127\061\264\234\356\112 \230\003\226\060\037\140\006\356\033\043\376\201\140\043\032\107 \142\205\245\314\031\064\200\157\263\254\032\343\237\360\173\110 \255\325\001\331\147\266\251\162\223\352\055\146\265\262\270\344  $\label{eq:condition} $$ \075\074\262\357\114\214\352\353\007\277\253\065\232\125\206\274$ \030\246\265\250\136\264\203\154\153\151\100\323\237\334\361\303 \151\153\271\341\155\011\364\361\252\120\166\012\172\175\172\027 \241\125\226\102\231\061\011\335\140\021\215\005\060\176\346\216 \106\321\235\024\332\307\027\344\005\226\214\304\044\265\033\317 \024\007\262\100\370\243\236\101\206\274\004\320\153\226\310\052 \200\064\375\277\357\006\243\335\130\305\205\075\076\217\376\236 \051\340\266\270\011\150\031\034\030\103

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "AffirmTrust Premium"
```

<sup>#</sup> Issuer: CN=AffirmTrust Premium,O=AffirmTrust,C=US

<sup>#</sup> Serial Number:6d:8c:14:46:b1:a6:0a:ee

<sup>#</sup> Subject: CN=AffirmTrust Premium,O=AffirmTrust,C=US

<sup>#</sup> Not Valid Before: Fri Jan 29 14:10:36 2010 # Not Valid After : Mon Dec 31 14:10:36 2040

<sup>#</sup> Fingerprint (SHA-256):

<sup>70:</sup>A7:3F:7F:37:6B:60:07:42:48:90:45:34:B1:14:82:D5:BF:0E:69:8E:CC:49:8D:F5:25:77:EB:F2:E9:3B:9A

```
# Fingerprint (SHA1): D8:A6:33:2C:E0:03:6F:B1:85:F6:63:4F:7D:6A:06:65:26:32:28:27
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "AffirmTrust Premium"
CKA CERT SHA1 HASH MULTILINE OCTAL
\330\246\063\054\340\003\157\261\205\366\143\117\175\152\006\145
\046\062\050\047
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\label{eq:condition} $$ 304\135\016\110\266\254\050\060\116\012\274\371\070\026\207\127 $$
END
CKA_ISSUER MULTILINE_OCTAL
\label{eq:condition} $$ \060\101\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$
\024\060\022\006\003\125\004\012\014\013\101\146\146\151\162\155
\124\162\165\163\164\061\034\060\032\006\003\125\004\003\014\023
\101\146\146\151\162\155\124\162\165\163\164\040\120\162\145\155
\151\165\155
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \002\010\155\214\024\106\261\246\012\356$
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "AffirmTrust Premium ECC"
# Issuer: CN=AffirmTrust Premium ECC,O=AffirmTrust,C=US
# Serial Number:74:97:25:8a:c7:3f:7a:54
# Subject: CN=AffirmTrust Premium ECC,O=AffirmTrust,C=US
# Not Valid Before: Fri Jan 29 14:20:24 2010
# Not Valid After: Mon Dec 31 14:20:24 2040
# Fingerprint (SHA-256):
BD:71:FD:F6:DA:97:E4:CF:62:D1:64:7A:DD:25:81:B0:7D:79:AD:F8:39:7E:B4:EC:BA:9C:5E:84:88:82:14:23
# Fingerprint (SHA1): B8:23:6B:00:2F:1D:16:86:53:01:55:6C:11:A4:37:CA:EB:FF:C3:BB
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "AffirmTrust Premium ECC"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\105\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\024\060\022\006\003\125\004\012\014\013\101\146\146\151\162\155
```

\124\162\165\163\164\061\040\060\036\006\003\125\004\003\014\027 \101\146\146\151\162\155\124\162\165\163\164\040\120\162\145\155 \151\165\155\040\105\103\103

**END** 

CKA ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

**END** 

### CKA SERIAL NUMBER MULTILINE OCTAL

 $\label{eq:condition} $$ \002\010\164\227\045\212\307\077\172\124 $$$ 

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

\060\202\001\376\060\202\001\205\240\003\002\001\002\002\010\164 \227\045\212\307\077\172\124\060\012\006\010\052\206\110\316\075 \004\003\003\060\105\061\013\060\011\006\003\125\004\006\023\002 \151\162\155\124\162\165\163\164\061\040\060\036\006\003\125\004 \003\014\027\101\146\146\151\162\155\124\162\165\163\164\040\120 \060\061\062\071\061\064\062\060\062\064\132\027\015\064\060\061 \062\063\061\061\064\062\060\062\064\132\060\105\061\013\060\011 \006\003\125\004\006\023\002\125\123\061\024\060\022\006\003\125 \004\012\014\013\101\146\146\151\162\155\124\162\165\163\164\061 \040\060\036\006\003\125\004\003\014\027\101\146\146\151\162\155 \124\162\165\163\164\040\120\162\145\155\151\165\155\040\105\103 \103\060\166\060\020\006\007\052\206\110\316\075\002\001\006\005 \053\201\004\000\042\003\142\000\004\015\060\136\033\025\235\003 \320\241\171\065\267\072\074\222\172\312\025\034\315\142\363\234 \046\134\007\075\345\124\372\243\326\314\022\352\364\024\137\350 \216\031\253\057\056\110\346\254\030\103\170\254\320\067\303\275 \262\315\054\346\107\342\032\346\143\270\075\056\057\170\304\117 \333\364\017\244\150\114\125\162\153\225\035\116\030\102\225\170 \314\067\074\221\342\233\145\053\051\243\102\060\100\060\035\006 \003\125\035\016\004\026\004\024\232\257\051\172\300\021\065\065  $\label{eq:condition} $$ \046\121\060\000\303\152\376\100\325\256\326\074\060\017\006\003$ \125\035\023\001\001\377\004\005\060\003\001\001\377\060\016\006 \003\125\035\017\001\001\377\004\004\003\002\001\006\060\012\006 \010\052\206\110\316\075\004\003\003\003\147\000\060\144\002\060 \027\011\363\207\210\120\132\257\310\300\102\277\107\137\365\154 \152\206\340\304\047\164\344\070\123\327\005\177\033\064\343\306 \057\263\312\011\074\067\235\327\347\270\106\361\375\241\342\161 \002\060\102\131\207\103\324\121\337\272\323\011\062\132\316\210 \176\127\075\234\137\102\153\365\007\055\265\360\202\223\371\131 \157\256\144\372\130\345\213\036\343\143\276\265\201\315\157\002

```
\214\171
END
CKA_NSS_MOZILLA_CA_POLICY CK_BBOOL CK_TRUE
CKA_NSS_SERVER_DISTRUST_AFTER CK_BBOOL CK_FALSE
CKA_NSS_EMAIL_DISTRUST_AFTER CK_BBOOL CK_FALSE
# Trust for "AffirmTrust Premium ECC"
# Issuer: CN=AffirmTrust Premium ECC,O=AffirmTrust,C=US
# Serial Number:74:97:25:8a:c7:3f:7a:54
# Subject: CN=AffirmTrust Premium ECC,O=AffirmTrust,C=US
# Not Valid Before: Fri Jan 29 14:20:24 2010
# Not Valid After: Mon Dec 31 14:20:24 2040
# Fingerprint (SHA-256):
BD:71:FD:F6:DA:97:E4:CF:62:D1:64:7A:DD:25:81:B0:7D:79:AD:F8:39:7E:B4:EC:BA:9C:5E:84:88:82:14:23
# Fingerprint (SHA1): B8:23:6B:00:2F:1D:16:86:53:01:55:6C:11:A4:37:CA:EB:FF:C3:BB
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "AffirmTrust Premium ECC"
CKA CERT SHA1 HASH MULTILINE OCTAL
\label{eq:condition} $$ \270\043\153\000\057\035\026\206\123\001\125\154\021\244\067\312
\353\377\303\273
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\144\260\011\125\317\261\325\231\342\276\023\253\246\135\352\115
END
CKA_ISSUER MULTILINE_OCTAL
\060\105\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\024\060\022\006\003\125\004\012\014\013\101\146\146\151\162\155
\124\162\165\163\164\061\040\060\036\006\003\125\004\003\014\027
\101\146\146\151\162\155\124\162\165\163\164\040\120\162\145\155
\151\165\155\040\105\103\103
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\010\164\227\045\212\307\077\172\124
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
#
# Certificate "Certum Trusted Network CA"
# Issuer: CN=Certum Trusted Network CA,OU=Certum Certification Authority,O=Unizeto Technologies
S.A.,C=PL
```

# Serial Number: 279744 (0x444c0)

- # Subject: CN=Certum Trusted Network CA,OU=Certum Certification Authority,O=Unizeto Technologies S.A..C=PL
- # Not Valid Before: Wed Oct 22 12:07:37 2008
- # Not Valid After: Mon Dec 31 12:07:37 2029
- # Fingerprint (SHA-256):
- 5C:58:46:8D:55:F5:8E:49:7E:74:39:82:D2:B5:00:10:B6:D1:65:37:4A:CF:83:A7:D4:A3:2D:B7:68:C4:40:8E
- # Fingerprint (SHA1): 07:E0:32:E0:20:B7:2C:3F:19:2F:06:28:A2:59:3A:19:A7:0F:06:9E
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA PRIVATE CK BBOOL CK FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA\_LABEL UTF8 "Certum Trusted Network CA"
- CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
- CKA\_SUBJECT MULTILINE\_OCTAL
- $\label{eq:condition} $$ \060\176\061\013\060\011\006\003\125\004\006\023\002\120\114\061 $$$
- $\\ \\042\\060\\040\\006\\003\\125\\004\\012\\023\\031\\125\\156\\151\\172\\145\\164$
- $\label{eq:condition} $$ \frac{157}040\\124\\145\\143\\150\\156\\157\\154\\157\\147\\151\\145\\163\\040\\123$
- \056\101\056\061\047\060\045\006\003\125\004\013\023\036\103\145
- \162\164\165\155\040\103\145\162\164\151\146\151\143\141\164\151
- $\label{eq:linear_line$

**END** 

CKA\_ID UTF8 "0"

### CKA\_ISSUER MULTILINE\_OCTAL

\060\176\061\013\060\011\006\003\125\004\006\023\002\120\114\061 \042\060\040\006\003\125\004\012\023\031\125\156\151\172\145\164 \157\040\124\145\143\150\156\157\154\157\147\151\145\163\040\123

\056\101\056\061\047\060\045\006\003\125\004\013\023\036\103\145

\162\164\165\155\040\103\145\162\164\151\146\151\143\141\164\151

 $\label{eq:condition} $$ \frac{157}{156}040\\101\\165\\164\\150\\157\\162\\151\\164\\171\\061\\042\\060\\040$ 

\006\003\125\004\003\023\031\103\145\162\164\165\155\040\124\162

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\003\004\104\300

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

\101\060\036\027\015\060\070\061\060\062\062\061\062\060\067\063 \067\132\027\015\062\071\061\062\063\061\061\062\060\067\063\067 \132\060\176\061\013\060\011\006\003\125\004\006\023\002\120\114 \061\042\060\040\006\003\125\004\012\023\031\125\156\151\172\145 \164\157\040\124\145\143\150\156\157\154\157\147\151\145\163\040 \123\056\101\056\061\047\060\045\006\003\125\004\013\023\036\103 \145\162\164\165\155\040\103\145\162\164\151\146\151\143\141\164 \151\157\156\040\101\165\164\150\157\162\151\164\171\061\042\060 \162\165\163\164\145\144\040\116\145\164\167\157\162\153\040\103 \101\060\202\001\042\060\015\006\011\052\206\110\206\367\015\001  $\label{eq:condition} $$ \001\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001$ \001\000\343\373\175\243\162\272\302\360\311\024\207\365\153\001 \116\341\156\100\007\272\155\047\135\177\367\133\055\263\132\307 \121\137\253\244\062\246\141\207\266\156\017\206\322\060\002\227 \370\327\151\127\241\030\071\135\152\144\171\306\001\131\254\074  $\label{eq:condition} $$ \061\112\070\174\322\004\322\113\050\350\040\137\073\007\242\314$$$ \115\163\333\363\256\117\307\126\325\132\247\226\211\372\363\253 \150\324\043\206\131\047\317\011\047\274\254\156\162\203\034\060 \162\337\340\242\351\322\341\164\165\031\275\052\236\173\025\124 \004\033\327\103\071\255\125\050\305\342\032\273\364\300\344\256 \070\111\063\314\166\205\237\071\105\322\244\236\362\022\214\121  $\label{eq:condition} $$ 370\174\344\055\177\365\254\137\353\026\237\261\055\321\272\314$$ \221\102\167\114\045\311\220\070\157\333\360\314\373\216\036\227  $\label{eq:condition} $$ \frac{131}076\\325\\140\\116\\346\\005\\050\\355\\111\\171\\023\\113\\272\\110\\333$ \057\371\162\323\071\312\376\037\330\064\162\365\264\100\317\061 \001\303\354\336\021\055\027\135\037\270\120\321\136\031\247\151  $\label{eq:condition} $$ 36\007\063\050\312\120\225\371\247\124\313\124\206\120\105\251 $$$ \371\111\002\003\001\000\001\243\102\060\100\060\017\006\003\125 \035\023\001\001\377\004\005\060\003\001\001\377\060\035\006\003 \315\355\273\220\274\342\204\067\106\165\367\060\016\006\003\125 \035\017\001\001\377\004\004\003\002\001\006\060\015\006\011\052 \206\110\206\367\015\001\001\005\005\000\003\202\001\001\000\246 \250\255\042\316\001\075\246\243\377\142\320\110\235\213\136\162 \260\170\104\343\334\034\257\011\375\043\110\372\275\052\304\271 \125\004\265\020\243\215\047\336\013\202\143\320\356\336\014\067  $\label{eq:condition} $$ \frac{171}101\frac{33}042\frac{262}{260}\frac{232}{101}\frac{440}{160}\frac{340}{324}\frac{320}{167}\frac{313}{320} $$$  $\\ \langle 043 \rangle 323 \rangle \langle 000 \rangle 340 \rangle 154 \rangle 126 \rangle \langle 057 \rangle 341 \rangle 151 \rangle \langle 015 \rangle \langle 331 \rangle \langle 252 \rangle \langle 277 \rangle \langle 041 \rangle \langle 201 \rangle \langle 277 \rangle \langle 277$ \120\331\006\245\250\377\225\067\320\252\376\342\263\365\231\055 \105\204\212\345\102\011\327\164\002\057\367\211\330\231\351\274 \047\324\107\215\272\015\106\034\167\317\024\244\034\271\244\061 \304\234\050\164\003\064\377\063\031\046\245\351\015\164\267\076 \227\306\166\350\047\226\243\146\335\341\256\362\101\133\312\230  $\label{eq:condition} $$ 126\203\163\160\344\206\032\322\061\101\272\057\276\055\023\132$ \166\157\116\350\116\201\016\077\133\003\042\240\022\276\146\130 \021\112\313\003\304\264\052\052\055\226\027\340\071\124\274\110 \323\166\047\235\232\055\006\246\311\354\071\322\253\333\237\232 \013\047\002\065\051\261\100\225\347\371\350\234\125\210\031\106 \326\267\064\365\176\316\071\232\331\070\361\121\367\117\054

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE

CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "Certum Trusted Network CA"

# Issuer: CN=Certum Trusted Network CA,OU=Certum Certification Authority,O=Unizeto Technologies S.A..C=PL

# Serial Number: 279744 (0x444c0)

# Subject: CN=Certum Trusted Network CA,OU=Certum Certification Authority,O=Unizeto Technologies S.A..C=PL

# Not Valid Before: Wed Oct 22 12:07:37 2008

# Not Valid After: Mon Dec 31 12:07:37 2029

# Fingerprint (SHA-256):

5C:58:46:8D:55:F5:8E:49:7E:74:39:82:D2:B5:00:10:B6:D1:65:37:4A:CF:83:A7:D4:A3:2D:B7:68:C4:40:8E

# Fingerprint (SHA1): 07:E0:32:E0:20:B7:2C:3F:19:2F:06:28:A2:59:3A:19:A7:0F:06:9E

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Certum Trusted Network CA"

CKA CERT SHA1 HASH MULTILINE OCTAL

 $\label{eq:condition} $$ \007\340\062\340\040\267\054\077\031\057\006\050\242\131\072\031 $$$ 

\247\017\006\236

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\325\351\201\100\305\030\151\374\106\054\211\165\142\017\252\170

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\176\061\013\060\011\006\003\125\004\006\023\002\120\114\061 $$$ 

 $\\ \\ 042\\ \\ 060\\ \\ 040\\ \\ 006\\ \\ 003\\ \\ 125\\ \\ 004\\ \\ 012\\ \\ 023\\ \\ 031\\ \\ 125\\ \\ 156\\ \\ 151\\ \\ 172\\ \\ 145\\ \\ 164$ 

\157\040\124\145\143\150\156\157\154\157\147\151\145\163\040\123

 $\label{eq:condition} $$ \056\101\056\061\047\060\045\006\003\125\004\013\023\036\103\145$$ 

 $\label{eq:condition} $$ \frac{157}{156}040\\101\\165\\164\\150\\157\\162\\151\\164\\171\\061\\042\\060\\040$ 

\006\003\125\004\003\023\031\103\145\162\164\165\155\040\124\162

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

 ${\tt CKA\_TRUST\_STEP\_UP\_APPROVED\ CK\_BBOOL\ CK\_FALSE}$ 

# Certificate "TWCA Root Certification Authority"

#

# Issuer: CN=TWCA Root Certification Authority, OU=Root CA,O=TAIWAN-CA,C=TW

# Serial Number: 1 (0x1)

# Subject: CN=TWCA Root Certification Authority, OU=Root CA,O=TAIWAN-CA,C=TW

# Not Valid Before: Thu Aug 28 07:24:33 2008 # Not Valid After : Tue Dec 31 15:59:59 2030

# Fingerprint (SHA-256):

BF:D8:8F:E1:10:1C:41:AE:3E:80:1B:F8:BE:56:35:0E:E9:BA:D1:A6:B9:BD:51:5E:DC:5C:6D:5B:87:11:AC:44

# Fingerprint (SHA1): CF:9E:87:6D:D3:EB:FC:42:26:97:A3:B5:A3:7A:A0:76:A9:06:23:48

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "TWCA Root Certification Authority"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \000137061\013\060\011\006\003\125\004\006\023\002\124\127\061\022\060\020\006\003\125\004\011\1124\101\111\127\101\116\055\103\101\061\020\060\016\0006\003\125\0004\013\014\007\122\157\157\164\040\103\101\061\052\060\050\006\003\125\0004\003\014\041\124\127\103\101\040\122\157\157\164\040\103\145\162\164\151\146\151\144\1151\157\156\040\101\165\164\150\157\162\151\164\171$ 

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000137061\013\060\011\006\003\125\004\006\023\002\124\127\061\022\060\020\006\003\125\004\011\1124\101\111\127\101\116\055\103\101\061\020\060\016\0006\003\125\0004\013\014\007\122\157\157\164\040\103\125\0004\003\014\0041\122\157\157\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156\0040\101\165\164\150\157\162\151\164\171$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\001\001

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\036\027\015\060\070\060\070\062\070\060\067\062\064\063\063 \132\027\015\063\060\061\062\063\061\061\065\065\071\065\071\132 \060\137\061\013\060\011\006\003\125\004\006\023\002\124\127\061  $\label{eq:condition} $$ \022\060\020\006\003\125\004\012\014\011\124\101\111\127\101\116$ \055\103\101\061\020\060\016\006\003\125\004\013\014\007\122\157 \157\164\040\103\101\061\052\060\050\006\003\125\004\003\014\041 \124\127\103\101\040\122\157\157\164\040\103\145\162\164\151\146 \151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164  $\label{eq:condition} $$ \frac{171 \cdot 060 \cdot 202 \cdot 001 \cdot 042 \cdot 060 \cdot 015 \cdot 006 \cdot 011 \cdot 052 \cdot 206 \cdot 110 \cdot 206 \cdot 367 \cdot 015 \cdot 001}{170 \cdot 001 \cdot 001 \cdot 001} $$$ \001\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001 \001\000\260\176\162\270\244\003\224\346\247\336\011\070\221\112  $\label{eq:condition} $$ \021\100\207\247\174\131\144\024\173\265\021\020\335\376\277\325 $$$ \300\273\126\342\205\045\364\065\162\017\370\123\320\101\341\104  $\label{eq:condition} $$ \001\302\264\034\303\061\102\026\107\205\063\042\166\262\012\157$$$  $\label{eq:condition} $$ \0.017\3.45\0.45\1.20\1.17\2.05\2.06\2.76\2.77\2.30\0.56\0.20\1.47\0.36\2.76\0.21$ \005\206\005\220\304\131\320\174\170\020\260\200\134\267\341\307  $\label{eq:condition} $$ \053\165\313\174\237\256\265\321\235\043\067\143\247\334\102\242$ \055\222\004\033\120\301\173\270\076\033\311\126\004\213\057\122 \233\255\251\126\351\301\377\255\251\130\207\060\266\201\367\227  $\label{eq:condition} $$ 105\374\031\127\073\053\157\344\107\364\231\105\376\035\361\370 $$$ \227\243\210\035\067\034\134\217\340\166\045\232\120\370\240\124 \377\104\220\166\043\322\062\306\303\253\006\277\374\373\277\363  $\verb|255|175|222|142|002|133|051|323|065|243|223|232|103|144|140|135|$ \262\372\062\377\073\004\257\115\100\152\371\307\343\357\043\375 \153\313\345\017\213\070\015\356\012\374\376\017\230\237\060\061 \335\154\122\145\371\213\201\276\042\341\034\130\003\272\221\033 \211\007\002\003\001\000\001\243\102\060\100\060\016\006\003\125  $\label{eq:condition} $$ \035\017\001\001\377\004\004\003\002\001\006\060\017\006\003\125$ \035\023\001\001\377\004\005\060\003\001\001\377\060\035\006\003 \125\035\016\004\026\004\024\152\070\133\046\215\336\213\132\362 \206\110\206\367\015\001\001\005\005\000\003\202\001\001\000\074 \325\167\075\332\337\211\272\207\014\010\124\152\040\120\222\276 \260\101\075\271\046\144\203\012\057\350\100\300\227\050\047\202 \060\112\311\223\377\152\347\246\000\177\211\102\232\326\021\345 \123\316\057\314\362\332\005\304\376\342\120\304\072\206\175\314 \332\176\020\011\073\222\065\052\123\262\376\353\053\005\331\154 \135\346\320\357\323\152\146\236\025\050\205\172\350\202\000\254  $\label{eq:condition} $$ \036\247\011\151\126\102\323\150\121\030\276\124\232\277\104\101$ \272\111\276\040\272\151\134\356\270\167\315\316\154\037\255\203 \226\030\175\016\265\024\071\204\361\050\351\055\243\236\173\036 \172\162\132\203\263\171\157\357\264\374\320\012\245\130\117\106 \337\373\155\171\131\362\204\042\122\256\017\314\373\174\073\347 \152\312\107\141\303\172\370\323\222\004\037\270\040\204\341\066 \124\026\307\100\336\073\212\163\334\337\306\011\114\337\354\332 \377\324\123\102\241\311\362\142\035\042\203\074\227\305\371\031 \142\047\254\145\042\327\323\074\306\345\216\262\123\314\111\316 \274\060\376\173\016\063\220\373\355\322\024\221\037\007\257

```
END
```

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "TWCA Root Certification Authority"

# Issuer: CN=TWCA Root Certification Authority,OU=Root CA,O=TAIWAN-CA,C=TW

# Serial Number: 1 (0x1)

# Subject: CN=TWCA Root Certification Authority, OU=Root CA,O=TAIWAN-CA,C=TW

# Not Valid Before: Thu Aug 28 07:24:33 2008

# Not Valid After: Tue Dec 31 15:59:59 2030

# Fingerprint (SHA-256):

BF:D8:8F:E1:10:1C:41:AE:3E:80:1B:F8:BE:56:35:0E:E9:BA:D1:A6:B9:BD:51:5E:DC:5C:6D:5B:87:11:AC:44

# Fingerprint (SHA1): CF:9E:87:6D:D3:EB:FC:42:26:97:A3:B5:A3:7A:A0:76:A9:06:23:48

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "TWCA Root Certification Authority"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \frac{317}{236}\frac{207}{155}\frac{323}{353}\frac{374}{102}\frac{66}{227}\frac{243}{265}\frac{243}{172}\frac{166}{240} $$$ 

\251\006\043\110

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\252\010\217\366\371\173\267\362\261\247\036\233\352\352\275\171

**END** 

CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \060\137\061\013\060\011\006\003\125\004\006\023\002\124\127\061 $$$ 

\022\060\020\006\003\125\004\012\014\011\124\101\111\127\101\116

\055\103\101\061\020\060\016\006\003\125\004\013\014\007\122\157

 $\label{eq:condition} $$ \frac{157}{164}040\\103\\101\\061\\052\\060\\050\\0050\\000\\003\\125\\0004\\003\\0114\\041$ 

 $\label{eq:condition} $$ \frac{151}{143}\frac{141}{164}\frac{151}{157}\frac{040}{101}\frac{165}{164}\frac{150}{157}\frac{162}{151}\frac{164}{164} $$$ 

\171

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\001\001

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

 ${\tt CKA\_TRUST\_EMAIL\_PROTECTION\ CK\_TRUST\ CKT\_NSS\_TRUSTED\_DELEGATOR}$ 

CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

 ${\tt CKA\_TRUST\_STEP\_UP\_APPROVED\ CK\_BBOOL\ CK\_FALSE}$ 

#

# Certificate "Explicitly Distrust DigiNotar Root CA"

#

# Issuer: E=info@diginotar.nl,CN=DigiNotar Root CA,O=DigiNotar,C=NL

# Serial Number:0f:ff:ff:ff:ff:ff:ff:ff:ff:ff:ff:ff:ff

- # Subject: E=info@diginotar.nl,CN=DigiNotar Root CA,O=DigiNotar,C=NL
- # Not Valid Before: Fri Jul 27 17:19:37 2007
- # Not Valid After: Mon Mar 31 18:19:22 2025
- # Fingerprint (MD5): 0A:A4:D5:CC:BA:B4:FB:A3:59:E3:E6:01:DD:53:D9:4E
- # Fingerprint (SHA1): C1:77:CB:4B:E0:B4:26:8E:F5:C7:CF:45:99:22:B9:B0:CE:BA:21:2F

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA LABEL UTF8 "Explicitly Distrust DigiNotar Root CA"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000137061\013\060\011\006\003\125\004\006\023\002\116\114\061\114\061\022\060\003\125\004\001\1104\151\116\157\164\141\162\060\003\125\0004\003\023\021\104\151\147\151\116\157\164\141\162\040\122\157\157\164\040\103\101\061\040\060\036\006\011\052\206\110\206\367\015\001\011\001\026\021\151\156\146\157\100\144\151\147\151\156\157\164\141\162\056\156\154$ 

**END** 

CKA ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000137061\013\060\011\006\003\125\004\006\023\002\116\114\061\022\060\020\006\003\125\004\012\110\151\116\157\164\141\162\060\030\006\003\125\0004\003\023\021\104\151\147\151\116\157\164\141\162\040\122\157\157\164\040\103\101\061\040\060\036\006\011\052\206\110\206\367\015\001\011\001\026\021\151\156\146\157\100\144\151\147\151\156\157\164\141\162\056\156\154$ 

**END** 

## CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\141\162\061\032\060\030\006\003\125\004\003\023\021\104\151\147 \151\116\157\164\141\162\040\122\157\157\164\040\103\101\061\040 \060\036\006\011\052\206\110\206\367\015\001\011\001\026\021\151 \156\146\157\100\144\151\147\151\156\157\164\141\162\056\156\154 \060\202\002\042\060\015\006\011\052\206\110\206\367\015\001\001  $\label{eq:condition} $$ \001\005\000\003\202\002\017\000\060\202\002\012\002\202\002\01$ \000\254\260\130\301\000\275\330\041\010\013\053\232\376\156\126 \060\005\237\033\167\220\020\101\134\303\015\207\021\167\216\201 \361\312\174\351\214\152\355\070\164\065\273\332\337\371\273\300 \011\067\264\226\163\201\175\063\032\230\071\367\223\157\225\177 \075\271\261\165\207\272\121\110\350\213\160\076\225\004\305\330 \266\303\026\331\210\260\261\207\035\160\332\206\264\017\024\213 \172\317\020\321\164\066\242\022\173\167\206\112\171\346\173\337  $\label{eq:condition} $$ \002\021\150\245\116\206\256\064\130\233\044\023\170\126\042\045$  $\label{eq:condition} $$ \036\001\213\113\121\161\373\202\314\131\226\151\210\132\150\123$ \305\271\015\002\067\313\113\274\146\112\220\176\052\013\005\007 \355\026\137\125\220\165\330\106\311\033\203\342\010\276\361\043 \314\231\035\326\052\017\203\040\025\130\047\202\056\372\342\042 \302\111\261\271\001\201\152\235\155\235\100\167\150\166\116\041  $\label{eq:condition} $$ \052\155\204\100\205\116\166\231\174\202\363\363\267\002\131\324$$ \046\001\033\216\337\255\123\006\321\256\030\335\342\262\072\313 \327\210\070\216\254\133\051\271\031\323\230\371\030\003\317\110  $\label{eq:condition} $$ \202\206\146\013\033\151\017\311\353\070\210\172\046\032\005\114 $$$ \222\327\044\324\226\362\254\122\055\243\107\325\122\366\077\376  $\label{eq:condition} $$ 316 \ 204 \ 006 \ 160 \ 246 \ 252 \ 076 \ 242 \ 362 \ 266 \ 126 \ 064 \ 030 \ 127 \ 242 \ 344 $$$ \201\155\347\312\360\152\323\307\221\153\002\203\101\174\025\357 \153\232\144\136\343\320\074\345\261\353\173\135\206\373\313\346  $\label{eq:condition} $$ \frac{167}{111}\frac{315}{243}\frac{34}{367}\frac{271}{234}\frac{270}{344}\frac{3137}{223}\frac{317}{314} $$$ \060\032\062\034\316\034\143\225\245\371\352\341\164\213\236\351 \053\251\060\173\240\030\037\016\030\013\345\133\251\323\321\154  $\label{eq:condition} $$ \036\007\147\217\221\113\251\212\274\322\146\252\223\001\210\262$ \221\372\061\134\325\246\301\122\010\011\315\012\143\242\323\042 \246\350\241\331\071\006\227\365\156\215\002\220\214\024\173\077 \200\315\033\234\272\304\130\162\043\257\266\126\237\306\172\102 \063\051\007\077\202\311\346\037\005\015\315\114\050\066\213\323 \310\076\034\306\210\357\136\356\211\144\351\035\353\332\211\176 \062\246\151\321\335\314\210\237\321\320\311\146\041\334\006\147  $\label{eq:condition} $$ 305 \ 224 \ 172 \ 232 \ 155 \ 142 \ 114 \ 175 \ 314 \ 340 \ 144 \ 200 \ 262 \ 236 \ 107 \ 216$ \243\002\003\001\000\001\243\102\060\100\060\017\006\003\125\035  $\label{eq:condition} $$ \023\001\001\377\004\005\060\003\001\001\377\060\016\006\003\125$$ \035\017\001\001\377\004\004\003\002\001\006\060\035\006\003\125 \035\016\004\026\004\024\210\150\277\340\216\065\304\073\070\153 \142\367\050\073\204\201\310\014\327\115\060\015\006\011\052\206 \110\206\367\015\001\001\005\005\000\003\202\002\001\000\073\002 \215\313\074\060\350\156\240\255\362\163\263\137\236\045\023\004 \005\323\366\343\213\273\013\171\316\123\336\344\226\305\321\257 \163\274\325\303\320\100\125\174\100\177\315\033\137\011\325\362 \174\237\150\035\273\135\316\172\071\302\214\326\230\173\305\203

\125\250\325\175\100\312\340\036\367\211\136\143\135\241\023\302 \135\212\266\212\174\000\363\043\303\355\205\137\161\166\360\150 \143\252\105\041\071\110\141\170\066\334\361\103\223\324\045\307 \362\200\145\341\123\002\165\121\374\172\072\357\067\253\204\050 \127\014\330\324\324\231\126\154\343\242\376\131\204\264\061\350  $\label{eq:condition} $$ \063\370\144\224\224\121\227\253\071\305\113\355\332\335\200\013$ \157\174\051\015\304\216\212\162\015\347\123\024\262\140\101\075 \204\221\061\150\075\047\104\333\345\336\364\372\143\105\310\114  $\label{eq:condition} $$ \076\230\365\077\101\272\116\313\067\015\272\146\230\361\335\313$ \237\134\367\124\066\202\153\054\274\023\141\227\102\370\170\273 \314\310\242\237\312\360\150\275\153\035\262\337\215\157\007\235  $\label{eq:condition} $$ \32\216\147\307\107\036\312\271\277\052\102\221\267\143\123\146$$ \361\102\243\341\364\132\115\130\153\265\344\244\063\255\134\160 \035\334\340\362\353\163\024\221\232\003\301\352\000\145\274\007  $\label{eq:condition} $$ \frac{374}{317}022\\021\\042\\054\\256\\240\\275\\072\\340\\242\\052\\330\\131\\351$ \051\323\030\065\244\254\021\137\031\265\265\033\377\042\112\134 \306\172\344\027\357\040\251\247\364\077\255\212\247\232\004\045 \235\016\312\067\346\120\375\214\102\051\004\232\354\271\317\113 \162\275\342\010\066\257\043\057\142\345\312\001\323\160\333\174 \202\043\054\026\061\014\306\066\007\220\172\261\037\147\130\304 \073\130\131\211\260\214\214\120\263\330\206\313\150\243\304\012 \347\151\113\040\316\301\036\126\113\225\251\043\150\330\060\330  $\label{eq:condition} $$ 303\353\260\125\121\315\345\375\053\270\365\273\021\237\123\124 $$$ \366\064\031\214\171\011\066\312\141\027\045\027\013\202\230\163  $\label{eq:condition} $$ \014\167\164\303\325\015\307\250\022\114\307\247\124\161\107\056$$ \054\032\175\311\343\053\073\110\336\047\204\247\143\066\263\175 \217\240\144\071\044\015\075\173\207\257\146\134\164\033\113\163 \262\345\214\360\206\231\270\345\305\337\204\301\267\353 **END** 

```
# Trust for Certificate "Explicitly Distrust DigiNotar Root CA"
```

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Explicitly Distrust DigiNotar Root CA"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\301\167\313\113\340\264\046\216\365\307\317\105\231\042\271\260

\316\272\041\057

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

<sup>#</sup> Issuer: E=info@diginotar.nl,CN=DigiNotar Root CA,O=DigiNotar,C=NL

<sup>#</sup> Serial Number:0f:ff:ff:ff:ff:ff:ff:ff:ff:ff:ff:ff:ff

<sup>#</sup> Subject: E=info@diginotar.nl,CN=DigiNotar Root CA,O=DigiNotar,C=NL

<sup>#</sup> Not Valid Before: Fri Jul 27 17:19:37 2007

<sup>#</sup> Not Valid After: Mon Mar 31 18:19:22 2025

<sup>#</sup> Fingerprint (MD5): 0A:A4:D5:CC:BA:B4:FB:A3:59:E3:E6:01:DD:53:D9:4E

<sup>#</sup> Fingerprint (SHA1): C1:77:CB:4B:E0:B4:26:8E:F5:C7:CF:45:99:22:B9:B0:CE:BA:21:2F

```
\012\244\325\314\272\264\373\243\131\343\346\001\335\123\331\116
END
CKA ISSUER MULTILINE OCTAL
\060\137\061\013\060\011\006\003\125\004\006\023\002\116\114\061
\022\060\020\006\003\125\004\012\023\011\104\151\147\151\116\157
\164\141\162\061\032\060\030\006\003\125\004\003\023\021\104\151
\147\151\116\157\164\141\162\040\122\157\157\164\040\103\101\061
\040\060\036\006\011\052\206\110\206\367\015\001\011\001\026\021
\151\156\146\157\100\144\151\147\151\156\157\164\141\162\056\156
\154
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\377\377
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS NOT TRUSTED
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_NOT_TRUSTED
CKA TRUST CODE SIGNING CK TRUST CKT NSS NOT TRUSTED
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
#
# Certificate "Security Communication RootCA2"
# Issuer: OU=Security Communication RootCA2,O="SECOM Trust Systems CO.,LTD.",C=JP
# Serial Number: 0 (0x0)
# Subject: OU=Security Communication RootCA2,O="SECOM Trust Systems CO.,LTD.",C=JP
# Not Valid Before: Fri May 29 05:00:39 2009
# Not Valid After: Tue May 29 05:00:39 2029
# Fingerprint (SHA-256):
51:3B:2C:EC:B8:10:D4:CD:E5:DD:85:39:1A:DF:C6:C2:DD:60:D8:7B:B7:36:D2:B5:21:48:4A:A4:7A:0E:BE:F6
# Fingerprint (SHA1): 5F:3B:8C:F2:F8:10:B3:7D:78:B4:CE:EC:19:19:C3:73:34:B9:C7:74
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "Security Communication RootCA2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\label{eq:condition} $$ \060\135\061\013\060\011\006\003\125\004\006\023\002\112\120\061
\\ \\045\\ \\060\\ \\043\\ \\006\\ \\003\\ \\125\\ \\004\\ \\012\\ \\023\\ \\034\\ \\123\\ \\105\\ \\103\\ \\117\\ \\115\\ \\040
\124\162\165\163\164\040\123\171\163\164\145\155\163\040\103\117
\056\054\114\124\104\056\061\047\060\045\006\003\125\004\013\023
\036\123\145\143\165\162\151\164\171\040\103\157\155\155\165\156
\151\143\141\164\151\157\156\040\122\157\157\164\103\101\062
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
```

\060\135\061\013\060\011\006\003\125\004\006\023\002\112\120\061

\045\060\043\006\003\125\004\012\023\034\123\105\103\117\115\040 \124\162\165\163\164\040\123\171\163\164\145\155\163\040\103\117 \056\054\114\124\104\056\061\047\060\045\006\003\125\004\013\023 \036\123\145\143\165\162\151\164\171\040\103\157\155\155\165\156 \151\143\141\164\151\157\156\040\122\157\157\164\103\101\062 END

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL \002\001\000

**END** 

### CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \060\202\003\167\060\202\002\137\240\003\002\001\0002\0001\000$  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\013\005\000\060$$$ \135\061\013\060\011\006\003\125\004\006\023\002\112\120\061\045 \054\114\124\104\056\061\047\060\045\006\003\125\004\013\023\036 \143\141\164\151\157\156\040\122\157\157\164\103\101\062\060\036 \027\015\060\071\060\065\062\071\060\065\060\060\060\063\071\132\027 \015\062\071\060\065\062\071\060\065\060\060\063\071\132\060\135 \061\013\060\011\006\003\125\004\006\023\002\112\120\061\045\060 \043\006\003\125\004\012\023\034\123\105\103\117\115\040\124\162 \114\124\104\056\061\047\060\045\006\003\125\004\013\023\036\123 \145\143\165\162\151\164\171\040\103\157\155\155\165\156\151\143 \141\164\151\157\156\040\122\157\157\164\103\101\062\060\202\001 \042\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000  $\label{eq:condition} $$ \003\202\001\017\000\060\202\001\012\002\202\001\001\000\320\025 $$$ \071\122\261\122\263\272\305\131\202\304\135\122\256\072\103\145 \200\113\307\362\226\274\333\066\227\326\246\144\214\250\136\360  $\label{eq:condition} $$ 343 \cdot 012 \cdot 034 \cdot 367 \cdot 337 \cdot 227 \cdot 075 \cdot 113 \cdot 256 \cdot 366 \cdot 135 \cdot 354 \cdot 041 \cdot 265 \cdot 101 \cdot 253 \cdot 101 \cdot 101$ \315\271\176\166\237\276\371\076\066\064\240\073\301\366\061\021 \105\164\223\075\127\200\305\371\211\231\312\345\253\152\324\265 \332\101\220\020\301\326\326\102\211\302\277\364\070\022\225\114 \124\005\367\066\344\105\203\173\024\145\326\334\014\115\321\336 \176\014\253\073\304\025\276\072\126\246\132\157\166\151\122\251 \172\271\310\353\152\232\135\122\320\055\012\153\065\026\011\020  $\label{eq:condition} $$ \204\320\152\312\072\006\000\067\107\344\176\127\117\077\213\353$  $\label{eq:condition} $$ 147\270\210\252\305\276\123\125\262\221\304\175\271\260\205\031 $$$  $\label{eq:condition} $$ \006\170\056\333\141\032\372\205\365\112\221\241\347\026\325\216 $$$ \242\071\337\224\270\160\037\050\077\213\374\100\136\143\203\074 \203\052\032\231\153\317\336\131\152\073\374\157\026\327\037\375 \112\020\353\116\202\026\072\254\047\014\123\361\255\325\044\260 \153\003\120\301\055\074\026\335\104\064\047\032\165\373\002\003 \001\000\001\243\102\060\100\060\035\006\003\125\035\016\004\026 \004\024\012\205\251\167\145\005\230\174\100\201\370\017\227\054 \070\361\012\354\074\317\060\016\006\003\125\035\017\001\001\377 \004\004\003\002\001\006\060\017\006\003\125\035\023\001\001\377

\004\005\060\003\001\001\377\060\015\006\011\052\206\110\206\367 \015\001\001\001\013\005\000\003\202\001\001\000\114\072\243\104\254  $\label{eq:condition} $$ \271\105\261\307\223\176\310\013\012\102\337\144\352\034\356\131 $$$ \154\010\272\211\137\152\312\112\225\236\172\217\007\305\332\105 \162\202\161\016\072\322\314\157\247\264\241\043\273\366\044\237 \313\027\376\214\246\316\302\322\333\314\215\374\161\374\003\051 \301\154\135\063\137\144\266\145\073\211\157\030\166\170\365\334 \242\110\037\031\077\216\223\353\361\372\027\356\315\116\343\004 \022\125\326\345\344\335\373\076\005\174\342\035\136\306\247\274 \227\117\150\072\365\351\056\012\103\266\257\127\134\142\150\174 \267\375\243\212\204\240\254\142\276\053\011\207\064\360\152\001  $\label{eq:condition} $$ \273\233\051\126\074\376\000\067\317\043\154\361\116\252\266\164$$ \106\022\154\221\356\064\325\354\232\221\347\104\276\220\061\162 \325\111\002\366\002\345\364\037\353\174\331\226\125\251\377\354  $\label{eq:condition} $$ \212\371\231\107\377\065\132\002\252\004\313\212\133\207\161\051 $$$ \221\275\244\264\172\015\275\232\365\127\043\000\007\041\027\077  $\label{eq:condition} $$ \frac{112\071\321\005\111\013\247\266\067\201\245\135\214\252\063\136}{247\266\067\201\245\135\214\252\063\136}$ \201\050\174\247\175\047\353\000\256\215\067

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Security Communication RootCA2"
- # Issuer: OU=Security Communication RootCA2,O="SECOM Trust Systems CO.,LTD.",C=JP
- # Serial Number: 0 (0x0)
- # Subject: OU=Security Communication RootCA2,O="SECOM Trust Systems CO.,LTD.",C=JP
- # Not Valid Before: Fri May 29 05:00:39 2009
- # Not Valid After: Tue May 29 05:00:39 2029
- # Fingerprint (SHA-256):
- 51:3B:2C:EC:B8:10:D4:CD:E5:DD:85:39:1A:DF:C6:C2:DD:60:D8:7B:B7:36:D2:B5:21:48:4A:A4:7A:0E:BE:F6
- # Fingerprint (SHA1): 5F:3B:8C:F2:F8:10:B3:7D:78:B4:CE:EC:19:19:C3:73:34:B9:C7:74
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA\_LABEL UTF8 "Security Communication RootCA2"
- CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL
- \137\073\214\362\370\020\263\175\170\264\316\354\031\031\303\163 \064\271\307\164

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{thm:local_local$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\135\061\013\060\011\006\003\125\004\006\023\002\112\120\061 \045\060\043\006\003\125\004\012\023\034\123\105\103\117\115\040 \124\162\165\163\164\040\123\171\163\164\145\155\163\040\103\117

```
\056\054\114\124\104\056\061\047\060\045\006\003\125\004\013\023
\036\123\145\143\165\162\151\164\171\040\103\157\155\155\165\156
\151\143\141\164\151\157\156\040\122\157\157\164\103\101\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\000
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "EC-ACC"
# Issuer: CN=EC-ACC,OU=Jerarquia Entitats de Certificacio Catalanes,OU=Vegeu https://www.catcert.net/verarrel
(c)03,OU=Serveis Publics de Certificacio,O=Agencia Catalana de Certificacio (NIF Q-0801176-I),C=ES
# Serial Number:ee:2b:3d:eb:d4:21:de:14:a8:62:ac:04:f3:dd:c4:01
# Subject: CN=EC-ACC,OU=Jerarquia Entitats de Certificacio Catalanes,OU=Vegeu
https://www.catcert.net/verarrel (c)03,OU=Serveis Publics de Certificacio,O=Agencia Catalana de Certificacio (NIF
Q-0801176-I),C=ES
# Not Valid Before: Tue Jan 07 23:00:00 2003
# Not Valid After: Tue Jan 07 22:59:59 2031
# Fingerprint (SHA-256):
88:49:7F:01:60:2F:31:54:24:6A:E2:8C:4D:5A:EF:10:F1:D8:7E:BB:76:62:6F:4A:E0:B7:F9:5B:A7:96:87:99
# Fingerprint (SHA1): 28:90:3A:63:5B:52:80:FA:E6:77:4C:0B:6D:A7:D6:BA:A6:4A:F2:E8
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "EC-ACC"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\201\363\061\013\060\011\006\003\125\004\006\023\002\105\123
\151\141\040\103\141\164\141\154\141\156\141\040\144\145\040\103
 \\ 145 \\ 162 \\ 164 \\ 151 \\ 146 \\ 151 \\ 143 \\ 141 \\ 143 \\ 151 \\ 157 \\ 040 \\ 050 \\ 116 \\ 111 \\ 106 
\040\121\055\060\070\060\061\061\067\066\055\111\051\061\050\060
\\ \\ 046\\ \\ 006\\ \\ 003\\ \\ 125\\ \\ 004\\ \\ 013\\ \\ 023\\ \\ 037\\ \\ 123\\ \\ 145\\ \\ 162\\ \\ 166\\ \\ 145\\ \\ 151\\ \\ 163\\ \\ 040
\120\165\142\154\151\143\163\040\144\145\040\103\145\162\164\151
\146\151\143\141\143\151\157\061\065\060\063\006\003\125\004\013
\label{eq:condition} $$ \023\054\126\145\147\145\165\040\150\164\164\160\163\072\057\057
\167\167\167\056\143\141\164\143\145\162\164\056\156\145\164\057
\166\145\162\141\162\162\145\154\040\050\143\051\060\063\061\065
\060\063\006\003\125\004\013\023\054\112\145\162\141\162\161\165
\151\141\040\105\156\164\151\164\141\164\163\040\144\145\040\103
\145\162\164\151\146\151\143\141\143\151\157\040\103\141\164\141
```

\154\141\156\145\163\061\017\060\015\006\003\125\004\003\023\006

\105\103\055\101\103\103

**END** 

CKA ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

\060\201\363\061\013\060\011\006\003\125\004\006\023\002\105\123 \061\073\060\071\006\003\125\004\012\023\062\101\147\145\156\143 \151\141\040\103\141\164\141\154\141\156\141\040\144\145\040\103 \145\162\164\151\146\151\143\141\143\151\157\040\050\116\111\106 \040\121\055\060\070\060\061\061\067\066\055\111\051\061\050\060 \046\006\003\125\004\013\023\037\123\145\162\166\145\151\163\040 \120\165\142\154\151\143\163\040\144\145\040\103\145\162\164\151 \146\151\143\141\143\151\157\061\065\060\063\006\003\125\004\013 \023\054\126\145\147\145\165\040\150\164\164\160\163\072\057\057  $\label{eq:condition} $$ \frac{167}{167}\frac{056}{143}\frac{141}{164}\frac{143}{145}\frac{162}{164}\frac{056}{156}\frac{145}{164}\frac{057}{164} $$$ \166\145\162\141\162\162\145\154\040\050\143\051\060\063\061\065 \060\063\006\003\125\004\013\023\054\112\145\162\141\162\161\165 \151\141\040\105\156\164\151\164\141\164\163\040\144\145\040\103 \145\162\164\151\146\151\143\141\143\151\157\040\103\141\164\141 \154\141\156\145\163\061\017\060\015\006\003\125\004\003\023\006 \105\103\055\101\103\103

**END** 

### CKA SERIAL NUMBER MULTILINE OCTAL

\002\020\356\053\075\353\324\041\336\024\250\142\254\004\363\335 \304\001

**END** 

## CKA VALUE MULTILINE OCTAL

\060\202\005\126\060\202\004\076\240\003\002\001\002\002\020\356 \053\075\353\324\041\336\024\250\142\254\004\363\335\304\001\060 \015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\201 \363\061\013\060\011\006\003\125\004\006\023\002\105\123\061\073  $\label{eq:condition} $$ \000\071\006\003\125\004\012\023\062\101\147\145\156\143\151\141 $$$ \040\103\141\164\141\154\141\156\141\040\144\145\040\103\145\162 \164\151\146\151\143\141\143\151\157\040\050\116\111\106\040\121 \055\060\070\060\061\061\067\066\055\111\051\061\050\060\046\006 \003\125\004\013\023\037\123\145\162\166\145\151\163\040\120\165 \142\154\151\143\163\040\144\145\040\103\145\162\164\151\146\151 \143\141\143\151\157\061\065\060\063\006\003\125\004\013\023\054 \126\145\147\145\165\040\150\164\164\160\163\072\057\057\167\167  $\label{eq:condition} $$ 167\056\143\141\164\143\145\162\164\056\156\145\164\057\166\145$$ \162\141\162\162\145\154\040\050\143\051\060\063\061\065\060\063 \006\003\125\004\013\023\054\112\145\162\141\162\161\165\151\141 \040\105\156\164\151\164\141\164\163\040\144\145\040\103\145\162 \164\151\146\151\143\141\143\151\157\040\103\141\164\141\154\141 \156\145\163\061\017\060\015\006\003\125\004\003\023\006\105\103 \055\101\103\103\060\036\027\015\060\063\060\061\060\067\062\063 \060\060\060\060\132\027\015\063\061\060\061\060\067\062\062\065 \071\065\071\132\060\201\363\061\013\060\011\006\003\125\004\006 \023\002\105\123\061\073\060\071\006\003\125\004\012\023\062\101

\147\145\156\143\151\141\040\103\141\164\141\154\141\156\141\040 \144\145\040\103\145\162\164\151\146\151\143\141\143\151\157\040 \050\116\111\106\040\121\055\060\070\060\061\061\067\066\055\111 \051\061\050\060\046\006\003\125\004\013\023\037\123\145\162\166 \145\151\163\040\120\165\142\154\151\143\163\040\144\145\040\103 \145\162\164\151\146\151\143\141\143\151\157\061\065\060\063\006 \003\125\004\013\023\054\126\145\147\145\165\040\150\164\164\160 \163\072\057\057\167\167\167\056\143\141\164\143\145\162\164\056 \156\145\164\057\166\145\162\141\162\162\145\154\040\050\143\051 \060\063\061\065\060\063\006\003\125\004\013\023\054\112\145\162 \141\162\161\165\151\141\040\105\156\164\151\164\141\164\163\040  $\\ 144\\145\\040\\103\\145\\162\\164\\151\\146\\151\\143\\141\\143\\151\\157\\040$ \103\141\164\141\154\141\156\145\163\061\017\060\015\006\003\125 \004\003\023\006\105\103\055\101\103\103\060\202\001\042\060\015  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001 $$$ \017\000\060\202\001\012\002\202\001\001\000\263\042\307\117\342 \227\102\225\210\107\203\100\366\035\027\363\203\163\044\036\121 \363\230\212\303\222\270\377\100\220\005\160\207\140\311\000\251 \265\224\145\031\042\025\027\302\103\154\146\104\232\015\004\076  $\label{eq:condition} $$ \071\157\245\113\172\252\143\267\212\104\235\331\143\221\204\146 $$$ \340\050\017\272\102\343\156\216\367\024\047\223\151\356\221\016 \243\137\016\261\353\146\242\162\117\022\023\206\145\172\076\333  $\label{eq:condition} $$ \frac{117}007\\364\\247\\011\\140\\332\\072\\102\\231\\307\\262\\177\\263\\026\\225$ \034\307\371\064\265\224\205\325\231\136\240\110\240\176\347\027 \145\270\242\165\270\036\363\345\102\175\257\355\363\212\110\144 \135\202\024\223\330\300\344\377\263\120\162\362\166\366\263\135 \102\120\171\320\224\076\153\014\000\276\330\153\016\116\052\354  $\label{eq:condition} $$ \076\322\314\202\242\030\145\063\023\167\236\232\135\032\023\330 $$$ \303\333\075\310\227\172\356\160\355\247\346\174\333\161\317\055 \224\142\337\155\326\365\070\276\077\245\205\012\031\270\250\330  $\label{eq:condition} $$ \011\165\102\160\304\352\357\313\016\310\064\250\022\042\230\014 $$$ \270\023\224\266\113\354\360\320\220\347\047\002\003\001\000\001 \243\201\343\060\201\340\060\035\006\003\125\035\021\004\026\060 \024\201\022\145\143\137\141\143\143\100\143\141\164\143\145\162 \164\056\156\145\164\060\017\006\003\125\035\023\001\001\377\004 \005\060\003\001\001\377\060\016\006\003\125\035\017\001\001\377 \004\004\003\002\001\006\060\035\006\003\125\035\016\004\026\004 \024\240\303\213\104\252\067\245\105\277\227\200\132\321\361\170 \242\233\351\135\215\060\177\006\003\125\035\040\004\170\060\166  $\label{eq:condition} $$ \0.060\164\0.06\0.01\0.053\0.06\0.01\0.04\0.01\3.65\1.70\0.01\0.03\0.01\0.12\0.060$ \145\060\054\006\010\053\006\001\005\005\007\002\001\026\040\150 \164\164\160\163\072\057\057\167\167\167\056\143\141\164\143\145 \162\164\056\156\145\164\057\166\145\162\141\162\162\145\154\060 \065\006\010\053\006\001\005\005\007\002\002\060\051\032\047\126 \145\147\145\165\040\150\164\164\160\163\072\057\057\167\167\167 \056\143\141\164\143\145\162\164\056\156\145\164\057\166\145\162 \141\162\162\145\154\040\060\015\006\011\052\206\110\206\367\015 \001\001\005\005\000\003\202\001\001\000\240\110\133\202\001\366

\115\110\270\071\125\065\234\200\172\123\231\325\132\377\261\161 \073\314\071\011\224\136\326\332\357\276\001\133\135\323\036\330 \375\175\117\315\240\101\340\064\223\277\313\342\206\234\067\222 \220\126\034\334\353\051\005\345\304\236\307\065\337\212\014\315 \305\041\103\351\252\210\345\065\300\031\102\143\132\002\136\244 \110\030\072\205\157\334\235\274\077\235\234\301\207\270\172\141 \010\351\167\013\177\160\253\172\335\331\227\054\144\036\205\277 \274\164\226\241\303\172\022\354\014\032\156\203\014\074\350\162 \106\237\373\110\325\136\227\346\261\241\370\344\357\106\045\224 \234\211\333\151\070\276\354\134\016\126\307\145\121\345\120\210 \210\277\102\325\053\075\345\371\272\236\056\263\312\364\163\222  $\label{eq:condition} $$ \002\013\276\114\146\353\040\376\271\313\265\231\177\346\266\023 $$$ \372\312\113\115\331\356\123\106\006\073\306\116\255\223\132\201 \234\235\245\140\225\072\122\177\365\321\253\010\156\363\356\133 \371\210\075\176\270\157\156\003\344\102

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE

# For Server Distrust After: Sat Dec 28 00:00:00 2019

CKA\_NSS\_SERVER\_DISTRUST\_AFTER MULTILINE\_OCTAL

\061\071\061\062\062\070\060\060\060\060\060\060\132

**END** 

# For Email Distrust After: Wed Aug 31 00:00:00 2022

 $CKA\_NSS\_EMAIL\_DISTRUST\_AFTER\ MULTILINE\_OCTAL$ 

\062\062\060\070\063\061\060\060\060\060\060\060\132

**END** 

# Trust for "EC-ACC"

# Issuer: CN=EC-ACC,OU=Jerarquia Entitats de Certificacio Catalanes,OU=Vegeu https://www.catcert.net/verarrel (c)03,OU=Serveis Publics de Certificacio,O=Agencia Catalana de Certificacio (NIF Q-0801176-I),C=ES

# Serial Number:ee:2b:3d:eb:d4:21:de:14:a8:62:ac:04:f3:dd:c4:01

# Subject: CN=EC-ACC,OU=Jerarquia Entitats de Certificacio Catalanes,OU=Vegeu

https://www.catcert.net/verarrel (c)03,OU=Serveis Publics de Certificacio,O=Agencia Catalana de Certificacio (NIF Q-0801176-I),C=ES

# Not Valid Before: Tue Jan 07 23:00:00 2003

# Not Valid After: Tue Jan 07 22:59:59 2031

# Fingerprint (SHA-256):

88:49:7F:01:60:2F:31:54:24:6A:E2:8C:4D:5A:EF:10:F1:D8:7E:BB:76:62:6F:4A:E0:B7:F9:5B:A7:96:87:99

# Fingerprint (SHA1): 28:90:3A:63:5B:52:80:FA:E6:77:4C:0B:6D:A7:D6:BA:A6:4A:F2:E8

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "EC-ACC"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \050\220\072\143\133\122\200\372\346\167\114\013\155\247\326\272$ 

\246\112\362\350

**END** 

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\353\365\235\051\015\141\371\102\037\174\302\272\155\343\025\011
END
CKA ISSUER MULTILINE OCTAL
\060\201\363\061\013\060\011\006\003\125\004\006\023\002\105\123
\\ \backslash 061 \backslash 073 \backslash 060 \backslash 071 \backslash 006 \backslash 003 \backslash 125 \backslash 004 \backslash 012 \backslash 023 \backslash 062 \backslash 101 \backslash 147 \backslash 145 \backslash 156 \backslash 143
\151\141\040\103\141\164\141\154\141\156\141\040\144\145\040\103
 \\ 145 \\ 162 \\ 164 \\ 151 \\ 146 \\ 151 \\ 143 \\ 141 \\ 143 \\ 151 \\ 157 \\ 040 \\ 050 \\ 116 \\ 111 \\ 106 
\040\121\055\060\070\060\061\061\067\066\055\111\051\061\050\060
\046\006\003\125\004\013\023\037\123\145\162\166\145\151\163\040
\label{eq:condition} $$ \frac{120}{165}\frac{142}{154}\frac{151}{143}\frac{163}{040}\frac{144}{145}\frac{103}{103}\frac{145}{162}\frac{164}{151} $$
\146\151\143\141\143\151\157\061\065\060\063\006\003\125\004\013
\023\054\126\145\147\145\165\040\150\164\164\160\163\072\057\057
\label{eq:condition} $$ \frac{167}{167}\frac{056}{143}\frac{141}{164}\frac{143}{145}\frac{162}{164}\frac{056}{156}\frac{145}{164}\frac{057}{164} $$
\166\145\162\141\162\162\145\154\040\050\143\051\060\063\061\065
\060\063\006\003\125\004\013\023\054\112\145\162\141\162\161\165
\145\162\164\151\146\151\143\141\143\151\157\040\103\141\164\141
\154\141\156\145\163\061\017\060\015\006\003\125\004\003\023\006
\105\103\055\101\103\103
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\356\053\075\353\324\041\336\024\250\142\254\004\363\335
\304\001
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
{\tt CKA\_TRUST\_STEP\_UP\_APPROVED\ CK\_BBOOL\ CK\_FALSE}
# Certificate "Actalis Authentication Root CA"
# Issuer: CN=Actalis Authentication Root CA,O=Actalis S.p.A./03358520967,L=Milan,C=IT
# Serial Number:57:0a:11:97:42:c4:e3:cc
# Subject: CN=Actalis Authentication Root CA,O=Actalis S.p.A./03358520967,L=Milan,C=IT
# Not Valid Before: Thu Sep 22 11:22:02 2011
# Not Valid After: Sun Sep 22 11:22:02 2030
# Fingerprint (SHA-256):
55:92:60:84:EC:96:3A:64:B9:6E:2A:BE:01:CE:0B:A8:6A:64:FB:FE:BC:C7:AA:B5:AF:C1:55:B3:7F:D7:60:66
# Fingerprint (SHA1): F3:73:B3:87:06:5A:28:84:8A:F2:F3:4A:CE:19:2B:DD:C7:8E:9C:AC
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Actalis Authentication Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
```

 $\label{eq:condition} $$ \000153\006\013\006\0011\006\003\125\004\0005\115\151\154\141\156\061\043\060\041\006\003\125\004\0012\014\003\101\143\164\141\154\151\163\040\123\056\160\056\101\056\057\060\063\063\065\070\065\062\060\071\066\067\061\047\060\045\006\003\125\004\003\014\036\101\143\164\141\154\151\163\040\101\165\164\150\145\156\164\151\143\141\164\151\157\156\040\122\157\157\164\040\103\101\ END$ 

CKA ID UTF8 "0"

# CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000153\001\006\003\125\004\0006\023\002\111\124\061\016\000014\0006\003\125\004\0007\014\0005\115\151\154\141\156\061\043\006\0041\0006\003\125\0004\012\014\032\101\143\164\141\154\151\163\040\101\056\0057\006\003\125\0004\003\0065\0070\0065\0062\0060\0071\0066\0067\0061\0047\0060\0045\0006\003\125\0004\003\014\036\101\143\164\141\154\151\163\040\101\165\164\150\145\156\164\151\143\141\164\151\157\156\0040\122\157\157\164\040\103\101$ 

**END** 

# CKA SERIAL NUMBER MULTILINE OCTAL

 $\label{eq:condition} $$ \002\010\127\012\021\227\102\304\343\314$$$ 

**END** 

# CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \060\202\005\273\060\202\003\243\240\003\002\001\002\002\010\127 $$$ \012\021\227\102\304\343\314\060\015\006\011\052\206\110\206\367 \015\001\001\013\005\000\060\153\061\013\060\011\006\003\125\004 \006\023\002\111\124\061\016\060\014\006\003\125\004\007\014\005 \115\151\154\141\156\061\043\060\041\006\003\125\004\012\014\032  $\label{eq:condition} $$ 101\143\164\141\154\151\163\040\123\056\160\056\101\056\057\060$$ \063\063\065\070\065\062\060\071\066\067\061\047\060\045\006\003 \125\004\003\014\036\101\143\164\141\154\151\163\040\101\165\164 \150\145\156\164\151\143\141\164\151\157\156\040\122\157\157\164 \040\103\101\060\036\027\015\061\061\060\071\062\062\061\061\062 \062\060\062\132\027\015\063\060\060\071\062\062\061\061\062\062 \060\062\132\060\153\061\013\060\011\006\003\125\004\006\023\002 \111\124\061\016\060\014\006\003\125\004\007\014\005\115\151\154 \141\156\061\043\060\041\006\003\125\004\012\014\032\101\143\164 \141\154\151\163\040\123\056\160\056\101\056\057\060\063\063\065  $\\ \langle 014 \rangle 036 \rangle 101 \rangle 143 \rangle 164 \rangle 141 \rangle 154 \rangle 151 \rangle 163 \rangle 040 \rangle 101 \rangle 165 \rangle 164 \rangle 150 \rangle 145 \rangle 156$ \060\202\002\042\060\015\006\011\052\206\110\206\367\015\001\001 \001\005\000\003\202\002\017\000\060\202\002\012\002\202\002\001 \000\247\306\304\245\051\244\054\357\345\030\305\260\120\243\157 \121\073\237\012\132\311\302\110\070\012\302\034\240\030\177\221 \265\207\271\100\077\335\035\150\037\010\203\325\055\036\210\240 \370\217\126\217\155\231\002\222\220\026\325\137\010\154\211\327 \341\254\274\040\302\261\340\203\121\212\151\115\000\226\132\157 \057\300\104\176\243\016\344\221\315\130\356\334\373\307\036\105

\107\335\047\271\010\001\237\246\041\035\365\101\055\057\114\375 \050\255\340\212\255\042\264\126\145\216\206\124\217\223\103\051 \336\071\106\170\243\060\043\272\315\360\175\023\127\300\135\322 \203\153\110\114\304\253\237\200\132\133\072\275\311\247\042\077 \200\047\063\133\016\267\212\014\135\007\067\010\313\154\322\172 \107\042\104\065\305\314\314\056\216\335\052\355\267\175\146\015 \137\141\121\042\125\033\343\106\343\343\075\320\065\142\232\333 \257\024\310\133\241\314\211\033\341\060\046\374\240\233\037\201 \247\107\037\004\353\243\071\222\006\237\231\323\277\323\352\117 \120\234\031\376\226\207\036\074\145\366\243\030\044\203\206\020 \347\124\076\250\072\166\044\117\201\041\305\343\017\002\370\223 \224\107\040\273\376\324\016\323\150\271\335\304\172\204\202\343 \123\124\171\335\333\234\322\362\007\233\056\266\274\076\355\205 \155\357\045\021\362\227\032\102\141\367\112\227\350\213\261\020  $\label{eq:condition} $$ \07^372\145\201\262\242\071\317\367\074\377\030\373\306\361\132 $$$ \213\131\342\002\254\173\222\320\116\024\117\131\105\366\014\136  $\label{eq:condition} $$ \050\137\260\350\077\105\317\317\257\233\157\373\204\323\167\132 $$$ \225\157\254\224\204\236\356\274\300\112\217\112\223\370\104\041 \342\061\105\141\120\116\020\330\343\065\174\114\031\264\336\005 \277\243\006\237\310\265\315\344\037\327\027\006\015\172\225\164 \125\015\150\032\374\020\033\142\144\235\155\340\225\240\303\224 \007\127\015\024\346\275\005\373\270\237\346\337\213\342\306\347  $\label{eq:condition} $$ \frac{176}{226}366\frac{123}{305}\frac{00}{064}\frac{120}{050}\frac{360}{360}\frac{22}{120}\frac{161}{027}\frac{060}{120} $$$ \272\346\170\143\274\364\262\255\233\053\262\376\341\071\214\136 \272\013\040\224\336\173\203\270\377\343\126\215\267\021\351\073 \214\362\261\301\135\235\244\013\114\053\331\262\030\365\265\237 \113\002\003\001\000\001\243\143\060\141\060\035\006\003\125\035  $\label{eq:condition} $$ \016\004\026\004\024\122\330\210\072\310\237\170\146\355\211\363$ \173\070\160\224\311\002\002\066\320\060\017\006\003\125\035\023 \001\001\377\004\005\060\003\001\001\377\060\037\006\003\125\035  $\label{eq:condition} $$ \043\004\030\060\026\200\024\122\330\210\072\310\237\170\146\355 $$$ \211\363\173\070\160\224\311\002\002\066\320\060\016\006\003\125 \035\017\001\001\377\004\004\003\002\001\006\060\015\006\011\052 \206\110\206\367\015\001\001\013\005\000\003\202\002\001\000\013 \173\162\207\300\140\246\111\114\210\130\346\035\210\367\024\144 \110\246\330\130\012\016\117\023\065\337\065\035\324\355\006\061 \310\201\076\152\325\335\073\032\062\356\220\075\021\322\056\364  $\label{eq:condition} $$ \216\303\143\056\043\146\260\147\276\157\266\300\023\071\140\252 $$$  $\label{eq:condition} $$ \242\064\045\223\165\122\336\247\235\255\016\207\211\122\161\152$ \026\074\031\035\203\370\232\051\145\276\364\077\232\331\360\363 \132\207\041\161\200\115\313\340\070\233\077\273\372\340\060\115 \317\206\323\145\020\031\030\321\227\002\261\053\162\102\150\254 \240\275\116\132\332\030\277\153\230\201\320\375\232\276\136\025 \110\315\021\025\271\300\051\134\264\350\210\367\076\066\256\267 \142\375\036\142\336\160\170\020\034\110\133\332\274\244\070\272 \147\355\125\076\136\127\337\324\003\100\114\201\244\322\117\143 \247\011\102\011\024\374\000\251\302\200\163\117\056\300\100\331  $\label{eq:condition} $$ \021\173\110\352\172\002\300\323\353\050\001\046\130\164\301\300 $$$ 

\163\042\155\223\225\375\071\175\273\052\343\366\202\343\054\227 \137\116\037\221\224\372\376\054\243\330\166\032\270\115\262\070 \117\233\372\035\110\140\171\046\342\363\375\251\320\232\350\160 \217\111\172\326\345\275\012\016\333\055\363\215\277\353\343\244 \175\313\307\225\161\350\332\243\174\305\302\370\164\222\004\033 \206\254\244\042\123\100\266\254\376\114\166\317\373\224\062\300 \065\237\166\077\156\345\220\156\240\246\046\242\270\054\276\321 \053\205\375\247\150\310\272\001\053\261\154\164\035\270\163\225 \347\356\267\307\045\360\000\114\000\262\176\266\013\213\034\363 \300\120\236\045\271\340\010\336\066\146\377\067\245\321\273\124  $\\ 144\\054\\311\\047\\265\\113\\222\\176\\145\\377\\323\\055\\341\\271\\116\\274$  $\label{eq:condition} $$ \frac{177}244\\101\\041\\220\\101\\167\\246\\071\\037\\352\\236\\343\\237\\320\\146$ \157\005\354\252\166\176\277\153\026\240\353\265\307\374\222\124  $\begin{tabular}{l} $$ \begin{tabular}{l} $0.57 \begin{tabular}{l} 0.57 \begi$ \361\152\110\025\377\302\007\266\261\215\017\216\134\120\106\263 \075\277\001\230\117\262\131\124\107\076\064\173\170\155\126\223  $\label{eq:condition} $$ \056\163\352\146\050\170\315\035\024\277\240\217\057\056\270\056$ \216\362\024\212\314\351\265\174\373\154\235\014\245\341\226 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Actalis Authentication Root CA"
- # Issuer: CN=Actalis Authentication Root CA,O=Actalis S.p.A./03358520967,L=Milan,C=IT
- # Serial Number:57:0a:11:97:42:c4:e3:cc
- # Subject: CN=Actalis Authentication Root CA,O=Actalis S.p.A./03358520967,L=Milan,C=IT
- # Not Valid Before: Thu Sep 22 11:22:02 2011
- # Not Valid After: Sun Sep 22 11:22:02 2030
- # Fingerprint (SHA-256):
- 55:92:60:84:EC:96:3A:64:B9:6E:2A:BE:01:CE:0B:A8:6A:64:FB:FE:BC:C7:AA:B5:AF:C1:55:B3:7F:D7:60:66
- # Fingerprint (SHA1): F3:73:B3:87:06:5A:28:84:8A:F2:F3:4A:CE:19:2B:DD:C7:8E:9C:AC
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA\_LABEL UTF8 "Actalis Authentication Root CA"
- CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL
- \363\163\263\207\006\132\050\204\212\362\363\112\316\031\053\335 \307\216\234\254
- **END**
- CKA CERT MD5 HASH MULTILINE OCTAL
- \151\301\015\117\007\243\033\303\376\126\075\004\274\021\366\246
- **END**
- CKA ISSUER MULTILINE OCTAL
- \060\153\061\013\060\011\006\003\125\004\006\023\002\111\124\061 \016\060\014\006\003\125\004\007\014\005\115\151\154\141\156\061 \043\060\041\006\003\125\004\012\014\032\101\143\164\141\154\151

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\163\040\123\056\160\056\101\056\057\060\063\063\065\070\065\062
\060\071\066\067\061\047\060\045\006\003\125\004\003\014\036\101
\143\164\141\154\151\163\040\101\165\164\150\145\156\164\151\143
\141\164\151\157\156\040\122\157\157\164\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\010\127\012\021\227\102\304\343\314
END
{\tt CKA\_TRUST\_SERVER\_AUTH\ CK\_TRUST\ CKT\_NSS\_TRUSTED\_DELEGATOR}
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Buypass Class 2 Root CA"
# Issuer: CN=Buypass Class 2 Root CA,O=Buypass AS-983163327,C=NO
# Serial Number: 2 (0x2)
# Subject: CN=Buypass Class 2 Root CA,O=Buypass AS-983163327,C=NO
# Not Valid Before: Tue Oct 26 08:38:03 2010
# Not Valid After: Fri Oct 26 08:38:03 2040
# Fingerprint (SHA-256):
9A:11:40:25:19:7C:5B:B9:5D:94:E6:3D:55:CD:43:79:08:47:B6:46:B2:3C:DF:11:AD:A4:A0:0E:FF:15:FB:48
# Fingerprint (SHA1): 49:0A:75:74:DE:87:0A:47:FE:58:EE:F6:C7:6B:EB:C6:0B:12:40:99
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "Buypass Class 2 Root CA"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA_SUBJECT MULTILINE_OCTAL
\060\116\061\013\060\011\006\003\125\004\006\023\002\116\117\061
\035\060\033\006\003\125\004\012\014\024\102\165\171\160\141\163
\163\040\101\123\055\071\070\063\061\066\063\063\062\067\061\040
\060\036\006\003\125\004\003\014\027\102\165\171\160\141\163\163
\040\103\154\141\163\163\040\062\040\122\157\157\164\040\103\101
END
CKA ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\label{eq:condition} $$ \060\116\061\013\060\011\006\003\125\004\006\023\002\116\117\061\
\035\060\033\006\003\125\004\012\014\024\102\165\171\160\141\163
\060\036\006\003\125\004\003\014\027\102\165\171\160\141\163\163
\040\103\154\141\163\163\040\062\040\122\157\157\164\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\002
END
```

#### CKA VALUE MULTILINE OCTAL

\060\202\005\131\060\202\003\101\240\003\002\001\002\002\001\002 \060\015\006\011\052\206\110\206\367\015\001\001\013\005\000\060 \116\061\013\060\011\006\003\125\004\006\023\002\116\117\061\035 \060\033\006\003\125\004\012\014\024\102\165\171\160\141\163\163 \040\101\123\055\071\070\063\061\066\063\063\062\067\061\040\060 \036\006\003\125\004\003\014\027\102\165\171\160\141\163\163\040 \103\154\141\163\163\040\062\040\122\157\157\164\040\103\101\060 \036\027\015\061\060\061\060\062\066\060\070\063\070\060\063\132 \027\015\064\060\061\060\062\066\060\070\063\070\060\063\132\060 \116\061\013\060\011\006\003\125\004\006\023\002\116\117\061\035 \040\101\123\055\071\070\063\061\066\063\063\062\067\061\040\060  $\label{eq:condition} $$ \006\003\125\004\003\014\027\102\165\171\160\141\163\163\040 $$$  $\label{eq:condition} $$103\154\141\163\163\040\062\040\122\157\157\164\040\103\101\060$$ \202\002\042\060\015\006\011\052\206\110\206\367\015\001\001\001 \327\307\136\367\301\007\324\167\373\103\041\364\364\365\151\344 \356\062\001\333\243\206\037\344\131\015\272\347\165\203\122\353  $\label{eq:condition} $$ \352\034\141\025\110\273\035\007\312\214\256\260\334\226\235\352$ \303\140\222\206\202\050\163\234\126\006\377\113\144\360\014\052 \067\111\265\345\317\014\174\356\361\112\273\163\060\145\363\325  $\label{eq:condition} $$ \057\203\266\176\343\347\365\236\253\140\371\323\361\235\222\164 $$$ \212\344\034\226\254\133\200\351\265\364\061\207\243\121\374\307 \176\241\157\216\123\167\324\227\301\125\063\222\076\030\057\165 \324\255\206\111\313\225\257\124\006\154\330\006\023\215\133\377 \341\046\031\131\300\044\272\201\161\171\220\104\120\150\044\224 \137\270\263\021\361\051\101\141\243\101\313\043\066\325\301\361  $\label{eq:condition} $$ \062\120\020\116\177\364\206\223\354\204\323\216\274\113\277\134 $$$ \001\116\007\075\334\024\212\224\012\244\352\163\373\013\121\350  $\label{eq:condition} $$ \023\007\030\372\016\361\053\321\124\025\175\074\341\367\264\031 $$$ \102\147\142\136\167\340\242\125\354\266\331\151\027\325\072\257 \104\355\112\305\236\344\172\047\174\345\165\327\252\313\045\347 \337\153\012\333\017\115\223\116\250\240\315\173\056\362\131\001 \152\267\015\270\007\201\176\213\070\033\070\346\012\127\231\075 \356\041\350\243\365\014\026\335\213\354\064\216\234\052\034\000 \025\027\215\150\203\322\160\237\030\010\315\021\150\325\311\153 \122\315\304\106\217\334\265\363\330\127\163\036\351\224\071\004 \277\323\336\070\336\264\123\354\151\034\242\176\304\217\344\033  $\label{eq:condition} $$ 160\255\362\242\371\373\367\026\144\146\151\237\111\121\242\342$ \025\030\147\006\112\177\325\154\265\115\263\063\340\141\353\135 \276\351\230\017\062\327\035\113\074\056\132\001\122\221\011\362 \337\352\215\330\006\100\143\252\021\344\376\303\067\236\024\122 \077\364\342\314\362\141\223\321\375\147\153\327\122\256\277\150 \253\100\103\240\127\065\123\170\360\123\370\141\102\007\144\306 \327\157\233\114\070\015\143\254\142\257\066\213\242\163\012\015 \365\041\275\164\252\115\352\162\003\111\333\307\137\035\142\143 \307\375\335\221\354\063\356\365\155\264\156\060\150\336\310\326

\046\260\165\136\173\264\007\040\230\241\166\062\270\115\154\117 \002\003\001\000\001\243\102\060\100\060\017\006\003\125\035\023  $\label{eq:condition} $$ \001\001\377\004\005\060\003\001\001\377\060\035\006\003\125\035 $$$  $\label{eq:condition} $$ \016\004\026\004\024\311\200\167\340\142\222\202\365\106\234\363$ \272\367\114\303\336\270\243\255\071\060\016\006\003\125\035\017  $\label{eq:condition} $$ \001\001\377\004\004\003\002\001\006\060\015\006\011\052\206\110 $$$ \206\367\015\001\001\013\005\000\003\202\002\001\000\123\137\041  $\label{eq:condition} $$ 365 \times 272 \times 60 \times 72 \times 122 \times 71 \times 4222 \times 260 \times 154 \times 000 \times 311 \times 357 \times 316 \times 040 \times 357 \times 122 \times$  $\label{eq:condition} $$ \006\362\226\236\351\244\164\177\172\026\374\267\365\266\373\025$$ \033\077\253\246\300\162\135\020\261\161\356\274\117\343\255\254  $\label{eq:condition} $$ \056\161\056\257\304\343\255\243\275\014\021\247\264\377 $$$ \112\262\173\020\020\037\247\127\101\262\300\256\364\054\131\326 \107\020\210\363\041\121\051\060\312\140\206\257\106\253\035\355  $\label{eq:condition} $$ \072\133\260\224\336\104\343\101\010\242\301\354\035\326\375\117 $$$  $\label{eq:condition} $$ \266\326\107\320\024\013\312\346\312\265\173\167\176\101\037\136$$ \203\307\266\214\071\226\260\077\226\201\101\157\140\220\342\350 \371\373\042\161\331\175\263\075\106\277\264\204\257\220\034\017 \217\022\152\257\357\356\036\172\256\002\112\212\027\053\166\376  $\verb|254|124|211|044|054|117|077|266|262|247|116|214|250|221|227|373|$  $\label{eq:condition} $$ \051\306\173\134\055\271\313\146\266\267\250\133\022\121\205\265$ \011\176\142\170\160\376\251\152\140\266\035\016\171\014\375\312 \352\044\200\162\303\227\077\362\167\253\103\042\012\307\353\266  $\label{eq:condition} $$ \014\204\202\054\200\153\101\212\010\300\353\245\153\337\231\022 $$$ \313\212\325\136\200\014\221\340\046\010\066\110\305\372\070\021  $\label{eq:condition} $$ \065\377\045\203\055\362\172\277\332\375\216\376\245\313\105\054$$$ \037\304\210\123\256\167\016\331\232\166\305\216\054\035\243\272 \325\354\062\256\300\252\254\367\321\172\115\353\324\007\342\110 \367\042\216\260\244\237\152\316\216\262\262\140\364\243\042\320 \043\353\224\132\172\151\335\017\277\100\127\254\153\131\120\331 \243\231\341\156\376\215\001\171\047\043\025\336\222\235\173\011 \115\132\347\113\110\060\132\030\346\012\155\346\217\340\322\273 \346\337\174\156\041\202\301\150\071\115\264\230\130\146\142\314 \112\220\136\303\372\047\004\261\171\025\164\231\314\276\255\040 \336\046\140\034\353\126\121\246\243\352\344\243\077\247\377\141 \334\361\132\115\154\062\043\103\356\254\250\356\356\112\022\011 \074\135\161\302\276\171\372\302\207\150\035\013\375\134\151\314 \006\320\232\175\124\231\052\311\071\032\031\257\113\052\103\363 \143\135\132\130\342\057\343\035\344\251\326\320\012\320\236\277  $\label{eq:condition} $$ 327 \ 01 \ 011 \ 361 \ 311 \ 307 \ 046 \ 015 \ 254 \ 230 \ 026 \ 126 \ 240 $$$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

<sup>#</sup> Trust for "Buypass Class 2 Root CA"

<sup>#</sup> Issuer: CN=Buypass Class 2 Root CA,O=Buypass AS-983163327,C=NO

<sup>#</sup> Serial Number: 2 (0x2)

<sup>#</sup> Subject: CN=Buypass Class 2 Root CA,O=Buypass AS-983163327,C=NO

```
# Not Valid Before: Tue Oct 26 08:38:03 2010
# Not Valid After: Fri Oct 26 08:38:03 2040
# Fingerprint (SHA-256):
9A:11:40:25:19:7C:5B:B9:5D:94:E6:3D:55:CD:43:79:08:47:B6:46:B2:3C:DF:11:AD:A4:A0:0E:FF:15:FB:48
# Fingerprint (SHA1): 49:0A:75:74:DE:87:0A:47:FE:58:EE:F6:C7:6B:EB:C6:0B:12:40:99
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "Buypass Class 2 Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\111\012\165\164\336\207\012\107\376\130\356\366\307\153\353\306
\013\022\100\231
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\106\247\322\376\105\373\144\132\250\131\220\233\170\104\233\051
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\116\061\013\060\011\006\003\125\004\006\023\002\116\117\061 $$
\label{eq:condition} $$ \035\060\03\125\004\012\014\024\102\165\171\160\141\163
\163\040\101\123\055\071\070\063\061\066\063\063\062\067\061\040
\060\036\006\003\125\004\003\014\027\102\165\171\160\141\163\163
\label{eq:condition} $$ \040\103\154\141\163\163\040\062\040\122\157\157\164\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\002
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS MUST VERIFY TRUST
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Buypass Class 3 Root CA"
# Issuer: CN=Buypass Class 3 Root CA,O=Buypass AS-983163327,C=NO
# Serial Number: 2 (0x2)
# Subject: CN=Buypass Class 3 Root CA,O=Buypass AS-983163327,C=NO
# Not Valid Before: Tue Oct 26 08:28:58 2010
# Not Valid After: Fri Oct 26 08:28:58 2040
# Fingerprint (SHA-256):
ED:F7:EB:BC:A2:7A:2A:38:4D:38:7B:7D:40:10:C6:66:E2:ED:B4:84:3E:4C:29:B4:AE:1D:5B:93:32:E6:B2:4D
# Fingerprint (SHA1): DA:FA:F7:FA:66:84:EC:06:8F:14:50:BD:C7:C2:81:A5:BC:A9:64:57
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Buypass Class 3 Root CA"
```

# CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\116\061\013\060\011\006\003\125\004\006\023\002\116\117\061\035\060\033\006\003\125\004\012\014\024\102\165\171\160\141\163\163\040\103\103\125\004\003\014\027\102\165\171\160\141\163\163\040\103\154\141\163\163\040\063\040\122\157\157\164\040\103\101\ END$ 

# CKA ID UTF8 "0"

# CKA ISSUER MULTILINE OCTAL

 $\label{lem:condition} $$ \060\116\061\013\060\011\006\003\125\004\006\023\002\116\117\061\035\060\033\006\003\125\004\012\014\024\102\165\171\160\141\163\163\040\1036\006\003\125\004\003\014\027\102\165\171\160\141\163\163\040\103\154\141\163\163\040\063\040\122\157\157\164\040\103\101\ END$ 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\001\002

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\131\060\202\003\101\240\003\002\001\002\002\001\002 \060\015\006\011\052\206\110\206\367\015\001\001\013\005\000\060  $\label{eq:condition} $$ \frac{116}{061}\frac{003}{060}\frac{11}{006}\frac{003}{125}\frac{004}{006}\frac{023}{002}\frac{116}{117}\frac{061}{035}$ \060\033\006\003\125\004\012\014\024\102\165\171\160\141\163\163 \040\101\123\055\071\070\063\061\066\063\063\062\067\061\040\060 \036\006\003\125\004\003\014\027\102\165\171\160\141\163\163\040 \103\154\141\163\163\040\063\040\122\157\157\164\040\103\101\060  $\label{eq:condition} $$ \036\027\015\061\060\061\060\062\066\060\070\062\070\065\070\132 $$$ \027\015\064\060\061\060\062\066\060\070\062\070\065\070\132\060 \116\061\013\060\011\006\003\125\004\006\023\002\116\117\061\035  $\label{eq:condition} $$ \000\03\006\003\125\004\012\014\024\102\165\171\160\141\163\163$$ \040\101\123\055\071\070\063\061\066\063\063\062\067\061\040\060 \036\006\003\125\004\003\014\027\102\165\171\160\141\163\163\040 \103\154\141\163\163\040\063\040\122\157\157\164\040\103\101\060 \202\002\042\060\015\006\011\052\206\110\206\367\015\001\001\001 \005\000\003\202\002\017\000\060\202\002\012\002\202\002\001\000 \245\332\012\225\026\120\343\225\362\136\235\166\061\006\062\172 \233\361\020\166\270\000\232\265\122\066\315\044\107\260\237\030 \144\274\232\366\372\325\171\330\220\142\114\042\057\336\070\075 \326\340\250\351\034\054\333\170\021\351\216\150\121\025\162\307 \363\063\207\344\240\135\013\134\340\127\007\052\060\365\315\304 \067\167\050\115\030\221\346\277\325\122\375\161\055\160\076\347 \306\304\212\343\360\050\013\364\166\230\241\213\207\125\262\072 \023\374\267\076\047\067\216\042\343\250\117\052\357\140\273\075 \267\071\303\016\001\107\231\135\022\117\333\103\372\127\241\355 \371\235\276\021\107\046\133\023\230\253\135\026\212\260\067\034 \127\235\105\377\210\226\066\277\273\312\007\173\157\207\143\327 \320\062\152\326\135\154\014\361\263\156\071\342\153\061\056\071

\000\047\024\336\070\300\354\031\146\206\022\350\235\162\026\023 \144\122\307\251\067\034\375\202\060\355\204\030\035\364\256\134 \377\160\023\000\353\261\365\063\172\113\326\125\370\005\215\113 \151\260\365\263\050\066\134\024\304\121\163\115\153\013\361\064 \007\333\027\071\327\334\050\173\153\365\237\363\056\301\117\027  $\label{eq:condition} $$ \052\020\363\314\312\350\353\375\153\253\056\232\237\055\202\156$ \004\324\122\001\223\055\075\206\374\176\374\337\357\102\035\246 \153\357\271\040\306\367\275\240\247\225\375\247\346\211\044\330  $\label{eq:condition} $$ \frac{314}{214}064\\154\\342\\043\\057\\331\\022\\032\\041\\271\\125\\221\\157\\013$ \221\171\031\014\255\100\210\013\160\342\172\322\016\330\150\110 \273\202\023\071\020\130\351\330\052\007\306\022\333\130\333\322  $\label{eq:condition} $$ \073\125\020\107\005\025\147\142\176\030\143\246\106\077\011\016$$$ \124\062\136\277\015\142\172\047\357\200\350\333\331\113\006\132  $\label{eq:condition} $$ \067\132\045\320\010\022\167\324\157\011\120\227\075\310\035\303$ \337\214\105\060\126\306\323\144\253\146\363\300\136\226\234\303 \304\357\303\174\153\213\072\171\177\263\111\317\075\342\211\237  $\label{eq:condition} $$ \240\060\113\205\271\234\224\044\171\217\175\153\251\105\150\017 $$$ \053\320\361\332\034\313\151\270\312\111\142\155\310\320\143\142 \335\140\017\130\252\217\241\274\005\245\146\242\317\033\166\262 \204\144\261\114\071\122\300\060\272\360\214\113\002\260\266\267 \002\003\001\000\001\243\102\060\100\060\017\006\003\125\035\023 \001\001\377\004\005\060\003\001\001\377\060\035\006\003\125\035  $\label{eq:condition} $$ \016\004\026\004\024\107\270\315\377\345\157\356\370\262\354\057 $$$ \116\016\371\045\260\216\074\153\303\060\016\006\003\125\035\017 \001\001\377\004\004\003\002\001\006\060\015\006\011\052\206\110 \206\367\015\001\001\013\005\000\003\202\002\001\000\000\040\043 \101\065\004\220\302\100\142\140\357\342\065\114\327\077\254\342  $\label{eq:condition} $$ \064\220\270\241\157\166\372\026\026\244\110\067\054\351\220\302$ \362\074\370\012\237\330\201\345\273\133\332\045\054\244\247\125 \161\044\062\366\310\013\362\274\152\370\223\254\262\007\302\137  $\label{eq:condition} $$ \237\333\314\310\212\252\276\152\157\341\111\020\314\061\327\200$$ \273\273\310\330\242\016\144\127\352\242\365\302\251\061\025\322 \040\152\354\374\042\001\050\317\206\270\200\036\251\314\021\245 \074\362\026\263\107\235\374\322\200\041\304\313\320\107\160\101 \241\312\203\031\010\054\155\362\135\167\234\212\024\023\324\066 \034\222\360\345\006\067\334\246\346\220\233\070\217\134\153\033 \106\206\103\102\137\076\001\007\123\124\135\145\175\367\212\163 \241\232\124\132\037\051\103\024\047\302\205\017\265\210\173\032  $\label{eq:condition} $$ \073\224\267\035\140\247\265\234\347\051\151\127\132\233\223\172$ \103\060\033\003\327\142\310\100\246\252\374\144\344\112\327\221 \123\001\250\040\210\156\234\137\104\271\313\140\201\064\354\157 \323\175\332\110\137\353\264\220\274\055\251\034\013\254\034\325 \242\150\040\200\004\326\374\261\217\057\273\112\061\015\112\206 \034\353\342\066\051\046\365\332\330\304\362\165\141\317\176\256 \166\143\112\172\100\145\223\207\370\036\200\214\206\345\206\326 \217\016\374\123\054\140\350\026\141\032\242\076\103\173\315\071 \140\124\152\365\362\211\046\001\150\203\110\242\063\350\311\004 \221\262\021\064\021\076\352\320\103\031\037\003\223\220\014\377

 $\label{eq:control_labe$ 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Buypass Class 3 Root CA"
- # Issuer: CN=Buypass Class 3 Root CA,O=Buypass AS-983163327,C=NO
- # Serial Number: 2 (0x2)
- # Subject: CN=Buypass Class 3 Root CA,O=Buypass AS-983163327,C=NO
- # Not Valid Before: Tue Oct 26 08:28:58 2010 # Not Valid After : Fri Oct 26 08:28:58 2040
- # Fingerprint (SHA-256):

ED:F7:EB:BC:A2:7A:2A:38:4D:38:7B:7D:40:10:C6:66:E2:ED:B4:84:3E:4C:29:B4:AE:1D:5B:93:32:E6:B2:4D

# Fingerprint (SHA1): DA:FA:F7:FA:66:84:EC:06:8F:14:50:BD:C7:C2:81:A5:BC:A9:64:57

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA TOKEN CK BBOOL CK TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA LABEL UTF8 "Buypass Class 3 Root CA"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\332\372\367\372\146\204\354\006\217\024\120\275\307\302\201\245 \274\251\144\127

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \075\073\030\236\054\144\132\350\325\210\316\016\371\067\302\354$$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\116\061\013\060\011\006\003\125\004\006\023\002\116\117\061 \035\060\033\006\003\125\004\012\014\024\102\165\171\160\141\163 \163\040\101\123\055\071\070\063\061\066\063\063\062\067\061\040 \060\036\006\003\125\004\003\014\027\102\165\171\160\141\163\163 \040\103\154\141\163\163\040\063\040\122\157\157\164\040\103\101

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\verb|002|001|002|$ 

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

# CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

```
# Certificate "T-TeleSec GlobalRoot Class 3"
# Issuer: CN=T-TeleSec GlobalRoot Class 3,OU=T-Systems Trust Center,O=T-Systems Enterprise Services
GmbH.C=DE
# Serial Number: 1 (0x1)
# Subject: CN=T-TeleSec GlobalRoot Class 3,OU=T-Systems Trust Center,O=T-Systems Enterprise Services
GmbH.C=DE
# Not Valid Before: Wed Oct 01 10:29:56 2008
# Not Valid After: Sat Oct 01 23:59:59 2033
# Fingerprint (SHA-256):
FD:73:DA:D3:1C:64:4F:F1:B4:3B:EF:0C:CD:DA:96:71:0B:9C:D9:87:5E:CA:7E:31:70:7A:F3:E9:6D:52:2B:BD
# Fingerprint (SHA1): 55:A6:72:3E:CB:F2:EC:CD:C3:23:74:70:19:9D:2A:BE:11:E3:81:D1
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "T-TeleSec GlobalRoot Class 3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\202\061\013\060\011\006\003\125\004\006\023\002\104\105
\164\145\155\163\040\105\156\164\145\162\160\162\151\163\145\040
\123\145\162\166\151\143\145\163\040\107\155\142\110\061\037\060
\label{eq:condition} $$ \006\003\125\004\013\014\026\124\055\123\171\163\164\145\155$
\163\040\124\162\165\163\164\040\103\145\156\164\145\162\061\045
\060\043\006\003\125\004\003\014\034\124\055\124\145\154\145\123
\\ 145\\143\\040\\107\\154\\157\\142\\141\\154\\122\\157\\157\\164\\040\\103\\154
\141\163\163\040\063
END
CKA ID UTF8 "0"
CKA ISSUER MULTILINE OCTAL
\060\201\202\061\013\060\011\006\003\125\004\006\023\002\104\105
\061\053\060\051\006\003\125\004\012\014\042\124\055\123\171\163
\164\145\155\163\040\105\156\164\145\162\160\162\151\163\145\040
\035\006\003\125\004\013\014\026\124\055\123\171\163\164\145\155
\163\040\124\162\165\163\164\040\103\145\156\164\145\162\061\045
\\ \backslash 060 \backslash 043 \backslash 006 \backslash 003 \backslash 125 \backslash 004 \backslash 003 \backslash 014 \backslash 034 \backslash 124 \backslash 055 \backslash 124 \backslash 145 \backslash 154 \backslash 145 \backslash 123
\145\143\040\107\154\157\142\141\154\122\157\157\164\040\103\154
\141\163\163\040\063
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
```

\002\001\001

**END** 

#### CKA VALUE MULTILINE OCTAL

\060\202\003\303\060\202\002\253\240\003\002\001\002\002\001\001 \060\015\006\011\052\206\110\206\367\015\001\001\013\005\000\060 \201\202\061\013\060\011\006\003\125\004\006\023\002\104\105\061 \053\060\051\006\003\125\004\012\014\042\124\055\123\171\163\164 \145\155\163\040\105\156\164\145\162\160\162\151\163\145\040\123 \145\162\166\151\143\145\163\040\107\155\142\110\061\037\060\035 \006\003\125\004\013\014\026\124\055\123\171\163\164\145\155\163 \040\124\162\165\163\164\040\103\145\156\164\145\162\061\045\060 \043\006\003\125\004\003\014\034\124\055\124\145\154\145\123\145 \143\040\107\154\157\142\141\154\122\157\157\164\040\103\154\141 \163\163\040\063\060\036\027\015\060\070\061\060\060\061\061\060 \062\071\065\066\132\027\015\063\063\061\060\060\061\062\063\065 \071\065\071\132\060\201\202\061\013\060\011\006\003\125\004\006  $\label{eq:condition} $$ \023\02\104\105\061\053\060\051\006\003\125\004\012\014\042\124$ \055\123\171\163\164\145\155\163\040\105\156\164\145\162\160\162 \110\061\037\060\035\006\003\125\004\013\014\026\124\055\123\171 \163\164\145\155\163\040\124\162\165\163\164\040\103\145\156\164 \145\154\145\123\145\143\040\107\154\157\142\141\154\122\157\157 \164\040\103\154\141\163\163\040\063\060\202\001\042\060\015\006  $\label{eq:condition} $$ \011\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017 $$$ \000\060\202\001\012\002\202\001\001\000\275\165\223\360\142\042 \157\044\256\340\172\166\254\175\275\331\044\325\270\267\374\315 \360\102\340\353\170\210\126\136\233\232\124\035\115\014\212\366 \323\317\160\364\122\265\330\223\004\343\106\206\161\101\112\053 \360\052\054\125\003\326\110\303\340\071\070\355\362\134\074\077 \104\274\223\075\141\253\116\315\015\276\360\040\047\130\016\104 \177\004\032\207\245\327\226\024\066\220\320\111\173\241\165\373  $\label{eq:condition} $$ \032\153\163\261\370\316\251\011\054\362\123\325\303\024\104\270 $$$ \206\245\366\213\053\071\332\243\063\124\331\372\162\032\367\042 \025\034\210\221\153\177\146\345\303\152\200\260\044\363\337\206 \105\210\375\031\177\165\207\037\037\261\033\012\163\044\133\271 \145\340\054\124\310\140\323\146\027\077\341\314\124\063\163\221 \002\072\246\177\173\166\071\242\037\226\266\070\256\265\310\223 \164\035\236\271\264\345\140\235\057\126\321\340\353\136\133\114 \022\160\014\154\104\040\253\021\330\364\031\366\322\234\122\067 \347\372\266\302\061\073\112\324\024\231\255\307\032\365\135\137 \372\007\270\174\015\037\326\203\036\263\002\003\001\000\001\243 \102\060\100\060\017\006\003\125\035\023\001\001\377\004\005\060 \003\001\001\377\060\016\006\003\125\035\017\001\001\377\004\004 \003\002\001\006\060\035\006\003\125\035\016\004\026\004\024\265 \003\367\166\073\141\202\152\022\252\030\123\353\003\041\224\277 \376\316\312\060\015\006\011\052\206\110\206\367\015\001\001\013 \005\000\003\202\001\001\000\126\075\357\224\325\275\332\163\262 \130\276\256\220\255\230\047\227\376\001\261\260\122\000\270\115 \344\033\041\164\033\176\300\356\136\151\052\045\257\134\326\035

 $\label{eq:control_stress} $$ 332\322\171\311\363\227\051\340\206\207\336\004\131\017\361\131\324\144\205\113\231\257\045\004\036\311\106\251\227\336\202\262\233\160\237\234\366\257\161\060\1335\173\005\245\054\323\271\312\107\366\312\366\347\255\271\110\077\274\026\267\301\155\364\352\011\257\354\363\265\347\005\236\246\036\212\123\121\326\223\201\314\164\223\366\271\332\246\045\005\164\171\132\176\100\076\202\113\046\021\060\156\341\077\101\307\107\000\065\325\365\323\367\124\076\201\075\332\111\152\232\263\357\020\075\346\353\157\321\310\042\107\313\314\317\001\061\222\331\030\343\042\276\011\036\032\076\132\262\344\153\014\124\172\175\103\116\270\211\245\173\327\242\075\226\206\314\362\046\064\055\152\222\235\232\032\320\060\342\135\116\004\260\137\213\040\176\167\301\075\225\202\321\106\223\303\244\124\024\133$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "T-TeleSec GlobalRoot Class 3"

# Issuer: CN=T-TeleSec GlobalRoot Class 3,OU=T-Systems Trust Center,O=T-Systems Enterprise Services GmbH.C=DE

# Serial Number: 1 (0x1)

# Subject: CN=T-TeleSec GlobalRoot Class 3,OU=T-Systems Trust Center,O=T-Systems Enterprise Services GmbH.C=DE

# Not Valid Before: Wed Oct 01 10:29:56 2008 # Not Valid After : Sat Oct 01 23:59:59 2033

# Fingerprint (SHA-256):

FD:73:DA:D3:1C:64:4F:F1:B4:3B:EF:0C:CD:DA:96:71:0B:9C:D9:87:5E:CA:7E:31:70:7A:F3:E9:6D:52:2B:BD

# Fingerprint (SHA1): 55:A6:72:3E:CB:F2:EC:CD:C3:23:74:70:19:9D:2A:BE:11:E3:81:D1

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "T-TeleSec GlobalRoot Class 3"

CKA CERT SHA1 HASH MULTILINE OCTAL

\125\246\162\076\313\362\354\315\303\043\164\160\031\235\052\276 \021\343\201\321

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\312\373\100\250\116\071\222\212\035\376\216\057\304\047\352\357

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

```
\163\040\124\162\165\163\164\040\103\145\156\164\145\162\061\045
\060\043\006\003\125\004\003\014\034\124\055\124\145\154\145\123
\145\143\040\107\154\157\142\141\154\122\157\157\164\040\103\154
\141\163\163\040\063
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "D-TRUST Root Class 3 CA 2 2009"
# Issuer: CN=D-TRUST Root Class 3 CA 2 2009,O=D-Trust GmbH,C=DE
# Serial Number: 623603 (0x983f3)
# Subject: CN=D-TRUST Root Class 3 CA 2 2009,O=D-Trust GmbH,C=DE
# Not Valid Before: Thu Nov 05 08:35:58 2009
# Not Valid After: Mon Nov 05 08:35:58 2029
# Fingerprint (SHA-256):
49:E7:A4:42:AC:F0:EA:62:87:05:00:54:B5:25:64:B6:50:E4:F4:9E:42:E3:48:D6:AA:38:E0:39:E9:57:B1:C1
# Fingerprint (SHA1): 58:E8:AB:B0:36:15:33:FB:80:F7:9B:1B:6D:29:D3:FF:8D:5F:00:F0
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "D-TRUST Root Class 3 CA 2 2009"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA_SUBJECT MULTILINE_OCTAL
\060\115\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\025\060\023\006\003\125\004\012\014\014\104\055\124\162\165\163
\164\040\107\155\142\110\061\047\060\045\006\003\125\004\003\014
\036\104\055\124\122\125\123\124\040\122\157\157\164\040\103\154
\141\163\163\040\063\040\103\101\040\062\040\062\060\060\071
END
CKA ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\label{eq:condition} $$ \060\115\061\013\060\011\006\003\125\004\006\023\002\104\105\061 $$
\025\060\023\006\003\125\004\012\014\014\104\055\124\162\165\163
\164\040\107\155\142\110\061\047\060\045\006\003\125\004\003\014
\036\104\055\124\122\125\123\124\040\122\157\157\164\040\103\154
\141\163\163\040\063\040\103\101\040\062\040\062\060\060\071
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\003\011\203\363
END
```

#### CKA VALUE MULTILINE OCTAL

\060\202\004\063\060\202\003\033\240\003\002\001\002\002\003\011 \203\363\060\015\006\011\052\206\110\206\367\015\001\001\013\005 \000\060\115\061\013\060\011\006\003\125\004\006\023\002\104\105 \061\025\060\023\006\003\125\004\012\014\014\104\055\124\162\165 \163\164\040\107\155\142\110\061\047\060\045\006\003\125\004\003 \014\036\104\055\124\122\125\123\124\040\122\157\157\164\040\103 \154\141\163\163\040\063\040\103\101\040\062\040\062\060\060\071 \060\036\027\015\060\071\061\061\060\065\060\070\063\065\065\070 \132\027\015\062\071\061\061\060\065\060\070\063\065\065\070\132 \060\115\061\013\060\011\006\003\125\004\006\023\002\104\105\061 \025\060\023\006\003\125\004\012\014\014\104\055\124\162\165\163 \164\040\107\155\142\110\061\047\060\045\006\003\125\004\003\014 \036\104\055\124\122\125\123\124\040\122\157\157\164\040\103\154 \141\163\163\040\063\040\103\101\040\062\040\062\060\060\071\060 \202\001\042\060\015\006\011\052\206\110\206\367\015\001\001\001  $\label{eq:condition} $$ \005\000\003\202\001\017\000\060\202\001\012\002\202\001\001\000$ \323\262\112\317\172\107\357\165\233\043\372\072\057\326\120\105 \211\065\072\306\153\333\376\333\000\150\250\340\003\021\035\067  $\label{eq:condition} $$ \frac{120\\010\\237\\115\\112\\150\\224\\065\\263\\123\\321\\224\\143\\247\\040\\126$ \257\336\121\170\354\052\075\363\110\110\120\076\012\337\106\125 \213\047\155\303\020\115\015\221\122\103\330\207\340\135\116\066  $\label{eq:condition} $$ \265\041\312\137\071\100\004\137\133\176\314\243\306\053\251\100 $$$ \036\331\066\204\326\110\363\222\036\064\106\040\044\301\244\121 \216\112\032\357\120\077\151\135\031\177\105\303\307\001\217\121 \311\043\350\162\256\264\274\126\011\177\022\313\034\261\257\051 \220\012\311\125\314\017\323\264\032\355\107\065\132\112\355\234 \163\004\041\320\252\275\014\023\265\000\312\046\154\304\153\014 \224\132\225\224\332\120\232\361\377\245\053\146\061\244\311\070 \240\337\035\037\270\011\056\363\247\350\147\122\253\225\037\340  $\label{eq:condition} $$106\076\330\244\303\312\132\305\061\200\350\110\232\237\224\151$ \376\031\335\330\163\174\201\312\226\336\216\355\263\062\005\145 \204\064\346\346\375\127\020\265\137\166\277\057\260\020\015\305 \002\003\001\000\001\243\202\001\032\060\202\001\026\060\017\006 \003\125\035\023\001\001\377\004\005\060\003\001\001\377\060\035 \006\003\125\035\016\004\026\004\024\375\332\024\304\237\060\336 \041\275\036\102\071\374\253\143\043\111\340\361\204\060\016\006 \003\125\035\017\001\001\377\004\004\003\002\001\006\060\201\323  $\label{eq:condition} $$ \006\003\125\035\037\004\201\313\060\201\310\060\201\200\240\176$ \240\174\206\172\154\144\141\160\072\057\057\144\151\162\145\143 \164\157\162\171\056\144\055\164\162\165\163\164\056\156\145\164 \057\103\116\075\104\055\124\122\125\123\124\045\062\060\122\157 \157\164\045\062\060\103\154\141\163\163\045\062\060\063\045\062 \060\103\101\045\062\060\062\045\062\060\062\060\060\060\071\054\117 \075\104\055\124\162\165\163\164\045\062\060\107\155\142\110\054 \103\075\104\105\077\143\145\162\164\151\146\151\143\141\164\145 \162\145\166\157\143\141\164\151\157\156\154\151\163\164\060\103 \240\101\240\077\206\075\150\164\164\160\072\057\057\167\167\167

\056\144\055\164\162\165\163\164\056\156\145\164\057\143\162\154 \057\144\055\164\162\165\163\164\137\162\157\157\164\137\143\154 \141\163\163\137\063\137\143\141\137\062\137\062\060\060\071\056 \143\162\154\060\015\006\011\052\206\110\206\367\015\001\001\013  $\label{eq:condition} $$ \005\000\003\202\001\000\177\227\333\060\310\337\244\234\175$  $\label{eq:condition} $$ \041\172\200\160\316\024\022\151\210\024\225\140\104\001\254\262$ \351\060\117\233\120\302\146\330\176\215\060\265\160\061\351\342 \151\307\363\160\333\040\025\206\320\015\360\276\254\001\165\204  $\label{eq:condition} $$ \frac{316}{176}\frac{237}{115}\frac{277}{267}\frac{0073}{234}\frac{363}{312}\frac{35}{342}\frac{136}{150}\frac{330}{312} $$$ \243\235\227\345\100\140\322\066\041\376\320\264\270\027\332\164 \243\177\324\337\260\230\002\254\157\153\153\054\045\044\162\241 \145\356\045\132\345\346\062\347\362\337\253\111\372\363\220\151 \043\333\004\331\347\134\130\374\145\324\227\276\314\374\056\012 \314\045\052\065\004\370\140\221\025\165\075\101\377\043\037\031 \310\154\353\202\123\004\246\344\114\042\115\215\214\272\316\133 \163\354\144\124\120\155\321\234\125\373\151\303\066\303\214\274 \074\205\246\153\012\046\015\340\223\230\140\256\176\306\044\227 \212\141\137\221\216\146\222\011\207\066\315\213\233\055\076\366 \121\324\120\324\131\050\275\203\362\314\050\173\123\206\155\330 \046\210\160\327\352\221\315\076\271\312\300\220\156\132\306\136 \164\145\327\134\376\243\342

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "D-TRUST Root Class 3 CA 2 2009"
```

# Issuer: CN=D-TRUST Root Class 3 CA 2 2009,O=D-Trust GmbH,C=DE

# Serial Number: 623603 (0x983f3)

# Subject: CN=D-TRUST Root Class 3 CA 2 2009,O=D-Trust GmbH,C=DE

# Not Valid Before: Thu Nov 05 08:35:58 2009 # Not Valid After: Mon Nov 05 08:35:58 2029

# Fingerprint (SHA-256):

49:E7:A4:42:AC:F0:EA:62:87:05:00:54:B5:25:64:B6:50:E4:F4:9E:42:E3:48:D6:AA:38:E0:39:E9:57:B1:C1

# Fingerprint (SHA1): 58:E8:AB:B0:36:15:33:FB:80:F7:9B:1B:6D:29:D3:FF:8D:5F:00:F0

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "D-TRUST Root Class 3 CA 2 2009"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$130\350\253\260\066\025\063\373\200\367\233\033\155\051\323\377\215\137\000\360$ 

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\315\340\045\151\215\107\254\234\211\065\220\367\375\121\075\057

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

```
\060\115\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\025\060\023\006\003\125\004\012\014\014\104\055\124\162\165\163
\164\040\107\155\142\110\061\047\060\045\006\003\125\004\003\014
\label{eq:condition} $$ \036\104\055\124\122\125\123\124\040\122\157\157\164\040\103\154
\141\163\163\040\063\040\103\101\040\062\040\062\060\060\071
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\003\011\203\363
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
#
# Certificate "D-TRUST Root Class 3 CA 2 EV 2009"
# Issuer: CN=D-TRUST Root Class 3 CA 2 EV 2009,O=D-Trust GmbH,C=DE
# Serial Number: 623604 (0x983f4)
# Subject: CN=D-TRUST Root Class 3 CA 2 EV 2009,O=D-Trust GmbH,C=DE
# Not Valid Before: Thu Nov 05 08:50:46 2009
# Not Valid After: Mon Nov 05 08:50:46 2029
# Fingerprint (SHA-256):
EE:C5:49:6B:98:8C:E9:86:25:B9:34:09:2E:EC:29:08:BE:D0:B0:F3:16:C2:D4:73:0C:84:EA:F1:F3:D3:48:81
# Fingerprint (SHA1): 96:C9:1B:0B:95:B4:10:98:42:FA:D0:D8:22:79:FE:60:FA:B9:16:83
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "D-TRUST Root Class 3 CA 2 EV 2009"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\120\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\025\060\023\006\003\125\004\012\014\014\104\055\124\162\165\163
\164\040\107\155\142\110\061\052\060\050\006\003\125\004\003\014
\041\104\055\124\122\125\123\124\040\122\157\157\164\040\103\154
\141\163\163\040\063\040\103\101\040\062\040\105\126\040\062\060
\060\071
END
CKA ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\label{eq:condition} $$ \060\120\061\013\060\011\006\003\125\004\006\023\002\104\105\061 $$
\025\060\023\006\003\125\004\012\014\014\104\055\124\162\165\163
\164\040\107\155\142\110\061\052\060\050\006\003\125\004\003\014
\041\104\055\124\122\125\123\124\040\122\157\157\164\040\103\154
\141\163\163\040\063\040\103\101\040\062\040\105\126\040\062\060
\060\071
END
```

# CKA SERIAL NUMBER MULTILINE OCTAL

\002\003\011\203\364

**END** 

# CKA VALUE MULTILINE OCTAL

\060\202\004\103\060\202\003\053\240\003\002\001\002\002\003\011 \203\364\060\015\006\011\052\206\110\206\367\015\001\001\013\005 \000\060\120\061\013\060\011\006\003\125\004\006\023\002\104\105 \061\025\060\023\006\003\125\004\012\014\014\104\055\124\162\165 \163\164\040\107\155\142\110\061\052\060\050\006\003\125\004\003 \014\041\104\055\124\122\125\123\124\040\122\157\157\164\040\103 \154\141\163\163\040\063\040\103\101\040\062\040\105\126\040\062  $\label{eq:condition} $$ \060\060\071\060\036\027\015\060\071\061\061\060\065\060\070\065$ \060\064\066\132\027\015\062\071\061\061\060\065\060\070\065\060 \064\066\132\060\120\061\013\060\011\006\003\125\004\006\023\002 \104\105\061\025\060\023\006\003\125\004\012\014\014\104\055\124 \162\165\163\164\040\107\155\142\110\061\052\060\050\006\003\125  $\\ \\004\\ \\003\\ \\014\\ \\041\\ \\104\\ \\055\\ \\124\\ \\122\\ \\125\\ \\123\\ \\124\\ \\040\\ \\122\\ \\157\\ \\157\\ \\164$ \040\103\154\141\163\163\040\063\040\103\101\040\062\040\105\126 \040\062\060\060\071\060\202\001\042\060\015\006\011\052\206\110 \206\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001 \012\002\202\001\001\000\231\361\204\064\160\272\057\267\060\240 \216\275\174\004\317\276\142\274\231\375\202\227\322\172\012\147 \226\070\011\366\020\116\225\042\163\231\215\332\025\055\347\005 \374\031\163\042\267\216\230\000\274\074\075\254\241\154\373\326 \171\045\113\255\360\314\144\332\210\076\051\270\017\011\323\064 \335\063\365\142\321\341\315\031\351\356\030\117\114\130\256\342 \036\326\014\133\025\132\330\072\270\304\030\144\036\343\063\262 \265\211\167\116\014\277\331\224\153\023\227\157\022\243\376\231 \251\004\314\025\354\140\150\066\355\010\173\267\365\277\223\355 \146\061\203\214\306\161\064\207\116\027\352\257\213\221\215\034 \126\101\256\042\067\136\067\362\035\331\321\055\015\057\151\121 \247\276\146\246\212\072\052\275\307\032\261\341\024\360\276\072 \035\271\317\133\261\152\376\264\261\106\040\242\373\036\073\160 \357\223\230\175\214\163\226\362\305\357\205\160\255\051\046\374 \036\004\076\034\240\330\017\313\122\203\142\174\356\213\123\225 \220\251\127\242\352\141\005\330\371\115\304\047\372\156\255\355 \371\327\121\367\153\245\002\003\001\000\001\243\202\001\044\060 \202\001\040\060\017\006\003\125\035\023\001\001\377\004\005\060  $\label{eq:condition} $$ \003\001\001\377\060\035\006\003\125\035\016\004\026\004\024\323$ \224\212\114\142\023\052\031\056\314\257\162\212\175\066\327\232 \034\334\147\060\016\006\003\125\035\017\001\001\377\004\004\003 \002\001\006\060\201\335\006\003\125\035\037\004\201\325\060\201 \322\060\201\207\240\201\204\240\201\201\206\177\154\144\141\160 \072\057\057\144\151\162\145\143\164\157\162\171\056\144\055\164 \162\165\163\164\056\156\145\164\057\103\116\075\104\055\124\122 \125\123\124\045\062\060\122\157\157\164\045\062\060\103\154\141 \163\163\045\062\060\063\045\062\060\103\101\045\062\060\062\045  $\\ \begin{tabular}{l} $\langle 062 \rangle 060 \rangle 105 \rangle 126 \langle 045 \rangle 062 \rangle 060 \rangle 060 \rangle 060 \rangle 071 \rangle 054 \rangle 117 \rangle 075 \rangle 104 \rangle 055 \rangle 062 \rangle 060 \rangle 060$ 

\124\162\165\163\164\045\062\060\107\155\142\110\054\103\075\104 \105\077\143\145\162\164\151\146\151\143\141\164\145\162\145\166 \157\143\141\164\151\157\156\154\151\163\164\060\106\240\104\240  $\label{eq:condition} $$ 102\206\100\150\164\164\160\072\057\057\167\167\167\056\144\055$$ \164\162\165\163\164\056\156\145\164\057\143\162\154\057\144\055  $\label{eq:loss} $$ 164\165\163\164\137\162\157\157\164\137\143\154\141\163\163$$ \137\063\137\143\141\137\062\137\145\166\137\062\060\060\071\056  $\label{eq:condition} $$ \005\000\003\202\001\000\0064\355\173\132\074\244\224\210\357\$ \032\021\165\007\057\263\376\074\372\036\121\046\353\207\366\051 \336\340\361\324\306\044\011\351\301\317\125\033\264\060\331\316  $\label{eq:condition} $$ \032\376\006\121\246\025\244\055\357\262\113\277\040\050\045\111 $$$ \321\246\066\167\064\350\144\337\122\261\021\307\163\172\315\071 \236\302\255\214\161\041\362\132\153\257\337\074\116\125\257\262  $\label{eq:condition} $$ \204\145\024\211\271\167\313\052\061\276\317\243\155\317\157\110$$ \224\062\106\157\347\161\214\240\246\204\031\067\007\362\003\105 \011\053\206\165\174\337\137\151\127\000\333\156\330\246\162\042 \113\120\324\165\230\126\337\267\030\377\103\103\120\256\172\104 \173\360\171\121\327\103\075\247\323\201\323\360\311\117\271\332 \306\227\206\320\202\303\344\102\155\376\260\342\144\116\016\046 \347\100\064\046\265\010\211\327\010\143\143\070\047\165\036\063 \352\156\250\335\237\231\117\164\115\201\211\200\113\335\232\227  $\label{eq:condition} $$ \051\134\057\276\201\101\271\214\377\352\175\140\006\236\315\327$ \075\323\056\243\025\274\250\346\046\345\157\303\334\270\003\041 \352\237\026\361\054\124\265

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "D-TRUST Root Class 3 CA 2 EV 2009"
```

EE:C5:49:6B:98:8C:E9:86:25:B9:34:09:2E:EC:29:08:BE:D0:B0:F3:16:C2:D4:73:0C:84:EA:F1:F3:D3:48:81

# Fingerprint (SHA1): 96:C9:1B:0B:95:B4:10:98:42:FA:D0:D8:22:79:FE:60:FA:B9:16:83

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "D-TRUST Root Class 3 CA 2 EV 2009"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\226\311\033\013\225\264\020\230\102\372\320\330\042\171\376\140

\372\271\026\203

**END** 

<sup>#</sup> Issuer: CN=D-TRUST Root Class 3 CA 2 EV 2009,O=D-Trust GmbH,C=DE

<sup>#</sup> Serial Number: 623604 (0x983f4)

<sup>#</sup> Subject: CN=D-TRUST Root Class 3 CA 2 EV 2009,O=D-Trust GmbH,C=DE

<sup>#</sup> Not Valid Before: Thu Nov 05 08:50:46 2009

<sup>#</sup> Not Valid After: Mon Nov 05 08:50:46 2029

<sup>#</sup> Fingerprint (SHA-256):

```
CKA CERT MD5 HASH MULTILINE OCTAL
\252\306\103\054\136\055\315\304\064\300\120\117\021\002\117\266
END
CKA ISSUER MULTILINE OCTAL
\060\120\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\025\060\023\006\003\125\004\012\014\014\104\055\124\162\165\163
\164\040\107\155\142\110\061\052\060\050\006\003\125\004\003\014
\041\104\055\124\122\125\123\124\040\122\157\157\164\040\103\154
\141\163\163\040\063\040\103\101\040\062\040\105\126\040\062\060
\060\071
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\003\011\203\364
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "CA Disig Root R2"
# Issuer: CN=CA Disig Root R2,O=Disig a.s.,L=Bratislava,C=SK
# Serial Number:00:92:b8:88:db:b0:8a:c1:63
# Subject: CN=CA Disig Root R2,O=Disig a.s.,L=Bratislava,C=SK
# Not Valid Before: Thu Jul 19 09:15:30 2012
# Not Valid After: Sat Jul 19 09:15:30 2042
# Fingerprint (SHA-256):
E2:3D:4A:03:6D:7B:70:E9:F5:95:B1:42:20:79:D2:B9:1E:DF:BB:1F:B6:51:A0:63:3E:AA:8A:9D:C5:F8:07:03
# Fingerprint (SHA1): B5:61:EB:EA:A4:DE:E4:25:4B:69:1A:98:A5:57:47:C2:34:C7:D9:71
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "CA Disig Root R2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\122\061\013\060\011\006\003\125\004\006\023\002\123\113\061
\label{eq:condition} $$ \023\060\021\006\003\125\004\007\023\012\102\162\141\164\151\163
\154\141\166\141\061\023\060\021\006\003\125\004\012\023\012\104
\151\163\151\147\040\141\056\163\056\061\031\060\027\006\003\125
\164\040\122\062
END
CKA ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\122\061\013\060\011\006\003\125\004\006\023\002\123\113\061
\023\060\021\006\003\125\004\007\023\012\102\162\141\164\151\163
```

\154\141\166\141\061\023\060\021\006\003\125\004\012\023\012\104 \151\163\151\147\040\141\056\163\056\061\031\060\027\006\003\125 \004\003\023\020\103\101\040\104\151\163\151\147\040\122\157\157 \164\040\122\062

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL \002\011\000\222\270\210\333\260\212\301\143

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\151\060\202\003\121\240\003\002\001\002\002\011\000 \222\270\210\333\260\212\301\143\060\015\006\011\052\206\110\206 \367\015\001\001\013\005\000\060\122\061\013\060\011\006\003\125 \004\006\023\002\123\113\061\023\060\021\006\003\125\004\007\023  $\label{eq:condition} $$ \003\125\004\012\023\012\104\151\163\151\147\040\141\056\163\056$$ \061\031\060\027\006\003\125\004\003\023\020\103\101\040\104\151  $\label{eq:condition} $$ 163\151\147\040\122\157\157\164\040\122\062\060\036\027\015\061$ \062\060\067\061\071\060\071\061\065\063\060\132\027\015\064\062 \060\067\061\071\060\071\061\065\063\060\132\060\122\061\013\060 \125\004\007\023\012\102\162\141\164\151\163\154\141\166\141\061 \023\060\021\006\003\125\004\012\023\012\104\151\163\151\147\040  $\label{eq:condition} $$ 141\056\163\056\061\031\060\027\006\003\125\004\003\023\020\103$ \101\040\104\151\163\151\147\040\122\157\157\164\040\122\062\060 \202\002\042\060\015\006\011\052\206\110\206\367\015\001\001\001 \005\000\003\202\002\017\000\060\202\002\012\002\202\002\001\000 \242\243\304\000\011\326\205\135\055\155\024\366\302\303\163\236  $\\ \begin{tabular}{l} $$ \begin{tabular}{l} $$ \begin{tabular}{l} $\begin{tabular}{l} $\begin{tabular}{l}$ \253\171\130\074\332\377\174\034\237\330\227\002\170\076\153\101 \004\351\101\275\276\003\054\105\366\057\144\324\253\135\243\107  $\label{eq:condition} $$ \075\144\233\351\150\232\306\314\033\077\272\276\262\213\064\002$ \056\230\125\031\374\214\157\252\137\332\114\316\115\003\041\243 \330\322\064\223\126\226\313\114\014\000\026\074\137\032\315\310 \307\154\246\255\323\061\247\274\350\345\341\146\326\322\373\003 \264\101\145\311\020\256\016\005\143\306\200\152\151\060\375\322 \356\220\357\015\047\337\237\225\163\364\341\045\332\154\026\336 \101\070\064\352\213\374\321\350\004\024\141\055\101\176\254\307  $\label{eq:condition} $$ \frac{167}{116}\frac{313}{121}\frac{4}{373}\frac{6222}{030}\frac{033}{004}\frac{132}{150}\frac{306}{311}\frac{304}{306} $$$  $\label{eq:condition} $$ 372\267\023\240\230\267\021\053\267\326\127\314\174\236\027\321 $$ \313\045\376\206\116\044\056\126\014\170\115\236\001\022\246\053 \247\001\145\156\174\142\035\204\204\337\352\300\153\265\245\052 \225\203\303\123\021\014\163\035\013\262\106\220\321\102\072\316  $\label{eq:condition} $$ 100\156\225\255\377\306\224\255\156\227\204\216\175\157\236\212 $$$ \200\015\111\155\163\342\173\222\036\303\363\301\363\353\056\005 \157\331\033\317\067\166\004\310\264\132\344\027\247\313\335\166 \037\320\031\166\350\054\005\263\326\234\064\330\226\334\141\207 \221\005\344\104\010\063\301\332\271\010\145\324\256\262\066\015 \353\272\070\272\014\345\233\236\353\215\146\335\231\317\326\211

\101\366\004\222\212\051\051\155\153\072\034\347\165\175\002\161 \016\363\300\347\275\313\031\335\235\140\262\302\146\140\266\261 \004\356\311\346\206\271\232\146\100\250\347\021\355\201\105\003 \213\366\147\131\350\301\006\021\275\335\317\200\002\117\145\100 \170\134\107\120\310\233\346\037\201\173\344\104\250\133\205\232 \342\336\132\325\307\371\072\104\146\113\344\062\124\174\344\154 \234\263\016\075\027\242\262\064\022\326\176\262\250\111\273\321 \172\050\100\276\242\026\037\337\344\067\037\021\163\373\220\012 \145\103\242\015\174\370\006\001\125\063\175\260\015\270\364\365 \256\245\102\127\174\066\021\214\173\136\304\003\235\214\171\235 \002\003\001\000\001\243\102\060\100\060\017\006\003\125\035\023  $\label{eq:condition} $$ \001\001\377\004\005\060\003\001\001\377\060\016\006\003\125\035 $$$ \017\001\001\377\004\004\003\002\001\006\060\035\006\003\125\035  $\label{eq:condition} $$ \004\026\004\024\265\231\370\257\260\224\365\343\040\326\012 $$$ \255\316\116\126\244\056\156\102\355\060\015\006\011\052\206\110 \206\367\015\001\001\013\005\000\003\202\002\001\000\046\006\136 \160\347\145\063\310\202\156\331\234\027\072\033\172\146\262\001 \366\170\073\151\136\057\352\377\116\371\050\303\230\052\141\114 \264\044\022\212\175\155\021\024\367\234\265\312\346\274\236\047 \216\114\031\310\251\275\172\300\327\066\016\155\205\162\156\250 \306\242\155\366\372\163\143\177\274\156\171\010\034\235\212\237 \032\212\123\246\330\273\331\065\125\261\021\305\251\003\263\126  $\label{eq:condition} $$ \073\271\204\223\042\136\176\301\366\022\122\213\352\054\147\274$ \376\066\114\365\270\317\321\263\111\222\073\323\051\016\231\033 \226\367\141\270\073\304\053\266\170\154\264\043\157\360\375\323 \262\136\165\037\231\225\250\254\366\332\341\305\061\173\373\321 \106\263\322\274\147\264\142\124\272\011\367\143\260\223\242\232  $\label{eq:condition} $$ \frac{371}{351}122\\056\\213\\140\\022\\253\\374\\365\\140\\126\\357\\020\\134\\213$ \304\032\102\334\203\133\144\016\313\265\274\326\117\301\174\074 \156\215\023\155\373\173\353\060\320\334\115\257\305\325\266\245  $\label{eq:condition} $$ \frac{114\\133\\161\\311\\350\\061\\276\\350\\070\\006\\110\\241\\032\\342\\352\\322$ \336\022\071\130\032\377\200\016\202\165\346\267\311\007\154\016 \357\377\070\361\230\161\304\267\177\016\025\320\045\151\275\042 \235\053\355\005\366\106\107\254\355\300\360\324\073\342\354\356 \226\133\220\023\116\036\126\072\353\260\357\226\273\226\043\021 \272\362\103\206\164\144\225\310\050\165\337\035\065\272\322\067 \203\070\123\070\066\073\317\154\351\371\153\016\320\373\004\350  $\label{eq:condition} $$ \frac{117}{167}\frac{327}{145}\frac{1001}{170}\frac{206}{014}\frac{172}{076}\frac{041}{142}\frac{361}{177}\frac{143}{161} $$$  $\label{eq:condition} $$ \014\311\237\104\333\250\047\242\165\276\156\201\076\327\300\353$ \033\230\017\160\134\064\262\212\314\300\205\030\353\156\172\263 \367\132\241\007\277\251\102\222\363\140\042\227\344\024\241\007 \233\116\166\300\216\175\375\244\045\307\107\355\377\037\163\254 \314\303\245\351\157\012\216\233\145\302\120\205\265\243\240\123 \022\314\125\207\141\363\201\256\020\106\141\275\104\041\270\302 \075\164\317\176\044\065\372\034\007\016\233\075\042\312\357\061 \057\214\254\022\275\357\100\050\374\051\147\237\262\023\117\146  $\\ 044\\304\\123\\031\\351\\036\\051\\025\\357\\346\\155\\260\\177\\055\\147\\375$ \363\154\033\165\106\243\345\112\027\351\244\327\013

**END** CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE # Trust for "CA Disig Root R2" # Issuer: CN=CA Disig Root R2,O=Disig a.s.,L=Bratislava,C=SK # Serial Number:00:92:b8:88:db:b0:8a:c1:63 # Subject: CN=CA Disig Root R2,O=Disig a.s.,L=Bratislava,C=SK # Not Valid Before: Thu Jul 19 09:15:30 2012 # Not Valid After: Sat Jul 19 09:15:30 2042 # Fingerprint (SHA-256): E2:3D:4A:03:6D:7B:70:E9:F5:95:B1:42:20:79:D2:B9:1E:DF:BB:1F:B6:51:A0:63:3E:AA:8A:9D:C5:F8:07:03 # Fingerprint (SHA1): B5:61:EB:EA:A4:DE:E4:25:4B:69:1A:98:A5:57:47:C2:34:C7:D9:71 CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST CKA TOKEN CK BBOOL CK TRUE CKA\_PRIVATE CK\_BBOOL CK\_FALSE CKA MODIFIABLE CK BBOOL CK FALSE CKA\_LABEL UTF8 "CA Disig Root R2" CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL \265\141\353\352\244\336\344\045\113\151\032\230\245\127\107\302 \064\307\331\161 **END** CKA CERT MD5 HASH MULTILINE OCTAL \046\001\373\330\047\247\027\232\105\124\070\032\103\001\073\003 **END** CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000\122\061\013\060\011\006\003\125\004\006\023\002\123\113\061 $$ \023\060\021\006\003\125\004\012\162\141\164\151\163 $$ \154\141\166\141\061\023\060\021\006\003\125\004\012\023\012\104 $$ \151\163\151\147\040\141\056\163\056\061\031\060\027\006\003\125 $$ \004\003\023\020\103\101\040\104\151\163\151\147\040\122\157\157 $$ \164\040\122\062$$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\011\000\222\270\210\333\260\212\301\143

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

# # Certificate "ACCVRAIZ1"
# # Issuer: C=ES,O=ACCV,OU=PKIACCV,CN=ACCVRAIZ1
# Serial Number:5e:c3:b7:a6:43:7f:a4:e0
# Subject: C=ES,O=ACCV,OU=PKIACCV,CN=ACCVRAIZ1

# Not Valid Before: Thu May 05 09:37:37 2011

# Not Valid After: Tue Dec 31 09:37:37 2030

# Fingerprint (SHA-256):

9A:6E:C0:12:E1:A7:DA:9D:BE:34:19:4D:47:8A:D7:C0:DB:18:22:FB:07:1D:F1:29:81:49:6E:D1:04:38:41:13

# Fingerprint (SHA1): 93:05:7A:88:15:C6:4F:CE:88:2F:FA:91:16:52:28:78:BC:53:64:17

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA LABEL UTF8 "ACCVRAIZ1"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA\_SUBJECT MULTILINE\_OCTAL

\023\002\105\123

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

 $\label{eq:condition} $$ \002\010\136\303\267\246\103\177\244\340 $$$ 

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\202\007\323\060\202\005\273\240\003\002\001\002\002\010\136$ \303\267\246\103\177\244\340\060\015\006\011\052\206\110\206\367 \015\001\001\005\005\000\060\102\061\022\060\020\006\003\125\004 \003\014\011\101\103\103\126\122\101\111\132\061\061\020\060\016 \006\003\125\004\013\014\007\120\113\111\101\103\103\126\061\015 \060\013\006\003\125\004\012\014\004\101\103\103\126\061\013\060 \011\006\003\125\004\006\023\002\105\123\060\036\027\015\061\061 \060\065\060\065\060\071\063\067\063\067\132\027\015\063\060\061  $\label{eq:condition} $$ \062\063\061\060\071\063\067\063\067\132\060\102\061\022\060\020 $$$ \006\003\125\004\003\014\011\101\103\103\126\122\101\111\132\061 \061\020\060\016\006\003\125\004\013\014\007\120\113\111\101\103 \126\061\013\060\011\006\003\125\004\006\023\002\105\123\060\202 \002\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005 \000\003\202\002\017\000\060\202\002\012\002\202\002\001\000\233 \251\253\277\141\112\227\257\057\227\146\232\164\137\320\331\226 \375\317\342\344\146\357\037\037\107\063\302\104\243\337\232\336 \037\265\124\335\025\174\151\065\021\157\273\310\014\216\152\030

\036\330\217\331\026\274\020\110\066\134\360\143\263\220\132\134 \044\067\327\243\326\313\011\161\271\361\001\162\204\260\175\333 \115\200\315\374\323\157\311\370\332\266\016\202\322\105\205\250 \033\150\250\075\350\364\104\154\275\241\302\313\003\276\214\076 \023\000\204\337\112\110\300\343\042\012\350\351\067\247\030\114 \261\011\015\043\126\177\004\115\331\027\204\030\245\310\332\100 \224\163\353\316\016\127\074\003\201\072\235\012\241\127\103\151 \254\127\155\171\220\170\345\265\264\073\330\274\114\215\050\241 \247\243\247\272\002\116\045\321\052\256\355\256\003\042\270\153 \040\017\060\050\124\225\177\340\356\316\012\146\235\321\100\055 \156\042\257\235\032\301\005\031\322\157\300\362\237\370\173\263  $\label{eq:condition} $$ \002\102\373\120\251\035\055\223\017\043\253\306\301\017\222\377 $$$ \320\242\025\365\123\011\161\034\377\105\023\204\346\046\136\370 \340\210\034\012\374\026\266\250\163\006\270\360\143\204\002\240 \306\132\354\347\164\337\160\256\243\203\045\352\326\307\227\207 \223\247\306\212\212\063\227\140\067\020\076\227\076\156\051\025  $\label{eq:condition} $$ 326\241\017\321\210\054\022\237\157\252\244\306\102\353\101\242$ \343\225\103\323\001\205\155\216\273\073\363\043\066\307\376\073 \340\241\045\007\110\253\311\211\164\377\010\217\200\277\300\226 \145\363\356\354\113\150\275\235\210\303\061\263\100\361\350\317 \366\070\273\234\344\321\177\324\345\130\233\174\372\324\363\016 \233\165\221\344\272\122\056\031\176\321\365\315\132\031\374\272  $\label{eq:condition} $$ 006\366\373\122\250\113\231\004\335\370\371\264\213\120\243\116$$ \142\211\360\207\044\372\203\102\301\207\372\325\055\051\052\132 \161\172\144\152\327\047\140\143\015\333\316\111\365\215\037\220 \211\062\027\370\163\103\270\322\132\223\206\141\326\341\165\012 \352\171\146\166\210\117\161\353\004\045\326\012\132\172\223\345 \271\113\027\100\017\261\266\271\365\336\117\334\340\263\254\073 \021\160\140\204\112\103\156\231\040\300\051\161\012\300\145\002 \003\001\000\001\243\202\002\313\060\202\002\307\060\175\006\010  $\label{eq:condition} $$ \0.053\0.06\0.01\0.05\0.005\0.007\0.001\0.004\1.61\0.60\1.57\0.60\1.14\0.06\0.10 $$$ \053\006\001\005\005\007\060\002\206\100\150\164\164\160\072\057 \057\167\167\167\056\141\143\143\166\056\145\163\057\146\151\154 \145\141\144\155\151\156\057\101\162\143\150\151\166\157\163\057 \143\145\162\164\151\146\151\143\141\144\157\163\057\162\141\151 \172\141\143\143\166\061\056\143\162\164\060\037\006\010\053\006 \001\005\005\007\060\001\206\023\150\164\164\160\072\057\057\157 \143\163\160\056\141\143\143\166\056\145\163\060\035\006\003\125  $\label{eq:condition} $$ \035\016\004\026\004\024\322\207\264\343\337\067\047\223\125\366 $$$ \126\352\201\345\066\314\214\036\077\275\060\017\006\003\125\035 \023\001\001\377\004\005\060\003\001\001\377\060\037\006\003\125 \035\043\004\030\060\026\200\024\322\207\264\343\337\067\047\223 \125\366\126\352\201\345\066\314\214\036\077\275\060\202\001\163 \006\003\125\035\040\004\202\001\152\060\202\001\146\060\202\001  $\label{eq:condition} $$ 142\006\004\125\035\040\000\060\202\001\130\060\202\001\042\006$ \010\053\006\001\005\005\007\002\002\060\202\001\024\036\202\001  $\label{eq:condition} $$ 141\000\144\000\040\000\144\000\145\000\040\000\103\000\145\000 $$ 

\162\000\164\000\151\000\146\000\151\000\143\000\141\000\143\000 \151\000\363\000\156\000\040\000\122\000\141\000\355\000\172\000 \040\000\144\000\145\000\040\000\154\000\141\000\040\000\101\000 \103\000\103\000\126\000\040\000\050\000\101\000\147\000\145\000 \156\000\143\000\151\000\141\000\040\000\144\000\145\000\040\000 \124\000\145\000\143\000\156\000\157\000\154\000\157\000\147\000 \355\000\141\000\040\000\171\000\040\000\103\000\145\000\162\000 \164\000\151\000\146\000\151\000\143\000\141\000\143\000\151\000 \363\000\156\000\040\000\105\000\154\000\145\000\143\000\164\000 \162\000\363\000\156\000\151\000\143\000\141\000\054\000\040\000 \103\000\111\000\106\000\040\000\121\000\064\000\066\000\060\000  $\label{eq:condition} $$ \000\061\000\065\000\066\000\105\000\051\000\056\000\040\000 $$$ \103\000\120\000\123\000\040\000\145\000\156\000\040\000\150\000  $\label{eq:condition} $$ 164\000\166\000\072\000\057\000\057\000\167\000\167\000$  $\label{eq:condition} $$ 167\000\056\000\141\000\143\000\143\000\166\000\056\000\145\000 $$$ \163\060\060\006\010\053\006\001\005\005\007\002\001\026\044\150  $\label{eq:condition} $$ 164\160\072\057\057\167\167\167\056\141\143\143\166\056\145$$ \163\057\154\145\147\151\163\154\141\143\151\157\156\137\143\056 \150\164\155\060\125\006\003\125\035\037\004\116\060\114\060\112 \240\110\240\106\206\104\150\164\164\160\072\057\057\167\167\167 \056\141\143\143\166\056\145\163\057\146\151\154\145\141\144\155 \151\156\057\101\162\143\150\151\166\157\163\057\143\145\162\164  $\verb| 151| 146| 151| 143| 141| 144| 157| 163| 057| 162| 141| 151| 172| 141| 143| 143|$ \166\061\137\144\145\162\056\143\162\154\060\016\006\003\125\035 \017\001\001\377\004\004\003\002\001\006\060\027\006\003\125\035  $\label{eq:condition} $$ \021\004\020\060\016\201\014\141\143\143\166\100\141\143\143\166$ \056\145\163\060\015\006\011\052\206\110\206\367\015\001\001\005  $\label{eq:condition} $$ \005\000\003\202\000\001\000\227\061\002\237\347\375\103\147\110 $$$ \104\024\344\051\207\355\114\050\146\320\217\065\332\115\141\267 \112\227\115\265\333\220\340\005\056\016\306\171\320\362\227\151  $\label{eq:condition} $$ \017\275\004\107\331\276\333\265\051\332\233\331\256\251\231\325 $$$ \323\074\060\223\365\215\241\250\374\006\215\104\364\312\026\225 \174\063\334\142\213\250\067\370\047\330\011\055\033\357\310\024  $\\ \\047\\ \\040\\ \\251\\ \\144\\ \\104\\ \\377\\ \\056\\ \\326\\ \\165\\ \\252\\ \\154\\ \\115\\ \\140\\ \\100\\ \\031\\ \\111$ \103\124\143\332\342\314\272\146\345\117\104\172\133\331\152\201 \053\100\325\177\371\001\047\130\054\310\355\110\221\174\077\246 \000\317\304\051\163\021\066\336\206\031\076\235\356\031\212\033 \325\260\355\216\075\234\052\300\015\330\075\146\343\074\015\275 \325\224\134\342\342\247\065\033\004\000\366\077\132\215\352\103 \275\137\211\035\251\301\260\314\231\342\115\000\012\332\311\047 \133\347\023\220\134\344\365\063\242\125\155\334\340\011\115\057 \261\046\133\047\165\000\011\304\142\167\051\010\137\236\131\254 \266\176\255\237\124\060\042\003\301\036\161\144\376\371\070\012 \226\030\335\002\024\254\043\313\006\034\036\244\175\215\015\336 \047\101\350\255\332\025\267\260\043\335\053\250\323\332\045\207 \355\350\125\104\115\210\364\066\176\204\232\170\254\367\016\126 \111\016\326\063\045\326\204\120\102\154\040\022\035\052\325\276  $\label{eq:condition} $$ \274\362\160\201\244\160\140\276\005\265\233\236\004\104\276\141 $$ 

 $\label{eq:condition} $$ \addition{ } $$ \add$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "ACCVRAIZ1"

# Issuer: C=ES.O=ACCV.OU=PKIACCV.CN=ACCVRAIZ1

# Serial Number:5e:c3:b7:a6:43:7f:a4:e0

# Subject: C=ES,O=ACCV,OU=PKIACCV,CN=ACCVRAIZ1

# Not Valid Before: Thu May 05 09:37:37 2011

# Not Valid After: Tue Dec 31 09:37:37 2030

# Fingerprint (SHA-256):

9A:6E:C0:12:E1:A7:DA:9D:BE:34:19:4D:47:8A:D7:C0:DB:18:22:FB:07:1D:F1:29:81:49:6E:D1:04:38:41:13

# Fingerprint (SHA1): 93:05:7A:88:15:C6:4F:CE:88:2F:FA:91:16:52:28:78:BC:53:64:17

CKA CLASS CK OBJECT CLASS CKO NSS TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "ACCVRAIZ1"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\223\005\172\210\025\306\117\316\210\057\372\221\026\122\050\170 \274\123\144\027

**END** 

CKA CERT MD5 HASH MULTILINE OCTAL

 $\label{eq:condition} $$ 320\240\132\356\005\266\011\224\041\241\175\361\262\051\202\002$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\010\136\303\267\246\103\177\244\340

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "TWCA Global Root CA"

#

# Issuer: CN=TWCA Global Root CA,OU=Root CA,O=TAIWAN-CA,C=TW

# Serial Number: 3262 (0xcbe)

# Subject: CN=TWCA Global Root CA,OU=Root CA,O=TAIWAN-CA,C=TW

# Not Valid Before: Wed Jun 27 06:28:33 2012 # Not Valid After : Tue Dec 31 15:59:59 2030

# Fingerprint (SHA-256):

59:76:90:07:F7:68:5D:0F:CD:50:87:2F:9F:95:D5:75:5A:5B:2B:45:7D:81:F3:69:2B:61:0A:98:67:2F:0E:1B

# Fingerprint (SHA1): 9C:BB:48:53:F6:A4:F6:D3:52:A4:E8:32:52:55:60:13:F5:AD:AF:65

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA LABEL UTF8 "TWCA Global Root CA"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \0011\006\003\125\004\006\023\002\124\127\061 $$ \022\060\020\006\003\125\004\012\023\011\124\101\111\1127\101\116 $$ \055\103\101\061\020\060\016\0006\003\125\004\013\023\007\122\157 $$ \157\164\040\103\101\061\034\060\032\006\003\125\004\003\023\023 $$ \124\127\103\101\040\107\154\157\142\141\154\040\122\157\157\164 $$ \040\103\101$$ 

END

CKA\_ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \0011\006\003\125\004\006\023\002\124\127\061 $$ \022\060\020\006\003\125\004\012\023\011\124\101\111\1127\101\116 $$ \055\103\101\061\020\060\016\0006\003\125\004\013\023\007\122\157 $$ \157\164\040\103\101\061\034\060\032\006\003\125\004\003\023\023 $$ \124\127\103\101\040\107\154\157\142\141\154\040\122\157\157\164 $$ \040\103\101$$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\002\014\276

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\157\164\040\103\101\061\034\060\032\006\003\125\004\003\023\023 \124\127\103\101\040\107\154\157\142\141\154\040\122\157\157\164 \040\103\101\060\036\027\015\061\062\060\066\062\067\060\066\062 \070\063\063\132\027\015\063\060\061\062\063\061\061\065\065\071 \065\071\132\060\121\061\013\060\011\006\003\125\004\006\023\002 \124\127\061\022\060\020\006\003\125\004\012\023\011\124\101\111 \127\101\116\055\103\101\061\020\060\016\006\003\125\004\013\023 \007\122\157\157\164\040\103\101\061\034\060\032\006\003\125\004  $\label{eq:condition} $$ \003\023\023\124\127\103\101\040\107\154\157\142\141\154\040\122 $$$ \157\157\164\040\103\101\060\202\002\042\060\015\006\011\052\206 \110\206\367\015\001\001\001\005\000\003\202\002\017\000\060\202  $\label{eq:condition} $$ \002\01\002\001\000\260\005\333\310\353\214\304\156\212 $$$ \041\357\216\115\234\161\012\037\122\160\355\155\202\234\227\305 \327\114\116\105\111\313\100\102\265\022\064\154\031\302\164\244  $\label{eq:condition} $$ \061\137\205\002\227\354\103\063\012\123\322\234\214\216\267\270 $$$ \171\333\053\325\152\362\216\146\304\356\053\001\007\222\324\263 \320\002\337\120\366\125\257\146\016\313\340\107\140\057\053\062 \071\065\122\072\050\203\370\173\026\306\030\270\142\326\107\045 \221\316\360\031\022\115\255\143\365\323\077\165\137\051\360\241 \060\034\052\240\230\246\025\275\356\375\031\066\360\342\221\103 \217\372\312\326\020\047\111\114\357\335\301\361\205\160\233\312 \352\250\132\103\374\155\206\157\163\351\067\105\251\360\066\307  $\label{eq:condition} $$ \frac{314}{210}165 \frac{36}{273}154 \frac{377}{233}153 \frac{376}{027}\frac{354}{141}\frac{252}{161} $$$ \174\306\035\242\367\111\351\025\265\074\326\241\141\365\021\367 \005\157\035\375\021\276\320\060\007\302\051\260\011\116\046\334 \343\242\250\221\152\037\302\221\105\210\134\345\230\270\161\245 \025\031\311\174\165\021\314\160\164\117\055\233\035\221\104\375 \126\050\240\376\273\206\152\310\372\134\013\130\334\306\113\166 \310\253\042\331\163\017\245\364\132\002\211\077\117\236\042\202 \356\242\164\123\052\075\123\047\151\035\154\216\062\054\144\000  $\\ \\ \langle 046 \rangle 143 \rangle 141 \rangle 066 \rangle 116 \rangle 243 \rangle 106 \rangle 267 \rangle 077 \rangle 175 \rangle 263 \rangle 055 \rangle 254 \rangle 155 \rangle 220 \rangle 242 \rangle 166 \rangle 167 \rangle 167$ \225\242\316\317\332\202\347\007\064\031\226\351\270\041\252\051 \176\246\070\276\216\051\112\041\146\171\037\263\303\265\011\147 \336\326\324\007\106\363\052\332\346\042\067\140\313\201\266\017 \240\017\351\310\225\177\277\125\221\005\172\317\075\025\300\157 \336\011\224\001\203\327\064\033\314\100\245\360\270\233\147\325 \230\221\073\247\204\170\225\046\244\132\010\370\053\164\264\000  $\label{eq:condition} $$ \004\074\337\270\024\216\350\337\251\215\154\147\222\063\035\300 $$$ \267\322\354\222\310\276\011\277\054\051\005\157\002\153\236\357 \274\277\052\274\133\300\120\217\101\160\161\207\262\115\267\004 \251\204\243\062\257\256\356\153\027\213\262\261\376\154\341\220 \214\210\250\227\110\316\310\115\313\363\006\317\137\152\012\102 \261\036\036\167\057\216\240\346\222\016\006\374\005\042\322\046 \341\061\121\175\062\334\017\002\003\001\000\001\243\043\060\041 \060\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001 \377\060\015\006\011\052\206\110\206\367\015\001\001\013\005\000 \003\202\002\001\000\137\064\201\166\357\226\035\325\345\265\331

\002\143\204\026\301\256\240\160\121\247\367\114\107\065\310\013 \327\050\075\211\161\331\252\063\101\352\024\033\154\041\000\300 \154\102\031\176\237\151\133\040\102\337\242\322\332\304\174\227 \113\215\260\350\254\310\356\245\151\004\231\012\222\246\253\047 \056\032\115\201\277\204\324\160\036\255\107\376\375\112\235\063 \340\362\271\304\105\010\041\012\332\151\151\163\162\015\276\064 \376\224\213\255\303\036\065\327\242\203\357\345\070\307\245\205  $\label{eq:condition} $$ \037\253\317\064\354\077\050\376\014\361\127\206\116\311\125\367 $$$  $\label{eq:condition} $$ \034\324\330\245\175\006\172\157\325\337\020\337\201\116\041\145$$$ \261\266\341\027\171\225\105\006\316\137\314\334\106\211\143\150 \104\215\223\364\144\160\240\075\235\050\005\303\071\160\270\142 \173\040\375\344\333\351\010\241\270\236\075\011\307\117\373\054 \370\223\166\101\336\122\340\341\127\322\235\003\274\167\236\376 \236\051\136\367\301\121\140\037\336\332\013\262\055\165\267\103 \110\223\347\366\171\306\204\135\200\131\140\224\374\170\230\217 \074\223\121\355\100\220\007\337\144\143\044\313\116\161\005\241 \327\224\032\210\062\361\042\164\042\256\245\246\330\022\151\114 \140\243\002\356\053\354\324\143\222\013\136\276\057\166\153\243 \266\046\274\217\003\330\012\362\114\144\106\275\071\142\345\226 \353\064\143\021\050\314\225\361\255\357\357\334\200\130\110\351 \113\270\352\145\254\351\374\200\265\265\310\105\371\254\301\237 \331\271\352\142\210\216\304\361\113\203\022\255\346\213\204\326 \236\302\353\203\030\237\152\273\033\044\140\063\160\314\354\367 \062\363\134\331\171\175\357\236\244\376\311\043\303\044\356\025 \222\261\075\221\117\046\206\275\146\163\044\023\352\244\256\143 \301\255\175\204\003\074\020\170\206\033\171\343\304\363\362\004 \225\040\256\043\202\304\263\072\000\142\277\346\066\044\341\127  $\label{eq:condition} $$ \272\307\036\220\165\325\137\077\225\141\053\301\073\315\345\263$ \150\141\320\106\046\251\041\122\151\055\353\056\307\353\167\316 \246\072\265\003\063\117\166\321\347\134\124\001\135\313\170\364  $\label{eq:condition} $$ \frac{311}014\frac{277}317022\frac{216}027055043\frac{150}{224}\frac{347}253\frac{376}251262$ \053\006\320\004\315

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

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# Trust for "TWCA Global Root CA"
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CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

<sup>#</sup> Issuer: CN=TWCA Global Root CA,OU=Root CA,O=TAIWAN-CA,C=TW

<sup>#</sup> Serial Number: 3262 (0xcbe)

<sup>#</sup> Subject: CN=TWCA Global Root CA,OU=Root CA,O=TAIWAN-CA,C=TW

<sup>#</sup> Not Valid Before: Wed Jun 27 06:28:33 2012 # Not Valid After : Tue Dec 31 15:59:59 2030

<sup>#</sup> Fingerprint (SHA-256):

<sup>59:76:90:07:</sup>F7:68:5D:0F:CD:50:87:2F:9F:95:D5:75:5A:5B:2B:45:7D:81:F3:69:2B:61:0A:98:67:2F:0E:1B

<sup>#</sup> Fingerprint (SHA1): 9C:BB:48:53:F6:A4:F6:D3:52:A4:E8:32:52:55:60:13:F5:AD:AF:65

```
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "TWCA Global Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\234\273\110\123\366\244\366\323\122\244\350\062\122\125\140\023
\365\255\257\145
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\371\003\176\317\346\236\074\163\172\052\220\007\151\377\053\226
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\121\061\013\060\011\006\003\125\004\006\023\002\124\127\061 $$
\022\060\020\006\003\125\004\012\023\011\124\101\111\127\101\116
\begin{tabular}{l} $$ \begin{tabular}{l} $0.055 \ 1.03 \ 1.01 \ 0.020 \ 0.060 \ 0.016 \ 0.006 \ 0.03 \ 1.25 \ 0.04 \ 0.13 \ 0.023 \ 0.07 \ 1.22 \ 1.57 \ 0.04 \ 0.013 \ 0.006 \ 0.006 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.008 \ 0.00
\157\164\040\103\101\061\034\060\032\006\003\125\004\003\023\023
\124\127\103\101\040\107\154\157\142\141\154\040\122\157\157\164
\040\103\101
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\002\014\276
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "TeliaSonera Root CA v1"
# Issuer: CN=TeliaSonera Root CA v1,O=TeliaSonera
# Serial Number:00:95:be:16:a0:f7:2e:46:f1:7b:39:82:72:fa:8b:cd:96
# Subject: CN=TeliaSonera Root CA v1,O=TeliaSonera
# Not Valid Before: Thu Oct 18 12:00:50 2007
# Not Valid After: Mon Oct 18 12:00:50 2032
# Fingerprint (SHA-256):
DD:69:36:FE:21:F8:F0:77:C1:23:A1:A5:21:C1:22:24:F7:22:55:B7:3E:03:A7:26:06:93:E8:A2:4B:0F:A3:89
# Fingerprint (SHA1): 43:13:BB:96:F1:D5:86:9B:C1:4E:6A:92:F6:CF:F6:34:69:87:82:37
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "TeliaSonera Root CA v1"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\151\141\123\157\156\145\162\141\061\037\060\035\006\003\125\004
\003\014\026\124\145\154\151\141\123\157\156\145\162\141\040\122
\157\157\164\040\103\101\040\166\061
```

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \020\021\000\225\276\026\240\367\056\106\361\173\071\202\162\372 \213\315\226$ 

**END** 

# CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \0.060\202\005\0.070\060\202\003\040\240\003\002\001\002\002\002\002\000$ \225\276\026\240\367\056\106\361\173\071\202\162\372\213\315\226 \060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060 \141\123\157\156\145\162\141\061\037\060\035\006\003\125\004\003 \014\026\124\145\154\151\141\123\157\156\145\162\141\040\122\157  $\label{eq:condition} $$ \frac{157}{164}040\\103\\101\\040\\166\\061\\060\\036\\027\\015\\060\\067\\061\\060$ \061\070\061\062\060\060\065\060\132\027\015\063\062\061\060\061 \070\061\062\060\060\065\060\132\060\067\061\024\060\022\006\003 \061\037\060\035\006\003\125\004\003\014\026\124\145\154\151\141  $\label{eq:local_$ \061\060\202\002\042\060\015\006\011\052\206\110\206\367\015\001 \001\001\005\000\003\202\002\017\000\060\202\002\012\002\202\002  $\label{eq:condition} $$ \001\000\302\276\353\047\360\041\243\363\151\046\125\176\235\305 $$$ \125\026\221\134\375\357\041\277\123\200\172\055\322\221\214\143 \061\360\354\044\360\303\245\322\162\174\020\155\364\067\267\345 \346\174\171\352\214\265\202\213\256\110\266\254\000\334\145\165 \354\052\115\137\301\207\365\040\145\053\201\250\107\076\211\043 \225\060\026\220\177\350\127\007\110\347\031\256\277\105\147\261 \067\033\006\052\376\336\371\254\175\203\373\136\272\344\217\227 \147\276\113\216\215\144\007\127\070\125\151\064\066\075\023\110 \357\117\342\323\146\036\244\317\032\267\136\066\063\324\264\006 \275\030\001\375\167\204\120\000\105\365\214\135\350\043\274\176 \376\065\341\355\120\173\251\060\215\031\323\011\216\150\147\135 \277\074\227\030\123\273\051\142\305\312\136\162\301\307\226\324 \333\055\240\264\037\151\003\354\352\342\120\361\014\074\360\254 \363\123\055\360\034\365\355\154\071\071\163\200\026\310\122\260 \043\315\340\076\334\335\074\107\240\273\065\212\342\230\150\213 \276\345\277\162\356\322\372\245\355\022\355\374\230\030\251\046 \166\334\050\113\020\040\034\323\177\026\167\055\355\157\200\367 \111\273\123\005\273\135\150\307\324\310\165\026\077\211\132\213 \367\027\107\324\114\361\322\211\171\076\115\075\230\250\141\336 \072\036\322\370\136\003\340\301\311\034\214\323\215\115\323\225 \066\263\067\137\143\143\233\063\024\360\055\046\153\123\174\211

\214\062\302\156\354\075\041\000\071\311\241\150\342\120\203\056 \260\072\053\363\066\240\254\057\344\157\141\302\121\011\071\076 \213\123\271\273\147\332\334\123\271\166\131\066\235\103\345\040 \340\075\062\140\205\042\121\267\307\063\273\335\025\057\244\170 \246\007\173\201\106\066\004\206\335\171\065\307\225\054\073\260 \243\027\065\345\163\037\264\134\131\357\332\352\020\145\173\172 \320\177\237\263\264\052\067\073\160\213\233\133\271\053\267\354 \262\121\022\227\123\051\132\324\360\022\020\334\117\002\273\022 \222\057\142\324\077\151\103\174\015\326\374\130\165\001\210\235 \130\026\113\336\272\220\377\107\001\211\006\152\366\137\262\220 \152\263\002\246\002\210\277\263\107\176\052\331\325\372\150\170  $\label{eq:condition} $$ \0.065\115\0.02\0.03\0.01\0.00\0.01\243\0.075\0.60\0.017\0.06\0.03\1.25$$ \035\023\001\001\377\004\005\060\003\001\001\377\060\013\006\003 \125\035\017\004\004\003\002\001\006\060\035\006\003\125\035\016  $\label{eq:condition} $$ \004\026\004\024\360\217\131\070\000\263\365\217\232\226\014\325$ \353\372\173\252\027\350\023\022\060\015\006\011\052\206\110\206  $\label{eq:condition} $$ \367\015\001\001\005\005\000\003\202\002\001\000\276\344\134\142 $$$ \116\044\364\014\010\377\360\323\014\150\344\223\111\042\077\104 \047\157\273\155\336\203\146\316\250\314\015\374\365\232\006\345  $\label{eq:condition} $$ 167\024\221\353\235\101\173\231\052\204\345\377\374\041\301\135$ \360\344\037\127\267\165\251\241\137\002\046\377\327\307\367\116 \336\117\370\367\034\106\300\172\117\100\054\042\065\360\031\261 \320\153\147\054\260\250\340\300\100\067\065\366\204\134\134\343 \257\102\170\376\247\311\015\120\352\015\204\166\366\121\357\203  $\label{eq:condition} $$ \frac{306}172\377\016\126\111\056\217\172\326\014\346\047\124\343}$ \115\012\140\162\142\315\221\007\326\245\277\310\231\153\355\304 \031\346\253\114\021\070\305\157\061\342\156\111\310\077\166\200  $\label{eq:condition} $$ \046\03\046\051\340\066\366\366\040\123\343\027\160\064\027\235 $$$ \143\150\036\153\354\303\115\206\270\023\060\057\135\106\015\107 \103\325\033\252\131\016\271\134\215\006\110\255\164\207\137\307  $\label{eq:condition} $$ 374 \cdot 061 \cdot 124 \cdot 101 \cdot 023 \cdot 342 \cdot 307 \cdot 041 \cdot 016 \cdot 236 \cdot 340 \cdot 036 \cdot 015 \cdot 341 \cdot 300 \cdot 173 \cdot 124 \cdot 124$ \103\205\220\305\212\130\306\145\012\170\127\362\306\043\017\001 \331\040\113\336\017\373\222\205\165\052\134\163\215\155\173\045 \221\312\356\105\256\006\113\000\314\323\261\131\120\332\072\210 \073\051\103\106\136\227\053\124\316\123\157\215\112\347\226\372 \277\161\016\102\213\174\375\050\240\320\110\312\332\304\201\114 \273\242\163\223\046\310\353\014\326\046\210\266\300\044\317\273  $\label{eq:condition} $$ \275\133\353\165\175\351\010\216\206\063\054\171\167\011\151\245 $$$ \211\374\263\160\220\207\166\217\323\042\273\102\316\275\163\013  $\label{eq:condition} $$ \040\046\052\320\233\075\160\036\044\154\315\207\166\251\027\226 $$$ \267\317\015\222\373\216\030\251\230\111\321\236\376\140\104\162 \041\271\031\355\302\365\061\361\071\110\210\220\044\165\124\026 \255\316\364\370\151\024\144\071\373\243\270\272\160\100\307\047 \034\277\304\126\123\372\143\145\320\363\034\016\026\365\153\206 \130\115\030\324\344\015\216\245\235\133\221\334\166\044\120\077 \306\052\373\331\267\234\265\326\346\320\331\350\031\213\025\161 \110\255\267\352\330\131\210\324\220\277\026\263\331\351\254\131 \141\124\310\034\272\312\301\312\341\271\040\114\217\072\223\211

```
END
CKA_NSS_MOZILLA_CA_POLICY CK_BBOOL CK_TRUE
CKA_NSS_SERVER_DISTRUST_AFTER CK_BBOOL CK_FALSE
CKA_NSS_EMAIL_DISTRUST_AFTER CK_BBOOL CK_FALSE
# Trust for "TeliaSonera Root CA v1"
# Issuer: CN=TeliaSonera Root CA v1,O=TeliaSonera
# Serial Number:00:95:be:16:a0:f7:2e:46:f1:7b:39:82:72:fa:8b:cd:96
# Subject: CN=TeliaSonera Root CA v1,O=TeliaSonera
# Not Valid Before: Thu Oct 18 12:00:50 2007
# Not Valid After: Mon Oct 18 12:00:50 2032
# Fingerprint (SHA-256):
DD:69:36:FE:21:F8:F0:77:C1:23:A1:A5:21:C1:22:24:F7:22:55:B7:3E:03:A7:26:06:93:E8:A2:4B:0F:A3:89
# Fingerprint (SHA1): 43:13:BB:96:F1:D5:86:9B:C1:4E:6A:92:F6:CF:F6:34:69:87:82:37
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "TeliaSonera Root CA v1"
CKA CERT SHA1 HASH MULTILINE OCTAL
\103\023\273\226\361\325\206\233\301\116\152\222\366\317\366\064
\151\207\202\067
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\067\101\111\033\030\126\232\046\365\255\302\146\373\100\245\114
END
CKA_ISSUER MULTILINE_OCTAL
\060\067\061\024\060\022\006\003\125\004\012\014\013\124\145\154
\151\141\123\157\156\145\162\141\061\037\060\035\006\003\125\004
\\ \\003\\014\\026\\124\\145\\154\\151\\141\\123\\157\\156\\145\\162\\141\\040\\122
\157\157\164\040\103\101\040\166\061
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \002\021\000\225\276\026\240\367\056\106\361\173\071\202\162\372
\213\315\226
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
#
# Certificate "E-Tugra Certification Authority"
# Issuer: CN=E-Tugra Certification Authority, OU=E-Tugra Sertifikasyon Merkezi, O=E-Tu..ra EBG Bili..im
Teknolojileri ve Hizmetleri A....,L=Ankara,C=TR
# Serial Number:6a:68:3e:9c:51:9b:cb:53
```

\245\240\314\277\323\366\165\244\165\226\155\126

# Subject: CN=E-Tugra Certification Authority, OU=E-Tugra Sertifikasyon Merkezi, O=E-Tu..ra EBG Bili..im

Teknolojileri ve Hizmetleri A....,L=Ankara,C=TR

# Not Valid Before: Tue Mar 05 12:09:48 2013

# Not Valid After: Fri Mar 03 12:09:48 2023

# Fingerprint (SHA-256):

B0:BF:D5:2B:B0:D7:D9:BD:92:BF:5D:4D:C1:3D:A2:55:C0:2C:54:2F:37:83:65:EA:89:39:11:F5:5E:55:F2:3C

# Fingerprint (SHA1): 51:C6:E7:08:49:06:6E:F3:92:D4:5C:A0:0D:6D:A3:62:8F:C3:52:39

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "E-Tugra Certification Authority"

CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\201\262\061\013\060\011\006\003\125\004\006\023\002\124\122 $$$ 

 $\label{eq:condition} $$ \0061\017\060\015\006\003\125\004\007\014\006\101\156\153\141\162$$$ 

\304\237\162\141\040\105\102\107\040\102\151\154\151\305\237\151

\155\040\124\145\153\156\157\154\157\152\151\154\145\162\151\040

\305\236\056\061\046\060\044\006\003\125\004\013\014\035\105\055

\124\165\147\162\141\040\123\145\162\164\151\146\151\153\141\163

\171\157\156\040\115\145\162\153\145\172\151\061\050\060\046\006

\003\125\004\003\014\037\105\055\124\165\147\162\141\040\103\145

\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150

\157\162\151\164\171

**END** 

CKA\_ID UTF8 "0"

# CKA ISSUER MULTILINE OCTAL

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\010\152\150\076\234\121\233\313\123

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\006\113\060\202\004\063\240\003\002\001\002\002\010\152 \150\076\234\121\233\313\123\060\015\006\011\052\206\110\206\367

\015\001\001\001\013\005\000\060\201\262\061\013\060\011\006\003\125 \004\006\023\002\124\122\061\017\060\015\006\003\125\004\007\014 \006\101\156\153\141\162\141\061\100\060\076\006\003\125\004\012 \014\067\105\055\124\165\304\237\162\141\040\105\102\107\040\102 \151\154\151\305\237\151\155\040\124\145\153\156\157\154\157\152 \145\162\151\040\101\056\305\236\056\061\046\060\044\006\003\125 \004\013\014\035\105\055\124\165\147\162\141\040\123\145\162\164  $\verb| 151| 146| 151| 153| 141| 163| 171| 157| 156| 040| 115| 145| 162| 153| 145| 172|$ \151\061\050\060\046\006\003\125\004\003\014\037\105\055\124\165  $\\ 147 \\ 162 \\ 141 \\ 040 \\ 103 \\ 145 \\ 162 \\ 164 \\ 151 \\ 146 \\ 151 \\ 143 \\ 141 \\ 164 \\ 151 \\ 157 \\$ \156\040\101\165\164\150\157\162\151\164\171\060\036\027\015\061 \063\060\063\060\065\061\062\060\071\064\070\132\027\015\062\063  $\label{eq:condition} $$ \060\063\060\063\061\062\060\071\064\070\132\060\201\262\061\013 $$$  $\label{eq:condition} $$ \000\01\006\003\125\004\006\023\002\124\122\061\017\060\015\006$ \003\125\004\007\014\006\101\156\153\141\162\141\061\100\060\076  $\label{eq:condition} $$ \006\003\125\004\012\014\067\105\055\124\165\304\237\162\141\040 $$$ \105\102\107\040\102\151\154\151\305\237\151\155\040\124\145\153 \156\157\154\157\152\151\154\145\162\151\040\166\145\040\110\151 \172\155\145\164\154\145\162\151\040\101\056\305\236\056\061\046 \060\044\006\003\125\004\013\014\035\105\055\124\165\147\162\141 \040\123\145\162\164\151\146\151\153\141\163\171\157\156\040\115 \037\105\055\124\165\147\162\141\040\103\145\162\164\151\146\151  $\\ 143 \\ 141 \\ 164 \\ 151 \\ 157 \\ 156 \\ 040 \\ 101 \\ 165 \\ 164 \\ 150 \\ 157 \\ 162 \\ 151 \\ 164 \\ 171 \\$ \060\202\002\042\060\015\006\011\052\206\110\206\367\015\001\001 \001\005\000\003\202\002\017\000\060\202\002\012\002\202\002\001  $\label{eq:condition} $$ \000\342\365\077\223\005\121\036\205\142\124\136\172\013\365\030 $$$  $\\ \\007\\ \\203\\ \\256\\ \\176\\ \\257\\ \\174\\ \\367\\ \\324\\ \\212\\ \\153\\ \\245\\ \\143\\ \\103\\ \\071\\ \\271\\ \\113$ \367\303\306\144\211\075\224\056\124\200\122\071\071\007\113\113  $\label{eq:condition} $$ 35 \times 0.07 \times$ \017\230\160\370\214\205\036\164\216\222\155\033\100\321\231\015 \273\165\156\310\251\153\232\300\204\061\257\312\103\313\353\053 \064\350\217\227\153\001\233\325\016\112\010\252\133\222\164\205 \103\323\200\256\241\210\133\256\263\352\136\313\026\232\167\104 \310\241\366\124\150\316\336\217\227\053\272\133\100\002\014\144 \027\300\265\223\315\341\361\023\146\316\014\171\357\321\221\050  $\verb|253|137|240|022|122|060|163|031|216|217|341|214|007|242|303|273|$ \112\360\352\037\025\250\356\045\314\244\106\370\033\042\357\263 \016\103\272\054\044\270\305\054\134\324\034\370\135\144\275\303 \223\136\050\247\077\047\361\216\036\323\052\120\005\243\125\331 \313\347\071\123\300\230\236\214\124\142\213\046\260\367\175\215 \174\344\306\236\146\102\125\202\107\347\262\130\215\146\367\007 \174\056\066\346\120\034\077\333\103\044\305\277\206\107\171\263 \171\034\367\132\364\023\354\154\370\077\342\131\037\225\356\102 \076\271\255\250\062\205\111\227\106\376\113\061\217\132\313\255 \164\107\037\351\221\267\337\050\004\042\240\324\017\135\342\171 \117\352\154\205\206\275\250\246\316\344\372\303\341\263\256\336

\074\121\356\313\023\174\001\177\204\016\135\121\224\236\023\014 \266\056\245\114\371\071\160\066\157\226\312\056\014\104\125\305 \312\372\135\002\243\337\326\144\214\132\263\001\012\251\265\012 \107\027\377\357\221\100\052\216\241\106\072\061\230\345\021\374 \314\273\111\126\212\374\271\320\141\232\157\145\154\346\303\313  $\label{eq:condition} $$ \076\165\111\376\217\247\342\211\305\147\327\235\106\023\116\061$$$ \166\073\044\263\236\021\145\206\253\177\357\035\324\370\274\347 \254\132\134\267\132\107\134\125\316\125\264\042\161\133\133\013 \360\317\334\240\141\144\352\251\327\150\012\143\247\340\015\077 \240\257\323\252\322\176\357\121\240\346\121\053\125\222\025\027 \123\313\267\146\016\146\114\370\371\165\114\220\347\022\160\307 \105\002\003\001\000\001\243\143\060\141\060\035\006\003\125\035 \016\004\026\004\024\056\343\333\262\111\320\234\124\171\134\372  $\\ \langle 047 \rangle 052 \rangle 376 \rangle 314 \rangle 116 \rangle 322 \rangle 350 \rangle 116 \rangle 124 \rangle 060 \rangle 017 \rangle 006 \rangle 003 \rangle 125 \rangle 035 \rangle 023 \rangle 036 \rangle 037 \rangle$  $\\ \\001\\\\001\\\\377\\\\004\\\\005\\\\0005\\\\000\\\\0003\\\\001\\\\001\\\\377\\\\060\\\\037\\\\006\\\\003\\\\125\\\\035$ \043\004\030\060\026\200\024\056\343\333\262\111\320\234\124\171 \134\372\047\052\376\314\116\322\350\116\124\060\016\006\003\125 \035\017\001\001\377\004\004\003\002\001\006\060\015\006\011\052 \206\110\206\367\015\001\001\013\005\000\003\202\002\001\000\005  $\label{eq:condition} $$ \067\072\364\115\267\105\342\105\165\044\217\266\167\122\350\034$$$ \330\020\223\145\363\362\131\006\244\076\036\051\354\135\321\320 \253\174\340\012\220\110\170\355\116\230\003\231\376\050\140\221  $\label{eq:condition} $$ \035\060\035\270\143\174\250\346\065\265\372\323\141\166\346\326 $$$ \007\113\312\151\232\262\204\172\167\223\105\027\025\237\044\320  $\label{eq:condition} $$ \230\022\377\273\240\056\375\116\114\207\370\316\134\252\230 $$$ \033\005\340\000\106\112\202\200\245\063\213\050\334\355\070\323 \337\345\076\351\376\373\131\335\141\204\117\322\124\226\023\141  $\label{eq:condition} $$ \023\076\217\200\151\276\223\107\265\065\103\322\132\273\075\134$$ \357\263\102\107\315\073\125\023\006\260\011\333\375\143\366\072 \210\012\231\157\176\341\316\033\123\152\104\146\043\121\010\173  $\label{eq:condition} $$ \274\133\122\242\375\006\067\070\100\141\217\112\226\270\220\067$ \370\146\307\170\220\000\025\056\213\255\121\065\123\007\250\153 \150\256\371\116\074\007\046\315\010\005\160\314\071\077\166\275 \245\323\147\046\001\206\246\123\322\140\073\174\103\177\125\212 \274\225\032\301\050\071\114\037\103\322\221\364\162\131\212\271 \126\374\077\264\235\332\160\234\166\132\214\103\120\356\216\060 \162\115\337\377\111\367\306\251\147\331\155\254\002\021\342\072  $\label{eq:condition} $$ \026\045\247\130\010\313\157\123\101\234\110\070\107\150\063\321 $$$  $\label{eq:condition} $$ 327\307\217\324\164\041\324\303\005\220\172\377\316\226\210\261$ \025\051\135\043\253\320\140\241\022\117\336\364\027\315\062\345 \311\277\310\103\255\375\056\216\361\257\342\364\230\372\022\037 \040\330\300\247\014\205\305\220\364\073\055\226\046\261\054\276 \114\253\353\261\322\212\311\333\170\023\017\036\011\235\155\217 \000\237\002\332\301\372\037\172\172\011\304\112\346\210\052\227 \237\211\213\375\067\137\137\072\316\070\131\206\113\257\161\013 \264\330\362\160\117\237\062\023\343\260\247\127\345\332\332\103 \313\204\064\362\050\304\352\155\364\052\357\301\153\166\332\373 \176\273\205\074\322\123\302\115\276\161\341\105\321\375\043\147

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE

CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

CKA NSS EMAIL DISTRUST AFTER CK BBOOL CK FALSE

# Trust for "E-Tugra Certification Authority"

# Issuer: CN=E-Tugra Certification Authority, OU=E-Tugra Sertifikasyon Merkezi, O=E-Tu..ra EBG Bili..im

Teknolojileri ve Hizmetleri A....,L=Ankara,C=TR

# Serial Number:6a:68:3e:9c:51:9b:cb:53

# Subject: CN=E-Tugra Certification Authority, OU=E-Tugra Sertifikasyon Merkezi, O=E-Tu..ra EBG Bili..im

Teknolojileri ve Hizmetleri A....,L=Ankara,C=TR

# Not Valid Before: Tue Mar 05 12:09:48 2013

# Not Valid After: Fri Mar 03 12:09:48 2023

# Fingerprint (SHA-256):

B0:BF:D5:2B:B0:D7:D9:BD:92:BF:5D:4D:C1:3D:A2:55:C0:2C:54:2F:37:83:65:EA:89:39:11:F5:5E:55:F2:3C

# Fingerprint (SHA1): 51:C6:E7:08:49:06:6E:F3:92:D4:5C:A0:0D:6D:A3:62:8F:C3:52:39

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "E-Tugra Certification Authority"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \frac{347}{010}\frac{111}{006}\frac{363}{222}\frac{324}{134}\frac{40}{015}\frac{155}{243}\frac{142}{142} $$$ 

\217\303\122\071

**END** 

CKA CERT MD5 HASH MULTILINE OCTAL

\270\241\003\143\260\275\041\161\160\212\157\023\072\273\171\111

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\201\262\061\013\060\011\006\003\125\004\006\023\002\124\122 $$$ 

 $\label{eq:condition} $$ \0061\017\060\015\006\003\125\004\007\014\006\101\156\153\141\162$$$ 

\141\061\100\060\076\006\003\125\004\012\014\067\105\055\124\165

\304\237\162\141\040\105\102\107\040\102\151\154\151\305\237\151

 $\label{eq:condition} $$ \frac{155}040\\124\\145\\153\\156\\157\\154\\157\\152\\151\\154\\145\\162\\151\\040$ 

\166\145\040\110\151\172\155\145\164\154\145\162\151\040\101\056

\305\236\056\061\046\060\044\006\003\125\004\013\014\035\105\055

\124\165\147\162\141\040\123\145\162\164\151\146\151\153\141\163 \171\157\156\040\115\145\162\153\145\172\151\061\050\060\046\006

\003\125\004\003\014\037\105\055\124\165\147\162\141\040\103\145

\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150

\157\162\151\164\171

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\010\152\150\076\234\121\233\313\123

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "T-TeleSec GlobalRoot Class 2"

#

# Issuer: CN=T-TeleSec GlobalRoot Class 2,OU=T-Systems Trust Center,O=T-Systems Enterprise Services GmbH.C=DE

# Serial Number: 1 (0x1)

# Subject: CN=T-TeleSec GlobalRoot Class 2,OU=T-Systems Trust Center,O=T-Systems Enterprise Services GmbH.C=DE

# Not Valid Before: Wed Oct 01 10:40:14 2008 # Not Valid After : Sat Oct 01 23:59:59 2033

# Fingerprint (SHA-256):

91:E2:F5:78:8D:58:10:EB:A7:BA:58:73:7D:E1:54:8A:8E:CA:CD:01:45:98:BC:0B:14:3E:04:1B:17:05:25:52

# Fingerprint (SHA1): 59:0D:2D:7D:88:4F:40:2E:61:7E:A5:62:32:17:65:CF:17:D8:94:E9

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "T-TeleSec GlobalRoot Class 2"

CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\201\202\061\013\060\0011\006\003\125\004\012\125\004\006\023\002\104\105\\ \0001\0005\1006\0003\125\0004\012\014\002\124\102\151\163\145\040\\ \123\145\162\166\151\143\145\163\040\107\155\142\110\061\037\060\\ \035\006\003\125\0004\013\1014\026\124\055\123\171\163\164\145\155\\ \163\040\124\162\165\163\164\040\103\145\156\164\145\162\061\045\\ \060\043\006\003\125\0004\0003\014\003\125\124\145\157\142\141\154\122\157\157\164\040\103\154\\ \141\163\163\040\062\\$ 

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:control_loop} $$ \000\201\202\061\013\060\0011\006\003\125\004\012\014\042\124\055\123\177\163\164\145\155\163\040\105\156\164\145\162\160\162\151\163\145\040\123\145\162\166\151\143\145\163\040\107\155\142\110\061\037\060\035\006\003\125\004\013\014\026\124\055\123\177\163\164\145\155\163\040\124\162\165\163\164\040\103\145\156\164\145\162\061\045\166\0043\006\003\125\004\003\014\034\124\055\124\145\154\145\123\145\143\040\107\154\157\142\141\154\122\157\157\164\040\103\154\141\163\163\040\062$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

\060\202\003\303\060\202\002\253\240\003\002\001\002\002\001\001 \060\015\006\011\052\206\110\206\367\015\001\001\013\005\000\060 \201\202\061\013\060\011\006\003\125\004\006\023\002\104\105\061 \053\060\051\006\003\125\004\012\014\042\124\055\123\171\163\164 \145\155\163\040\105\156\164\145\162\160\162\151\163\145\040\123 \145\162\166\151\143\145\163\040\107\155\142\110\061\037\060\035 \006\003\125\004\013\014\026\124\055\123\171\163\164\145\155\163 \040\124\162\165\163\164\040\103\145\156\164\145\162\061\045\060  $\\ \\043\\ \\006\\ \\003\\ \\125\\ \\004\\ \\003\\ \\014\\ \\034\\ \\124\\ \\055\\ \\124\\ \\145\\ \\154\\ \\145\\ \\123\\ \\145$ \143\040\107\154\157\142\141\154\122\157\157\164\040\103\154\141 \163\163\040\062\060\036\027\015\060\070\061\060\060\061\061\060 \064\060\061\064\132\027\015\063\063\061\060\060\061\062\063\065 \071\065\071\132\060\201\202\061\013\060\011\006\003\125\004\006  $\label{eq:condition} $$ \023\02\104\105\061\053\060\051\006\003\125\004\012\014\042\124$ \055\123\171\163\164\145\155\163\040\105\156\164\145\162\160\162 \151\163\145\040\123\145\162\166\151\143\145\163\040\107\155\142 \163\164\145\155\163\040\124\162\165\163\164\040\103\145\156\164 \145\162\061\045\060\043\006\003\125\004\003\014\034\124\055\124  $\\ 145\\154\\145\\123\\145\\143\\040\\107\\154\\157\\142\\141\\154\\122\\157\\157$ \164\040\103\154\141\163\163\040\062\060\202\001\042\060\015\006 \011\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017  $\label{eq:condition} $$ \000\060\202\001\012\002\202\001\001\000\252\137\332\033\137\350 $$$ \163\221\345\332\134\364\242\346\107\345\363\150\125\140\005\035  $\label{eq:condition} $$ \002\244\263\233\131\363\036\212\257\064\255\374\015\302\331\110$$ \031\356\151\217\311\040\374\041\252\007\031\355\260\134\254\145 \307\137\355\002\174\173\174\055\033\326\272\271\200\302\030\202  $\label{eq:condition} $$ \026\204\372\146\260\010\306\124\043\201\344\315\271\111\077\366$$ \117\156\067\110\050\070\017\305\276\347\150\160\375\071\227\115 \322\307\230\221\120\252\304\104\263\043\175\071\107\351\122\142 \326\022\223\136\267\061\226\102\005\373\166\247\036\243\365\302 \374\351\172\305\154\251\161\117\352\313\170\274\140\257\307\336 \364\331\313\276\176\063\245\156\224\203\360\064\372\041\253\352 \216\162\240\077\244\336\060\133\357\206\115\152\225\133\103\104 \250\020\025\034\345\001\127\305\230\361\346\006\050\221\252\040  $\label{eq:condition} $$ 305 \times 267 \times 123 \times 46 \times 121 \times 103 \times 262 \times 130 \times 1225 \times 130 \times 41 \times 100 \times 171 \times 166 \times 331 \times 1200 \times 120 \times 1200 \times$ \300\215\174\201\363\162\160\236\157\376\032\216\331\137\065\306 \262\157\064\174\276\110\117\342\132\071\327\330\235\170\236\237 \206\076\003\136\031\213\104\242\325\307\002\003\001\000\001\243 \102\060\100\060\017\006\003\125\035\023\001\001\377\004\005\060 \003\001\001\377\060\016\006\003\125\035\017\001\001\377\004\004  $\label{eq:condition} $$ \003\002\001\006\060\035\006\003\125\035\016\004\026\004\024\277 $$$ \131\040\066\000\171\240\240\042\153\214\325\362\141\322\270\054 \313\202\112\060\015\006\011\052\206\110\206\367\015\001\001\013 \005\000\003\202\001\001\000\061\003\242\141\013\037\164\350\162

\066\306\155\371\115\236\372\042\250\341\201\126\317\315\273\237 \352\253\221\031\070\257\252\174\025\115\363\266\243\215\245\364 \216\366\104\251\247\350\041\225\255\076\000\142\026\210\360\002 \272\374\141\043\346\063\233\060\172\153\066\142\173\255\004\043 \204\130\145\342\333\053\212\347\045\123\067\142\123\137\274\332 \001\142\051\242\246\047\161\346\072\042\176\301\157\035\225\160 \040\112\007\064\337\352\377\025\200\345\272\327\172\330\133\165  $\label{eq:condition} $$ \frac{174 \cdot 005 \cdot 172 \cdot 051 \cdot 107 \cdot 176 \cdot 100 \cdot 250 \cdot 061 \cdot 023 \cdot 167 \cdot 315 \cdot 100 \cdot 073 \cdot 264 \cdot 121}{174 \cdot 005 \cdot 172 \cdot 051 \cdot 107 \cdot 176 \cdot 100 \cdot 250 \cdot 061 \cdot 023 \cdot 167 \cdot 315 \cdot 100 \cdot 073 \cdot 264 \cdot 121} $$$ \107\172\056\021\343\107\021\336\235\146\320\213\325\124\146\372 \203\125\352\174\302\051\211\033\351\157\263\316\342\005\204\311  $\begin{tabular}{ll} $$ \begin{tabular}{ll} $0.57 \begin{tabular}{ll}$  $\label{eq:condition} $$ \014\231\071\353\244\314\032\265\171\132\215\025\234\330\024\015$ \366\172\007\127\307\042\203\005\055\074\233\045\046\075\030\263 \251\103\174\310\310\253\144\217\016\243\277\234\033\235\060\333 \332\320\031\056\252\074\361\373\063\200\166\344\315\255\031\117 \005\047\216\023\241\156\302

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "T-TeleSec GlobalRoot Class 2"

# Issuer: CN=T-TeleSec GlobalRoot Class 2,OU=T-Systems Trust Center,O=T-Systems Enterprise Services GmbH,C=DE

# Serial Number: 1 (0x1)

# Subject: CN=T-TeleSec GlobalRoot Class 2,OU=T-Systems Trust Center,O=T-Systems Enterprise Services GmbH,C=DE

# Not Valid Before: Wed Oct 01 10:40:14 2008 # Not Valid After : Sat Oct 01 23:59:59 2033

# Fingerprint (SHA-256):

91:E2:F5:78:8D:58:10:EB:A7:BA:58:73:7D:E1:54:8A:8E:CA:CD:01:45:98:BC:0B:14:3E:04:1B:17:05:25:52

# Fingerprint (SHA1): 59:0D:2D:7D:88:4F:40:2E:61:7E:A5:62:32:17:65:CF:17:D8:94:E9

CKA CLASS CK OBJECT CLASS CKO NSS TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "T-TeleSec GlobalRoot Class 2"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\131\015\055\175\210\117\100\056\141\176\245\142\062\027\145\317 \027\330\224\351

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\053\233\236\344\173\154\037\000\162\032\314\301\167\171\337\152

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\201\202\061\013\060\011\006\003\125\004\006\023\002\104\105 \061\053\060\051\006\003\125\004\012\014\042\124\055\123\171\163 \164\145\155\163\040\105\156\164\145\162\160\162\151\163\145\040

```
\123\145\162\166\151\143\145\163\040\107\155\142\110\061\037\060
\035\006\003\125\004\013\014\026\124\055\123\171\163\164\145\155
\163\040\124\162\165\163\164\040\103\145\156\164\145\162\061\045
\label{eq:condition} $$ \004\003\125\004\003\014\034\124\055\124\145\154\145\123 $$
\\ 145\\143\\040\\107\\154\\157\\142\\141\\154\\122\\157\\157\\164\\040\\103\\154
\141\163\163\040\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Atos TrustedRoot 2011"
# Issuer: C=DE.O=Atos.CN=Atos TrustedRoot 2011
# Serial Number:5c:33:cb:62:2c:5f:b3:32
# Subject: C=DE,O=Atos,CN=Atos TrustedRoot 2011
# Not Valid Before: Thu Jul 07 14:58:30 2011
# Not Valid After: Tue Dec 31 23:59:59 2030
# Fingerprint (SHA-256):
F3:56:BE:A2:44:B7:A9:1E:B3:5D:53:CA:9A:D7:86:4A:CE:01:8E:2D:35:D5:F8:F9:6D:DF:68:A6:F4:1A:A4:74
# Fingerprint (SHA1): 2B:B1:F5:3E:55:0C:1D:C5:F1:D4:E6:B7:6A:46:4B:55:06:02:AC:21
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "Atos TrustedRoot 2011"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA SUBJECT MULTILINE OCTAL
\060\074\061\036\060\034\006\003\125\004\003\014\025\101\164\157
\163\040\124\162\165\163\164\145\144\122\157\157\164\040\062\060
\061\061\061\015\060\013\006\003\125\004\012\014\004\101\164\157
\163\061\013\060\011\006\003\125\004\006\023\002\104\105
END
CKA ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\074\061\036\060\034\006\003\125\004\003\014\025\101\164\157
\163\040\124\162\165\163\164\145\144\122\157\157\164\040\062\060
\061\061\061\015\060\013\006\003\125\004\012\014\004\101\164\157
\163\061\013\060\011\006\003\125\004\006\023\002\104\105
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\010\134\063\313\142\054\137\263\062
END
```

#### CKA VALUE MULTILINE OCTAL

\060\202\003\167\060\202\002\137\240\003\002\001\002\002\010\134 \063\313\142\054\137\263\062\060\015\006\011\052\206\110\206\367 \015\001\001\013\005\000\060\074\061\036\060\034\006\003\125\004 \003\014\025\101\164\157\163\040\124\162\165\163\164\145\144\122 \157\157\164\040\062\060\061\061\061\061\015\060\013\006\003\125\004 \012\014\004\101\164\157\163\061\013\060\011\006\003\125\004\006 \023\002\104\105\060\036\027\015\061\061\060\067\060\067\061\064 \065\070\063\060\132\027\015\063\060\061\062\063\061\062\063\065 \071\065\071\132\060\074\061\036\060\034\006\003\125\004\003\014 \025\101\164\157\163\040\124\162\165\163\164\145\144\122\157\157 \004\101\164\157\163\061\013\060\011\006\003\125\004\006\023\002 \104\105\060\202\001\042\060\015\006\011\052\206\110\206\367\015 \001\001\000\225\205\073\227\157\052\073\056\073\317\246\363\051  $\label{eq:condition} $$ \05\276\317\030\254\076\252\331\370\115\240\076\032\107\271\274 $$$ \232\337\362\376\314\076\107\350\172\226\302\044\216\065\364\251 \014\374\202\375\155\301\162\142\047\275\352\153\353\347\212\314 \124\076\220\120\317\200\324\225\373\350\265\202\324\024\305\266 \251\125\045\127\333\261\120\366\260\140\144\131\172\151\317\003 \267\157\015\276\312\076\157\164\162\352\252\060\052\163\142\276  $\label{eq:condition} $$ \frac{111}{221}\frac{310}{021}\frac{376}{016}\frac{003}{052}\frac{367}{152}\frac{040}{334}\frac{302}{025}\frac{15}{015} $$$ \136\025\152\374\343\202\301\265\305\235\144\011\154\243\131\230 \007\047\307\033\226\053\141\164\161\154\103\361\367\065\211\020 \340\236\354\125\241\067\042\242\207\004\005\054\107\175\264\034 \271\142\051\146\050\312\267\341\223\365\244\224\003\231\271\160 \205\265\346\110\352\215\120\374\331\336\314\157\007\016\335\013 \162\235\200\060\026\007\225\077\050\016\375\305\165\117\123\326 \164\232\264\044\056\216\002\221\317\166\305\233\036\125\164\234 \170\041\261\360\055\361\013\237\302\325\226\030\037\360\124\042 \172\214\007\002\003\001\000\001\243\175\060\173\060\035\006\003 \125\035\016\004\026\004\024\247\245\006\261\054\246\011\140\356 \321\227\351\160\256\274\073\031\154\333\041\060\017\006\003\125 \035\023\001\001\377\004\005\060\003\001\001\377\060\037\006\003 \125\035\043\004\030\060\026\200\024\247\245\006\261\054\246\011 \140\356\321\227\351\160\256\274\073\031\154\333\041\060\030\006 \003\125\035\040\004\021\060\017\060\015\006\013\053\006\001\004  $\label{eq:condition} $$ \001\260\055\003\004\001\0001\060\016\006\003\125\035\017\001\001$ \377\004\004\003\002\001\206\060\015\006\011\052\206\110\206\367 \015\001\001\001\013\005\000\003\202\001\001\000\046\167\064\333\224 \110\206\052\101\235\054\076\006\220\140\304\214\254\013\124\270 \037\271\173\323\007\071\344\372\076\173\262\075\116\355\237\043 \275\227\363\153\134\357\356\375\100\246\337\241\223\241\012\206 \254\357\040\320\171\001\275\170\367\031\330\044\061\064\004\001 \246\272\025\232\303\047\334\330\117\017\314\030\143\377\231\017 \016\221\153\165\026\341\041\374\330\046\307\107\267\246\317\130 \162\161\176\272\341\115\225\107\073\311\257\155\241\264\301\354

 $\label{eq:control} $$ \frac{341}366\\264\\017\\070\\265\\342\\144\\334\\045\\317\\246\\333\\353\\232\\134\\231\\241\\305\\010\\336\\375\\346\\332\\325\\326\\132\\105\\014\\304\\2267\\302\\2265\\365\\365\\333\\306\\275\\353\\132\\247\\360\\126\\042\\251\\074\\145\\124\\306\\025\\250\\275\\206\\236\\315\\203\\226\\150\\172\\161\\201\\211\\341\\013\\341\\352\\021\\033\\150\\010\\314\\151\\236\\354\\236\\101\\236\\104\\062\\046\\172\\342\\207\\012\\161\\075\\353\\344\\132\\244\\322\\333\\305\\315\\306\\336\\140\\177\\271\\363\\117\\104\\222\\357\\052\\267\\030\\076\\247\\031\\331\\013\\175\\261\\067\\101\\102\\260\\272\\140\\035\\362\\376\\011\\021\\260\\360\\207\\173\\247\\235$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Atos TrustedRoot 2011"
- # Issuer: C=DE,O=Atos,CN=Atos TrustedRoot 2011
- # Serial Number:5c:33:cb:62:2c:5f:b3:32
- # Subject: C=DE,O=Atos,CN=Atos TrustedRoot 2011
- # Not Valid Before: Thu Jul 07 14:58:30 2011
- # Not Valid After: Tue Dec 31 23:59:59 2030
- # Fingerprint (SHA-256):

F3:56:BE:A2:44:B7:A9:1E:B3:5D:53:CA:9A:D7:86:4A:CE:01:8E:2D:35:D5:F8:F9:6D:DF:68:A6:F4:1A:A4:74

# Fingerprint (SHA1): 2B:B1:F5:3E:55:0C:1D:C5:F1:D4:E6:B7:6A:46:4B:55:06:02:AC:21

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "Atos TrustedRoot 2011"

CKA CERT SHA1 HASH MULTILINE OCTAL

\053\261\365\076\125\014\035\305\361\324\346\267\152\106\113\125

\006\002\254\041

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\256\271\304\062\113\254\177\135\146\314\167\224\273\052\167\126

**END** 

CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \060\074\061\036\060\034\006\003\125\004\003\014\025\101\164\157$ 

\163\040\124\162\165\163\164\145\144\122\157\157\164\040\062\060

\163\061\013\060\011\006\003\125\004\006\023\002\104\105

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\010\134\063\313\142\054\137\263\062

END

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

# Certificate "QuoVadis Root CA 1 G3"

#

- # Issuer: CN=QuoVadis Root CA 1 G3,O=QuoVadis Limited,C=BM
- # Serial Number:78:58:5f:2e:ad:2c:19:4b:e3:37:07:35:34:13:28:b5:96:d4:65:93
- # Subject: CN=QuoVadis Root CA 1 G3,O=QuoVadis Limited,C=BM
- # Not Valid Before: Thu Jan 12 17:27:44 2012
- # Not Valid After : Sun Jan 12 17:27:44 2042
- # Fingerprint (SHA-256):

8A:86:6F:D1:B2:76:B5:7E:57:8E:92:1C:65:82:8A:2B:ED:58:E9:F2:F2:88:05:41:34:B7:F1:F4:BF:C9:CC:74

# Fingerprint (SHA1): 1B:8E:EA:57:96:29:1A:C9:39:EA:B8:0A:81:1A:73:73:C0:93:79:67

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "QuoVadis Root CA 1 G3"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \000\110\061\013\060\011\006\003\125\004\006\023\002\102\115\061 $$$ 

 $\label{eq:condition} $$ \031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144$ 

\151\163\040\114\151\155\151\164\145\144\061\036\060\034\006\003

\157\164\040\103\101\040\061\040\107\063

**END** 

CKA\_ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \00110061013060011006003125004006023002102\\115061 \031060027\\006003\\125004\\012\\023\\020\\121\\165\\157\\126\\141\\144\\061\\036\\060\\034\\006\\003\\125\\004\\003\\023\\025\\121\\165\\157\\126\\141\\144\\151\\163\\040\\122\\157\\157\\164\\040\\103\\101\\040\\061\\040\\107\\063$ 

**END** 

### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\024\170\130\137\056\255\054\031\113\343\067\007\065\064\023 \050\265\226\324\145\223

**END** 

#### CKA\_VALUE MULTILINE\_OCTAL

\060\011\006\003\125\004\006\023\002\102\115\061\031\060\027\006 \003\125\004\012\023\020\121\165\157\126\141\144\151\163\040\114 \151\155\151\164\145\144\061\036\060\034\006\003\125\004\003\023  $\label{eq:condition} $$ \025\121\165\157\126\141\144\151\163\040\122\157\157\164\040\103$ \101\040\061\040\107\063\060\202\002\042\060\015\006\011\052\206 \110\206\367\015\001\001\001\005\000\003\202\002\017\000\060\202 \002\012\002\202\002\001\000\240\276\120\020\216\351\362\154\100 \264\004\234\205\271\061\312\334\055\344\021\251\004\074\033\125 \301\347\130\060\035\044\264\303\357\205\336\214\054\341\301\075 \337\202\346\117\255\107\207\154\354\133\111\301\112\325\273\217 \354\207\254\177\202\232\206\354\075\003\231\122\001\322\065\236 \254\332\360\123\311\146\074\324\254\002\001\332\044\323\073\250 \002\106\257\244\034\343\370\163\130\166\267\366\016\220\015\265 \360\317\314\372\371\306\114\345\303\206\060\012\215\027\176\065 \307\253\340\023\234\005\030\230\317\223\365\261\222\264\374\043 \323\317\325\304\047\111\340\236\074\233\010\243\213\135\052\041 \340\374\071\252\123\332\175\176\317\032\011\123\274\135\005\004 \317\241\112\217\213\166\202\015\241\370\322\307\024\167\133\220  $\label{eq:condition} $$ \066\07\201\233\076\006\372\122\136\143\305\246\000\376\245\351 $$$ \122\033\122\265\222\071\162\003\011\142\275\260\140\026\156\246 \335\045\302\003\146\335\363\004\321\100\342\116\213\206\364\157 \345\203\240\047\204\136\004\301\365\220\275\060\075\304\357\250 \151\274\070\233\244\244\226\321\142\332\151\300\001\226\256\313  $\label{eq:condition} $$ 304\121\064\352\014\252\377\041\216\131\217\112\134\344\141\232$ \247\322\351\052\170\215\121\075\072\025\356\242\131\216\251\134 \336\305\371\220\042\345\210\105\161\335\221\231\154\172\237\075 \075\230\174\136\366\276\026\150\240\136\256\013\043\374\132\017 \252\042\166\055\311\241\020\035\344\323\104\043\220\210\237\306 \052\346\327\365\232\263\130\036\057\060\211\010\033\124\242\265  $\verb|230|043|354|010|167|034|225|135|141|321|313|211|234|137|242|112|$ \221\232\357\041\252\111\026\010\250\275\141\050\061\311\164\255 \205\366\331\305\261\213\321\345\020\062\115\137\213\040\072\074 \111\037\063\205\131\015\333\313\011\165\103\151\163\373\153\161 \175\360\337\304\114\175\306\243\056\310\225\171\313\163\242\216 \116\115\044\373\136\344\004\276\162\033\246\047\055\111\132\231 \172\327\134\011\040\267\177\224\271\117\361\015\034\136\210\102  $\label{eq:condition} $$ \033\021\267\347\221\333\236\154\364\152\337\214\006\230\003\255$ \314\050\357\245\107\363\123\002\003\001\000\001\243\102\060\100 \377\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001 \006\060\035\006\003\125\035\016\004\026\004\024\243\227\326\363 \136\242\020\341\253\105\237\074\027\144\074\356\001\160\234\314 \060\015\006\011\052\206\110\206\367\015\001\001\001\013\005\000\003  $\label{eq:condition} $$ \202\001\000\030\372\133\165\374\076\172\307\137\167\307\312 $$$ \337\317\137\303\022\304\100\135\324\062\252\270\152\327\325\025 \025\106\230\043\245\346\220\133\030\231\114\343\255\102\243\202  $\label{eq:condition} $$ \061\066\210\315\351\373\304\004\226\110\213\001\307\215\001\317 $$$ 

\133\063\006\226\106\146\164\035\117\355\301\266\271\264\015\141 \314\143\176\327\056\167\214\226\034\052\043\150\153\205\127\166 \160\063\023\376\341\117\246\043\167\030\372\032\214\350\275\145 \311\317\077\364\311\027\334\353\307\274\300\004\056\055\106\057 \151\146\303\033\217\376\354\076\323\312\224\277\166\012\045\015 \251\173\002\034\251\320\073\137\013\300\201\072\075\144\341\277 \247\055\116\275\115\304\330\051\306\042\030\320\305\254\162\002 \202\077\252\072\242\072\042\227\061\335\010\143\303\165\024\271 \140\050\055\133\150\340\026\251\146\202\043\121\365\353\123\330 \061\233\173\351\267\235\113\353\210\026\317\371\135\070\212\111  $\label{eq:condition} $$ \060\217\355\361\353\031\364\167\032\061\030\115\147\124\154\057$$$ \157\145\371\333\075\354\041\354\136\364\364\213\312\140\145\124 \321\161\144\364\371\246\243\201\063\066\063\161\360\244\170\137 \116\255\203\041\336\064\111\215\350\131\254\235\362\166\132\066 \362\023\364\257\340\011\307\141\052\154\367\340\235\256\273\206 \112\050\157\056\356\264\171\315\220\063\303\263\166\372\365\360 \154\235\001\220\372\236\220\366\234\162\317\107\332\303\037\344 \065\040\123\362\124\321\337\141\203\246\002\342\045\070\336\205 \062\055\136\163\220\122\135\102\304\316\075\113\341\371\031\204  $\label{eq:condition} $$ \035\325\242\120\314\101\373\101\024\303\275\326\311\132\243\143$ \146\002\200\275\005\072\073\107\234\354\000\046\114\365\210\121  $\label{eq:condition} $$ \277\250\043\177\030\007\260\013\355\213\046\241\144\323\141\112 $$$  $\label{eq:condition} $$ \frac{353}{134}\frac{237}{336}\frac{263}{257}\frac{147}{003}\frac{263}{037}\frac{335}{155}\frac{155}{135}\frac{151}{150}\frac{151}{150}$$ \253\136\072\354\174\151\274\307\073\205\116\236\025\271\264\025 \117\303\225\172\130\327\311\154\351\154\271\363\051\143\136\264 \054\360\055\075\355\132\145\340\251\133\100\302\110\231\201\155 \236\037\006\052\074\022\264\213\017\233\242\044\360\246\215\326 \172\340\113\266\144\226\143\225\204\302\112\315\034\056\044\207 \063\140\345\303

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "QuoVadis Root CA 1 G3"
```

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "QuoVadis Root CA 1 G3"

<sup>#</sup> Issuer: CN=QuoVadis Root CA 1 G3,O=QuoVadis Limited,C=BM

<sup>#</sup> Serial Number:78:58:5f:2e:ad:2c:19:4b:e3:37:07:35:34:13:28:b5:96:d4:65:93

<sup>#</sup> Subject: CN=QuoVadis Root CA 1 G3,O=QuoVadis Limited,C=BM

<sup>#</sup> Not Valid Before: Thu Jan 12 17:27:44 2012

<sup>#</sup> Not Valid After: Sun Jan 12 17:27:44 2042

<sup>#</sup> Fingerprint (SHA-256):

<sup>8</sup>A;86:6F;D1:B2:76:B5:7E:57:8E:92:1C:65:82:8A:2B:ED:58:E9:F2:F2:88:05:41:34:B7:F1:F4:BF:C9:CC:74

<sup>#</sup> Fingerprint (SHA1): 1B:8E:EA:57:96:29:1A:C9:39:EA:B8:0A:81:1A:73:73:C0:93:79:67

```
\033\216\352\127\226\051\032\311\071\352\270\012\201\032\163\163
\300\223\171\147
END
CKA CERT MD5 HASH MULTILINE OCTAL
\244\274\133\077\376\067\232\372\144\360\342\372\005\075\013\253
END
CKA ISSUER MULTILINE OCTAL
\060\110\061\013\060\011\006\003\125\004\006\023\002\102\115\061
\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144
\151\163\040\114\151\155\151\164\145\144\061\036\060\034\006\003
\125\004\003\023\025\121\165\157\126\141\144\151\163\040\122\157
\157\164\040\103\101\040\061\040\107\063
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\024\170\130\137\056\255\054\031\113\343\067\007\065\064\023
\050\265\226\324\145\223
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "QuoVadis Root CA 2 G3"
# Issuer: CN=QuoVadis Root CA 2 G3,O=QuoVadis Limited,C=BM
# Serial Number:44:57:34:24:5b:81:89:9b:35:f2:ce:b8:2b:3b:5b:a7:26:f0:75:28
# Subject: CN=QuoVadis Root CA 2 G3,O=QuoVadis Limited,C=BM
# Not Valid Before: Thu Jan 12 18:59:32 2012
# Not Valid After: Sun Jan 12 18:59:32 2042
# Fingerprint (SHA-256):
8F:E4:FB:0A:F9:3A:4D:0D:67:DB:0B:EB:B2:3E:37:C7:1B:F3:25:DC:BC:DD:24:0E:A0:4D:AF:58:B4:7E:18:40
# Fingerprint (SHA1): 09:3C:61:F3:8B:8B:DC:7D:55:DF:75:38:02:05:00:E1:25:F5:C8:36
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "QuoVadis Root CA 2 G3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\label{eq:condition} $$ \060\110\061\013\060\011\006\003\125\004\006\023\002\102\115\061 $$
\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144
\151\163\040\114\151\155\151\164\145\144\061\036\060\034\006\003
\125\004\003\023\025\121\165\157\126\141\144\151\163\040\122\157
\157\164\040\103\101\040\062\040\107\063
END
CKA_ID UTF8 "0"
```

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \0001100610130600111006003125004006023002102115061 $$ \031060027006003125004012023020121165157126141144 $$ \1511630401141511551511641451440610360600034006003 $$ \125004003023025121165157126141144151163040122157 $$ \157164040103101040062040107063$ 

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

\002\024\104\127\064\044\133\201\211\233\065\362\316\270\053\073 \133\247\046\360\165\050

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\140\060\202\003\110\240\003\002\001\002\002\024\104 \127\064\044\133\201\211\233\065\362\316\270\053\073\133\247\046 \360\165\050\060\015\006\011\052\206\110\206\367\015\001\001\013 \005\000\060\110\061\013\060\011\006\003\125\004\006\023\002\102 \141\144\151\163\040\114\151\155\151\164\145\144\061\036\060\034 \006\003\125\004\003\023\025\121\165\157\126\141\144\151\163\040 \061\062\060\061\061\062\061\070\065\071\063\062\132\027\015\064 \062\060\061\061\062\061\070\065\071\063\062\132\060\110\061\013 \003\125\004\012\023\020\121\165\157\126\141\144\151\163\040\114 \151\155\151\164\145\144\061\036\060\034\006\003\125\004\003\023 \025\121\165\157\126\141\144\151\163\040\122\157\157\164\040\103 \101\040\062\040\107\063\060\202\002\042\060\015\006\011\052\206 \110\206\367\015\001\001\001\005\000\003\202\002\017\000\060\202 \002\012\002\202\002\001\000\241\256\045\262\001\030\334\127\210 \077\106\353\371\257\342\353\043\161\342\232\321\141\146\041\137  $\label{eq:condition} $$ \252\257\047\121\345\156\033\026\324\055\175\120\260\123\167\275$ \170\072\140\342\144\002\233\174\206\233\326\032\216\255\377\037 \025\177\325\225\036\022\313\346\024\204\004\301\337\066\263\026 \237\212\343\311\333\230\064\316\330\063\027\050\106\374\247\311 \360\322\264\325\115\011\162\111\371\362\207\343\251\332\175\241 \175\153\262\072\045\251\155\122\104\254\370\276\156\373\334\246 \163\221\220\141\246\003\024\040\362\347\207\243\210\255\255\240 \214\377\246\013\045\122\045\347\026\001\325\313\270\065\201\014 \243\073\360\341\341\374\132\135\316\200\161\155\370\111\253\076  $\label{eq:condition} $$ \073\272\270\327\200\001\373\245\353\133\263\305\136\140\052\061 $$$ \240\257\067\350\040\072\237\250\062\054\014\314\011\035\323\236 \216\135\274\114\230\356\305\032\150\173\354\123\246\351\024\065 \243\337\315\200\237\014\110\373\034\364\361\277\112\270\372\325 \214\161\112\307\037\255\376\101\232\263\203\135\362\204\126\357  $\verb|245|127|103|316|051|255|214|253|125|277|304|373|133|001|335|043|$ \041\241\130\000\216\303\320\152\023\355\023\343\022\053\200\334 \147\346\225\262\315\036\042\156\052\370\101\324\362\312\024\007 \215\212\125\022\306\151\365\270\206\150\057\123\136\260\322\252

\041\301\230\346\060\343\147\125\307\233\156\254\031\250\125\246 \105\006\320\043\072\333\353\145\135\052\021\021\360\073\117\312 \155\364\064\304\161\344\377\000\132\366\134\256\043\140\205\163 \361\344\020\261\045\256\325\222\273\023\301\014\340\071\332\264 \071\127\265\253\065\252\162\041\073\203\065\347\061\337\172\041 \156\270\062\010\175\035\062\221\025\112\142\162\317\343\167\241 \274\325\021\033\166\001\147\010\340\101\013\303\353\025\156\370 \244\031\331\242\253\257\342\047\122\126\053\002\212\054\024\044  $\label{eq:condition} $$ \371\277\102\002\277\046\310\306\217\340\156\070\175\123\055\345 $$$ \355\230\263\225\143\150\177\371\065\364\337\210\305\140\065\222 \300\174\151\034\141\225\026\320\353\336\013\257\076\004\020\105 \145\130\120\070\257\110\362\131\266\026\362\074\015\220\002\306 \160\056\001\255\074\025\327\002\003\001\000\001\243\102\060\100  $\label{eq:condition} $$ \000\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001 $$$  $\label{eq:condition} $$ 377 \cdot 060 \cdot 016 \cdot 006 \cdot 003 \cdot 125 \cdot 035 \cdot 017 \cdot 001 \cdot 031 \cdot 377 \cdot 004 \cdot 004 \cdot 003 \cdot 002 \cdot 001$ \006\060\035\006\003\125\035\016\004\026\004\024\355\347\157\166  $\label{eq:condition} $$ \frac{354}{111}133\\306\\245\\167\\273\\162\\026\\161\\233\\304\\075$ \060\015\006\011\052\206\110\206\367\015\001\001\013\005\000\003 \202\002\001\000\221\337\200\077\103\011\176\161\302\367\353\263 \210\217\341\121\262\274\075\165\371\050\135\310\274\231\233\173 \135\252\345\312\341\012\367\350\262\323\237\335\147\061\176\272 \001\252\307\152\101\073\220\324\010\134\262\140\152\220\360\310  $\label{eq:condition} $$ \frac{316}{003}142\frac{371}{213}\frac{355}{373}\frac{156}{052}\frac{334}{006}\frac{115}{074}\frac{051}{017}\frac{211}{211}$ \026\212\130\114\110\017\350\204\141\352\074\162\246\167\344\102 \256\210\243\103\130\171\176\256\312\245\123\015\251\075\160\275 \040\031\141\244\154\070\374\103\062\341\301\107\377\370\354\361 \021\042\062\226\234\302\366\133\151\226\173\040\014\103\101\232 \133\366\131\031\210\336\125\210\067\121\013\170\134\012\036\243 \102\375\307\235\210\017\300\362\170\002\044\124\223\257\211\207 \210\311\112\200\035\352\320\156\076\141\056\066\273\065\016\047  $\label{eq:condition} $$ \226\375\146\064\073\141\162\163\361\026\134\107\006\124\111\000 $$$ \172\130\022\260\012\357\205\375\261\270\063\165\152\223\034\022 \346\140\136\157\035\177\311\037\043\313\204\141\237\036\202\104 \371\137\255\142\125\044\232\122\230\355\121\347\241\176\227\072 \346\057\037\021\332\123\200\054\205\236\253\065\020\333\042\137 \152\305\136\227\123\362\062\002\011\060\243\130\360\015\001\325 \162\306\261\174\151\173\303\365\066\105\314\141\156\136\114\224 \305\136\256\350\016\136\213\277\367\315\340\355\241\016\033\063 \356\124\030\376\017\276\357\176\204\153\103\343\160\230\333\135 \110\307\263\246\042\365\063\067\132\225\107\237\173\272\030\025 \157\377\326\024\144\203\111\322\012\147\041\333\017\065\143\140  $\label{eq:condition} $$ \050\042\343\261\225\203\315\205\246\335\057\017\347\147\122\156$$ \273\057\205\174\365\112\163\347\305\076\300\275\041\022\005\077 \374\267\003\111\002\133\310\045\346\342\124\070\365\171\207\214 \035\123\262\116\205\173\006\070\307\054\370\370\260\162\215\045 \345\167\122\364\003\034\110\246\120\137\210\040\060\156\362\202  $\label{eq:condition} $$103\253\075\227\204\347\123\373\041\301\117\017\042\232\206\270$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "QuoVadis Root CA 2 G3"

# Issuer: CN=QuoVadis Root CA 2 G3,O=QuoVadis Limited,C=BM

# Serial Number:44:57:34:24:5b:81:89:9b:35:f2:ce:b8:2b:3b:5b:a7:26:f0:75:28

# Subject: CN=QuoVadis Root CA 2 G3,O=QuoVadis Limited,C=BM

# Not Valid Before: Thu Jan 12 18:59:32 2012

# Not Valid After: Sun Jan 12 18:59:32 2042

# Fingerprint (SHA-256):

8F:E4:FB:0A:F9:3A:4D:0D:67:DB:0B:EB:B2:3E:37:C7:1B:F3:25:DC:BC:DD:24:0E:A0:4D:AF:58:B4:7E:18:40

# Fingerprint (SHA1): 09:3C:61:F3:8B:8B:DC:7D:55:DF:75:38:02:05:00:E1:25:F5:C8:36

CKA CLASS CK OBJECT CLASS CKO NSS TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "QuoVadis Root CA 2 G3"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\011\074\141\363\213\334\175\125\337\165\070\002\005\000\341

\045\365\310\066

**END** 

CKA CERT MD5 HASH MULTILINE OCTAL

 $\label{eq:condition} $$ \257\014\206\156\277\100\055\177\013\076\022\120\272\022\075\006$$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\110\061\013\060\011\006\003\125\004\006\023\002\102\115\061$$$ 

 $\label{eq:condition} $$ \031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144$ 

\151\163\040\114\151\155\151\164\145\144\061\036\060\034\006\003

\125\004\003\023\025\121\165\157\126\141\144\151\163\040\122\157

 $\label{eq:condition} $$ 157\164\040\103\101\040\062\040\107\063$$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\024\104\127\064\044\133\201\211\233\065\362\316\270\053\073

\133\247\046\360\165\050

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

 ${\tt CKA\_TRUST\_EMAIL\_PROTECTION\ CK\_TRUST\ CKT\_NSS\_MUST\_VERIFY\_TRUST}$ 

CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "QuoVadis Root CA 3 G3"

#

- # Issuer: CN=QuoVadis Root CA 3 G3,O=QuoVadis Limited,C=BM
- # Serial Number:2e:f5:9b:02:28:a7:db:7a:ff:d5:a3:a9:ee:bd:03:a0:cf:12:6a:1d
- # Subject: CN=QuoVadis Root CA 3 G3,O=QuoVadis Limited,C=BM
- # Not Valid Before: Thu Jan 12 20:26:32 2012
- # Not Valid After: Sun Jan 12 20:26:32 2042
- # Fingerprint (SHA-256):
- 88:EF:81:DE:20:2E:B0:18:45:2E:43:F8:64:72:5C:EA:5F:BD:1F:C2:D9:D2:05:73:07:09:C5:D8:B8:69:0F:46
- # Fingerprint (SHA1): 48:12:BD:92:3C:A8:C4:39:06:E7:30:6D:27:96:E6:A4:CF:22:2E:7D
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE
- CKA TOKEN CK BBOOL CK TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA LABEL UTF8 "QuoVadis Root CA 3 G3"
- CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509
- CKA\_SUBJECT MULTILINE\_OCTAL
- $\label{eq:condition} $$ \060\110\061\013\060\011\006\003\125\004\006\023\002\102\115\061 $$$
- $\label{eq:condition} $$ \001\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144$
- \151\163\040\114\151\155\151\164\145\144\061\036\060\034\006\003
- \125\004\003\023\025\121\165\157\126\141\144\151\163\040\122\157
- \157\164\040\103\101\040\063\040\107\063

**END** 

CKA ID UTF8 "0"

## CKA\_ISSUER MULTILINE\_OCTAL

\060\110\061\013\060\011\006\003\125\004\006\023\002\102\115\061 \031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144

 $\label{eq:condition} $$ 157\164\040\103\101\040\063\040\107\063$$ 

**END** 

## CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\024\056\365\233\002\050\247\333\172\377\325\243\251\356\275 \003\240\317\022\152\035

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

\101\040\063\040\107\063\060\202\002\042\060\015\006\011\052\206 \110\206\367\015\001\001\001\005\000\003\202\002\017\000\060\202 \002\012\002\202\002\001\000\263\313\016\020\147\216\352\024\227 \247\062\052\012\126\066\177\150\114\307\263\157\072\043\024\221 \377\031\177\245\312\254\356\263\166\235\172\351\213\033\253\153 \061\333\372\013\123\114\257\305\245\032\171\074\212\114\377\254 \337\045\336\116\331\202\062\013\104\336\312\333\214\254\243\156 \026\203\073\246\144\113\062\211\373\026\026\070\176\353\103\342 \323\164\112\302\142\012\163\012\335\111\263\127\322\260\012\205 \235\161\074\336\243\313\300\062\363\001\071\040\103\033\065\321 \123\263\261\356\305\223\151\202\076\026\265\050\106\241\336\352 \211\011\355\103\270\005\106\212\206\365\131\107\276\033\157\001 \041\020\271\375\251\322\050\312\020\071\011\312\023\066\317\234  $\label{eq:condition} $$ \255\255\100\164\171\053\002\077\064\377\372\040\151\175\323\356$$  $\\ 141 \\ 365 \\ 272 \\ 263 \\ 347 \\ 060 \\ 320 \\ 067 \\ 043 \\ 206 \\ 162 \\ 141 \\ 105 \\ 051 \\ 110 \\ 131 \\$ \150\157\167\246\056\201\276\007\115\157\257\316\304\105\023\221  $\label{eq:condition} $$ \024\160\006\217\037\237\370\207\151\261\016\357\303\211\031\353$ \352\034\141\374\172\154\212\334\326\003\013\236\046\272\022\335 \324\124\071\253\046\243\063\352\165\201\332\055\315\017\117\344  $\label{eq:condition} $$ \003\321\357\025\227\033\153\220\305\002\220\223\146\002\041\261$ \107\336\213\232\112\200\271\125\217\265\242\057\300\326\063\147 \332\176\304\247\264\004\104\353\107\373\346\130\271\367\014\360  $\label{eq:condition} $$ \frac{173 \cdot 053 \cdot 261 \cdot 300 \cdot 160 \cdot 051 \cdot 303 \cdot 100 \cdot 142 \cdot 055 \cdot 073 \cdot 110 \cdot 151 \cdot 334 \cdot 043 \cdot 074}{1000 \cdot 160 \cdot 051 \cdot 303 \cdot 100 \cdot 142 \cdot 055 \cdot 073 \cdot 110 \cdot 151 \cdot 334 \cdot 043 \cdot 074}$ \110\353\173\011\171\251\155\332\250\060\230\317\200\162\003\210 \246\133\106\256\162\171\174\010\003\041\145\256\267\341\034\245 \261\052\242\061\336\146\004\367\300\164\350\161\336\377\075\131 \314\226\046\022\213\205\225\127\032\253\153\165\013\104\075\021  $\label{eq:condition} $$ \050\074\173\141\267\342\217\147\117\345\354\074\114\140\200\151$ \127\070\036\001\133\215\125\350\307\337\300\314\167\043\064\111 \165\174\366\230\021\353\055\336\355\101\056\024\005\002\177\340  $\label{eq:condition} $$ \003\205\315\361\377\214\026\265\301\262\076\210\154\140\177\220 $$$ \117\225\367\366\055\255\001\071\007\004\372\165\200\175\277\111 \120\355\357\311\304\174\034\353\200\176\333\266\320\335\023\376 \311\323\234\327\262\227\251\002\003\001\000\001\243\102\060\100 \060\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001 \377\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001 \006\060\035\006\003\125\035\016\004\026\004\024\306\027\320\274 \250\352\002\103\362\033\006\231\135\053\220\040\271\327\234\344 \060\015\006\011\052\206\110\206\367\015\001\001\013\005\000\003 \202\002\001\000\064\141\331\126\265\022\207\125\115\335\243\065 \061\106\273\244\007\162\274\137\141\142\350\245\373\013\067\261  $\label{eq:condition} $$ \074\266\263\372\051\235\177\002\365\244\311\250\223\267\172\161 $$$ \050\151\217\163\341\122\220\332\325\276\072\345\267\166\152\126 \200\041\337\135\346\351\072\236\345\076\366\242\151\307\052\012 \260\030\107\334\040\160\175\122\243\076\131\174\301\272\311\310 \025\100\141\312\162\326\160\254\322\267\360\034\344\206\051\360 \316\357\150\143\320\265\040\212\025\141\232\176\206\230\264\311

\302\166\373\314\272\060\026\314\243\141\306\164\023\345\153\357 \243\025\352\003\376\023\213\144\344\323\301\322\350\204\373\111 \321\020\115\171\146\353\252\375\364\215\061\036\160\024\255\334 \336\147\023\114\201\025\141\274\267\331\221\167\161\031\201\140 \273\360\130\245\265\234\013\367\217\042\125\047\300\113\001\155 \073\231\015\324\035\233\143\147\057\320\356\015\312\146\274\224 \117\246\255\355\374\356\143\254\127\077\145\045\317\262\206\217 \320\010\377\270\166\024\156\336\345\047\354\253\170\265\123\271 \266\077\350\040\371\322\250\276\141\106\312\207\214\204\363\371 \361\240\150\233\042\036\201\046\233\020\004\221\161\300\006\037 \334\240\323\271\126\247\343\230\055\177\203\235\337\214\053\234  $\label{eq:condition} $$ \062\216\062\224\360\001\074\042\052\237\103\302\056\303\230\071 $$$ \007\070\173\374\136\000\102\037\363\062\046\171\203\204\366\345  $\label{eq:condition} $$ \360\301\121\022\300\013\036\004\043\014\124\245\114\057\111\305$ \112\321\266\156\140\015\153\374\153\213\205\044\144\267\211\016 \253\045\107\133\074\317\176\111\275\307\351\012\306\332\367\176  $\label{eq:condition} $$ \016\027\010\323\110\227\320\161\222\360\017\071\076\064\152\034 $$$ \175\330\362\042\256\273\151\364\063\264\246\110\125\321\017\016 \046\350\354\266\013\055\247\205\065\315\375\131\310\237\321\315  $\label{eq:condition} $$ \076\132\051\064\271\075\204\316\261\145\324\131\221\221\126\165$$ \041\301\167\236\371\172\341\140\235\323\255\004\030\364\174\353 \136\223\217\123\112\042\051\370\110\053\076\115\206\254\133\177 \313\006\231\131\140\330\130\145\225\215\104\321\367\177\176\047 \177\175\256\200\365\007\114\266\076\234\161\124\231\004\113\375 \130\371\230\364

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "QuoVadis Root CA 3 G3"
```

# Issuer: CN=QuoVadis Root CA 3 G3,O=QuoVadis Limited,C=BM

# Serial Number:2e:f5:9b:02:28:a7:db:7a:ff:d5:a3:a9:ee:bd:03:a0:cf:12:6a:1d

# Subject: CN=QuoVadis Root CA 3 G3,O=QuoVadis Limited,C=BM

# Not Valid Before: Thu Jan 12 20:26:32 2012

# Not Valid After : Sun Jan 12 20:26:32 2042

# Fingerprint (SHA-256):

88:EF:81:DE:20:2E:B0:18:45:2E:43:F8:64:72:5C:EA:5F:BD:1F:C2:D9:D2:05:73:07:09:C5:D8:B8:69:0F:46

# Fingerprint (SHA1): 48:12:BD:92:3C:A8:C4:39:06:E7:30:6D:27:96:E6:A4:CF:22:2E:7D

 ${\tt CKA\_CLASS\ CK\_OBJECT\_CLASS\ CKO\_NSS\_TRUST}$ 

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "QuoVadis Root CA 3 G3"

 ${\tt CKA\_CERT\_SHA1\_HASH\ MULTILINE\_OCTAL}$ 

 $\label{eq:condition} $$ 110\022\275\222\074\250\304\071\006\347\060\155\047\226\346\244 $$$ 

 $\ \ \, \backslash 317 \backslash 042 \backslash 056 \backslash 175$ 

**END** 

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\label{eq:condition} $$ 37\175\271\255\124\157\150\241\337\211\127\003\227\103\260\327
END
CKA ISSUER MULTILINE OCTAL
\060\110\061\013\060\011\006\003\125\004\006\023\002\102\115\061
\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144
\151\163\040\114\151\155\151\164\145\144\061\036\060\034\006\003
\157\164\040\103\101\040\063\040\107\063
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\label{eq:condition} $$ \002\024\056\365\233\002\050\247\333\172\377\325\243\251\356\275 $$
\003\240\317\022\152\035
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "DigiCert Assured ID Root G2"
# Issuer: CN=DigiCert Assured ID Root G2,OU=www.digicert.com,O=DigiCert Inc,C=US
# Serial Number:0b:93:1c:3a:d6:39:67:ea:67:23:bf:c3:af:9a:f4:4b
# Subject: CN=DigiCert Assured ID Root G2,OU=www.digicert.com,O=DigiCert Inc,C=US
# Not Valid Before: Thu Aug 01 12:00:00 2013
# Not Valid After: Fri Jan 15 12:00:00 2038
# Fingerprint (SHA-256):
7D:05:EB:B6:82:33:9F:8C:94:51:EE:09:4E:EB:FE:FA:79:53:A1:14:ED:B2:F4:49:49:45:2F:AB:7D:2F:C1:85
# Fingerprint (SHA1): A1:4B:48:D9:43:EE:0A:0E:40:90:4F:3C:E0:A4:C0:91:93:51:5D:3F
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "DigiCert Assured ID Root G2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\145\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\label{eq:condition} $$ \025\06\003\006\003\125\004\012\023\014\104\151\147\151\103\145 $$
\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157
\103\145\162\164\040\101\163\163\165\162\145\144\040\111\104\040
\122\157\157\164\040\107\062
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\145\061\013\060\011\006\003\125\004\006\023\002\125\123\061
```

 $\label{eq:control} $$ \025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157\155\061\044\060\042\006\003\125\004\003\023\033\104\151\147\151\103\145\162\164\040\101\163\165\162\145\144\040\111\104\040\122\157\157\164\040\107\062$ 

**END** 

## CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\013\223\034\072\326\071\147\352\147\043\277\303\257\232 \364\113

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\003\226\060\202\002\176\240\003\002\001\002\002\020\013 \223\034\072\326\071\147\352\147\043\277\303\257\232\364\113\060  $\label{eq:condition} $$ \015\006\011\052\206\110\206\367\015\001\001\013\005\000\060\145 $$$ \061\013\060\011\006\003\125\004\006\023\002\125\123\061\025\060  $\label{eq:condition} $$ \003\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164$$ \040\111\156\143\061\031\060\027\006\003\125\004\013\023\020\167 \167\167\056\144\151\147\151\143\145\162\164\056\143\157\155\061  $\\ \\044\\060\\042\\006\\003\\125\\004\\003\\023\\033\\104\\151\\147\\151\\103\\145$ \162\164\040\101\163\163\165\162\145\144\040\111\104\040\122\157 \157\164\040\107\062\060\036\027\015\061\063\060\070\060\061\061  $\label{eq:condition} $$ \062\060\060\060\132\027\015\063\070\060\061\061\065\061\062$ \060\060\060\060\132\060\145\061\013\060\011\006\003\125\004\006 \023\002\125\123\061\025\060\023\006\003\125\004\012\023\014\104 \151\147\151\103\145\162\164\040\111\156\143\061\031\060\027\006 \003\125\004\013\023\020\167\167\167\056\144\151\147\151\143\145 \162\164\056\143\157\155\061\044\060\042\006\003\125\004\003\023 \033\104\151\147\151\103\145\162\164\040\101\163\163\165\162\145 \144\040\111\104\040\122\157\157\164\040\107\062\060\202\001\042  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\001\005\000\003$ \202\001\017\000\060\202\001\012\002\202\001\001\000\331\347\050 \057\122\077\066\162\111\210\223\064\363\370\152\036\061\124\200 \237\255\124\101\265\107\337\226\250\324\257\200\055\271\012\317 \165\375\211\245\175\044\372\343\042\014\053\274\225\027\013\063 \277\031\115\101\006\220\000\275\014\115\020\376\007\265\347\034 \156\042\125\061\145\227\275\323\027\322\036\142\363\333\352\154  $\label{eq:condition} $$ 120\214\077\204\014\226\317\267\313\003\340\312\155\241\024\114$  $\label{eq:condition} $$ \033\211\335\355\000\260\122\174\257\221\154\261\070\023\321\351$ \022\010\300\000\260\034\053\021\332\167\160\066\233\256\316\171 \207\334\202\160\346\011\164\160\125\151\257\243\150\237\277\335 \266\171\263\362\235\160\051\125\364\253\377\225\141\363\311\100 \157\035\321\276\223\273\323\210\052\273\235\277\162\132\126\161 \073\077\324\363\321\012\376\050\357\243\356\331\231\257\003\323 \217\140\267\362\222\241\261\275\211\211\037\060\315\303\246\056 \142\063\256\026\002\167\104\132\347\201\012\074\247\104\056\171 \270\077\004\274\134\240\207\341\033\257\121\216\315\354\054\372 \370\376\155\360\072\174\252\213\344\147\225\061\215\002\003\001

\000\001\243\102\060\100\060\017\006\003\125\035\023\001\001\377 \004\005\060\003\001\001\377\060\016\006\003\125\035\017\001\001  $\label{eq:condition} $$ \sqrt{377} \cdot 004 \cdot 004 \cdot 003 \cdot 002 \cdot 001 \cdot 206 \cdot 060 \cdot 035 \cdot 006 \cdot 003 \cdot 125 \cdot 035 \cdot 016 \cdot 004 \cdot 026$  $\label{eq:condition} $$ \004\024\316\303\112\271\231\125\362\270\333\140\277\251\176\275 $$$ \126\265\227\066\247\326\060\015\006\011\052\206\110\206\367\015  $\label{eq:condition} $$ \001\001\005\000\003\202\001\001\000\312\245\125\214\343\310 $$$ \101\156\151\047\247\165\021\357\074\206\066\157\322\235\306\170  $\label{eq:condition} $$ \070\035\151\226\242\222\151\056\070\154\233\175\004\324\211\245 $$$ \261\061\067\212\311\041\314\253\154\315\213\034\232\326\277\110 \322\062\146\301\212\300\363\057\072\357\300\343\324\221\206\321 \120\343\003\333\163\167\157\112\071\123\355\336\046\307\265\175  $\verb|\|257|053|102|321|165|142|343|112|053|002|307|120|113|340|151|342|$ \226\154\016\104\146\020\104\217\255\005\353\370\171\254\246\033 \350\067\064\235\123\311\141\252\242\122\257\112\160\026\206\302  $\label{eq:condition} $$ \072\310\261\023\160\066\330\317\356\364\012\064\325\133\114\375 $$$ \007\234\242\272\331\001\162\134\363\115\301\335\016\261\034\015  $\label{eq:condition} $$ 304\143\276\255\364\024\373\211\354\242\101\016\114\314\310\127 $$$ \100\320\156\003\252\315\014\216\211\231\231\154\360\074\060\257  $\label{eq:condition} $$ \070\337\157\274\243\276\051\040\047\253\164\377\023\042\170\336 $$$ \227\122\125\036\203\265\124\040\003\356\256\300\117\126\336\067 \314\303\177\252\004\047\273\323\167\270\142\333\027\174\234\050 \042\023\163\154\317\046\365\212\051\347

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "DigiCert Assured ID Root G2"
```

# Issuer: CN=DigiCert Assured ID Root G2,OU=www.digicert.com,O=DigiCert Inc,C=US

# Serial Number:0b:93:1c:3a:d6:39:67:ea:67:23:bf:c3:af:9a:f4:4b

# Subject: CN=DigiCert Assured ID Root G2,OU=www.digicert.com,O=DigiCert Inc,C=US

# Not Valid Before: Thu Aug 01 12:00:00 2013

# Not Valid After : Fri Jan 15 12:00:00 2038

# Fingerprint (SHA-256):

# Fingerprint (SHA1): A1:4B:48:D9:43:EE:0A:0E:40:90:4F:3C:E0:A4:C0:91:93:51:5D:3F

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "DigiCert Assured ID Root G2"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \241\113\110\331\103\356\012\016\100\220\117\074\340\244\300\221 $$$ 

\223\121\135\077

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\222\070\271\370\143\044\202\145\054\127\063\346\376\201\217\235

**END** 

```
CKA ISSUER MULTILINE OCTAL
\060\145\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145
\label{eq:condition} $$ 162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157
\155\061\044\060\042\006\003\125\004\003\023\033\104\151\147\151
\103\145\162\164\040\101\163\163\165\162\145\144\040\111\104\040
\122\157\157\164\040\107\062
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \02\02\013\223\034\072\326\071\147\352\147\043\277\303\257\232 $$
\364\113
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "DigiCert Assured ID Root G3"
# Issuer: CN=DigiCert Assured ID Root G3,OU=www.digicert.com,O=DigiCert Inc,C=US
# Serial Number:0b:a1:5a:fa:1d:df:a0:b5:49:44:af:cd:24:a0:6c:ec
# Subject: CN=DigiCert Assured ID Root G3,OU=www.digicert.com,O=DigiCert Inc,C=US
# Not Valid Before: Thu Aug 01 12:00:00 2013
# Not Valid After: Fri Jan 15 12:00:00 2038
# Fingerprint (SHA-256):
7E:37:CB:8B:4C:47:09:0C:AB:36:55:1B:A6:F4:5D:B8:40:68:0F:BA:16:6A:95:2D:B1:00:71:7F:43:05:3F:C2
# Fingerprint (SHA1): F5:17:A2:4F:9A:48:C6:C9:F8:A2:00:26:9F:DC:0F:48:2C:AB:30:89
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "DigiCert Assured ID Root G3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\145\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145
\label{eq:condition} $$ 162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157
\155\061\044\060\042\006\003\125\004\003\023\033\104\151\147\151
\103\145\162\164\040\101\163\163\165\162\145\144\040\111\104\040
\122\157\157\164\040\107\063
END
CKA ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\145\061\013\060\011\006\003\125\004\006\023\002\125\123\061
```

\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145

 $\label{eq:control_loss} $$ 162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023 $$ 020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157 $$ 155\061\044\060\042\006\003\125\004\003\023\033\104\151\147\151 $$ 103\145\162\164\040\101\163\165\162\145\144\040\111\104\040 $$ 122\157\157\164\040\107\063$$ 

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

\002\020\013\241\132\372\035\337\240\265\111\104\257\315\044\240 \154\354

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

\241\132\372\035\337\240\265\111\104\257\315\044\240\154\354\060 \012\006\010\052\206\110\316\075\004\003\003\060\145\061\013\060  $\label{eq:condition} $$ \004\003\125\004\006\023\002\125\123\061\025\060\023\006\003$ \125\004\012\023\014\104\151\147\151\103\145\162\164\040\111\156  $\label{eq:condition} $$ 143\061\031\060\027\006\003\125\004\013\023\020\167\167\167\056$$ \144\151\147\151\143\145\162\164\056\143\157\155\061\044\060\042 \006\003\125\004\003\023\033\104\151\147\151\103\145\162\164\040  $\label{eq:condition} $$ 101\163\165\162\145\144\040\111\104\040\122\157\157\164\040 $$$ \107\063\060\036\027\015\061\063\060\070\060\061\061\062\060\060 \060\060\132\027\015\063\070\060\061\061\065\061\062\060\060\060  $\label{eq:condition} $$ \060\132\060\145\061\013\060\011\006\003\125\004\006\023\002\125$ \123\061\025\060\023\006\003\125\004\012\023\014\104\151\147\151 \103\145\162\164\040\111\156\143\061\031\060\027\006\003\125\004 \013\023\020\167\167\167\056\144\151\147\151\143\145\162\164\056 \143\157\155\061\044\060\042\006\003\125\004\003\023\033\104\151 \104\040\122\157\157\164\040\107\063\060\166\060\020\006\007\052 \206\110\316\075\002\001\006\005\053\201\004\000\042\003\142\000  $\\ \\004\\ \\031\\ \\347\\ \\274\\ \\254\\ \\104\\ \\145\\ \\355\\ \\315\\ \\270\\ \\077\\ \\130\\ \\373\\ \\215\\ \\261\\ \\1270\\ \\$ \251\104\055\005\025\362\357\013\377\020\164\237\265\142\122\137 \146\176\037\345\334\033\105\171\013\314\306\123\012\235\215\135 \002\331\251\131\336\002\132\366\225\052\016\215\070\112\212\111 \306\274\306\003\070\007\137\125\332\176\011\156\342\177\136\320 \105\040\017\131\166\020\326\240\044\360\055\336\066\362\154\051 \071\243\102\060\100\060\017\006\003\125\035\023\001\001\377\004 \005\060\003\001\001\377\060\016\006\003\125\035\017\001\001\377  $\label{eq:condition} $$ \024\313\320\275\251\341\230\005\121\241\115\067\242\203\171\316$$ \215\035\052\344\204\060\012\006\010\052\206\110\316\075\004\003 \003\003\147\000\060\144\002\060\045\244\201\105\002\153\022\113 \165\164\117\310\043\343\160\362\165\162\336\174\211\360\317\221 \162\141\236\136\020\222\131\126\271\203\307\020\347\070\351\130 \046\066\175\325\344\064\206\071\002\060\174\066\123\360\060\345 \142\143\072\231\342\266\243\073\233\064\372\036\332\020\222\161 \136\221\023\247\335\244\156\222\314\062\326\365\041\146\307\057 \352\226\143\152\145\105\222\225\001\264

```
END
```

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "DigiCert Assured ID Root G3"
- # Issuer: CN=DigiCert Assured ID Root G3,OU=www.digicert.com,O=DigiCert Inc,C=US
- # Serial Number:0b:a1:5a:fa:1d:df:a0:b5:49:44:af:cd:24:a0:6c:ec
- # Subject: CN=DigiCert Assured ID Root G3,OU=www.digicert.com,O=DigiCert Inc,C=US
- # Not Valid Before: Thu Aug 01 12:00:00 2013
- # Not Valid After: Fri Jan 15 12:00:00 2038
- # Fingerprint (SHA-256):

7E:37:CB:8B:4C:47:09:0C:AB:36:55:1B:A6:F4:5D:B8:40:68:0F:BA:16:6A:95:2D:B1:00:71:7F:43:05:3F:C2

# Fingerprint (SHA1): F5:17:A2:4F:9A:48:C6:C9:F8:A2:00:26:9F:DC:0F:48:2C:AB:30:89

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "DigiCert Assured ID Root G3"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \365\027\242\117\232\110\306\311\370\242\000\046\237\334\017\110$ 

\054\253\060\211

**END** 

CKA CERT MD5 HASH MULTILINE OCTAL

\174\177\145\061\014\201\337\215\272\076\231\342\134\255\156\373

**END** 

CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \060\145\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$$ 

\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145

\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023

 $\label{eq:condition} $$ \020\167\167\056\144\151\147\151\143\145\162\164\056\143\157$$$ 

 $\label{eq:condition} $$ 155\061\044\060\042\006\003\125\004\003\023\033\104\151\147\151$ 

\103\145\162\164\040\101\163\163\165\162\145\144\040\111\104\040

\122\157\157\164\040\107\063

**END** 

CKA SERIAL NUMBER MULTILINE OCTAL

\002\020\013\241\132\372\035\337\240\265\111\104\257\315\044\240 \154\354

END

 ${\tt CKA\_TRUST\_SERVER\_AUTH\ CK\_TRUST\ CKT\_NSS\_TRUSTED\_DELEGATOR}$ 

CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "DigiCert Global Root G2"

#

# Issuer: CN=DigiCert Global Root G2,OU=www.digicert.com,O=DigiCert Inc,C=US

- # Serial Number:03:3a:f1:e6:a7:11:a9:a0:bb:28:64:b1:1d:09:fa:e5
- # Subject: CN=DigiCert Global Root G2,OU=www.digicert.com,O=DigiCert Inc,C=US
- # Not Valid Before: Thu Aug 01 12:00:00 2013
- # Not Valid After: Fri Jan 15 12:00:00 2038
- # Fingerprint (SHA-256):

CB:3C:CB:B7:60:31:E5:E0:13:8F:8D:D3:9A:23:F9:DE:47:FF:C3:5E:43:C1:14:4C:EA:27:D4:6A:5A:B1:CB:5F

# Fingerprint (SHA1): DF:3C:24:F9:BF:D6:66:76:1B:26:80:73:FE:06:D1:CC:8D:4F:82:A4

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "DigiCert Global Root G2"

CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\141\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$$ 

 $\label{eq:condition} $$ \025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145$ 

\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023

 $\label{eq:condition} $$ \020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157$$$ 

END

CKA\_ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000141\0013\006\0011\006\003\125\004\0023\002\125\123\061\025\006\0023\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164\040\111\156\143\061\031\060\0027\006\003\125\004\003\125\004\003\125\004\003\125\004\151\143\157\155\061\040\060\036\006\003\125\004\003\023\027\104\151\147\151\103\145\162\164\040\107\154\157\142\141\154\040\122\157\157\164\040\107\062$ 

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\003\072\361\346\247\021\251\240\273\050\144\261\035\011 \372\345

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\132\060\141\061\013\060\011\006\003\125\004\006\023\002\125\123 \061\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103 \145\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013  $\label{eq:condition} $$ \023\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143$$ \157\155\061\040\060\036\006\003\125\004\003\023\027\104\151\147  $\label{eq:local_continuity} $$ \frac{151\\103\\145\\162\\164\\040\\107\\154\\157\\142\\141\\154\\040\\122\\157\\157$ \164\040\107\062\060\202\001\042\060\015\006\011\052\206\110\206 \367\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012  $\label{eq:condition} $$ \002\202\001\000\273\067\315\064\334\173\153\311\262\150\220 $$$ \255\112\165\377\106\272\041\012\010\215\365\031\124\311\373\210 \333\363\256\362\072\211\221\074\172\346\253\006\032\153\317\254  $\begin{tabular}{l} $$ \begin{tabular}{l} $\langle 0.055 \rangle 3.50 \rangle 1.36 \rangle 0.11 \rangle 0.44 \rangle 1.04 \rangle 2.72 \rangle 1.42 \rangle 2.32 \rangle 1.76 \rangle 3.26 \rangle 2.43 \rangle 2.50 \rangle 1.76 \rangle 3.40 \rangle 1.24 \rangle 1.24$ \165\040\005\254\120\267\234\143\032\154\060\334\332\037\031\261  $\label{eq:condition} $$ 327 \cdot 340 \cdot 313 \cdot 224 \cdot 203 \cdot 67 \cdot 256 \cdot 354 \cdot 037 \cdot 103 \cdot 116 \cdot 335 \cdot 327 \cdot 340 \cdot 313 \cdot 224 \cdot 203 \cdot 067 \cdot 256 \cdot 354 \cdot 037 \cdot 103 \cdot 116 \cdot 335 \cdot 327 \cdot 340 \cdot 313 \cdot 224 \cdot 203 \cdot 067 \cdot 256 \cdot 354 \cdot 037 \cdot 103 \cdot 116 \cdot 335 \cdot 327 \cdot 340 \cdot 313 \cdot 224 \cdot 203 \cdot 067 \cdot 256 \cdot 354 \cdot 037 \cdot 103 \cdot 116 \cdot 335 \cdot 327 \cdot 340 \cdot 313 \cdot 224 \cdot 203 \cdot 067 \cdot 256 \cdot 354 \cdot 037 \cdot 103 \cdot 116 \cdot 335 \cdot 327 \cdot 340 \cdot 313 \cdot 224 \cdot 203 \cdot 067 \cdot 256 \cdot 354 \cdot 037 \cdot 103 \cdot 116 \cdot 335 \cdot 327 \cdot 340 \cdot 313 \cdot 224 \cdot 203 \cdot 067 \cdot 256 \cdot 354 \cdot 037 \cdot 103 \cdot 116 \cdot 335 \cdot 327 \cdot 340 \cdot 313 \cdot 224 \cdot 203 \cdot 067 \cdot 256 \cdot 354 \cdot 037 \cdot 103 \cdot 116 \cdot 335 \cdot 327 \cdot 340 \cdot 313 \cdot 224 \cdot 203 \cdot 067 \cdot 256 \cdot 354 \cdot 037 \cdot 103 \cdot 116 \cdot 335 \cdot 327 \cdot 340 \cdot 313 \cdot 224 \cdot 203 \cdot 067 \cdot 256 \cdot 354 \cdot 037 \cdot 103 \cdot 116 \cdot 335 \cdot 327 \cdot 340 \cdot 313 \cdot 224 \cdot 203 \cdot 067 \cdot 256 \cdot 354 \cdot 037 \cdot 103 \cdot 116 \cdot 335 \cdot 327 \cdot 340 \cdot 313 \cdot 224 \cdot 203 \cdot 067 \cdot 256 \cdot 354 \cdot 037 \cdot 103 \cdot$ \173\054\322\275\056\245\057\344\251\270\255\072\324\231\244\266 \045\351\233\153\000\140\222\140\377\117\041\111\030\367\147\220 \253\141\006\234\217\362\272\351\264\351\222\062\153\265\363\127 \350\135\033\315\214\035\253\225\004\225\111\363\065\055\226\343 \111\155\335\167\343\373\111\113\264\254\125\007\251\217\225\263 \264\043\273\114\155\105\360\366\251\262\225\060\264\375\114\125 \214\047\112\127\024\174\202\235\315\163\222\323\026\112\006\014 \214\120\321\217\036\011\276\027\241\346\041\312\375\203\345\020 \274\203\245\012\304\147\050\366\163\024\024\075\106\166\303\207 \024\211\041\064\115\257\017\105\014\246\111\241\272\273\234\305 \261\063\203\051\205\002\003\001\000\001\243\102\060\100\060\017  $\\ \\006\\ \\003\\ \\125\\ \\035\\ \\023\\ \\001\\ \\001\\ \\377\\ \\004\\ \\005\\ \\060\\ \\003\\ \\001\\ \\001\\ \\377\\ \\060$ \016\006\003\125\035\017\001\001\377\004\004\003\002\001\206\060  $\label{eq:condition} $$ \035\006\003\125\035\016\004\026\004\024\116\042\124\040\030\225$ \346\343\156\346\017\372\372\271\022\355\006\027\217\071\060\015 \006\011\052\206\110\206\367\015\001\001\013\005\000\003\202\001  $\label{eq:condition} $$ \001\000\140\147\050\224\157\016\110\143\353\061\335\352\147\030 $$$ \325\211\175\074\305\213\112\177\351\276\333\053\027\337\260\137 \163\167\052\062\023\071\201\147\102\204\043\362\105\147\065\354 \210\277\370\217\260\141\014\064\244\256\040\114\204\306\333\370 \065\341\166\331\337\246\102\273\307\104\010\206\177\066\164\044 \132\332\154\015\024\131\065\275\362\111\335\266\037\311\263\015 \107\052\075\231\057\273\134\273\265\324\040\341\231\137\123\106 \025\333\150\233\360\363\060\325\076\061\342\215\204\236\343\212  $\label{eq:condition} $$ 32\32\226\076\065\023\245\137\360\371\160\120\160\107\101\021 $$$ \127\031\116\300\217\256\006\304\225\023\027\057\033\045\237\165 \362\261\216\231\241\157\023\261\101\161\376\210\052\310\117\020 \040\125\327\363\024\105\345\340\104\364\352\207\225\062\223\016 \376\123\106\372\054\235\377\213\042\271\113\331\011\105\244\336 \244\270\232\130\335\033\175\122\237\216\131\103\210\201\244\236 \046\325\157\255\335\015\306\067\175\355\003\222\033\345\167\137 \166\356\074\215\304\135\126\133\242\331\146\156\263\065\067\345 \062\266

**END** 

```
CKA_NSS_MOZILLA_CA_POLICY CK_BBOOL CK_TRUE
CKA_NSS_SERVER_DISTRUST_AFTER CK_BBOOL CK_FALSE
CKA_NSS_EMAIL_DISTRUST_AFTER CK_BBOOL CK_FALSE
```

```
# Trust for "DigiCert Global Root G2"
```

# Issuer: CN=DigiCert Global Root G2,OU=www.digicert.com,O=DigiCert Inc,C=US

# Serial Number:03:3a:f1:e6:a7:11:a9:a0:bb:28:64:b1:1d:09:fa:e5

# Subject: CN=DigiCert Global Root G2,OU=www.digicert.com,O=DigiCert Inc,C=US

# Not Valid Before: Thu Aug 01 12:00:00 2013

# Not Valid After: Fri Jan 15 12:00:00 2038

# Fingerprint (SHA-256):

CB:3C:CB:B7:60:31:E5:E0:13:8F:8D:D3:9A:23:F9:DE:47:FF:C3:5E:43:C1:14:4C:EA:27:D4:6A:5A:B1:CB:5F

# Fingerprint (SHA1): DF:3C:24:F9:BF:D6:66:76:1B:26:80:73:FE:06:D1:CC:8D:4F:82:A4

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "DigiCert Global Root G2"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\337\074\044\371\277\326\146\166\033\046\200\163\376\006\321\314 \215\117\202\244

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\344\246\212\310\124\254\122\102\106\012\375\162\110\033\052\104

**END** 

### CKA ISSUER MULTILINE OCTAL

\060\141\061\013\060\011\006\003\125\004\006\023\002\125\123\061

 $\label{eq:condition} $$ \025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145$ 

\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023

\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157

 $\label{eq:condition} $$ \frac{155}{061}\frac{040}{060}\frac{036}{006}\frac{125}{004}\frac{03}{023}\frac{027}{104}\frac{151}{147}\frac{151}{151}$ 

\103\145\162\164\040\107\154\157\142\141\154\040\122\157\157\164

\040\107\062

**END** 

CKA SERIAL NUMBER MULTILINE OCTAL

 $\label{eq:condition} $$ \02\02\03\03\072\361\346\247\021\251\240\273\050\144\261\035\011 $$$ 

\372\345

**END** 

 ${\tt CKA\_TRUST\_SERVER\_AUTH\ CK\_TRUST\ CKT\_NSS\_TRUSTED\_DELEGATOR}$ 

 ${\tt CKA\_TRUST\_EMAIL\_PROTECTION\ CK\_TRUST\ CKT\_NSS\_TRUSTED\_DELEGATOR}$ 

CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "DigiCert Global Root G3"

#

# Issuer: CN=DigiCert Global Root G3,OU=www.digicert.com,O=DigiCert Inc,C=US

# Serial Number:05:55:56:bc:f2:5e:a4:35:35:c3:a4:0f:d5:ab:45:72

# Subject: CN=DigiCert Global Root G3,OU=www.digicert.com,O=DigiCert Inc,C=US

# Not Valid Before: Thu Aug 01 12:00:00 2013

# Not Valid After: Fri Jan 15 12:00:00 2038

# Fingerprint (SHA-256):

31:AD:66:48:F8:10:41:38:C7:38:F3:9E:A4:32:01:33:39:3E:3A:18:CC:02:29:6E:F9:7C:2A:C9:EF:67:31:D0

# Fingerprint (SHA1): 7E:04:DE:89:6A:3E:66:6D:00:E6:87:D3:3F:FA:D9:3B:E8:3D:34:9E

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "DigiCert Global Root G3"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

\040\107\063

**END** 

CKA ID UTF8 "0"

## CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000141\0013\006\0011\006\003\125\004\0023\002\125\123\006\0023\0006\003\125\0004\0012\023\014\104\151\147\151\103\145\162\164\004\0111\156\143\160\1031\060\0027\006\0003\125\0004\0013\125\0004\0003\125\0004\0003\125\102\104\151\147\151\143\145\162\164\006\003\125\0004\0003\0023\0027\1004\151\147\151\103\145\162\164\0040\107\154\157\142\141\154\0040\122\157\157\164\0040\107\063$ 

**END** 

## CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\005\125\126\274\362\136\244\065\065\303\244\017\325\253 \105\162

**END** 

#### CKA VALUE MULTILINE OCTAL

\023\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164 \040\111\156\143\061\031\060\027\006\003\125\004\013\023\020\167  $\\ \\ \langle 040 \rangle 060 \rangle 036 \rangle 006 \rangle 003 \rangle 125 \rangle 004 \rangle 003 \rangle 023 \rangle 027 \rangle 104 \rangle 151 \rangle 147 \rangle 151 \rangle 103 \rangle 145 \rangle 104 \rangle 106 \rangle 106$ \162\164\040\107\154\157\142\141\154\040\122\157\157\164\040\107 \063\060\166\060\020\006\007\052\206\110\316\075\002\001\006\005 \053\201\004\000\042\003\142\000\004\335\247\331\273\212\270\013 \373\013\177\041\322\360\276\276\163\363\063\135\032\274\064\352 \336\306\233\274\320\225\366\360\314\320\013\272\141\133\121\106 \176\236\055\237\356\216\143\014\027\354\007\160\365\317\204\056 \100\203\234\350\077\101\155\073\255\323\244\024\131\066\170\235  $\label{eq:condition} $$ \020\023\154\162\336\256\210\247\241\153\265\103\316$$ \147\334\043\377\003\034\243\342\076\243\102\060\100\060\017\006  $\label{eq:condition} $$ \003\125\035\023\001\001\377\004\005\060\003\001\001\377\060\016$  $\\ \\006\\003\\125\\035\\017\\001\\001\\377\\004\\004\\003\\002\\001\\206\\060\\035$ \006\003\125\035\016\004\026\004\024\263\333\110\244\371\241\305 \330\256\066\101\314\021\143\151\142\051\274\113\306\060\012\006 \010\052\206\110\316\075\004\003\003\003\150\000\060\145\002\061 \000\255\274\362\154\077\022\112\321\055\071\303\012\011\227\163  $\label{eq:condition} $$ \364\210\066\214\210\047\273\346\210\215\120\205\247\143\371\236$$ \062\336\146\223\017\361\314\261\011\217\335\154\253\372\153\177 \240\002\060\071\146\133\302\144\215\270\236\120\334\250\325\111  $\label{eq:condition} $\242\355\307\334\321\111\177\027\001\270\310\206\217\116\214\210$ \053\250\232\251\212\305\321\000\275\370\124\342\232\345\133\174 \263\047\027

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "DigiCert Global Root G3"
```

 ${\tt CKA\_CLASS\ CK\_OBJECT\_CLASS\ CKO\_NSS\_TRUST}$ 

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "DigiCert Global Root G3"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\176\004\336\211\152\076\146\155\000\346\207\323\077\372\331\073 \350\075\064\236

**END** 

<sup>#</sup> Issuer: CN=DigiCert Global Root G3,OU=www.digicert.com,O=DigiCert Inc,C=US

<sup>#</sup> Serial Number:05:55:56:bc:f2:5e:a4:35:35:c3:a4:0f:d5:ab:45:72

<sup>#</sup> Subject: CN=DigiCert Global Root G3,OU=www.digicert.com,O=DigiCert Inc,C=US

<sup>#</sup> Not Valid Before: Thu Aug 01 12:00:00 2013

<sup>#</sup> Not Valid After: Fri Jan 15 12:00:00 2038

<sup>#</sup> Fingerprint (SHA-256):

<sup>31:</sup>AD:66:48:F8:10:41:38:C7:38:F3:9E:A4:32:01:33:39:3E:3A:18:CC:02:29:6E:F9:7C:2A:C9:EF:67:31:D0

<sup>#</sup> Fingerprint (SHA1): 7E:04:DE:89:6A:3E:66:6D:00:E6:87:D3:3F:FA:D9:3B:E8:3D:34:9E

```
CKA CERT MD5 HASH MULTILINE OCTAL
\365\135\244\120\245\373\050\176\036\017\015\314\226\127\126\312
END
CKA ISSUER MULTILINE OCTAL
\060\141\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145
\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\label{eq:condition} $$ \020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157 $$
\155\061\040\060\036\006\003\125\004\003\023\027\104\151\147\151
\103\145\162\164\040\107\154\157\142\141\154\040\122\157\157\164
\040\107\063
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\020\005\125\126\274\362\136\244\065\065\303\244\017\325\253
\105\162
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "DigiCert Trusted Root G4"
# Issuer: CN=DigiCert Trusted Root G4,OU=www.digicert.com,O=DigiCert Inc,C=US
# Serial Number:05:9b:1b:57:9e:8e:21:32:e2:39:07:bd:a7:77:75:5c
# Subject: CN=DigiCert Trusted Root G4,OU=www.digicert.com,O=DigiCert Inc,C=US
# Not Valid Before: Thu Aug 01 12:00:00 2013
# Not Valid After: Fri Jan 15 12:00:00 2038
# Fingerprint (SHA-256):
55:2F:7B:DC:F1:A7:AF:9E:6C:E6:72:01:7F:4F:12:AB:F7:72:40:C7:8E:76:1A:C2:03:D1:D9:D2:0A:C8:99:88
# Fingerprint (SHA1): DD:FB:16:CD:49:31:C9:73:A2:03:7D:3F:C8:3A:4D:7D:77:5D:05:E4
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "DigiCert Trusted Root G4"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\label{eq:condition} $$ \060\142\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$
\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145
\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157
\155\061\041\060\037\006\003\125\004\003\023\030\104\151\147\151
\103\145\162\164\040\124\162\165\163\164\145\144\040\122\157\157
\164\040\107\064
END
CKA_ID UTF8 "0"
```

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000142\0013\006\0011\006\003\125\004\0006\023\002\125\123\006\025\006\0023\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164\040\111\156\143\061\031\060\027\006\003\125\004\0013\125\004\013\125\004\103\145\162\164\056\143\157\155\061\041\060\037\006\003\125\004\003\023\030\104\151\147\151\103\145\162\164\040\124\162\165\163\164\145\144\040\122\157\157\164\040\107\064$ 

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

\002\020\005\233\033\127\236\216\041\062\342\071\007\275\247\167 \165\134

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \0.000\202\0.005\220\0.000\1.002\0.0000\0.0000\0.000\0.000\0.0000\0.0000\0.000\0.000\0.000\0.0000\0.0000\0.0000\0.0000\0.0000\0.00$ \233\033\127\236\216\041\062\342\071\007\275\247\167\165\134\060  $\label{eq:condition} $$ \015\006\011\052\206\110\206\367\015\001\001\014\005\000\060\142 $$$ \061\013\060\011\006\003\125\004\006\023\002\125\123\061\025\060 \023\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164  $\label{eq:condition} $$ \040\111\156\143\061\031\060\027\006\003\125\004\013\023\020\167 $$$ \167\167\056\144\151\147\151\143\145\162\164\056\143\157\155\061 \041\060\037\006\003\125\004\003\023\030\104\151\147\151\103\145  $\label{eq:condition} $$ 162\164\040\122\157\157\164\040$ \107\064\060\036\027\015\061\063\060\070\060\061\061\062\060\060 \060\060\132\027\015\063\070\060\061\061\065\061\062\060\060\060 \060\132\060\142\061\013\060\011\006\003\125\004\006\023\002\125 \123\061\025\060\023\006\003\125\004\012\023\014\104\151\147\151 \103\145\162\164\040\111\156\143\061\031\060\027\006\003\125\004 \013\023\020\167\167\167\056\144\151\147\151\143\145\162\164\056 \143\157\155\061\041\060\037\006\003\125\004\003\023\030\104\151  $\\ 147 \\ 151 \\ 103 \\ 145 \\ 162 \\ 164 \\ 040 \\ 124 \\ 162 \\ 165 \\ 163 \\ 164 \\ 145 \\ 144 \\ 040 \\ 122 \\$ \157\157\164\040\107\064\060\202\002\042\060\015\006\011\052\206 \110\206\367\015\001\001\001\005\000\003\202\002\017\000\060\202 \002\012\002\202\002\001\000\277\346\220\163\150\336\273\344\135 \112\074\060\042\060\151\063\354\302\247\045\056\311\041\075\362 \212\330\131\302\341\051\247\075\130\253\166\232\315\256\173\033 \204\015\304\060\037\363\033\244\070\026\353\126\306\227\155\035 \253\262\171\362\312\021\322\344\137\326\005\074\122\017\122\037  $\label{eq:condition} $$ \306\236\025\245\176\276\237\251\127\026\131\125\162\257\150\223 $$$ \160\302\262\272\165\231\152\163\062\224\321\020\104\020\056\337 \202\363\007\204\346\164\073\155\161\342\055\014\033\356\040\325 \311\040\035\143\051\055\316\354\136\116\310\223\370\041\141\233 \064\353\005\306\136\354\133\032\274\353\311\317\315\254\064\100 \137\261\172\146\356\167\310\110\250\146\127\127\237\124\130\216 \014\053\267\117\247\060\331\126\356\312\173\135\343\255\311\117 \136\345\065\347\061\313\332\223\136\334\216\217\200\332\266\221 \230\100\220\171\303\170\307\266\261\304\265\152\030\070\003\020 \215\330\324\067\244\056\005\175\210\365\202\076\020\221\160\253

\125\202\101\062\327\333\004\163\052\156\221\001\174\041\114\324 \274\256\033\003\165\135\170\146\331\072\061\104\232\063\100\277 \010\327\132\111\244\302\346\251\240\147\335\244\047\274\241\117 \071\265\021\130\027\367\044\134\106\217\144\367\301\151\210\166 \230\166\075\131\135\102\166\207\211\227\151\172\110\360\340\242 \022\033\146\232\164\312\336\113\036\347\016\143\256\346\324\357 \222\222\072\236\075\334\000\344\105\045\211\266\232\104\031\053 \176\300\224\264\322\141\155\353\063\331\305\337\113\004\000\314 \175\034\225\303\217\367\041\262\262\021\267\273\177\362\325\214 \160\054\101\140\252\261\143\030\104\225\032\166\142\176\366\200 \260\373\350\144\246\063\321\211\007\341\275\267\346\103\244\030  $\label{eq:condition} $$ \270\246\167\001\341\017\224\014\041\035\262\124\051\045\211\154$$ \345\016\122\121\107\164\276\046\254\266\101\165\336\172\254\137 \215\077\311\274\323\101\021\022\133\345\020\120\353\061\305\312  $\label{eq:condition} $$ 162\026\042\011\337\174\114\165\077\143\354\041\137\304\040\121 $$$ \153\157\261\253\206\213\117\302\326\105\137\235\040\374\241\036 \305\300\217\242\261\176\012\046\231\365\344\151\057\230\035\055 \365\331\251\262\035\345\033\002\003\001\000\001\243\102\060\100 \060\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001 \377\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001 \206\060\035\006\003\125\035\016\004\026\004\024\354\327\343\202 \322\161\135\144\114\337\056\147\077\347\272\230\256\034\017\117  $\label{eq:condition} $$ \0.060\0.15\0.06\0.11\0.05\2.06\1.10\2.06\3.67\0.15\0.01\0.01\0.01\0.01\0.00\0.003$ \202\002\001\000\273\141\331\175\251\154\276\027\304\221\033\303 \241\242\000\215\343\144\150\017\126\317\167\256\160\371\375\232 \112\231\271\311\170\134\014\014\137\344\346\024\051\126\013\066 \111\135\104\143\340\255\234\226\030\146\033\043\015\075\171\351 \155\153\326\124\370\322\074\301\103\100\256\035\120\365\122\374 \220\073\273\230\231\151\153\307\301\247\250\150\244\047\334\235 \371\047\256\060\205\271\366\147\115\072\076\217\131\071\042\123  $\label{eq:condition} $$ 104\353\310\135\003\312\355\120\172\175\142\041\012\200\310\163$ \146\321\240\005\140\137\350\245\264\247\257\250\367\155\065\234 \174\132\212\326\242\070\231\363\170\213\364\115\322\040\013\336 \004\356\214\233\107\201\162\015\300\024\062\357\060\131\056\256 \340\161\362\126\344\152\227\157\222\120\155\226\215\150\172\232 \262\066\024\172\006\362\044\271\011\021\120\327\010\261\270\211 \172\204\043\141\102\051\345\243\315\242\040\101\327\321\234\144  $\label{eq:condition} $$ \frac{331}{352} 046 \frac{241}{213} 024 \frac{327}{114} 031 \frac{262}{120} 101 \frac{161}{075} 077 \frac{115}{115}$  $\label{eq:condition} $$ 160\043\206\014\112\334\201\322\314\062\224\204\015\010\011\227 $$$ \034\117\300\356\153\040\164\060\322\340\071\064\020\205\041\025 \001\010\350\125\062\336\161\111\331\050\027\120\115\346\276\115 \321\165\254\320\312\373\101\270\103\245\252\323\303\005\104\117  $\label{eq:condition} $$ \054\066\233\342\372\342\105\270\043\123\154\006\157\147\125\177$ \106\265\114\077\156\050\132\171\046\322\244\250\142\227\322\036 \342\355\112\213\274\033\375\107\112\015\337\147\146\176\262\133 \101\320\073\344\364\073\364\004\143\351\357\302\124\000\121\240 \212\052\311\316\170\314\325\352\207\004\030\263\316\257\111\210 \257\363\222\231\266\263\346\141\017\322\205\000\347\120\032\344

 $\label{eq:condition} $$ \033\225\235\031\241\271\234\261\233\261\000\036\357\320\017\117 \102\154\311\012\274\356\103\372\072\161\245\310\115\046\245\065 \375\211\135\274\205\142\035\062\322\240\053\124\355\232\127\301 \333\372\020\317\031\267\213\112\033\217\001\266\047\225\123\350 \266\211\155\133\274\150\324\043\350\213\121\242\126\371\360\246 \200\240\326\036\263\274\017\017\123\165\051\252\352\023\167\344 \336\214\201\041\255\007\020\107\021\255\207\075\007\321\165\274 \317\363\146\176$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "DigiCert Trusted Root G4"
- # Issuer: CN=DigiCert Trusted Root G4,OU=www.digicert.com,O=DigiCert Inc,C=US
- # Serial Number:05:9b:1b:57:9e:8e:21:32:e2:39:07:bd:a7:77:75:5c
- # Subject: CN=DigiCert Trusted Root G4,OU=www.digicert.com,O=DigiCert Inc,C=US
- # Not Valid Before: Thu Aug 01 12:00:00 2013
- # Not Valid After: Fri Jan 15 12:00:00 2038
- # Fingerprint (SHA-256):
- 55:2F:7B:DC:F1:A7:AF:9E:6C:E6:72:01:7F:4F:12:AB:F7:72:40:C7:8E:76:1A:C2:03:D1:D9:D2:0A:C8:99:88
- # Fingerprint (SHA1): DD:FB:16:CD:49:31:C9:73:A2:03:7D:3F:C8:3A:4D:7D:77:5D:05:E4
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- $CKA\_MODIFIABLE\ CK\_BBOOL\ CK\_FALSE$
- CKA LABEL UTF8 "DigiCert Trusted Root G4"
- CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL
- \335\373\026\315\111\061\311\163\242\003\175\077\310\072\115\175\167\135\005\344

**END** 

## CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ 170\362\374\252\140\037\057\264\353\311\067\272\123\056\165\111 $$$ 

**END** 

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000142\001\006\003\125\004\006\023\002\125\123\061\025\006\0023\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157\155\061\041\060\037\006\003\125\004\003\023\030\104\151\147\151\103\145\162\164\040\124\162\165\163\164\145\144\040\122\157\157\164\040\107\064$ 

**END** 

## CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\020\005\233\033\127\236\216\041\062\342\071\007\275\247\167 $$$ 

\165\134

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

```
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

#

# Certificate "COMODO RSA Certification Authority"

#

# Issuer: CN=COMODO RSA Certification Authority,O=COMODO CA Limited,L=Salford,ST=Greater Manchester,C=GB

# Serial Number:4c:aa:f9:ca:db:63:6f:e0:1f:f7:4e:d8:5b:03:86:9d

# Subject: CN=COMODO RSA Certification Authority,O=COMODO CA Limited,L=Salford,ST=Greater

Manchester, C=GB

# Not Valid Before: Tue Jan 19 00:00:00 2010 # Not Valid After : Mon Jan 18 23:59:59 2038

# Fingerprint (SHA-256):

# Fingerprint (SHA1): AF:E5:D2:44:A8:D1:19:42:30:FF:47:9F:E2:F8:97:BB:CD:7A:8C:B4

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "COMODO RSA Certification Authority"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \0.060\201\205\0.061\0.013\0.060\0.011\0.06\0.03\1.25\0.04\0.06\0.023\0.02\1.07\1.02$ 

 $\label{eq:condition} $$ \061\033\060\031\006\003\125\004\010\023\022\107\162\145\141\164$$$ 

\145\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060

 $\label{eq:condition} $$ \006\003\125\004\007\023\007\123\141\154\146\157\162\144\061 $$$ 

 $\label{eq:condition} $$ \032\060\030\006\003\125\004\012\023\021\103\117\115\117\104\117$ 

\040\103\101\040\114\151\155\151\164\145\144\061\053\060\051\006

 $\\ \\003\\125\\004\\003\\023\\042\\103\\117\\115\\117\\104\\117\\040\\122\\123\\101$ 

 $\\ \\ 040\\ \\ 103\\ \\ 145\\ \\ 162\\ \\ 164\\ \\ 151\\ \\ 146\\ \\ 151\\ \\ 143\\ \\ 141\\ \\ 164\\ \\ 151\\ \\ 157\\ \\ 156\\ \\ 040\\ \\ 101$ 

\165\164\150\157\162\151\164\171

**END** 

CKA\_ID UTF8 "0"

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\201\205\061\013\060\011\006\003\125\004\010\023\022\107\162\145\141\164\145\162\060\031\125\004\010\123\141\154\145\162\061\020\060\03\125\004\007\023\007\123\141\154\146\157\162\144\061\032\060\030\006\003\125\004\012\023\021\103\117\115\117\104\117\040\113\101\040\114\151\155\151\164\145\144\061\053\060\051\006\003\125\004\003\023\042\103\117\115\117\104\117\040\122\123\101\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171$ 

END

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\114\252\371\312\333\143\157\340\037\367\116\330\133\003

**END** 

#### CKA VALUE MULTILINE OCTAL

\060\202\005\330\060\202\003\300\240\003\002\001\002\002\020\114 \252\371\312\333\143\157\340\037\367\116\330\133\003\206\235\060 \015\006\011\052\206\110\206\367\015\001\001\001\014\005\000\060\201 \205\061\013\060\011\006\003\125\004\006\023\002\107\102\061\033 \060\031\006\003\125\004\010\023\022\107\162\145\141\164\145\162 \040\115\141\156\143\150\145\163\164\145\162\061\020\060\016\006 \003\125\004\007\023\007\123\141\154\146\157\162\144\061\032\060 \030\006\003\125\004\012\023\021\103\117\115\117\104\117\040\103 \101\040\114\151\155\151\164\145\144\061\053\060\051\006\003\125 \004\003\023\042\103\117\115\117\104\117\040\122\123\101\040\103 \145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164  $\label{eq:condition} $$ \frac{150}{157}\frac{62}{151}\frac{64}{171}\frac{060}{036}\frac{027}{015}\frac{061}{060}\frac{060}{061}\frac{061}{071} $$$ \060\060\060\060\060\060\060\132\027\015\063\070\060\061\061\070\062 \004\006\023\002\107\102\061\033\060\031\006\003\125\004\010\023 \022\107\162\145\141\164\145\162\040\115\141\156\143\150\145\163 \154\146\157\162\144\061\032\060\030\006\003\125\004\012\023\021 \103\117\115\117\104\117\040\103\101\040\114\151\155\151\164\145  $\\ 144 \\ 1053 \\ 1060 \\ 1051 \\ 1006 \\ 1003 \\ 125 \\ 1004 \\ 1003 \\ 1023 \\ 1042 \\ 103 \\ 117 \\ 115 \\ 117$ \104\117\040\122\123\101\040\103\145\162\164\151\146\151\143\141 \164\151\157\156\040\101\165\164\150\157\162\151\164\171\060\202 \002\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005 \000\003\202\002\017\000\060\202\002\012\002\202\002\001\000\221 \350\124\222\322\012\126\261\254\015\044\335\305\317\104\147\164 \231\053\067\243\175\043\160\000\161\274\123\337\304\372\052\022 \217\113\177\020\126\275\237\160\162\267\141\177\311\113\017\027  $\label{eq:condition} $$ \247\075\343\260\004\141\356\377\021\227\307\364\206\076\012\372 $$$ \076\134\371\223\346\064\172\331\024\153\347\234\263\205\240\202 \172\166\257\161\220\327\354\375\015\372\234\154\372\337\260\202 \364\024\176\371\276\304\246\057\117\177\231\177\265\374\147\103 \162\275\014\000\326\211\353\153\054\323\355\217\230\034\024\253 \176\345\343\156\374\330\250\344\222\044\332\103\153\142\270\125 \375\352\301\274\154\266\213\363\016\215\232\344\233\154\151\231 \370\170\110\060\105\325\255\341\015\074\105\140\374\062\226\121 \047\274\147\303\312\056\266\153\352\106\307\307\040\240\261\037 \145\336\110\010\272\244\116\251\362\203\106\067\204\353\350\314 \201\110\103\147\116\162\052\233\134\275\114\033\050\212\134\042 \173\264\253\230\331\356\340\121\203\303\011\106\116\155\076\231 \372\225\027\332\174\063\127\101\074\215\121\355\013\266\134\257 \054\143\032\337\127\310\077\274\351\135\304\233\257\105\231\342 \243\132\044\264\272\251\126\075\317\157\252\377\111\130\276\360 \250\377\364\270\255\351\067\373\272\270\364\013\072\371\350\103 \102\036\211\330\204\313\023\361\331\273\341\211\140\270\214\050 \126\254\024\035\234\012\347\161\353\317\016\335\075\251\226\241

\110\275\074\367\257\265\015\042\114\300\021\201\354\126\073\366 \323\242\342\133\267\262\004\042\122\225\200\223\151\350\216\114 \145\361\221\003\055\160\164\002\352\213\147\025\051\151\122\002 \273\327\337\120\152\125\106\277\240\243\050\141\177\160\320\303 \242\252\054\041\252\107\316\050\234\006\105\166\277\202\030\047 \264\325\256\264\313\120\346\153\364\114\206\161\060\351\246\337 \026\206\340\330\377\100\335\373\320\102\210\177\243\063\072\056 \134\036\101\021\201\143\316\030\161\153\053\354\246\212\267\061 \134\072\152\107\340\303\171\131\326\040\032\257\362\152\230\252 \162\274\127\112\322\113\235\273\020\374\260\114\101\345\355\035  $\label{eq:condition} $$ \050\235\234\314\277\263\121\332\247\107\345\204\123\002$  $\label{eq:condition} $$ \003\001\000\001\243\102\060\100\060\035\006\003\125\035\016\004$ \026\004\024\273\257\176\002\075\372\246\361\074\204\216\255\356  $\label{eq:condition} $$ \070\230\354\331\062\062\324\060\016\006\003\125\035\017\001\001$  $\label{eq:condition} $$ \sqrt{377} \cdot 004 \cdot 004 \cdot 003 \cdot 002 \cdot 001 \cdot 006 \cdot 060 \cdot 017 \cdot 006 \cdot 003 \cdot 125 \cdot 035 \cdot 023 \cdot 001 \cdot 001$ \377\004\005\060\003\001\001\377\060\015\006\011\052\206\110\206 \367\015\001\001\014\005\000\003\202\002\001\000\012\361\325\106 \204\267\256\121\273\154\262\115\101\024\000\223\114\234\313\345 \300\124\317\240\045\216\002\371\375\260\242\015\365\040\230\074  $\label{eq:condition} $$ \023\055\254\126\242\260\326\176\021\222\351\056\272\236\056\232 $$$ \162\261\275\031\104\154\141\065\242\232\264\026\022\151\132\214 \341\327\076\244\032\350\057\003\364\256\141\035\020\033\052\244 \213\172\305\376\005\246\341\300\326\310\376\236\256\217\053\272 \075\231\370\330\163\011\130\106\156\246\234\364\327\047\323\225 \332\067\203\162\034\323\163\340\242\107\231\003\070\135\325\111 \171\000\051\034\307\354\233\040\034\007\044\151\127\170\262\071 \374\072\204\240\265\234\174\215\277\056\223\142\047\267\071\332  $\label{eq:condition} $$ \027\030\256\275\074\011\150\377\204\233\074\325\326\013\003\343$ \127\236\024\367\321\353\117\310\275\207\043\267\266\111\103\171 \205\134\272\353\222\013\241\306\350\150\250\114\026\261\032\231  $\label{eq:condition} $$ \012\350\123\054\222\273\241\011\030\165\014\145\250\173\313\043$ \267\032\302\050\205\303\033\377\320\053\142\357\244\173\011\221 \230\147\214\024\001\315\150\006\152\143\041\165\003\200\210\212 \156\201\306\205\362\251\244\055\347\364\245\044\020\107\203\312 \315\364\215\171\130\261\006\233\347\032\052\331\235\001\327\224 \175\355\003\112\312\360\333\350\251\001\076\365\126\231\311\036 \216\111\075\273\345\011\271\340\117\111\222\075\026\202\100\314 \314\131\306\346\072\355\022\056\151\074\154\225\261\375\252\035  $\label{eq:condition} $$ \frac{173}177\206\276\036\016\062\106\373\373\023\217\165\177\114\213}{190} $$$ \113\106\143\376\000\064\100\160\301\303\271\241\335\246\160\342 \004\263\101\274\351\200\221\352\144\234\172\341\042\003\251\234 \156\157\016\145\117\154\207\207\136\363\156\240\371\165\245\233 \100\350\123\262\047\235\112\271\300\167\041\215\377\207\362\336 \274\214\357\027\337\267\111\013\321\362\156\060\013\032\016\116 \166\355\021\374\365\351\126\262\175\277\307\155\012\223\214\245 \320\300\266\035\276\072\116\224\242\327\156\154\013\302\212\174 \372\040\363\304\344\345\315\015\250\313\221\222\261\174\205\354  $\verb|\265|024|151|146|016|202|347|315|316|310|055|246|121|177|041|301|$ 

 $\label{eq:condition} $$ \065\123\205\006\112\135\237\255\273\033\137\164$$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE

CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "COMODO RSA Certification Authority"

 ${\tt\#\,Issuer:\,CN=COMODO\,RSA\,Certification\,Authority,O=COMODO\,CA\,Limited,L=Salford,ST=Greater}$ 

Manchester, C=GB

# Serial Number:4c:aa:f9:ca:db:63:6f:e0:1f:f7:4e:d8:5b:03:86:9d

# Subject: CN=COMODO RSA Certification Authority,O=COMODO CA Limited,L=Salford,ST=Greater

Manchester, C=GB

# Not Valid Before: Tue Jan 19 00:00:00 2010

# Not Valid After: Mon Jan 18 23:59:59 2038

# Fingerprint (SHA-256):

52:F0:E1:C4:E5:8E:C6:29:29:1B:60:31:7F:07:46:71:B8:5D:7E:A8:0D:5B:07:27:34:63:53:4B:32:B4:02:34

# Fingerprint (SHA1): AF:E5:D2:44:A8:D1:19:42:30:FF:47:9F:E2:F8:97:BB:CD:7A:8C:B4

CKA CLASS CK OBJECT CLASS CKO NSS TRUST

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "COMODO RSA Certification Authority"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\257\345\322\104\250\321\031\102\060\377\107\237\342\370\227\273

\315\172\214\264

**END** 

CKA CERT MD5 HASH MULTILINE OCTAL

 $\label{eq:condition} $$ \033\061\260\161\100\066\314\024\066\221\255\304\076\375\354\030 $$$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\201\205\061\013\060\011\006\003\125\004\006\023\002\107\102$ 

 $\label{eq:condition} $$ \001\03\000\1006\003\125\004\010\023\022\107\162\145\141\164$ 

\145\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060

 $\label{eq:condition} $$ \006\003\125\004\007\023\007\123\141\154\146\157\162\144\061 $$$ 

 $\label{eq:condition} $$ \032\060\030\006\003\125\004\012\023\021\103\117\115\117\104\117$ 

 $\\ \\ 040\\ \\ 103\\ \\ 101\\ \\ 040\\ \\ 114\\ \\ 151\\ \\ 155\\ \\ 151\\ \\ 164\\ \\ 145\\ \\ 144\\ \\ 061\\ \\ 053\\ \\ 060\\ \\ 051\\ \\ 006$ 

 $\\ \\003\\125\\004\\003\\023\\042\\103\\117\\115\\117\\104\\117\\040\\122\\123\\101$ 

\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101

\165\164\150\157\162\151\164\171

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\020\114\252\371\312\333\143\157\340\037\367\116\330\133\003$ 

\206\235

**END** 

 ${\tt CKA\_TRUST\_SERVER\_AUTH\ CK\_TRUST\ CKT\_NSS\_TRUSTED\_DELEGATOR}$ 

CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

```
#
# Certificate "USERTrust RSA Certification Authority"
# Issuer: CN=USERTrust RSA Certification Authority,O=The USERTRUST Network,L=Jersey City,ST=New
Jersey, C=US
# Serial Number:01:fd:6d:30:fc:a3:ca:51:a8:1b:bc:64:0e:35:03:2d
# Subject: CN=USERTrust RSA Certification Authority,O=The USERTRUST Network,L=Jersey City,ST=New
Jersey, C=US
# Not Valid Before: Mon Feb 01 00:00:00 2010
# Not Valid After: Mon Jan 18 23:59:59 2038
# Fingerprint (SHA-256):
E7:93:C9:B0:2F:D8:AA:13:E2:1C:31:22:8A:CC:B0:81:19:64:3B:74:9C:89:89:64:B1:74:6D:46:C3:D4:CB:D2
# Fingerprint (SHA1): 2B:8F:1B:57:33:0D:BB:A2:D0:7A:6C:51:F7:0E:E9:0D:DA:B9:AD:8E
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "USERTrust RSA Certification Authority"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\label{eq:condition} $$ \0.060\201\210\061\013\060\011\006\003\125\004\006\023\002\125\123
\145\162\163\145\171\061\024\060\022\006\003\125\004\007\023\013
\112\145\162\163\145\171\040\103\151\164\171\061\036\060\034\006
\003\125\004\012\023\025\124\150\145\040\125\123\105\122\124\122
\125\123\124\040\116\145\164\167\157\162\153\061\056\060\054\006
\122\123\101\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171
END
CKA ID UTF8 "0"
CKA ISSUER MULTILINE OCTAL
\060\201\210\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\023\060\021\006\003\125\004\010\023\012\116\145\167\040\112
\145\162\163\145\171\061\024\060\022\006\003\125\004\007\023\013
\112\145\162\163\145\171\040\103\151\164\171\061\036\060\034\006
\003\125\004\012\023\025\124\150\145\040\125\123\105\122\124\122
\125\123\124\040\116\145\164\167\157\162\153\061\056\060\054\006
\003\125\004\003\023\045\125\123\105\122\124\162\165\163\164\040
\122\123\101\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
```

 $\\ \\002\\ \\020\\ \\001\\ \\375\\ \\155\\ \\060\\ \\374\\ \\243\\ \\312\\ \\121\\ \\250\\ \\033\\ \\274\\ \\144\\ \\016\\ \\065$ 

\003\055

**END** 

CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\336\060\202\003\306\240\003\002\001\002\002\002\001 \375\155\060\374\243\312\121\250\033\274\144\016\065\003\055\060 \015\006\011\052\206\110\206\367\015\001\001\001\014\005\000\060\201 \210\061\013\060\011\006\003\125\004\006\023\002\125\123\061\023 \060\021\006\003\125\004\010\023\012\116\145\167\040\112\145\162 \162\163\145\171\040\103\151\164\171\061\036\060\034\006\003\125 \004\012\023\025\124\150\145\040\125\123\105\122\124\122\125\123 \124\040\116\145\164\167\157\162\153\061\056\060\054\006\003\125 \004\003\023\045\125\123\105\122\124\162\165\163\164\040\122\123  $\label{eq:condition} $$ 101\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040 $$$ \101\165\164\150\157\162\151\164\171\060\036\027\015\061\060\060 \062\060\061\060\060\060\060\060\060\132\027\015\063\070\060\061  $\label{eq:condition} $$ \061\070\062\063\065\071\065\071\132\060\201\210\061\013\060\011 $$$  $\label{eq:condition} $$ \006\003\125\004\006\023\002\125\123\061\023\060\021\006\003\125$ \004\010\023\012\116\145\167\040\112\145\162\163\145\171\061\024  $\label{eq:condition} $$ \000\022\006\003\125\004\007\023\013\112\145\162\163\145\171\040 $$$ \103\151\164\171\061\036\060\034\006\003\125\004\012\023\025\124 \150\145\040\125\123\105\122\124\122\125\123\124\040\116\145\164 \123\105\122\124\162\165\163\164\040\122\123\101\040\103\145\162 \164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157  $\label{eq:condition} $$ 162\151\164\171\060\202\002\042\060\015\006\011\052\206\110\206$ \367\015\001\001\001\005\000\003\202\002\017\000\060\202\002\012 \002\202\002\001\000\200\022\145\027\066\016\303\333\010\263\320 \254\127\015\166\355\315\047\323\114\255\120\203\141\342\252\040 \115\011\055\144\011\334\316\211\237\314\075\251\354\366\317\301  $\label{eq:condition} $\34\361\323\261\326\173\067\050\021\053\107\332\071\306\274\072$ \031\264\137\246\275\175\235\243\143\102\266\166\362\251\073\053 \221\370\342\157\320\354\026\040\220\011\076\342\350\164\311\030 \264\221\324\142\144\333\177\243\006\361\210\030\152\220\042\074 \274\376\023\360\207\024\173\366\344\037\216\324\344\121\306\021 \147\106\010\121\313\206\024\124\077\274\063\376\176\154\234\377 \026\235\030\275\121\216\065\246\247\146\310\162\147\333\041\146 \261\324\233\170\003\300\120\072\350\314\360\334\274\236\114\376 \257\005\226\065\037\127\132\267\377\316\371\075\267\054\266\366 \124\335\310\347\022\072\115\256\114\212\267\134\232\264\267\040  $\label{eq:condition} $$ \075\312\177\042\064\256\176\073\150\146\001\104\347\001\116\106$  $\label{eq:condition} $$ 123\233\063\140\367\224\276\123\067\220\163\103\363\062\303\123$ \357\333\252\376\164\116\151\307\153\214\140\223\336\304\307\014 \337\341\062\256\314\223\073\121\170\225\147\213\356\075\126\376 \014\320\151\017\033\017\363\045\046\153\063\155\367\156\107\372 \163\103\345\176\016\245\146\261\051\174\062\204\143\125\211\304 \015\301\223\124\060\031\023\254\323\175\067\247\353\135\072\154  $\begin{tabular}{ll} $$ \065\134\333\101\327\022\332\251\111\013\337\330\200\212\011\223 \end{tabular}$ \142\216\265\146\317\045\210\315\204\270\261\077\244\071\017\331  $\label{eq:condition} $$ \022\114\225\174\363\153\005\251\136\026\203\314\270 $$$ \147\342\350\023\235\314\133\202\323\114\263\355\133\377\336\345

\163\254\043\073\055\000\277\065\125\164\011\111\330\111\130\032 \177\222\066\346\121\222\016\363\046\175\034\115\027\274\311\354 \103\046\320\277\101\137\100\251\104\104\364\231\347\127\207\236  $\label{eq:condition} $$ \frac{120\\037\\127\\124\\250\\076\\375\\164\\143\\057\\261\\120\\145\\011\\346\\130$ \102\056\103\032\114\264\360\045\107\131\372\004\036\223\324\046 \106\112\120\201\262\336\276\170\267\374\147\025\341\311\127\204 \036\017\143\326\351\142\272\326\137\125\056\352\134\306\050\010 \004\045\071\270\016\053\251\362\114\227\034\007\077\015\122\365 \355\357\057\202\017\002\003\001\000\001\243\102\060\100\060\035 \006\003\125\035\016\004\026\004\024\123\171\277\132\252\053\112 \317\124\200\341\330\233\300\235\362\262\003\146\313\060\016\006 \003\125\035\023\001\001\377\004\005\060\003\001\001\377\060\015  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\014\005\000\003\202\002$  $\label{eq:condition} $$ \001\000\134\324\174\015\317\367\001\175\101\231\145\014\163\305 $$$ \122\237\313\370\317\231\006\177\033\332\103\025\237\236\002\125  $\label{eq:condition} $$ \frac{127}{226}024\\361\\122\\074\\047\\207\\224\\050\\355\\037\\072\\001\\067\\242$ \166\374\123\120\300\204\233\306\153\116\272\214\041\117\242\216 \125\142\221\363\151\025\330\274\210\343\304\252\013\375\357\250 \351\113\125\052\006\040\155\125\170\051\031\356\137\060\134\113 \044\021\125\377\044\232\156\136\052\053\356\013\115\237\177\367 \001\070\224\024\225\103\007\011\373\140\251\356\034\253\022\214  $\label{eq:condition} $\240\232\136\247\230\152\131\155\213\077\010\373\310\321\105\257$ \030\025\144\220\022\017\163\050\056\305\342\044\116\374\130\354 \360\364\105\376\042\263\353\057\216\322\331\105\141\005\301\227 \157\250\166\162\217\213\214\066\257\277\015\005\316\161\215\346 \246\157\037\154\246\161\142\305\330\320\203\162\014\361\147\021 \211\014\234\023\114\162\064\337\274\325\161\337\252\161\335\341 \271\154\214\074\022\135\145\332\275\127\022\266\103\153\377\345 \336\115\146\021\121\317\231\256\354\027\266\350\161\221\214\336  $\label{eq:condition} $$ \frac{335}{6335} \frac{65}{161} \frac{242}{025} \frac{047}{224} \frac{317}{141} \frac{343}{046} \frac{273}{157}$ \243\147\045\041\135\346\335\035\013\056\150\033\073\202\257\354 \203\147\205\324\230\121\164\261\271\231\200\211\377\177\170\031 \134\171\112\140\056\222\100\256\114\067\052\054\311\307\142\310 \016\135\367\066\133\312\340\045\045\001\264\335\032\007\234\167 \000\077\320\334\325\354\075\324\372\273\077\314\205\326\157\177 \251\055\337\271\002\367\365\227\232\265\065\332\303\147\260\207  $\label{eq:condition} $$ \frac{112}251\\050\\236\\043\\216\\377\\134\\047\\153\\341\\260\\117\\363\\007\\356$  $\label{eq:condition} $$ \000\056\324\131\207\313\122\101\225\352\364\107\327\356\144\101 $$$ \125\174\215\131\002\225\335\142\235\302\271\356\132\050\164\204 \245\233\267\220\307\014\007\337\365\211\066\164\062\326\050\301 \260\260\013\340\234\114\303\034\326\374\343\151\265\107\106\201 \057\242\202\253\323\143\104\160\304\215\377\055\063\272\255\217 \173\265\160\210\256\076\031\317\100\050\330\374\310\220\273\135 \231\042\365\122\346\130\305\037\210\061\103\356\210\035\327\306 \216\074\103\152\035\247\030\336\175\075\026\361\142\371\312\220 \250\375

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "USERTrust RSA Certification Authority"

# Issuer: CN=USERTrust RSA Certification Authority,O=The USERTRUST Network,L=Jersey City,ST=New Jersey,C=US

# Serial Number:01:fd:6d:30:fc:a3:ca:51:a8:1b:bc:64:0e:35:03:2d

# Subject: CN=USERTrust RSA Certification Authority,O=The USERTRUST Network,L=Jersey City,ST=New Jersey,C=US

# Not Valid Before: Mon Feb 01 00:00:00 2010 # Not Valid After: Mon Jan 18 23:59:59 2038

# Fingerprint (SHA-256):

E7:93:C9:B0:2F:D8:AA:13:E2:1C:31:22:8A:CC:B0:81:19:64:3B:74:9C:89:89:64:B1:74:6D:46:C3:D4:CB:D2

# Fingerprint (SHA1): 2B:8F:1B:57:33:0D:BB:A2:D0:7A:6C:51:F7:0E:E9:0D:DA:B9:AD:8E

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "USERTrust RSA Certification Authority"

CKA CERT SHA1 HASH MULTILINE OCTAL

\053\217\033\127\063\015\273\242\320\172\154\121\367\016\351\015 \332\271\255\216

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \033\376\151\321\221\267\031\063\243\162\250\017\341\125\345\265$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\201\210\061\013\060\011\006\003\125\004\006\023\002\125\123

\061\023\060\021\006\003\125\004\010\023\012\116\145\167\040\112

\003\125\004\012\023\025\124\150\145\040\125\123\105\122\124\122

\122\123\101\040\103\145\162\164\151\146\151\143\141\164\151\157

 $\label{eq:condition} $$ \frac{156}{040}101\frac{65}{164}150\frac{157}{162}151\frac{4}{171}$$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\001\375\155\060\374\243\312\121\250\033\274\144\016\065 \003\055

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

```
# Certificate "USERTrust ECC Certification Authority"
# # Issuer: CN=USERTrust ECC Certification Authority,O=The USERTRUST Network,L=Jersey City,ST=New
```

# Serial Number:5c:8b:99:c5:5a:94:c5:d2:71:56:de:cd:89:80:cc:26

# Subject: CN=USERTrust ECC Certification Authority,O=The USERTRUST Network,L=Jersey City,ST=New Jersey,C=US

# Not Valid Before: Mon Feb 01 00:00:00 2010

# Not Valid After: Mon Jan 18 23:59:59 2038

# Fingerprint (SHA-256):

Jersey, C=US

4F:F4:60:D5:4B:9C:86:DA:BF:BC:FC:57:12:E0:40:0D:2B:ED:3F:BC:4D:4F:BD:AA:86:E0:6A:DC:D2:A9:AD:7A

# Fingerprint (SHA1): D1:CB:CA:5D:B2:D5:2A:7F:69:3B:67:4D:E5:F0:5A:1D:0C:95:7D:F0

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "USERTrust ECC Certification Authority"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \060\201\210\061\013\060\011\006\003\125\004\006\023\002\125\123$ 

\061\023\060\021\006\003\125\004\010\023\012\116\145\167\040\112

 $\label{eq:condition} $$ 145\backslash 162\backslash 163\backslash 145\backslash 171\backslash 061\backslash 024\backslash 060\backslash 022\backslash 006\backslash 003\backslash 125\backslash 004\backslash 007\backslash 023\backslash 013$$ 

 $\label{eq:condition} $$ \003\125\004\012\023\025\124\150\145\040\125\123\105\122\124\122$ 

\125\123\124\040\116\145\164\167\157\162\153\061\056\060\054\006

\003\125\004\003\023\045\125\123\105\122\124\162\165\163\164\040

\105\103\103\040\103\145\162\164\151\146\151\143\141\164\151\157

\156\040\101\165\164\150\157\162\151\164\171

**END** 

CKA\_ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\134\213\231\305\132\224\305\322\161\126\336\315\211\200 \314\046

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\002\217\060\202\002\025\240\003\002\001\002\002\020\134 \213\231\305\132\224\305\322\161\126\336\315\211\200\314\046\060

\012\006\010\052\206\110\316\075\004\003\003\060\201\210\061\013 \060\011\006\003\125\004\006\023\002\125\123\061\023\060\021\006  $\\ \\003\\125\\004\\010\\023\\012\\1116\\145\\145\\167\\040\\112\\145\\162\\163\\145\\171$ \171\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023  $\label{eq:condition} $$ \025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116$$ \145\164\167\157\162\153\061\056\060\054\006\003\125\004\003\023 \145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164 \150\157\162\151\164\171\060\036\027\015\061\060\060\062\060\061  $\label{eq:condition} $$ \0.060\0.0$ \004\006\023\002\125\123\061\023\060\021\006\003\125\004\010\023  $\label{eq:condition} $$ \003\125\004\007\023\013\112\145\162\163\145\171\040\103\151\164 $$$ \171\061\036\060\034\006\003\125\004\012\023\025\124\150\145\040 \153\061\056\060\054\006\003\125\004\003\023\045\125\123\105\122 \124\162\165\163\164\040\105\103\103\040\103\145\162\164\151\146 \171\060\166\060\020\006\007\052\206\110\316\075\002\001\006\005 \053\201\004\000\042\003\142\000\004\032\254\124\132\251\371\150 \043\347\172\325\044\157\123\306\132\330\113\253\306\325\266\321 \346\163\161\256\335\234\326\014\141\375\333\240\211\003\270\005  $\\024\\354\\127\\316\\356\\135\\077\\342\\041\\263\\316\\367\\324\\212\\171\\340$ \243\203\176\055\227\320\141\304\361\231\334\045\221\143\253\177 \060\243\264\160\342\307\241\063\234\363\277\056\134\123\261\137 \263\175\062\177\212\064\343\171\171\243\102\060\100\060\035\006 \003\125\035\016\004\026\004\024\072\341\011\206\324\317\031\302 \226\166\164\111\166\334\340\065\306\143\143\232\060\016\006\003 \125\035\017\001\001\377\004\004\003\002\001\006\060\017\006\003 \125\035\023\001\001\377\004\005\060\003\001\001\377\060\012\006 \010\052\206\110\316\075\004\003\003\003\150\000\060\145\002\060 \066\147\241\026\010\334\344\227\000\101\035\116\276\341\143\001 \317\073\252\102\021\144\240\235\224\071\002\021\171\134\173\035 \372\144\271\356\026\102\263\277\212\302\011\304\354\344\261\115 \002\061\000\351\052\141\107\214\122\112\113\116\030\160\366\326 \104\326\156\365\203\272\155\130\275\044\331\126\110\352\357\304 \242\106\201\210\152\072\106\321\251\233\115\311\141\332\321\135 \127\152\030

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

<sup>#</sup> Trust for "USERTrust ECC Certification Authority"

<sup>#</sup> Issuer: CN=USERTrust ECC Certification Authority,O=The USERTRUST Network,L=Jersey City,ST=New Jersey,C=US

```
# Serial Number:5c:8b:99:c5:5a:94:c5:d2:71:56:de:cd:89:80:cc:26
# Subject: CN=USERTrust ECC Certification Authority,O=The USERTRUST Network,L=Jersey City,ST=New
Jersey, C=US
# Not Valid Before: Mon Feb 01 00:00:00 2010
# Not Valid After: Mon Jan 18 23:59:59 2038
# Fingerprint (SHA-256):
4F:F4:60:D5:4B:9C:86:DA:BF:BC:FC:57:12:E0:40:0D:2B:ED:3F:BC:4D:4F:BD:AA:86:E0:6A:DC:D2:A9:AD:7A
# Fingerprint (SHA1): D1:CB:CA:5D:B2:D5:2A:7F:69:3B:67:4D:E5:F0:5A:1D:0C:95:7D:F0
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "USERTrust ECC Certification Authority"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\321\313\312\135\262\325\052\177\151\073\147\115\345\360\132\035
\014\225\175\360
END
CKA CERT MD5 HASH MULTILINE OCTAL
\372\150\274\331\265\177\255\375\311\035\006\203\050\314\044\301
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \0.060\201\210\061\013\060\011\006\003\125\004\006\023\002\125\123
\145\162\163\145\171\061\024\060\022\006\003\125\004\007\023\013
\112\145\162\163\145\171\040\103\151\164\171\061\036\060\034\006
\003\125\004\012\023\025\124\150\145\040\125\123\105\122\124\122
\125\123\124\040\116\145\164\167\157\162\153\061\056\060\054\006
\105\103\103\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\134\213\231\305\132\224\305\322\161\126\336\315\211\200
\314\046
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "GlobalSign ECC Root CA - R5"
# Issuer: CN=GlobalSign,O=GlobalSign,OU=GlobalSign ECC Root CA - R5
# Serial Number:60:59:49:e0:26:2e:bb:55:f9:0a:77:8a:71:f9:4a:d8:6c
# Subject: CN=GlobalSign,O=GlobalSign,OU=GlobalSign ECC Root CA - R5
# Not Valid Before: Tue Nov 13 00:00:00 2012
# Not Valid After: Tue Jan 19 03:14:07 2038
```

# Fingerprint (SHA-256):

17:9F:BC:14:8A:3D:D0:0F:D2:4E:A1:34:58:CC:43:BF:A7:F5:9C:81:82:D7:83:A5:13:F6:EB:EC:10:0C:89:24

# Fingerprint (SHA1): 1F:24:C6:30:CD:A4:18:EF:20:69:FF:AD:4F:DD:5F:46:3A:1B:69:AA

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "GlobalSign ECC Root CA - R5"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

**END** 

CKA ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

 $\label{eq:condition} $$ \002\021\140\131\111\340\046\056\273\125\371\012\167\212\161\371\112\330\154$ 

END

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\002\036\060\202\001\244\240\003\002\001\002\002\021\140 \131\111\340\046\056\273\125\371\012\167\212\161\371\112\330\154 \060\012\006\010\052\206\110\316\075\004\003\003\060\120\061\044 \060\042\006\003\125\004\013\023\033\107\154\157\142\141\154\123 \151\147\156\040\105\103\103\040\122\157\157\164\040\103\101\040 \055\040\122\065\061\023\060\021\006\003\125\004\012\023\012\107  $\label{thm:local_local$  $\\ \\004\\ \\003\\ \\023\\ \\012\\ \\107\\ \\154\\ \\157\\ \\142\\ \\141\\ \\154\\ \\123\\ \\151\\ \\147\\ \\156\\ \\060\\ \\036$ \027\015\061\062\061\061\061\063\060\060\060\060\060\060\060\132\027 \015\063\070\060\061\061\071\060\063\061\064\060\067\132\060\120 \154\123\151\147\156\040\105\103\103\040\122\157\157\164\040\103 \101\040\055\040\122\065\061\023\060\021\006\003\125\004\012\023 \012\107\154\157\142\141\154\123\151\147\156\061\023\060\021\006 \003\125\004\003\023\012\107\154\157\142\141\154\123\151\147\156 \060\166\060\020\006\007\052\206\110\316\075\002\001\006\005\053 \201\004\000\042\003\142\000\004\107\105\016\226\373\175\135\277

\351\071\321\041\370\237\013\266\325\173\036\222\072\110\131\034 \360\142\061\055\300\172\050\376\032\247\134\263\266\314\227\347 \105\324\130\372\321\167\155\103\242\300\207\145\064\012\037\172 \335\353\074\063\241\305\235\115\244\157\101\225\070\177\311\036  $\label{eq:condition} $$ \204\353\321\236\111\222\207\224\207\014\072\205\112\146\237\235$ \131\223\115\227\141\006\206\112\243\102\060\100\060\016\006\003 \125\035\017\001\001\377\004\004\003\002\001\006\060\017\006\003 \125\035\023\001\001\377\004\005\060\003\001\001\377\060\035\006 \003\125\035\016\004\026\004\024\075\346\051\110\233\352\007\312 \041\104\112\046\336\156\336\322\203\320\237\131\060\012\006\010 \052\206\110\316\075\004\003\003\003\150\000\060\145\002\061\000  $\label{eq:condition} $$ \frac{345}{151}022\frac{311}{156}\frac{333}{306}\frac{061}{272}\frac{11}{101}\frac{341}{227}\frac{370}{373}\frac{375}{375} $$$ \232\342\175\022\311\355\174\144\323\313\005\045\213\126\331\240  $\label{eq:condition} $$ \frac{347}136\\135\\116\\013\\203\\234\\133\\166\\051\\240\\011\\046\\041\\152\\142$  $\label{eq:condition} $$ \002\060\161\322\265\217\134\352\073\341\170\011\205\250\165\222 $$$ \073\310\134\375\110\357\015\164\042\250\010\342\156\305\111\316 \307\\014\\274\\247\\141\\151\\361\\367\\073\\341\\052\\313\\371\\053\\363\\146 \220\067

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "GlobalSign ECC Root CA R5"
- # Issuer: CN=GlobalSign,O=GlobalSign,OU=GlobalSign ECC Root CA R5
- # Serial Number:60:59:49:e0:26:2e:bb:55:f9:0a:77:8a:71:f9:4a:d8:6c
- # Subject: CN=GlobalSign,O=GlobalSign,OU=GlobalSign ECC Root CA R5
- # Not Valid Before: Tue Nov 13 00:00:00 2012
- # Not Valid After: Tue Jan 19 03:14:07 2038
- # Fingerprint (SHA-256):

17:9F:BC:14:8A:3D:D0:0F:D2:4E:A1:34:58:CC:43:BF:A7:F5:9C:81:82:D7:83:A5:13:F6:EB:EC:10:0C:89:24

# Fingerprint (SHA1): 1F:24:C6:30:CD:A4:18:EF:20:69:FF:AD:4F:DD:5F:46:3A:1B:69:AA

CKA CLASS CK OBJECT CLASS CKO NSS TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "GlobalSign ECC Root CA - R5"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\037\044\306\060\315\244\030\357\040\151\377\255\117\335\137\106 \072\033\151\252

**END** 

CKA CERT MD5 HASH MULTILINE OCTAL

 $\label{eq:condition} $$ \237\255\073\034\002\036\212\272\027\164\070\201\014\242\274\010 $$$ 

**END** 

CKA ISSUER MULTILINE OCTAL

\060\120\061\044\060\042\006\003\125\004\013\023\033\107\154\157\142\141\154\123\151\147\156\040\105\103\103\040\122\157\157\164\040\103\101\040\055\040\122\065\061\023\060\021\006\003\125\004

```
\012\023\012\107\154\157\142\141\154\123\151\147\156\061\023\060
\021\006\003\125\004\003\023\012\107\154\157\142\141\154\123\151
\147\156
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\021\140\131\111\340\046\056\273\125\371\012\167\212\161\371
\112\330\154
END
{\tt CKA\_TRUST\_SERVER\_AUTH\ CK\_TRUST\ CKT\_NSS\_TRUSTED\_DELEGATOR}
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Staat der Nederlanden Root CA - G3"
# Issuer: CN=Staat der Nederlanden Root CA - G3,O=Staat der Nederlanden,C=NL
# Serial Number: 10003001 (0x98a239)
# Subject: CN=Staat der Nederlanden Root CA - G3,O=Staat der Nederlanden,C=NL
# Not Valid Before: Thu Nov 14 11:28:42 2013
# Not Valid After: Mon Nov 13 23:00:00 2028
# Fingerprint (SHA-256):
3C:4F:B0:B9:5A:B8:B3:00:32:F4:32:B8:6F:53:5F:E1:72:C1:85:D0:FD:39:86:58:37:CF:36:18:7F:A6:F4:28
# Fingerprint (SHA1): D8:EB:6B:41:51:92:59:E0:F3:E7:85:00:C0:3D:B6:88:97:C9:EE:FC
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "Staat der Nederlanden Root CA - G3"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA_SUBJECT MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\116\114\061
\036\060\034\006\003\125\004\012\014\025\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\061
\053\060\051\006\003\125\004\003\014\042\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\040
\122\157\157\164\040\103\101\040\055\040\107\063
END
CKA ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\116\114\061
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\061
\053\060\051\006\003\125\004\003\014\042\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\040
\122\157\157\164\040\103\101\040\055\040\107\063
END
```

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\164\060\202\003\134\240\003\002\001\002\002\004\000 \230\242\071\060\015\006\011\052\206\110\206\367\015\001\001\013 \005\000\060\132\061\013\060\011\006\003\125\004\006\023\002\116 \114\061\036\060\034\006\003\125\004\012\014\025\123\164\141\141 \164\040\144\145\162\040\116\145\144\145\162\154\141\156\144\145 \156\061\053\060\051\006\003\125\004\003\014\042\123\164\141\141 \164\040\144\145\162\040\116\145\144\145\162\154\141\156\144\145 \156\040\122\157\157\164\040\103\101\040\055\040\107\063\060\036 \015\062\070\061\061\061\063\062\063\060\060\060\060\132\060\132 \061\013\060\011\006\003\125\004\006\023\002\116\114\061\036\060  $\label{eq:condition} $$ \034\006\003\125\004\012\014\025\123\164\141\141\164\040\144\145$$ \162\040\116\145\144\145\162\154\141\156\144\145\156\061\053\060  $\label{eq:condition} $$ \004\003\125\004\003\014\042\123\164\141\141\164\040\144\145$$ \162\040\116\145\144\145\162\154\141\156\144\145\156\040\122\157 \157\164\040\103\101\040\055\040\107\063\060\202\002\042\060\015  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\001\005\000\003\202\002$ \017\000\060\202\002\012\002\202\002\001\000\276\062\242\124\017 \160\373\054\134\131\353\154\304\244\121\350\205\052\263\314\112  $\\ \\064\\362\\260\\137\\363\\016\\307\\034\\075\\123\\036\\210\\010\\150\\330\\157$ \075\255\302\236\314\202\147\007\047\207\150\161\072\237\165\226 \042\106\005\260\355\255\307\133\236\052\336\234\374\072\306\225 \247\365\027\147\030\347\057\111\010\014\134\317\346\314\064\355 \170\373\120\261\334\153\062\360\242\376\266\074\344\354\132\227 \307\077\036\160\010\060\240\334\305\263\155\157\320\202\162\021 \253\322\201\150\131\202\027\267\170\222\140\372\314\336\077\204 \353\215\070\063\220\012\162\043\372\065\314\046\161\061\321\162  $\label{eq:condition} $$ \050\222\331\133\043\155\146\265\155\007\102\353\246\063\316\222 $$$ \333\300\366\154\143\170\315\312\116\075\265\345\122\233\361\276 \073\346\124\140\260\146\036\011\253\007\376\124\211\021\102\321 \367\044\272\140\170\032\230\367\311\021\375\026\301\065\032\124 \165\357\103\323\345\256\116\316\347\173\303\306\116\141\121\113 \253\232\105\113\241\037\101\275\110\123\025\161\144\013\206\263 \345\056\276\316\244\033\301\051\204\242\265\313\010\043\166\103  $\\ \\042\\044\\037\\027\\004\\324\\156\\234\\306\\374\\177\\053\\146\\032\\354\\212$ \345\326\317\115\365\143\011\267\025\071\326\173\254\353\343\174 \351\116\374\165\102\310\355\130\225\014\006\102\242\234\367\344 \160\263\337\162\157\132\067\100\211\330\205\244\327\361\013\336 \103\031\324\112\130\054\214\212\071\236\277\204\207\361\026\073 \066\014\351\323\264\312\154\031\101\122\011\241\035\260\152\277 \202\357\160\121\041\062\334\005\166\214\313\367\144\344\003\120 \257\214\221\147\253\305\362\356\130\330\336\276\367\347\061\317 \154\311\073\161\301\325\210\265\145\274\300\350\027\027\007\022 \265\134\322\253\040\223\264\346\202\203\160\066\305\315\243\215 \255\213\354\243\301\103\207\346\103\342\064\276\225\213\065\355

\007\071\332\250\035\172\237\066\236\022\260\014\145\022\220\025 \140\331\046\100\104\343\126\140\245\020\324\152\074\375\101\334 \016\132\107\266\357\227\141\165\117\331\376\307\262\035\324\355 \135\111\263\251\152\313\146\204\023\325\134\240\334\337\156\167 \006\321\161\165\310\127\157\257\017\167\133\002\003\001\000\001 \243\102\060\100\060\017\006\003\125\035\023\001\001\377\004\005 \060\003\001\001\377\060\016\006\003\125\035\017\001\001\377\004 \004\003\002\001\006\060\035\006\003\125\035\016\004\026\004\024 \124\255\372\307\222\127\256\312\065\234\056\022\373\344\272\135 \040\334\224\127\060\015\006\011\052\206\110\206\367\015\001\001 \013\005\000\003\202\002\001\000\060\231\235\005\062\310\136\016  $\label{eq:condition} $$ \073\230\001\072\212\244\347\007\367\172\370\347\232\337\120\103$ \123\227\052\075\312\074\107\230\056\341\025\173\361\222\363\141 \332\220\045\026\145\300\237\124\135\016\003\073\133\167\002\234 \204\266\015\230\137\064\335\073\143\302\303\050\201\302\234\051 \056\051\342\310\303\001\362\063\352\052\252\314\011\010\367\145 \147\306\315\337\323\266\053\247\275\314\321\016\160\137\270\043 \321\313\221\116\012\364\310\172\345\331\143\066\301\324\337\374 \042\227\367\140\135\352\051\057\130\262\275\130\275\215\226\117  $\label{eq:condition} $$ \020\165\277\110\173\075\121\207\241\074\164\042\302\374\007\177 $$$ \200\334\304\254\376\152\301\160\060\260\351\216\151\342\054\151 \201\224\011\272\335\376\115\300\203\214\224\130\300\106\040\257 \234\037\002\370\065\125\111\057\106\324\300\360\240\226\002\017 \063\305\161\363\236\043\175\224\267\375\072\323\011\203\006\041 \375\140\075\256\062\300\322\356\215\246\360\347\264\202\174\012 \314\160\311\171\200\370\376\114\367\065\204\031\212\061\373\012 \331\327\177\233\360\242\232\153\303\005\112\355\101\140\024\060 \321\252\021\102\156\323\043\002\004\013\306\145\335\335\122\167 \332\201\153\262\250\372\001\070\271\226\352\052\154\147\227\211 \224\236\274\341\124\325\344\152\170\357\112\275\053\232\075\100 \176\306\300\165\322\156\373\150\060\354\354\213\235\371\111\065 \232\032\054\331\263\225\071\325\036\222\367\246\271\145\057\345 \075\155\072\110\114\010\334\344\050\022\050\276\175\065\134\352 \340\026\176\023\033\152\327\076\327\236\374\055\165\262\301\024 \325\043\003\333\133\157\013\076\170\057\015\336\063\215\026\267 \110\347\203\232\201\017\173\301\103\115\125\004\027\070\112\121 \325\131\242\211\164\323\237\276\036\113\327\306\155\267\210\044 \157\140\221\244\202\205\133\126\101\274\320\104\253\152\023\276 \321\054\130\267\022\063\130\262\067\143\334\023\365\224\035\077 \100\121\365\117\365\072\355\310\305\353\302\036\035\026\225\172 \307\176\102\161\223\156\113\025\267\060\337\252\355\127\205\110 \254\035\152\335\071\151\344\341\171\170\276\316\005\277\241\014 \367\200\173\041\147\047\060\131

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Issuer: CN=Staat der Nederlanden Root CA - G3,O=Staat der Nederlanden,C=NL
# Serial Number: 10003001 (0x98a239)
# Subject: CN=Staat der Nederlanden Root CA - G3,O=Staat der Nederlanden,C=NL
# Not Valid Before: Thu Nov 14 11:28:42 2013
# Not Valid After: Mon Nov 13 23:00:00 2028
# Fingerprint (SHA-256):
3C:4F:B0:B9:5A:B8:B3:00:32:F4:32:B8:6F:53:5F:E1:72:C1:85:D0:FD:39:86:58:37:CF:36:18:7F:A6:F4:28
# Fingerprint (SHA1): D8:EB:6B:41:51:92:59:E0:F3:E7:85:00:C0:3D:B6:88:97:C9:EE:FC
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "Staat der Nederlanden Root CA - G3"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\330\353\153\101\121\222\131\340\363\347\205\000\300\075\266\210
\227\311\356\374
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\013\106\147\007\333\020\057\031\214\065\120\140\321\013\364\067
END
CKA_ISSUER MULTILINE_OCTAL
\label{eq:condition} $$ \060\132\061\013\060\011\006\003\125\004\006\023\002\116\114\061
\036\060\034\006\003\125\004\012\014\025\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\061
\053\060\051\006\003\125\004\003\014\042\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\040
\122\157\157\164\040\103\101\040\055\040\107\063
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\004\000\230\242\071
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Staat der Nederlanden EV Root CA"
# Issuer: CN=Staat der Nederlanden EV Root CA,O=Staat der Nederlanden,C=NL
# Serial Number: 10000013 (0x98968d)
# Subject: CN=Staat der Nederlanden EV Root CA,O=Staat der Nederlanden,C=NL
# Not Valid Before: Wed Dec 08 11:19:29 2010
# Not Valid After: Thu Dec 08 11:10:28 2022
# Fingerprint (SHA-256):
4D:24:91:41:4C:FE:95:67:46:EC:4C:EF:A6:CF:6F:72:E2:8A:13:29:43:2F:9D:8A:90:7A:C4:CB:5D:AD:C1:5A
# Fingerprint (SHA1): 76:E2:7E:C1:4F:DB:82:C1:C0:A6:75:B5:05:BE:3D:29:B4:ED:DB:BB
```

# Trust for "Staat der Nederlanden Root CA - G3"

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA LABEL UTF8 "Staat der Nederlanden EV Root CA"

 ${\tt CKA\_CERTIFICATE\_TYPE\ CK\_CERTIFICATE\_TYPE\ CKC\_X\_509}$ 

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \000\130\061\013\060\011\006\003\125\004\000\023\002\116\114\061\036\060\034\006\003\125\004\012\014\025\123\164\141\141\164\040\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\040\144\145\156\040\105\126\040\1122\157\157\164\040\103\101$ 

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\004\000\230\226\215

**END** 

### CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \0.060\202\005\160\060\202\003\130\240\003\002\001\002\002\0004\000 $$$ \230\226\215\060\015\006\011\052\206\110\206\367\015\001\001\013 \005\000\060\130\061\013\060\011\006\003\125\004\006\023\002\116 \164\040\144\145\162\040\116\145\144\145\162\154\141\156\144\145 \156\061\051\060\047\006\003\125\004\003\014\040\123\164\141\141 \164\040\144\145\162\040\116\145\144\145\162\154\141\156\144\145 \156\040\105\126\040\122\157\157\164\040\103\101\060\036\027\015 \061\060\061\062\060\070\061\061\061\061\071\062\071\132\027\015\062 \062\061\062\060\070\061\061\061\060\062\070\132\060\130\061\013  $\label{eq:condition} $$ \000\011\006\003\125\004\006\023\002\116\114\061\036\060\034\006$  $\label{eq:condition} $$ \003\125\004\012\014\025\123\164\141\141\164\040\144\145\162\040 $$$ \116\145\144\145\162\154\141\156\144\145\156\061\051\060\047\006 \003\125\004\003\014\040\123\164\141\141\164\040\144\145\162\040 \116\145\144\145\162\154\141\156\144\145\156\040\105\126\040\122 \157\157\164\040\103\101\060\202\002\042\060\015\006\011\052\206 \110\206\367\015\001\001\001\005\000\003\202\002\017\000\060\202  $\label{eq:condition} $$ \002\01\002\02\001\000\343\307\176\211\371\044\113\072\322 $$$ \063\203\065\054\151\354\334\011\244\343\121\250\045\053\171\270 \010\075\340\221\272\204\205\306\205\244\312\346\311\056\123\244 \311\044\036\375\125\146\161\135\054\305\140\150\004\267\331\302

\122\046\070\210\244\326\073\100\246\302\315\077\315\230\223\263 \124\024\130\226\125\325\120\376\206\255\244\143\177\134\207\366 \216\346\047\222\147\027\222\002\003\054\334\326\146\164\355\335 \147\377\301\141\215\143\117\017\233\155\027\060\046\357\253\322 \037\020\240\371\305\177\026\151\201\003\107\355\036\150\215\162 \241\115\262\046\306\272\154\137\155\326\257\321\261\023\216\251 \255\363\136\151\165\046\030\076\101\053\041\177\356\213\135\007 \006\235\103\304\051\012\053\374\052\076\206\313\074\203\072\371 \311\015\332\305\231\342\274\170\101\063\166\341\277\057\135\345 \244\230\120\014\025\335\340\372\234\177\070\150\320\262\246\172 \247\321\061\275\176\212\130\047\103\263\272\063\221\323\247\230 \025\134\232\346\323\017\165\331\374\101\230\227\076\252\045\333 \217\222\056\260\173\014\137\361\143\251\067\371\233\165\151\114 \050\046\045\332\325\362\022\160\105\125\343\337\163\136\067\365  $\label{eq:condition} $$ \041\154\220\216\065\132\311\323\043\353\323\300\276\170\254\102$ \050\130\146\245\106\155\160\002\327\020\371\113\124\374\135\206  $\label{eq:condition} $$ \frac{254}{021}132\frac{65}{040}121\frac{15}{057}\frac{107}{210}107 $$ \227\071\300\317\272\300\102\001\100\231\110\041\013\153\247\322 \375\226\325\321\276\106\235\111\340\013\246\240\042\116\070\320  $\label{eq:condition} $$ \301\074\060\274\160\217\054\165\314\320\305\214\121\073\075\224 $$$ \010\144\046\141\175\271\303\145\217\024\234\041\320\252\375\027 \162\003\217\275\233\214\346\136\123\236\271\235\357\202\273\341  $\label{eq:condition} $$ \274\342\162\101\133\041\224\323\105\067\224\321\337\011\071\135$ \347\043\252\232\035\312\155\250\012\206\205\212\202\276\102\007 \326\362\070\202\163\332\207\133\345\074\323\236\076\247\073\236 \364\003\263\371\361\175\023\164\002\377\273\241\345\372\000\171 \034\246\146\101\210\134\140\127\246\056\011\304\272\375\232\317  $\label{eq:condition} $\247\037\100\303\273\314\132\012\125\113\073\070\166\121\270\143$ \213\204\224\026\346\126\363\002\003\001\000\001\243\102\060\100 \060\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001  $\label{eq:condition} $$ 377 \cdot 060 \cdot 016 \cdot 006 \cdot 003 \cdot 125 \cdot 035 \cdot 017 \cdot 001 \cdot 001 \cdot 377 \cdot 004 \cdot 004 \cdot 003 \cdot 002 \cdot 001$ \006\060\035\006\003\125\035\016\004\026\004\024\376\253\000\220 \230\236\044\374\251\314\032\212\373\047\270\277\060\156\250\073 \060\015\006\011\052\206\110\206\367\015\001\001\013\005\000\003 \202\002\001\000\317\167\054\156\126\276\116\263\266\204\000\224 \253\107\311\015\322\166\307\206\237\035\007\323\266\264\273\010 \170\257\151\322\013\111\336\063\305\254\255\302\210\002\175\006 \267\065\002\301\140\311\277\304\350\224\336\324\323\251\023\045 \132\376\156\242\256\175\005\334\175\363\154\360\176\246\215\356 \331\327\316\130\027\350\251\051\256\163\110\207\347\233\312\156 \051\241\144\137\031\023\367\256\006\020\377\121\306\233\115\125  $\label{eq:condition} $$ \045\117\223\231\020\001\123\165\361\023\316\307\246\101\101\322 $$$ \277\210\245\177\105\374\254\270\245\265\063\014\202\304\373\007 \366\152\345\045\204\137\006\312\301\206\071\021\333\130\315\167 \073\054\302\114\017\136\232\343\360\253\076\141\033\120\044\302 \300\364\361\031\360\021\051\266\245\030\002\233\327\143\114\160 \214\107\243\003\103\134\271\135\106\240\015\157\377\131\216\276 \335\237\162\303\133\053\337\214\133\316\345\014\106\154\222\262

\012\243\114\124\102\030\025\022\030\275\332\374\272\164\156\377 \301\266\240\144\330\251\137\125\256\237\134\152\166\226\330\163 \147\207\373\115\177\134\356\151\312\163\020\373\212\251\375\236 \275\066\070\111\111\207\364\016\024\360\351\207\270\077\247\117 \172\132\216\171\324\223\344\273\150\122\204\254\154\351\363\230 \160\125\162\062\371\064\253\053\111\265\315\040\142\344\072\172 \147\143\253\226\334\155\256\227\354\374\237\166\126\210\056\146 \317\133\266\311\244\260\327\005\272\341\047\057\223\273\046\052 \242\223\260\033\363\216\276\035\100\243\271\066\217\076\202\032 \032\136\210\352\120\370\131\342\203\106\051\013\343\104\134\341 \225\266\151\220\232\024\157\227\256\201\317\150\357\231\232\276  $\label{eq:condition} $$ \265\347\341\177\370\372\023\107\026\114\314\155\010\100\347\213$ \170\157\120\202\104\120\077\146\006\212\253\103\204\126\112\017 \040\055\206\016\365\322\333\322\172\212\113\315\245\350\116\361  $\label{eq:condition} $$ 136\046\045\001\131\043\240\176\322\366\176\041\127\327\047\274$ \025\127\114\244\106\301\340\203\036\014\114\115\037\117\006\031 \342\371\250\364\072\202\241\262\171\103\171\326\255\157\172\047 \220\003\244\352\044\207\077\331\275\331\351\362\137\120\111\034 \356\354\327\056

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Staat der Nederlanden EV Root CA"
- # Issuer: CN=Staat der Nederlanden EV Root CA,O=Staat der Nederlanden,C=NL
- # Serial Number: 10000013 (0x98968d)
- # Subject: CN=Staat der Nederlanden EV Root CA,O=Staat der Nederlanden,C=NL
- # Not Valid Before: Wed Dec 08 11:19:29 2010
- # Not Valid After: Thu Dec 08 11:10:28 2022
- # Fingerprint (SHA-256):
- 4D:24:91:41:4C:FE:95:67:46:EC:4C:EF:A6:CF:6F:72:E2:8A:13:29:43:2F:9D:8A:90:7A:C4:CB:5D:AD:C1:5A
- # Fingerprint (SHA1): 76:E2:7E:C1:4F:DB:82:C1:C0:A6:75:B5:05:BE:3D:29:B4:ED:DB:BB

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA LABEL UTF8 "Staat der Nederlanden EV Root CA"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\166\342\176\301\117\333\202\301\300\246\165\265\005\276\075\051\264\355\333\273

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\374\006\257\173\350\032\361\232\264\350\322\160\037\300\365\272

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\130\061\013\060\011\006\003\125\004\006\023\002\116\114\061 \036\060\034\006\003\125\004\012\014\025\123\164\141\141\164\040

```
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\061
\051\060\047\006\003\125\004\003\014\040\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\040
\105\126\040\122\157\157\164\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\000\230\226\215
END
{\tt CKA\_TRUST\_SERVER\_AUTH\ CK\_TRUST\ CKT\_NSS\_TRUSTED\_DELEGATOR}
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "IdenTrust Commercial Root CA 1"
# Issuer: CN=IdenTrust Commercial Root CA 1,O=IdenTrust,C=US
# Serial Number:0a:01:42:80:00:00:01:45:23:c8:44:b5:00:00:00:02
# Subject: CN=IdenTrust Commercial Root CA 1,O=IdenTrust,C=US
# Not Valid Before: Thu Jan 16 18:12:23 2014
# Not Valid After: Mon Jan 16 18:12:23 2034
# Fingerprint (SHA-256):
5D:56:49:9B:E4:D2:E0:8B:CF:CA:D0:8A:3E:38:72:3D:50:50:3B:DE:70:69:48:E4:2F:55:60:30:19:E5:28:AE
# Fingerprint (SHA1): DF:71:7E:AA:4A:D9:4E:C9:55:84:99:60:2D:48:DE:5F:BC:F0:3A:25
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "IdenTrust Commercial Root CA 1"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA_SUBJECT MULTILINE_OCTAL
\060\112\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\022\060\020\006\003\125\004\012\023\011\111\144\145\156\124\162
\165\163\164\061\047\060\045\006\003\125\004\003\023\036\111\144
\145\156\124\162\165\163\164\040\103\157\155\155\145\162\143\151
\141\154\040\122\157\157\164\040\103\101\040\061
END
CKA ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\022\060\020\006\003\125\004\012\023\011\111\144\145\156\124\162
\165\163\164\061\047\060\045\006\003\125\004\003\023\036\111\144
\145\156\124\162\165\163\164\040\103\157\155\155\145\162\143\151
\141\154\040\122\157\157\164\040\103\101\040\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\012\001\102\200\000\000\001\105\043\310\104\265\000\000
\000\002
```

#### **END**

#### CKA VALUE MULTILINE OCTAL

\060\202\005\140\060\202\003\110\240\003\002\001\002\002\002\012 \001\102\200\000\000\001\105\043\310\104\265\000\000\000\000\002\060 \015\006\011\052\206\110\206\367\015\001\001\013\005\000\060\112 \020\006\003\125\004\012\023\011\111\144\145\156\124\162\165\163 \164\061\047\060\045\006\003\125\004\003\023\036\111\144\145\156 \124\162\165\163\164\040\103\157\155\155\145\162\143\151\141\154 \040\122\157\157\164\040\103\101\040\061\060\036\027\015\061\064 \060\061\061\066\061\070\061\062\062\063\132\027\015\063\064\060  $\label{eq:condition} $$ \061\061\066\061\070\061\062\062\063\132\060\112\061\013\060\011 $$$ \006\003\125\004\006\023\002\125\123\061\022\060\020\006\003\125  $\\ \\004\\012\\023\\011\\111\\144\\145\\156\\124\\162\\165\\163\\164\\061\\047\\060$  $\\ \\045\\ \\006\\ \\003\\ \\125\\ \\004\\ \\003\\ \\023\\ \\036\\ \\111\\ \\144\\ \\145\\ \\156\\ \\124\\ \\162\\ \\165\\ \\163$ \164\040\103\157\155\155\145\162\143\151\141\154\040\122\157\157  $\label{eq:condition} $$ 164\040\103\101\040\061\060\202\002\042\060\015\006\011\052\206$ \110\206\367\015\001\001\001\005\000\003\202\002\017\000\060\202 \002\012\002\202\002\001\000\247\120\031\336\077\231\075\324\063  $\label{eq:condition} $$ 106\361\157\121\141\202\262\251\117\217\147\211\135\204\331\123$ \335\014\050\331\327\360\377\256\225\103\162\231\371\265\135\174 \212\301\102\341\061\120\164\321\201\015\174\315\233\041\253\103 \342\254\255\136\206\156\363\011\212\037\132\062\275\242\353\224 \371\350\134\012\354\377\230\322\257\161\263\264\123\237\116\207  $\label{eq:condition} $$ \frac{357}{222}\frac{274}{275}\frac{354}{117}\frac{062}{60}\frac{210}{113}\frac{027}{136}\frac{127}{304}\frac{302}{123}\frac{302}{120}$ \366\002\227\215\331\142\053\277\044\037\142\215\337\303\270\051 \113\111\170\074\223\140\210\042\374\231\332\066\310\302\242\324  $\label{eq:condition} $$ \054\124\000\147\065\156\163\277\002\130\360\244\335\345\260\242 $$$ \046\172\312\340\066\245\031\026\365\375\267\357\256\077\100\365 \155\132\004\375\316\064\312\044\334\164\043\033\135\063\023\022 \135\304\001\045\366\060\335\002\135\237\340\325\107\275\264\353 \033\241\273\111\111\330\237\133\002\363\212\344\044\220\344\142 \117\117\301\257\213\016\164\027\250\321\162\210\152\172\001\111 \314\264\106\171\306\027\261\332\230\036\007\131\372\165\041\205 \145\335\220\126\316\373\253\245\140\235\304\235\371\122\260\213 \275\207\371\217\053\043\012\043\166\073\367\063\341\311\000\363 \151\371\113\242\340\116\274\176\223\071\204\007\367\104\160\176  $\label{eq:condition} $$ \376\007\132\345\261\254\321\030\314\362\065\345\111\111\010\312$  $\label{eq:condition} $$ 126\311\075\373\017\030\175\213\073\301\023\302\115\217\311\117$  $\label{eq:condition} $$ \016\067\351\037\241\016\152\337\142\056\313\065\006\121\171\054$$$ \310\045\070\364\372\113\247\211\134\234\322\343\015\071\206\112 \164\174\325\131\207\302\077\116\014\134\122\364\075\367\122\202 \361\352\243\254\375\111\064\032\050\363\101\210\072\023\356\350 \336\377\231\035\137\272\313\350\036\362\271\120\140\300\061\323 \163\345\357\276\240\355\063\013\164\276\040\040\304\147\154\360 \010\003\172\125\200\177\106\116\226\247\364\036\076\341\366\330 \011\341\063\144\053\143\327\062\136\237\371\300\173\017\170\157 \227\274\223\232\371\234\022\220\170\172\200\207\025\327\162\164

\234\125\164\170\261\272\341\156\160\004\272\117\240\272\150\303 \173\377\061\360\163\075\075\224\052\261\013\101\016\240\376\115 \210\145\153\171\063\264\327\002\003\001\000\001\243\102\060\100 \060\016\006\003\125\035\017\001\001\377\004\004\003\002\001\006 \060\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001 \377\060\035\006\003\125\035\016\004\026\004\024\355\104\031\300 \323\360\006\213\356\244\173\276\102\347\046\124\310\216\066\166 \060\015\006\011\052\206\110\206\367\015\001\001\013\005\000\003  $\label{eq:condition} $$ \200\001\000\015\256\220\062\366\246\113\174\104\166\031\141 $$$ \036\047\050\315\136\124\357\045\274\343\010\220\371\051\327\256 \150\010\341\224\000\130\357\056\056\176\123\122\214\266\134\007 \352\210\272\231\213\120\224\327\202\200\337\141\011\000\223\255 \015\024\346\316\301\362\067\224\170\260\137\234\263\242\163\270  $\label{eq:condition} $$ \217\005\223\070\315\215\076\260\270\373\300\317\261\362\354\055$$ \055\033\314\354\252\232\263\252\140\202\033\055\073\303\204\075 \127\212\226\036\234\165\270\323\060\315\140\010\203\220\323\216 \124\361\115\146\300\135\164\003\100\243\356\205\176\302\037\167 \234\006\350\301\247\030\135\122\225\355\311\335\045\236\155\372 \251\355\243\072\064\320\131\173\332\355\120\363\065\277\355\353 \024\115\061\307\140\364\332\361\207\234\342\110\342\306\305\067 \373\006\020\372\165\131\146\061\107\051\332\166\232\034\351\202 \256\357\232\271\121\367\210\043\232\151\225\142\074\345\125\200  $\label{eq:condition} $$ \066\327\124\002\377\361\271\135\316\324\043\157\330\105\204\112$$ \133\145\357\211\014\335\024\247\040\313\030\245\045\264\015\371  $\label{eq:condition} $$ \001\360\242\322\364\000\310\164\216\241\052\110\216\145\333\023$ \304\342\045\027\175\353\276\207\133\027\040\124\121\223\112\123 \003\013\354\135\312\063\355\142\375\105\307\057\133\334\130\240  $\label{eq:condition} $$ \200\071\346\372\327\376\023\024\246\355\075\224\112\102\164\324 $$$ \303\167\131\163\315\217\106\276\125\070\357\372\350\221\062\352 \227\130\004\042\336\070\303\314\274\155\311\063\072\152\012\151  $\label{eq:condition} $$ \077\240\310\352\162\217\214\143\206\043\275\155\074\226\236\225$$ \340\111\114\252\242\271\052\033\234\066\201\170\355\303\350\106 \342\046\131\104\165\036\331\165\211\121\315\020\204\235\141\140 \313\135\371\227\042\115\216\230\346\343\177\366\133\273\256\315 \312\112\201\153\136\013\363\121\341\164\053\351\176\047\247\331 \231\111\116\370\245\200\333\045\017\034\143\142\212\311\063\147 \153\074\020\203\306\255\336\250\315\026\216\215\360\007\067\161 \237\362\253\374\101\365\301\213\354\000\067\135\011\345\116\200 \357\372\261\134\070\006\245\033\112\341\334\070\055\074\334\253  $\label{eq:condition} $$ \037\220\032\325\112\234\356\321\160\154\314\356\364\127\370\030 $$$ \272\204\156\207

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

<sup>#</sup> Trust for "IdenTrust Commercial Root CA 1"

<sup>#</sup> Issuer: CN=IdenTrust Commercial Root CA 1,O=IdenTrust,C=US

```
# Subject: CN=IdenTrust Commercial Root CA 1,O=IdenTrust,C=US
# Not Valid Before: Thu Jan 16 18:12:23 2014
# Not Valid After: Mon Jan 16 18:12:23 2034
# Fingerprint (SHA-256):
5D:56:49:9B:E4:D2:E0:8B:CF:CA:D0:8A:3E:38:72:3D:50:50:3B:DE:70:69:48:E4:2F:55:60:30:19:E5:28:AE
# Fingerprint (SHA1): DF:71:7E:AA:4A:D9:4E:C9:55:84:99:60:2D:48:DE:5F:BC:F0:3A:25
{\tt CKA\_CLASS\ CK\_OBJECT\_CLASS\ CKO\_NSS\_TRUST}
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "IdenTrust Commercial Root CA 1"
CKA CERT SHA1 HASH MULTILINE OCTAL
\337\161\176\252\112\331\116\311\125\204\231\140\055\110\336\137
\274\360\072\045
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\263\076\167\163\165\356\240\323\343\176\111\143\111\131\273\307
END
CKA_ISSUER MULTILINE_OCTAL
\060\112\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\022\060\020\006\003\125\004\012\023\011\111\144\145\156\124\162
\145\156\124\162\165\163\164\040\103\157\155\155\145\162\143\151
\141\154\040\122\157\157\164\040\103\101\040\061
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \002\020\012\001\102\200\000\000\001\105\043\310\104\265\000\000 $$
\000\002
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "IdenTrust Public Sector Root CA 1"
# Issuer: CN=IdenTrust Public Sector Root CA 1,O=IdenTrust,C=US
# Serial Number:0a:01:42:80:00:00:01:45:23:cf:46:7c:00:00:00:02
# Subject: CN=IdenTrust Public Sector Root CA 1,O=IdenTrust,C=US
# Not Valid Before: Thu Jan 16 17:53:32 2014
# Not Valid After: Mon Jan 16 17:53:32 2034
# Fingerprint (SHA-256):
30:D0:89:5A:9A:44:8A:26:20:91:63:55:22:D1:F5:20:10:B5:86:7A:CA:E1:2C:78:EF:95:8F:D4:F4:38:9F:2F
# Fingerprint (SHA1): BA:29:41:60:77:98:3F:F4:F3:EF:F2:31:05:3B:2E:EA:6D:4D:45:FD
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
```

# Serial Number:0a:01:42:80:00:00:01:45:23:c8:44:b5:00:00:00:02

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA LABEL UTF8 "IdenTrust Public Sector Root CA 1"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \000115\061\013\060\011\006\003\125\004\006\023\002\125\123\061\022\060\020\006\003\125\004\012\023\011\111\144\145\156\124\162\165\163\164\006\005\0006\003\125\0004\003\023\004\1111\144\145\156\124\162\165\163\164\040\120\165\142\154\151\143\040\123\145\143\164\157\162\040\122\157\157\164\040\103\101\040\061\ END$ 

CKA ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000115\061\013\060\011\006\003\125\004\006\023\002\125\123\061\022\060\020\006\003\125\004\012\023\011\111\144\145\156\124\162\165\163\164\006\005\0006\003\125\0004\003\023\004\1111\144\145\156\124\162\165\163\164\040\120\165\142\154\151\143\040\123\145\143\164\157\162\040\122\157\157\164\040\103\101\040\061\ END$ 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\012\001\102\200\000\000\001\105\043\317\106\174\000\000\000\0002

**END** 

#### CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\202\005\146\060\202\003\116\240\003\002\001\002\002\002\002\0012$ \001\102\200\000\000\001\105\043\317\106\174\000\000\000\000\002\060 \015\006\011\052\206\110\206\367\015\001\001\013\005\000\060\115 \020\006\003\125\004\012\023\011\111\144\145\156\124\162\165\163 \164\061\052\060\050\006\003\125\004\003\023\041\111\144\145\156 \164\157\162\040\122\157\157\164\040\103\101\040\061\060\036\027 \015\061\064\060\061\061\066\061\067\065\063\063\062\132\027\015 \063\064\060\061\061\066\061\067\065\063\063\062\132\060\115\061 \013\060\011\006\003\125\004\006\023\002\125\123\061\022\060\020 \006\003\125\004\012\023\011\111\144\145\156\124\162\165\163\164 \061\052\060\050\006\003\125\004\003\023\041\111\144\145\156\124 \162\165\163\164\040\120\165\142\154\151\143\040\123\145\143\164  $\label{eq:condition} $$ \frac{157}{162}040\\122\\157\\157\\164\\040\\103\\101\\040\\061\\060\\202\\002\\042$ \060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003 \202\002\017\000\060\202\002\012\002\202\002\001\000\266\042\224 \374\244\110\257\350\107\153\012\373\047\166\344\362\077\212\073 \172\112\054\061\052\214\215\260\251\303\061\153\250\167\166\204 \046\266\254\201\102\015\010\353\125\130\273\172\370\274\145\175 \362\240\155\213\250\107\351\142\166\036\021\356\010\024\321\262 \104\026\364\352\320\372\036\057\136\333\313\163\101\256\274\000 \260\112\053\100\262\254\341\073\113\302\055\235\344\241\233\354 \032\072\036\360\010\263\320\344\044\065\007\237\234\264\311\122

\155\333\007\312\217\265\133\360\203\363\117\307\055\245\310\255 \313\225\040\244\061\050\127\130\132\344\215\033\232\253\236\015  $\label{eq:condition} $$ \014\362\012\063\071\042\071\012\227\056\363\123\167\271\104\105$  $\label{eq:condition} $$ 375 \ 204 \ 313 \ 066 \ 040 \ 201 \ 131 \ 055 \ 232 \ 157 \ 155 \ 110 \ 110 \ 141 \ 312 \ 114$ \337\123\321\257\122\274\104\237\253\057\153\203\162\357\165\200  $\label{eq:condition} $$ 32\006\063\033\135\310\332\143\306\115\315\254\146\061\315\321 $$$ \336\076\207\020\066\341\271\244\172\357\140\120\262\313\312\246  $\label{eq:condition} $$ \frac{340}{067}257\\253\\064\\023\\071\\045\\350\\071\\146\\344\\230\\172\\252$  $\label{eq:condition} $$ \022\230\234\131\146\206\076\255\361\260\312\076\006\017\173\360 $$$ \021\113\067\240\104\155\173\313\250\214\161\364\325\265\221\066 \314\360\025\306\053\336\121\027\261\227\114\120\075\261\225\131 \174\005\175\055\041\325\000\277\001\147\242\136\173\246\134\362 \367\042\361\220\015\223\333\252\104\121\146\314\175\166\003\353 \152\250\052\070\031\227\166\015\153\212\141\371\274\366\356\166  $\label{eq:condition} $$ \375\160\053\335\051\074\370\012\036\133\102\034\213\126\057\125$ \033\034\241\056\265\307\026\346\370\252\074\222\216\151\266\001 \301\265\206\235\211\017\013\070\224\124\350\352\334\236\075\045 \274\123\046\355\325\253\071\252\305\100\114\124\253\262\264\331 \331\370\327\162\333\034\274\155\275\145\137\357\210\065\052\146  $\label{eq:condition} $$ \057\356\366\263\145\360\063\215\174\230\101\151\106\017\103\034$$$ \151\372\233\265\320\141\152\315\312\113\331\114\220\106\253\025 \131\241\107\124\051\056\203\050\137\034\302\242\253\162\027\000  $\\ \\006\\216\\105\\354\\213\\342\\063\\075\\177\\332\\031\\104\\344\\142\\162\\303$ \337\042\306\362\126\324\335\137\225\162\355\155\137\367\110\003 \133\375\305\052\240\366\163\043\204\020\033\001\347\002\003\001 \000\001\243\102\060\100\060\016\006\003\125\035\017\001\001\377 \004\004\003\002\001\006\060\017\006\003\125\035\023\001\001\377  $\\ \\004\\\\005\\\\060\\\\003\\\\001\\\\001\\\\377\\\\060\\\\035\\\\006\\\\003\\\\125\\\\035\\\\016\\\\004\\\\026$ \004\024\343\161\340\236\330\247\102\331\333\161\221\153\224\223 \353\303\243\321\024\243\060\015\006\011\052\206\110\206\367\015  $\label{eq:condition} $$ \001\001\013\005\000\003\202\002\001\000\107\372\335\012\260\021 $$$ \221\070\255\115\135\367\345\016\227\124\031\202\110\207\124\214 \252\144\231\330\132\376\210\001\305\130\245\231\261\043\124\043 \267\152\035\040\127\345\001\142\101\027\323\011\333\165\313\156 \124\220\165\376\032\237\201\012\302\335\327\367\011\320\133\162 \025\344\036\011\152\075\063\363\041\232\346\025\176\255\121\325 \015\020\355\175\102\300\217\356\300\232\010\325\101\326\134\016  $\label{eq:condition} $$ \041\151\156\200\141\016\025\300\270\317\305\111\022\122\314\276$  $\label{eq:condition} $$ \072\314\324\056\070\005\336\065\375\037\157\270\200\150\230\075$ \115\240\312\100\145\322\163\174\365\213\331\012\225\077\330\077 \043\155\032\321\052\044\031\331\205\263\027\357\170\156\251\130 \321\043\323\307\023\355\162\045\177\135\261\163\160\320\177\006 \227\011\204\051\200\141\035\372\136\377\163\254\240\343\211\270 \034\161\025\306\336\061\177\022\334\341\155\233\257\347\350\237 \232\031\120\004\232\262\232\157\145\213\122\137\074\130\004\050 \045\300\146\141\061\176\271\340\165\271\032\250\201\326\162\027 \263\305\003\061\065\021\170\170\242\340\351\060\214\177\200\337

 $\label{eq:constraint} $$ 130\337\074\272\047\226\342\200\064\155\343\230\323\144\047\254\110\176\050\167\134\306\045\141\045\370\205\014\145\372\304\062\057\245\230\005\344\370\013\147\026\026\306\202\270\062\031\371\371\271\171\334\037\315\353\257\253\016\335\033\333\105\344\172\347\002\342\225\135\374\151\360\123\151\141\225\165\171\013\136\125\346\070\034\224\251\131\063\236\310\161\164\171\177\121\211\266\310\152\270\060\310\152\070\303\156\236\341\067\026\352\005\142\114\133\022\107\355\247\264\263\130\126\307\111\363\177\022\150\011\061\161\360\155\370\116\107\373\326\205\356\305\130\100\031\244\035\247\371\113\103\067\334\150\132\117\317\353\302\144\164\336\264\025\331\364\124\124\032\057\034\327\227\161\124\220\216\331\040\235\123\053\177\253\217\342\352\060\274\120\067\357\361\107\265\175\174\054\004\354\150\235\264\111\104\020\364\162\113\034\144\347\374\346\153\220\335\151\175\151\375\000\126\245\267\254\266\255\267\312\076\001\357\234$ 

END

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "IdenTrust Public Sector Root CA 1"
- # Issuer: CN=IdenTrust Public Sector Root CA 1,O=IdenTrust,C=US
- # Serial Number:0a:01:42:80:00:00:01:45:23:cf:46:7c:00:00:00:02
- # Subject: CN=IdenTrust Public Sector Root CA 1,O=IdenTrust,C=US
- # Not Valid Before: Thu Jan 16 17:53:32 2014
- # Not Valid After: Mon Jan 16 17:53:32 2034
- # Fingerprint (SHA-256):
- # Fingerprint (SHA1): BA:29:41:60:77:98:3F:F4:F3:EF:F2:31:05:3B:2E:EA:6D:4D:45:FD

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "IdenTrust Public Sector Root CA 1"

CKA CERT SHA1 HASH MULTILINE OCTAL

\272\051\101\140\167\230\077\364\363\357\362\061\005\073\056\352 \155\115\105\375

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \067\006\245\260\374\211\235\272\364\153\214\032\144\315\325\272 $$$  END

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{lem:condition} $$ \000115\061\013\060\011\006\003\125\004\006\023\002\125\123\061\022\060\020\006\003\125\004\012\023\011\111\144\145\156\124\162\165\163\164\006\005\0006\003\125\0004\003\023\004\1111\144\145\156\124\162\165\163\164\040\120\165\142\154\151\143\040\123\145\143\164\157\162\040\122\157\157\164\040\103\101\040\061\ END$ 

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CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\012\001\102\200\000\000\001\105\043\317\106\174\000\000
\000\002
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Entrust Root Certification Authority - G2"
# Issuer: CN=Entrust Root Certification Authority - G2,OU="(c) 2009 Entrust, Inc. - for authorized use
only",OU=See www.entrust.net/legal-terms,O="Entrust, Inc.",C=US
# Serial Number: 1246989352 (0x4a538c28)
# Subject: CN=Entrust Root Certification Authority - G2,OU="(c) 2009 Entrust, Inc. - for authorized use
only",OU=See www.entrust.net/legal-terms,O="Entrust, Inc.",C=US
# Not Valid Before: Tue Jul 07 17:25:54 2009
# Not Valid After: Sat Dec 07 17:55:54 2030
# Fingerprint (SHA-256):
43:DF:57:74:B0:3E:7F:EF:5F:E4:0D:93:1A:7B:ED:F1:BB:2E:6B:42:73:8C:4E:6D:38:41:10:3D:3A:A7:F3:39
# Fingerprint (SHA1): 8C:F4:27:FD:79:0C:3A:D1:66:06:8D:E8:1E:57:EF:BB:93:22:72:D4
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "Entrust Root Certification Authority - G2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\201\276\061\013\060\011\006\003\125\004\006\023\002\125\123
\163\164\054\040\111\156\143\056\061\050\060\046\006\003\125\004
\013\023\037\123\145\145\040\167\167\167\056\145\156\164\162\165
\163\164\056\156\145\164\057\154\145\147\141\154\055\164\145\162
\label{eq:condition} $$ \frac{155}{63}061\\071\\060\\067\\006\\003\\125\\004\\013\\023\\060\\050\\143\\051
\040\062\060\060\071\040\105\156\164\162\165\163\164\054\040\111
\label{eq:condition} $$ \frac{156}{143}056040055040146157162040141165164150157162}$
\151\172\145\144\040\165\163\145\040\157\156\154\171\061\062\060
\122\157\157\164\040\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\101\165\164\150\157\162\151\164\171\040\055\040\107
\062
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\276\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\026\060\024\006\003\125\004\012\023\015\105\156\164\162\165
\163\164\054\040\111\156\143\056\061\050\060\046\006\003\125\004
```

 $\label{eq:control_loss} $$ \103\023\037\123\145\145\040\167\167\167\056\145\156\164\162\165\163\164\056\156\145\164\057\154\145\147\141\154\055\164\145\162\155\163\060\050\143\051\1040\062\060\060\060\071\040\105\156\164\162\165\163\164\054\040\111\156\143\056\040\055\040\146\157\162\040\141\165\164\150\157\162\040\141\165\164\150\162\060\060\006\003\125\004\003\023\051\105\156\164\162\165\163\164\040\122\157\156\040\101\165\164\150\157\162\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040\055\040\107\062$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\004\112\123\214\050

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\004\076\060\202\003\046\240\003\002\001\002\002\004\112 \123\214\050\060\015\006\011\052\206\110\206\367\015\001\001\013 \005\000\060\201\276\061\013\060\011\006\003\125\004\006\023\002 \125\123\061\026\060\024\006\003\125\004\012\023\015\105\156\164 \162\165\163\164\054\040\111\156\143\056\061\050\060\046\006\003 \125\004\013\023\037\123\145\145\040\167\167\167\056\145\156\164 \162\165\163\164\056\156\145\164\057\154\145\147\141\154\055\164 \145\162\155\163\061\071\060\067\006\003\125\004\013\023\060\050 \143\051\040\062\060\060\071\040\105\156\164\162\165\163\164\054 \040\111\156\143\056\040\055\040\146\157\162\040\141\165\164\150 \157\162\151\172\145\144\040\165\163\145\040\157\156\154\171\061 \062\060\060\006\003\125\004\003\023\051\105\156\164\162\165\163 \164\040\122\157\157\164\040\103\145\162\164\151\146\151\143\141 \164\151\157\156\040\101\165\164\150\157\162\151\164\171\040\055 \040\107\062\060\036\027\015\060\071\060\067\060\067\061\067\062 \065\065\064\132\027\015\063\060\061\062\060\067\061\067\065\065 \065\064\132\060\201\276\061\013\060\011\006\003\125\004\006\023 \002\125\123\061\026\060\024\006\003\125\004\012\023\015\105\156 \164\162\165\163\164\054\040\111\156\143\056\061\050\060\046\006 \003\125\004\013\023\037\123\145\145\040\167\167\167\056\145\156 \164\162\165\163\164\056\156\145\164\057\154\145\147\141\154\055 \164\145\162\155\163\061\071\060\067\006\003\125\004\013\023\060 \050\143\051\040\062\060\060\071\040\105\156\164\162\165\163\164  $\label{eq:condition} $$ \054\040\111\156\143\056\040\055\040\146\157\162\040\141\165\164$$$ \061\062\060\060\006\003\125\004\003\023\051\105\156\164\162\165 \163\164\040\122\157\157\164\040\103\145\162\164\151\146\151\143 \141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040 \055\040\107\062\060\202\001\042\060\015\006\011\052\206\110\206 \367\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012 \002\202\001\001\000\272\204\266\162\333\236\014\153\342\231\351 \060\001\247\166\352\062\270\225\101\032\311\332\141\116\130\162 \317\376\366\202\171\277\163\141\006\012\245\047\330\263\137\323

\105\116\034\162\326\116\062\362\162\212\017\367\203\031\320\152 \200\200\000\105\036\260\307\347\232\277\022\127\047\034\243\150  $\label{eq:condition} $$ \057\012\207\275\152\153\016\136\145\363\034\167\325\324\205\215 $$$ \160\041\264\263\062\347\213\242\325\206\071\002\261\270\322\107 \316\344\311\111\304\073\247\336\373\124\175\127\276\360\350\156 \302\171\262\072\013\125\342\120\230\026\062\023\134\057\170\126 \301\302\224\263\362\132\344\047\232\237\044\327\306\354\320\233  $\\ \langle 045 \rangle 202 \rangle 343 \rangle 314 \rangle 302 \rangle 304 \rangle 105 \rangle 305 \rangle 214 \rangle 227 \rangle 172 \rangle 006 \rangle 153 \rangle 052 \rangle 021 \rangle 237 \rangle 172 \rangle$ \251\012\156\110\073\157\333\324\021\031\102\367\217\007\277\365 \123\137\234\076\364\027\054\346\151\254\116\062\114\142\167\352 \267\350\345\273\064\274\031\213\256\234\121\347\267\176\265\123 \261\063\042\345\155\317\160\074\032\372\342\233\147\266\203\364 \215\245\257\142\114\115\340\130\254\144\064\022\003\370\266\215 \224\143\044\244\161\002\003\001\000\001\243\102\060\100\060\016  $\label{eq:condition} $$ \006\003\125\035\017\001\001\377\004\004\003\002\001\006\060\017 $$$ \006\003\125\035\023\001\001\377\004\005\060\003\001\001\377\060  $\label{eq:condition} $$ \035\006\003\125\035\016\004\026\004\024\152\162\046\172\320\036$ \357\175\347\073\151\121\324\154\215\237\220\022\146\253\060\015 \006\011\052\206\110\206\367\015\001\001\013\005\000\003\202\001  $\label{eq:condition} $$ \001\000\171\237\035\226\306\266\171\077\042\215\207\323\207\003$ \004\140\152\153\232\056\131\211\163\021\254\103\321\365\023\377 \215\071\053\300\362\275\117\160\214\251\057\352\027\304\013\124 \236\324\033\226\230\063\074\250\255\142\242\000\166\253\131\151 \156\006\035\176\304\271\104\215\230\257\022\324\141\333\012\031 \106\107\363\353\367\143\301\100\005\100\245\322\267\364\265\232 \066\277\251\210\166\210\004\125\004\053\234\207\177\032\067\074 \176\055\245\032\330\324\211\136\312\275\254\075\154\330\155\257 \325\363\166\017\315\073\210\070\042\235\154\223\232\304\075\277 \202\033\145\077\246\017\135\252\374\345\262\025\312\265\255\306 \274\075\320\204\350\352\006\162\260\115\071\062\170\277\076\021 \234\013\244\235\232\041\363\360\233\013\060\170\333\301\334\207 \103\376\274\143\232\312\305\302\034\311\307\215\377\073\022\130 \010\346\266\075\354\172\054\116\373\203\226\316\014\074\151\207 \124\163\244\163\302\223\377\121\020\254\025\124\001\330\374\005  $\verb|\|261|\|211|\|241|\|177|\|164|\|203|\|232|\|111|\|327|\|334|\|116|\|173|\|212|\|110|\|157|\|213|$ \105\366

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

<sup>#</sup> Trust for "Entrust Root Certification Authority - G2"

<sup>#</sup> Issuer: CN=Entrust Root Certification Authority - G2,OU="(c) 2009 Entrust, Inc. - for authorized use only",OU=See www.entrust.net/legal-terms,O="Entrust, Inc.",C=US

<sup>#</sup> Serial Number: 1246989352 (0x4a538c28)

<sup>#</sup> Subject: CN=Entrust Root Certification Authority - G2,OU="(c) 2009 Entrust, Inc. - for authorized use only",OU=See www.entrust.net/legal-terms,O="Entrust, Inc.",C=US

<sup>#</sup> Not Valid Before: Tue Jul 07 17:25:54 2009

```
# Not Valid After: Sat Dec 07 17:55:54 2030
# Fingerprint (SHA-256):
43:DF:57:74:B0:3E:7F:EF:5F:E4:0D:93:1A:7B:ED:F1:BB:2E:6B:42:73:8C:4E:6D:38:41:10:3D:3A:A7:F3:39
# Fingerprint (SHA1): 8C:F4:27:FD:79:0C:3A:D1:66:06:8D:E8:1E:57:EF:BB:93:22:72:D4
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Entrust Root Certification Authority - G2"
CKA CERT SHA1 HASH MULTILINE OCTAL
\214\364\047\375\171\014\072\321\146\006\215\350\036\127\357\273
\223\042\162\324
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\113\342\311\221\226\145\014\364\016\132\223\222\240\012\376\262
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\276\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\026\060\024\006\003\125\004\012\023\015\105\156\164\162\165
\163\164\054\040\111\156\143\056\061\050\060\046\006\003\125\004
\013\023\037\123\145\145\040\167\167\167\056\145\156\164\162\165
\163\164\056\156\145\164\057\154\145\147\141\154\055\164\145\162
\155\163\061\071\060\067\006\003\125\004\013\023\060\050\143\051
\040\062\060\060\071\040\105\156\164\162\165\163\164\054\040\111
\156\143\056\040\055\040\146\157\162\040\141\165\164\150\157\162
\151\172\145\144\040\165\163\145\040\157\156\154\171\061\062\060
\060\006\003\125\004\003\023\051\105\156\164\162\165\163\164\040
\157\156\040\101\165\164\150\157\162\151\164\171\040\055\040\107
\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\112\123\214\050
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
#
# Certificate "Entrust Root Certification Authority - EC1"
# Issuer: CN=Entrust Root Certification Authority - EC1,OU="(c) 2012 Entrust, Inc. - for authorized use
only",OU=See www.entrust.net/legal-terms,O="Entrust, Inc.",C=US
# Serial Number:00:a6:8b:79:29:00:00:00:00:50:d0:91:f9
# Subject: CN=Entrust Root Certification Authority - EC1,OU="(c) 2012 Entrust, Inc. - for authorized use
only",OU=See www.entrust.net/legal-terms,O="Entrust, Inc.",C=US
# Not Valid Before: Tue Dec 18 15:25:36 2012
```

# Not Valid After: Fri Dec 18 15:55:36 2037

# Fingerprint (SHA-256):

02:ED:0E:B2:8C:14:DA:45:16:5C:56:67:91:70:0D:64:51:D7:FB:56:F0:B2:AB:1D:3B:8E:B0:70:E5:6E:DF:F5

# Fingerprint (SHA1): 20:D8:06:40:DF:9B:25:F5:12:25:3A:11:EA:F7:59:8A:EB:14:B5:47

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "Entrust Root Certification Authority - EC1"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA\_SUBJECT MULTILINE\_OCTAL

END

\103\061

CKA ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \060\201\277\061\013\060\011\006\003\125\004\006\023\002\125\123\061\026\060\024\006\003\125\004\012\023\015\105\156\164\162\165\163\164\054\040\111\156\143\056\061\050\060\046\0006\003\125\004\013\023\037\123\145\145\040\167\167\167\056\145\156\164\162\165\164\145\162\155\163\061\071\060\067\006\003\125\004\013\023\060\050\143\051\145\162\163\164\050\143\056\164\162\165\163\164\050\1145\1145\144\040\111\156\143\056\040\055\040\146\157\162\040\141\165\164\150\157\162\151\172\145\144\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040\055\040\105\157\162\151\164\171\040\055\040\105\157\162\151\164\171\040\055\040\105\157\162\151\164\171\040\055\040\105\157\162\151\164\171\040\055\040\105\157\162\151\164\171\040\055\040\105\157\162\151\164\171\040\055\040\105\157\162\151\164\171\040\055\040\105\164\150\157\162\151\164\171\040\055\040\105\164\150\157\162\151\164\171\040\055\040\105\164\150\157\162\151\164\171\040\055\040\105\164\150\157\162\151\164\171\040\055\040\105\164\150\164\150\164\171\040\055\040\105\164\150\164\150\156\164\171\040\055\040\105\164\150\156\164\171\040\055\040\105\164\150\156\164\171\164\$ 

**END** 

### CKA SERIAL NUMBER MULTILINE OCTAL

\002\015\000\246\213\171\051\000\000\000\000\120\320\221\371

**END** 

#### CKA VALUE MULTILINE OCTAL

\060\202\002\371\060\202\002\200\240\003\002\001\002\002\0015\000 \246\213\171\051\000\000\000\000\120\320\221\371\060\012\006\010 \052\206\110\316\075\004\003\003\060\201\277\061\013\060\011\006

\003\125\004\006\023\002\125\123\061\026\060\024\006\003\125\004 \012\023\015\105\156\164\162\165\163\164\054\040\111\156\143\056 \061\050\060\046\006\003\125\004\013\023\037\123\145\145\040\167 \167\167\056\145\156\164\162\165\163\164\056\156\145\164\057\154 \145\147\141\154\055\164\145\162\155\163\061\071\060\067\006\003 \125\004\013\023\060\050\143\051\040\062\060\061\062\040\105\156 \164\162\165\163\164\054\040\111\156\143\056\040\055\040\146\157 \162\040\141\165\164\150\157\162\151\172\145\144\040\165\163\145 \040\157\156\154\171\061\063\060\061\006\003\125\004\003\023\052 \105\156\164\162\165\163\164\040\122\157\157\164\040\103\145\162 \061\062\061\070\061\065\062\065\063\066\132\027\015\063\067\061  $\label{eq:condition} $$ \062\061\070\061\065\065\065\063\066\132\060\201\277\061\013\060 $$$  $\label{eq:condition} $$ \004\003\125\004\006\023\002\125\123\061\026\060\024\006\003$ \125\004\012\023\015\105\156\164\162\165\163\164\054\040\111\156  $\label{eq:condition} $$ \frac{143}056\\061\\050\\060\\046\\004\\000\\003\\125\\004\\013\\023\\037\\123\\145\\145$ \040\167\167\167\056\145\156\164\162\165\163\164\056\156\145\164 \057\154\145\147\141\154\055\164\145\162\155\163\061\071\060\067  $\label{eq:condition} $$ \006\003\125\004\013\023\060\050\143\051\040\062\060\061\062\040 $$$ \105\156\164\162\165\163\164\054\040\111\156\143\056\040\055\040 \146\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165  $\label{eq:condition} $$ 163\145\040\157\156\154\171\061\063\060\061\006\003\125\004\003$ \023\052\105\156\164\162\165\163\164\040\122\157\157\164\040\103 \145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164 \150\157\162\151\164\171\040\055\040\105\103\061\060\166\060\020 \006\007\052\206\110\316\075\002\001\006\005\053\201\004\000\042  $\label{eq:condition} $$ \003\142\000\004\204\023\311\320\272\155\101\173\342\154\320\353$ \125\137\146\002\032\044\364\133\211\151\107\343\270\302\175\361 \362\002\305\237\240\366\133\325\213\006\031\206\117\123\020\155  $\\ \\007\\044\\047\\241\\240\\370\\325\\107\\031\\141\\114\\175\\312\\223\\047\\352$ \164\014\357\157\226\011\376\143\354\160\135\066\255\147\167\256 \311\235\174\125\104\072\242\143\121\037\365\343\142\324\251\107 \007\076\314\040\243\102\060\100\060\016\006\003\125\035\017\001 \001\377\004\004\003\002\001\006\060\017\006\003\125\035\023\001 \001\377\004\005\060\003\001\001\377\060\035\006\003\125\035\016 \004\026\004\024\267\143\347\032\335\215\351\010\246\125\203\244  $\label{eq:condition} $$ 340\152\120\101\145\021\102\111\060\012\006\010\052\206\110\316$$  $\label{eq:condition} $$ 107\337\034\256\123\231\027\266\157\034\175\341\277\021\224\321 $$$ \003\210\165\344\215\211\244\212\167\106\336\155\141\357\002\365 \373\265\337\314\376\116\377\376\251\346\247\002\060\133\231\327 \205\067\006\265\173\010\375\353\047\213\112\224\371\341\372\247 \216\046\010\350\174\222\150\155\163\330\157\046\254\041\002\270 \231\267\046\101\133\045\140\256\320\110\032\356\006

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Entrust Root Certification Authority - EC1"
# Issuer: CN=Entrust Root Certification Authority - EC1,OU="(c) 2012 Entrust, Inc. - for authorized use
only",OU=See www.entrust.net/legal-terms,O="Entrust, Inc.",C=US
# Serial Number:00:a6:8b:79:29:00:00:00:00:50:d0:91:f9
# Subject: CN=Entrust Root Certification Authority - EC1,OU="(c) 2012 Entrust, Inc. - for authorized use
only",OU=See www.entrust.net/legal-terms,O="Entrust, Inc.",C=US
# Not Valid Before: Tue Dec 18 15:25:36 2012
# Not Valid After: Fri Dec 18 15:55:36 2037
# Fingerprint (SHA-256):
02:ED:0E:B2:8C:14:DA:45:16:5C:56:67:91:70:0D:64:51:D7:FB:56:F0:B2:AB:1D:3B:8E:B0:70:E5:6E:DF:F5
# Fingerprint (SHA1): 20:D8:06:40:DF:9B:25:F5:12:25:3A:11:EA:F7:59:8A:EB:14:B5:47
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "Entrust Root Certification Authority - EC1"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\label{eq:condition} $$ \040\330\006\100\337\233\045\365\022\045\072\021\352\367\131\212
\353\024\265\107
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\266\176\035\360\130\305\111\154\044\073\075\355\230\030\355\274
END
CKA ISSUER MULTILINE OCTAL
\060\201\277\061\013\060\011\006\003\125\004\006\023\002\125\123
\163\164\054\040\111\156\143\056\061\050\060\046\006\003\125\004
\013\023\037\123\145\145\040\167\167\167\056\145\156\164\162\165
\163\164\056\156\145\164\057\154\145\147\141\154\055\164\145\162
\155\163\061\071\060\067\006\003\125\004\013\023\060\050\143\051
\040\062\060\061\062\040\105\156\164\162\165\163\164\054\040\111
\156\143\056\040\055\040\146\157\162\040\141\165\164\150\157\162
\151\172\145\144\040\165\163\145\040\157\156\154\171\061\063\060
\061\006\003\125\004\003\023\052\105\156\164\162\165\163\164\040
\157\156\040\101\165\164\150\157\162\151\164\171\040\055\040\105
\103\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\015\000\246\213\171\051\000\000\000\000\120\320\221\371
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
```

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

# Certificate "CFCA EV ROOT"

#

# Issuer: CN=CFCA EV ROOT,O=China Financial Certification Authority,C=CN

# Serial Number: 407555286 (0x184accd6)

# Subject: CN=CFCA EV ROOT,O=China Financial Certification Authority,C=CN

# Not Valid Before: Wed Aug 08 03:07:01 2012

# Not Valid After: Mon Dec 31 03:07:01 2029

# Fingerprint (SHA-256):

5C:C3:D7:8E:4E:1D:5E:45:54:7A:04:E6:87:3E:64:F9:0C:F9:53:6D:1C:CC:2E:F8:00:F3:55:C4:C5:FD:70:FD

# Fingerprint (SHA1): E2:B8:29:4B:55:84:AB:6B:58:C2:90:46:6C:AC:3F:B8:39:8F:84:83

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "CFCA EV ROOT"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

\040\105\126\040\122\117\117\124

**END** 

CKA\_ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\004\030\112\314\326

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\202\005\215\060\202\003\165\240\003\002\001\002\002\004\030\112\314\326\060\015\006\011\052\206\110\206\367\015\001\001\013\130\000\126\006\126\006\003\125\004\003\125\004\006\23\002\103\116\061\060\060\060\060\003\125\004\012\014\047\103\150\151\156\141\156\141\156\143\151\141\154\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\061\025\060\023\006\003\125\004\003\014\014\103\106\1062\060\0070\060\063\060\067\060\061\132\060\126\061\013\060\011$ 

\006\003\125\004\006\023\002\103\116\061\060\060\056\006\003\125 \004\012\014\047\103\150\151\156\141\040\106\151\156\141\156\143 \151\141\154\040\103\145\162\164\151\146\151\143\141\164\151\157 \156\040\101\165\164\150\157\162\151\164\171\061\025\060\023\006 \003\125\004\003\014\014\103\106\103\101\040\105\126\040\122\117  $\label{eq:condition} $$ \frac{117}124\060\202\002\042\060\015\006\011\052\206\110\206\367\015}{110\206\367\015} $$$ \001\001\001\005\000\003\202\002\017\000\060\202\002\012\002\202 \002\001\000\327\135\153\315\020\077\037\005\131\325\005\115\067  $\label{eq:condition} $$ \261\016\354\230\053\216\025\035\372\223\113\027\202\041\161\020$ \122\327\121\144\160\026\302\125\151\115\216\025\155\237\277\014  $\label{eq:condition} $$ \033\302\340\243\147\326\014\254\317\042\256\257\167\124\052\113$ \114\212\123\122\172\303\356\056\336\263\161\045\301\351\135\075 \356\241\057\243\367\052\074\311\043\035\152\253\035\241\247\361 \363\354\240\325\104\317\025\317\162\057\035\143\227\350\231\371  $\label{eq:condition} $$ 375 \ 223 \ 244 \ 124 \ 200 \ 114 \ 122 \ 324 \ 122 \ 253 \ 056 \ 111 \ 337 \ 220 \ 315 \ 270$ \137\276\077\336\241\312\115\040\324\045\350\204\051\123\267\261 \210\037\377\372\332\220\237\012\251\055\101\077\261\361\030\051 \356\026\131\054\064\111\032\250\006\327\250\210\322\003\162\172 \062\342\352\150\115\156\054\226\145\173\312\131\372\362\342\335 \356\060\054\373\314\106\254\304\143\353\157\177\066\053\064\163 \022\224\177\337\314\046\236\361\162\135\120\145\131\217\151\263 \207\136\062\157\303\030\212\265\225\217\260\172\067\336\132\105  $\\ \ \langle 073 \rangle 307 \rangle 066 \rangle 341 \rangle 357 \rangle 147 \rangle 321 \rangle 071 \rangle 323 \rangle 227 \rangle 133 \rangle 163 \rangle 142 \rangle 031 \rangle 110 \rangle 055$ \207\034\006\373\164\230\040\111\163\360\005\322\033\261\240\243 \267\033\160\323\210\151\271\132\326\070\364\142\334\045\213\170 \277\370\350\176\270\134\311\225\117\137\247\055\271\040\153\317 \153\335\365\015\364\202\267\364\262\146\056\020\050\366\227\132 \173\226\026\217\001\031\055\154\156\177\071\130\006\144\203\001 \203\203\303\115\222\335\062\306\207\244\067\351\026\316\252\055 \150\257\012\201\145\072\160\301\233\255\115\155\124\312\052\055  $\label{eq:condition} $$ \frac{3205 \cdot 33 \cdot 263 \cdot 200 \cdot 346 \cdot 160 \cdot 105 \cdot 015 \cdot 153 \cdot 136 \cdot 065 \cdot 360 \cdot 177 \cdot 073 \cdot 270}{130 \cdot 105 \cdot 105}$ \234\344\004\160\211\022\045\223\332\012\231\042\140\152\143\140 \116\166\006\230\116\275\203\255\035\130\212\045\205\322\307\145 \036\055\216\306\337\266\306\341\177\212\004\041\025\051\164\360 \076\234\220\235\014\056\361\212\076\132\252\014\011\036\307\325 \074\243\355\227\303\036\064\372\070\371\010\016\343\300\135\053 \203\321\126\152\311\266\250\124\123\056\170\062\147\075\202\177 \164\320\373\341\266\005\140\271\160\333\216\013\371\023\130\157  $\label{eq:condition} $$ 161\140\020\122\020\271\301\101\011\357\162\037\147\061\170\377 $$$ \226\005\215\002\003\001\000\001\243\143\060\141\060\037\006\003 \125\035\043\004\030\060\026\200\024\343\376\055\375\050\320\013 \265\272\266\242\304\277\006\252\005\214\223\373\057\060\017\006  $\label{eq:condition} $$ \003\125\035\023\001\001\377\004\005\060\003\001\001\377\060\016$ \006\003\125\035\017\001\001\377\004\004\003\002\001\006\060\035  $\label{eq:condition} $$ \006\003\125\035\016\004\026\004\024\343\376\055\375\050\320\013$ \265\272\266\242\304\277\006\252\005\214\223\373\057\060\015\006 \011\052\206\110\206\367\015\001\001\013\005\000\003\202\002\001 \000\045\306\272\153\353\207\313\336\202\071\226\075\360\104\247

\153\204\163\003\336\235\053\117\272\040\177\274\170\262\317\227 \260\033\234\363\327\171\056\365\110\266\322\373\027\210\346\323 \172\077\355\123\023\320\342\057\152\171\313\000\043\050\346\036  $\label{eq:condition} $$ \067\127\065\211\204\302\166\117\064\066\255\147\303\316\101\006$ \210\305\367\356\330\032\270\326\013\177\120\377\223\252\027\113 \214\354\355\122\140\262\244\006\352\116\353\364\153\031\375\353 \365\032\340\045\052\232\334\307\101\066\367\310\164\005\204\071  $\verb|\| 225 | 071 | 326 | 013 | 073 | 244 | 047 | 372 | 010 | 330 | 134 | 036 | 370 | 004 | 140 | 122 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 | 126 |$  $\label{eq:condition} $$ \021\050\003\377\357\123\146\000\245\112\064\026\146\174\375 $$$ \011\244\256\236\147\032\157\101\013\153\006\023\233\217\206\161  $\label{eq:condition} $$ \05^264\057\215\211\146\063\051\166\124\232\021\370\047\372\262 $$$ \077\221\340\316\015\033\363\060\032\255\277\042\135\033\323\277 \045\005\115\341\222\032\177\231\237\074\104\223\312\324\100\111 \154\200\207\327\004\072\303\062\122\065\016\126\370\245\335\175  $\label{eq:condition} $$ 304\213\015\021\037\123\313\036\262\027\266\150\167\132\340\324$ \313\310\007\256\365\072\056\216\067\267\320\001\113\103\051\167  $\label{eq:condition} $$ \frac{214 \cdot 071 \cdot 227 \cdot 217 \cdot 202 \cdot 132 \cdot 370 \cdot 121 \cdot 345 \cdot 211 \cdot 240 \cdot 030 \cdot 347 \cdot 150 \cdot 177 \cdot 135}{211 \cdot 240 \cdot 030 \cdot 347 \cdot 150 \cdot 177 \cdot 135} $$$ \012\056\373\243\107\016\075\246\043\172\306\001\307\217\310\136 \277\155\200\126\276\212\044\272\063\352\237\341\062\021\236\361 \322\117\200\366\033\100\257\070\236\021\120\171\163\022\022\315 \346\154\235\054\210\162\074\060\201\006\221\042\352\131\255\332  $\label{eq:condition} $$ \031\056\042\302\215\271\214\207\340\146\274\163\043\137\041\144 $$$  $\label{eq:condition} $$ 143\200\110\365\240\074\030\075\224\310\110\101\035\100\272\136 $$$ \376\376\126\071\241\310\317\136\236\031\144\106\020\332\027\221 \267\005\200\254\213\231\222\175\347\242\330\007\013\066\047\347 \110\171\140\212\303\327\023\134\370\162\100\337\112\313\317\231 \000\012\000\013\021\225\332\126\105\003\210\012\237\147\320\325 \171\261\250\215\100\155\015\302\172\100\372\363\137\144\107\222 \313\123\271\273\131\316\117\375\320\025\123\001\330\337\353\331 \346\166\357\320\043\273\073\251\171\263\325\002\051\315\211\243 \226\017\112\065\347\116\102\300\165\315\007\317\346\054\353\173 \056

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "CFCA EV ROOT"
```

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

<sup>#</sup> Issuer: CN=CFCA EV ROOT,O=China Financial Certification Authority,C=CN

<sup>#</sup> Serial Number: 407555286 (0x184accd6)

<sup>#</sup> Subject: CN=CFCA EV ROOT,O=China Financial Certification Authority,C=CN

<sup>#</sup> Not Valid Before: Wed Aug 08 03:07:01 2012

<sup>#</sup> Not Valid After: Mon Dec 31 03:07:01 2029

<sup>#</sup> Fingerprint (SHA-256):

<sup>5</sup>C:C3:D7:8E:4E:1D:5E:45:54:7A:04:E6:87:3E:64:F9:0C:F9:53:6D:1C:CC:2E:F8:00:F3:55:C4:C5:FD:70:FD

<sup>#</sup> Fingerprint (SHA1): E2:B8:29:4B:55:84:AB:6B:58:C2:90:46:6C:AC:3F:B8:39:8F:84:83

```
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "CFCA EV ROOT"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\label{eq:condition} $$ 342\270\051\113\125\204\253\153\130\302\220\106\154\254\077\270 $$
\071\217\204\203
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\164\341\266\355\046\172\172\104\060\063\224\253\173\047\201\060
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\126\061\013\060\011\006\003\125\004\006\023\002\103\116\061 $$
\060\060\056\006\003\125\004\012\014\047\103\150\151\156\141\040
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171\061\025\060\023\006\003\125\004\003\014\014\103\106\103\101
\040\105\126\040\122\117\117\124
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\004\030\112\314\326
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "OISTE WISeKey Global Root GB CA"
# Issuer: CN=OISTE WISeKey Global Root GB CA,OU=OISTE Foundation Endorsed,O=WISeKey,C=CH
# Serial Number:76:b1:20:52:74:f0:85:87:46:b3:f8:23:1a:f6:c2:c0
# Subject: CN=OISTE WISeKey Global Root GB CA,OU=OISTE Foundation Endorsed,O=WISeKey,C=CH
# Not Valid Before: Mon Dec 01 15:00:32 2014
# Not Valid After: Thu Dec 01 15:10:31 2039
# Fingerprint (SHA-256):
6B:9C:08:E8:6E:B0:F7:67:CF:AD:65:CD:98:B6:21:49:E5:49:4A:67:F5:84:5E:7B:D1:ED:01:9F:27:B8:6B:D6
# Fingerprint (SHA1): 0F:F9:40:76:18:D3:D7:6A:4B:98:F0:A8:35:9E:0C:FD:27:AC:CC:ED
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "OISTE WISeKey Global Root GB CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\label{eq:condition} $$ \060\155\061\013\060\011\006\003\125\004\006\023\002\103\110\061
\020\060\016\006\003\125\004\012\023\007\127\111\123\145\113\145
\171\061\042\060\040\006\003\125\004\013\023\031\117\111\123\124
\105\040\106\157\165\156\144\141\164\151\157\156\040\105\156\144
```

\157\162\163\145\144\061\050\060\046\006\003\125\004\003\023\037 \117\111\123\124\105\040\127\111\123\145\113\145\171\040\107\154 \157\142\141\154\040\122\157\157\164\040\107\102\040\103\101 END

CKA ID UTF8 "0"

### CKA\_ISSUER MULTILINE\_OCTAL

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\166\261\040\122\164\360\205\207\106\263\370\043\032\366 \302\300

**END** 

### CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \060\202\003\265\060\202\002\235\240\003\002\001\002\002\002\166$$ \261\040\122\164\360\205\207\106\263\370\043\032\366\302\300\060 \015\006\011\052\206\110\206\367\015\001\001\013\005\000\060\155  $\label{eq:condition} $$ \061\013\060\011\006\003\125\004\006\023\002\103\110\061\020\060 $$$ \016\006\003\125\004\012\023\007\127\111\123\145\113\145\171\061 \042\060\040\006\003\125\004\013\023\031\117\111\123\124\105\040 \106\157\165\156\144\141\164\151\157\156\040\105\156\144\157\162 \163\145\144\061\050\060\046\006\003\125\004\003\023\037\117\111 \123\124\105\040\127\111\123\145\113\145\171\040\107\154\157\142 \141\154\040\122\157\157\164\040\107\102\040\103\101\060\036\027 \015\061\064\061\062\060\061\061\065\060\060\063\062\132\027\015 \013\060\011\006\003\125\004\006\023\002\103\110\061\020\060\016 \006\003\125\004\012\023\007\127\111\123\145\113\145\171\061\042 \060\040\006\003\125\004\013\023\031\117\111\123\124\105\040\106 \157\165\156\144\141\164\151\157\156\040\105\156\144\157\162\163 \145\144\061\050\060\046\006\003\125\004\003\023\037\117\111\123 \124\105\040\127\111\123\145\113\145\171\040\107\154\157\142\141  $\label{eq:condition} $$ \frac{154}040\\122\\157\\157\\164\\040\\107\\102\\040\\103\\101\\060\\202\\001\\042$  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\001\005\000\003$ \202\001\017\000\060\202\001\012\002\202\001\001\000\330\027\267 \034\112\044\052\326\227\261\312\342\036\373\175\070\357\230\365 \262\071\230\116\047\270\021\135\173\322\045\224\210\202\025\046 \152\033\061\273\250\133\041\041\053\330\017\116\237\132\361\261 \132\344\171\326\062\043\053\341\123\314\231\105\134\173\117\255 \274\277\207\112\013\113\227\132\250\366\110\354\175\173\015\315 \041\006\337\236\025\375\101\212\110\267\040\364\241\172\033\127 \324\135\120\377\272\147\330\043\231\037\310\077\343\336\377\157 \133\167\261\153\156\270\311\144\367\341\312\101\106\016\051\161

\320\271\043\374\311\201\137\116\367\157\337\277\204\255\163\144 \273\267\102\216\151\366\324\166\035\176\235\247\270\127\212\121  $\label{eq:condition} $$ \050\102\167\077\235\043\033\262\266\075\200\024\007\114\056\117 $$$  $\label{eq:condition} $$ 367\325\012\026\015\275\146\103\067\176\043\103\171\303\100\206$ \365\114\051\332\216\232\255\015\245\004\207\210\036\205\343\351 \123\325\233\310\213\003\143\170\353\340\031\112\156\273\057\153  $\label{eq:condition} $$ \063\144\130\223\255\151\277\217\033\357\202\110\307\002\003\001 $$$ \000\001\243\121\060\117\060\013\006\003\125\035\017\004\004\003 \002\001\206\060\017\006\003\125\035\023\001\001\377\004\005\060  $\label{eq:condition} $$ \003\001\001\377\060\035\006\003\125\035\016\004\026\004\024\065$$  $\label{eq:condition} $$ \017\310\066\143\136\342\243\354\371\073\146\025\316\121\122\343$ \221\232\075\060\020\006\011\053\006\001\004\001\202\067\025\001  $\label{eq:condition} $$ \004\003\002\001\000\060\015\006\011\052\206\110\206\367\015\001$  $\label{eq:condition} $$ \001\013\005\000\003\202\001\000\100\100\114\373\207\262\231\201\$ \220\176\235\305\260\260\046\315\210\173\053\062\215\156\270\041 \161\130\227\175\256\067\024\257\076\347\367\232\342\175\366\161 \230\231\004\252\103\164\170\243\343\111\141\076\163\214\115\224 \340\371\161\304\266\026\016\123\170\037\326\242\207\057\002\071 \201\051\074\257\025\230\041\060\376\050\220\000\214\321\341\313 \372\136\310\375\370\020\106\073\242\170\102\221\027\164\125\012 \336\120\147\115\146\321\247\377\375\331\300\265\250\243\212\316  $\\ 146 \\ 365 \\ 017 \\ 103 \\ 315 \\ 247 \\ 053 \\ 127 \\ 173 \\ 143 \\ 106 \\ 152 \\ 252 \\ 056 \\ 122 \\ 330 \\$ \364\355\341\155\255\051\220\170\110\272\341\043\252\243\211\354 \265\253\226\300\264\113\242\035\227\236\172\362\156\100\161\337 \150\361\145\115\316\174\005\337\123\145\251\245\360\261\227\004 \160\025\106\003\230\324\322\277\124\264\240\130\175\122\157\332 \126\046\142\324\330\333\211\061\157\034\360\042\302\323\142\034 \065\315\114\151\025\124\032\220\230\336\353\036\137\312\167\307 \313\216\075\103\151\234\232\130\320\044\073\337\033\100\226\176 \065\255\201\307\116\161\272\210\023

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "OISTE WISeKey Global Root GB CA"
```

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

<sup>#</sup> Issuer: CN=OISTE WISeKey Global Root GB CA,OU=OISTE Foundation Endorsed,O=WISeKey,C=CH

<sup>#</sup> Serial Number:76:b1:20:52:74:f0:85:87:46:b3:f8:23:1a:f6:c2:c0

 $<sup>{\</sup>tt\#\,Subject:\,CN=OISTE\,\,WISeKey\,\,Global\,\,Root\,\,GB\,\,CA,OU=OISTE\,\,Foundation\,\,Endorsed,O=WISeKey,C=CHMOISTE\,\,GOMMON \,\,CMMON \,\,C$ 

<sup>#</sup> Not Valid Before: Mon Dec 01 15:00:32 2014

<sup>#</sup> Not Valid After : Thu Dec 01 15:10:31 2039

<sup>#</sup> Fingerprint (SHA-256):

<sup>6</sup>B:9C:08:E8:6E:B0:F7:67:CF:AD:65:CD:98:B6:21:49:E5:49:4A:67:F5:84:5E:7B:D1:ED:01:9F:27:B8:6B:D6

<sup>#</sup> Fingerprint (SHA1): 0F:F9:40:76:18:D3:D7:6A:4B:98:F0:A8:35:9E:0C:FD:27:AC:CC:ED

```
CKA LABEL UTF8 "OISTE WISeKey Global Root GB CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\017\371\100\166\030\323\327\152\113\230\360\250\065\236\014\375
\047\254\314\355
END
CKA CERT MD5 HASH MULTILINE OCTAL
\label{eq:condition} $\244\353\271\141\050\056\267\057\230\260\065\046\220\231\121\035$
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\155\061\013\060\011\006\003\125\004\006\023\002\103\110\061
\label{eq:condition} $$ \020\060\016\006\003\125\004\012\023\007\127\111\123\145\113\145$
\171\061\042\060\040\006\003\125\004\013\023\031\117\111\123\124
\label{eq:condition} $$ 105\040\106\157\165\156\144\141\164\151\157\156\040\105\156\144$
\157\162\163\145\144\061\050\060\046\006\003\125\004\003\023\037
\label{eq:local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_local_
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \002\020\166\261\040\122\164\360\205\207\106\263\370\043\032\366$
\302\300
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "SZAFIR ROOT CA2"
# Issuer: CN=SZAFIR ROOT CA2,O=Krajowa Izba Rozliczeniowa S.A.,C=PL
# Serial Number:3e:8a:5d:07:ec:55:d2:32:d5:b7:e3:b6:5f:01:eb:2d:dc:e4:d6:e4
# Subject: CN=SZAFIR ROOT CA2,O=Krajowa Izba Rozliczeniowa S.A.,C=PL
# Not Valid Before: Mon Oct 19 07:43:30 2015
# Not Valid After: Fri Oct 19 07:43:30 2035
# Fingerprint (SHA-256):
A1;33:9D:33;28:1A:0B:56:E5:57:D3:D3:2B:1C:E7:F9:36:7E:B0:94:BD:5F:A7:2A:7E:50:04:C8:DE:D7:CA:FE
# Fingerprint (SHA1): E2:52:FA:95:3F:ED:DB:24:60:BD:6E:28:F3:9C:CC:CF:5E:B3:3F:DE
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "SZAFIR ROOT CA2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\121\061\013\060\011\006\003\125\004\006\023\002\120\114\061
\050\060\046\006\003\125\004\012\014\037\113\162\141\152\157\167
\141\040\111\172\142\141\040\122\157\172\154\151\143\172\145\156
```

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

\151\157\167\141\040\123\056\101\056\061\030\060\026\006\003\125 \004\003\014\017\123\132\101\106\111\122\040\122\117\117\124\040 \103\101\062

**END** 

CKA ID UTF8 "0"

### CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\121\061\013\060\011\006\003\125\004\006\023\002\120\114\061 $$ \050\060\046\006\003\125\004\012\014\037\113\162\141\152\157\167 $$ $$ \141\040\122\157\172\154\151\143\172\145\156 $$ \151\157\167\141\040\123\056\101\056\061\030\060\026\006\003\125 $$ \004\003\014\017\123\132\101\106\111\122\040\122\117\117\124\040 $$ \103\101\062$$ 

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\024\076\212\135\007\354\125\322\062\325\267\343\266\137\001 \353\055\334\344\326\344

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

\060\202\003\162\060\202\002\132\240\003\002\001\002\002\002\004\076 \212\135\007\354\125\322\062\325\267\343\266\137\001\353\055\334 \344\326\344\060\015\006\011\052\206\110\206\367\015\001\001\013 \005\000\060\121\061\013\060\011\006\003\125\004\006\023\002\120  $\label{eq:condition} $$ \frac{114 \cdot 061 \cdot 050 \cdot 060 \cdot 046 \cdot 006 \cdot 003 \cdot 125 \cdot 004 \cdot 012 \cdot 014 \cdot 037 \cdot 113 \cdot 162 \cdot 141 \cdot 152}{141 \cdot 152 \cdot 141 \cdot 152} $$$ \157\167\141\040\111\172\142\141\040\122\157\172\154\151\143\172  $\label{eq:condition} $$ 145\156\151\157\167\141\040\123\056\101\056\061\030\060\026\006$ \003\125\004\003\014\017\123\132\101\106\111\122\040\122\117\117 \124\040\103\101\062\060\036\027\015\061\065\061\060\061\071\060 \067\064\063\063\060\132\027\015\063\065\061\060\061\071\060\067 \064\063\063\060\132\060\121\061\013\060\011\006\003\125\004\006 \023\002\120\114\061\050\060\046\006\003\125\004\012\014\037\113  $\label{eq:local_$ \151\143\172\145\156\151\157\167\141\040\123\056\101\056\061\030 \060\026\006\003\125\004\003\014\017\123\132\101\106\111\122\040 \122\117\117\124\040\103\101\062\060\202\001\042\060\015\006\011 \052\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000 \060\202\001\012\002\202\001\001\000\267\274\076\120\250\113\315 \100\265\316\141\347\226\312\264\241\332\014\042\260\372\265\173  $\label{eq:condition} $$ 166\000\167\214\013\317\175\250\206\314\046\121\344\040\075\205$ \014\326\130\343\347\364\052\030\235\332\321\256\046\356\353\123 \334\364\220\326\023\112\014\220\074\303\364\332\322\216\015\222 \072\334\261\261\377\070\336\303\272\055\137\200\271\002\275\112 \235\033\017\264\303\302\301\147\003\335\334\033\234\075\263\260 \336\000\036\250\064\107\273\232\353\376\013\024\275\066\204\332 \015\040\277\372\133\313\251\026\040\255\071\140\356\057\165\266 \347\227\234\371\076\375\176\115\157\115\057\357\210\015\152\372 \335\361\075\156\040\245\240\022\264\115\160\271\316\327\162\073 \211\223\247\200\204\034\047\111\162\111\265\377\073\225\236\301 \314\310\001\354\350\016\212\012\226\347\263\246\207\345\326\371

\005\053\015\227\100\160\074\272\254\165\132\234\325\115\235\002 \012\322\113\233\146\113\106\007\027\145\255\237\154\210\000\334 \042\211\340\341\144\324\147\274\061\171\141\074\273\312\101\315 \134\152\000\310\074\070\216\130\257\002\003\001\000\001\243\102 \060\100\060\017\006\003\125\035\023\001\001\377\004\005\060\003  $\label{eq:condition} $$ \001\001\377\060\016\006\003\125\035\017\001\001\377\004\004\003$ \002\001\006\060\035\006\003\125\035\016\004\026\004\024\056\026 \251\112\030\265\313\314\365\157\120\363\043\137\370\135\347\254 \360\310\060\015\006\011\052\206\110\206\367\015\001\001\013\005 \000\003\202\001\001\000\265\163\370\003\334\131\133\035\166\351 \243\052\173\220\050\262\115\300\063\117\252\232\261\324\270\344  $\\ \langle 047 \rangle 377 \rangle 251 \rangle 226 \rangle 231 \rangle 316 \rangle 106 \rangle 340 \rangle 155 \rangle 174 \rangle 114 \rangle 242 \rangle 070 \rangle 244 \rangle 006 \rangle 160$ \360\364\101\021\354\077\107\215\077\162\207\371\073\375\244\157  $\label{eq:condition} $$ \053\123\000\340\377\071\271\152\007\016\353\035\034\366\242\162$ \220\313\202\075\021\202\213\322\273\237\052\257\041\346\143\206 \235\171\031\357\367\273\014\065\220\303\212\355\117\017\365\314  $\label{eq:condition} $$ \022\331\244\076\273\240\374\040\225\137\117\046\057\021\043\203$ \116\165\007\017\277\233\321\264\035\351\020\004\376\312\140\217 \242\114\270\255\317\341\220\017\315\256\012\307\135\173\267\120 \322\324\141\372\325\025\333\327\237\207\121\124\353\245\343\353 \311\205\240\045\040\067\373\216\316\014\064\204\341\074\201\262 \167\116\103\245\210\137\206\147\241\075\346\264\134\141\266\076 \333\376\267\050\305\242\007\256\265\312\312\215\052\022\357\227 \355\302\060\244\311\052\172\373\363\115\043\033\231\063\064\240 \056\365\251\013\077\324\135\341\317\204\237\342\031\302\137\212 \326\040\036\343\163\267

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "SZAFIR ROOT CA2"
- # Issuer: CN=SZAFIR ROOT CA2,O=Krajowa Izba Rozliczeniowa S.A.,C=PL
- # Serial Number:3e:8a:5d:07:ec:55:d2:32:d5:b7:e3:b6:5f:01:eb:2d:dc:e4:d6:e4
- # Subject: CN=SZAFIR ROOT CA2,O=Krajowa Izba Rozliczeniowa S.A.,C=PL
- # Not Valid Before: Mon Oct 19 07:43:30 2015
- # Not Valid After: Fri Oct 19 07:43:30 2035
- # Fingerprint (SHA-256):

A1:33:9D:33:28:1A:0B:56:E5:57:D3:D3:2B:1C:E7:F9:36:7E:B0:94:BD:5F:A7:2A:7E:50:04:C8:DE:D7:CA:FE

# Fingerprint (SHA1): E2:52:FA:95:3F:ED:DB:24:60:BD:6E:28:F3:9C:CC:CF:5E:B3:3F:DE

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "SZAFIR ROOT CA2"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \frac{342\122\372\225\077\355\333\044\140\275\156\050\363\234\314\317}{342\122\372\225\077\355\333\044\140\275\156\050\363\234\314\317}$ 

\136\263\077\336

```
END
CKA CERT MD5 HASH MULTILINE OCTAL
\021\144\301\211\260\044\261\214\261\007\176\211\236\121\236\231
END
CKA ISSUER MULTILINE OCTAL
\060\121\061\013\060\011\006\003\125\004\006\023\002\120\114\061
\050\060\046\006\003\125\004\012\014\037\113\162\141\152\157\167
 \\ 141 \\ 040 \\ 111 \\ 172 \\ 142 \\ 141 \\ 040 \\ 122 \\ 157 \\ 172 \\ 154 \\ 151 \\ 143 \\ 172 \\ 145 \\ 156 
\151\157\167\141\040\123\056\101\056\061\030\060\026\006\003\125
\004\003\014\017\123\132\101\106\111\122\040\122\117\117\124\040
\103\101\062
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\024\076\212\135\007\354\125\322\062\325\267\343\266\137\001
\353\055\334\344\326\344
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Certum Trusted Network CA 2"
# Issuer: CN=Certum Trusted Network CA 2,OU=Certum Certification Authority,O=Unizeto Technologies
S.A..C=PL
# Serial Number:21:d6:d0:4a:4f:25:0f:c9:32:37:fc:aa:5e:12:8d:e9
# Subject: CN=Certum Trusted Network CA 2,OU=Certum Certification Authority,O=Unizeto Technologies
S.A..C=PL
# Not Valid Before: Thu Oct 06 08:39:56 2011
# Not Valid After: Sat Oct 06 08:39:56 2046
# Fingerprint (SHA-256):
B6:76:F2:ED:DA:E8:77:5C:D3:6C:B0:F6:3C:D1:D4:60:39:61:F4:9E:62:65:BA:01:3A:2F:03:07:B6:D0:B8:04
# Fingerprint (SHA1): D3:DD:48:3E:2B:BF:4C:05:E8:AF:10:F5:FA:76:26:CF:D3:DC:30:92
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Certum Trusted Network CA 2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
```

\060\201\200\061\013\060\011\006\003\125\004\006\023\002\120\114 \061\042\060\040\006\003\125\004\012\023\031\125\156\151\172\145 \164\157\040\124\145\143\150\156\157\154\157\147\151\145\163\040

\042\006\003\125\004\003\023\033\103\145\162\164\165\155\040\124

\162\165\163\164\145\144\040\116\145\164\167\157\162\153\040\103 \101\040\062

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\201\200\061\013\060\011\006\003\125\004\006\0023\002\120\114 $$ \061\042\060\040\006\003\125\004\012\023\031\125\156\151\172\145 $$ \164\157\040\124\145\143\150\156\157\154\157\147\151\145\163\040 $$ \123\056\101\056\061\047\060\045\006\003\125\004\013\023\036\103 $$ \145\162\164\155\144\151\146\151\143\141\164 $$ \151\157\156\040\101\165\164\157\162\151\164\171\061\044\060 $$ \042\006\003\125\004\003\023\033\103\145\162\164\165\155\040\124 $$ \162\165\163\164\145\144\040\116\145\164\167\157\162\153\040\103 $$ \101\040\062 $$$ 

**END** 

### CKA SERIAL NUMBER MULTILINE OCTAL

\002\020\041\326\320\112\117\045\017\311\062\067\374\252\136\022 \215\351

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\322\060\202\003\272\240\003\002\001\002\002\020\041 \326\320\112\117\045\017\311\062\067\374\252\136\022\215\351\060  $\label{eq:condition} $$ \015\006\011\052\206\110\206\367\015\001\001\015\005\000\060\201 $$$ \200\061\013\060\011\006\003\125\004\006\023\002\120\114\061\042 \060\040\006\003\125\004\012\023\031\125\156\151\172\145\164\157 \040\124\145\143\150\156\157\154\157\147\151\145\163\040\123\056 \101\056\061\047\060\045\006\003\125\004\013\023\036\103\145\162 \164\165\155\040\103\145\162\164\151\146\151\143\141\164\151\157 \156\040\101\165\164\150\157\162\151\164\171\061\044\060\042\006 \003\125\004\003\023\033\103\145\162\164\165\155\040\124\162\165 \062\060\042\030\017\062\060\061\061\061\060\060\066\060\070\063 \071\065\066\132\030\017\062\060\064\066\061\060\060\066\060\070 \063\071\065\066\132\060\201\200\061\013\060\011\006\003\125\004 \006\023\002\120\114\061\042\060\040\006\003\125\004\012\023\031 \125\156\151\172\145\164\157\040\124\145\143\150\156\157\154\157 \147\151\145\163\040\123\056\101\056\061\047\060\045\006\003\125 \004\013\023\036\103\145\162\164\165\155\040\103\145\162\164\151 \164\171\061\044\060\042\006\003\125\004\003\023\033\103\145\162 \164\165\155\040\124\162\165\163\164\145\144\040\116\145\164\167 \157\162\153\040\103\101\040\062\060\202\002\042\060\015\006\011 \052\206\110\206\367\015\001\001\001\005\000\003\202\002\017\000 \060\202\002\012\002\202\002\001\000\275\371\170\370\346\325\200 \014\144\235\206\033\226\144\147\077\042\072\036\165\001\175\357 \373\134\147\214\311\314\134\153\251\221\346\271\102\345\040\113 \233\332\233\173\271\231\135\331\233\200\113\327\204\100\053\047 \323\350\272\060\273\076\011\032\247\111\225\357\053\100\044\302

\227\307\247\356\233\045\357\250\012\000\227\205\132\252\235\334 \051\311\342\065\007\353\160\115\112\326\301\263\126\270\241\101 \070\233\321\373\061\177\217\340\137\341\261\077\017\216\026\111 \140\327\006\215\030\371\252\046\020\253\052\323\320\321\147\215 \033\106\276\107\060\325\056\162\321\305\143\332\347\143\171\104 \176\113\143\044\211\206\056\064\077\051\114\122\213\052\247\300 \342\221\050\211\271\300\133\371\035\331\347\047\255\377\232\002 \227\301\306\120\222\233\002\054\275\251\271\064\131\012\277\204  $\label{eq:condition} $$ \frac{377}{337}\frac{36}{263}\frac{337}{353}\frac{331}{236}\frac{340}{230}\frac{354}{246}\frac{153}{167} $$$ \026\052\333\314\255\073\034\244\207\334\106\163\136\031\142\150 \105\127\344\220\202\102\273\102\326\360\141\340\301\243\075\146 \243\135\364\030\356\210\311\215\027\105\051\231\062\165\002\061 \356\051\046\310\153\002\346\265\142\105\177\067\025\132\043\150 \211\324\076\336\116\047\260\360\100\014\274\115\027\313\115\242 \263\036\320\006\132\335\366\223\317\127\165\231\365\372\206\032 \147\170\263\277\226\376\064\334\275\347\122\126\345\263\345\165 \173\327\101\221\005\334\135\151\343\225\015\103\271\374\203\226 \071\225\173\154\200\132\117\023\162\306\327\175\051\172\104\272 \122\244\052\325\101\106\011\040\376\042\240\266\133\060\215\274 \211\014\325\327\160\370\207\122\375\332\357\254\121\056\007\263 \116\376\320\011\332\160\357\230\372\126\346\155\333\265\127\113 \334\345\054\045\025\310\236\056\170\116\370\332\234\236\206\054  $\label{eq:condition} $$ \frac{312}127\363\032\345\310\222\213\032\202\226\172\303\274\120\022}$ \151\330\016\132\106\213\072\353\046\372\043\311\266\260\201\276 \102\000\244\370\326\376\060\056\307\322\106\366\345\216\165\375 \362\314\271\320\207\133\314\006\020\140\273\203\065\267\136\147 \336\107\354\231\110\361\244\241\025\376\255\214\142\216\071\125  $\label{eq:condition} $$ \frac{117}071\\026\\271\\261\\143\\235\\377\\267\\002\\003\\001\\000\\001\\243\\102$ \060\100\060\017\006\003\125\035\023\001\001\377\004\005\060\003 \001\001\377\060\035\006\003\125\035\016\004\026\004\024\266\241  $\label{eq:condition} $$ 124\071\002\303\240\077\216\212\274\372\324\370\034\246\321\072$ \016\375\060\016\006\003\125\035\017\001\001\377\004\004\003\002 \001\006\060\015\006\011\052\206\110\206\367\015\001\001\015\005  $\label{eq:condition} $$ \000\003\202\002\001\000\161\245\016\316\344\351\277\077\070\325 $$$ \211\132\304\002\141\373\114\305\024\027\055\213\117\123\153\020 \027\374\145\204\307\020\111\220\336\333\307\046\223\210\046\157 \160\326\002\136\071\240\367\217\253\226\265\245\023\134\201\024 \155\016\201\202\021\033\212\116\306\117\245\335\142\036\104\337  $\label{eq:condition} $$ \011\131\364\133\167\013\067\351\213\040\306\370\012\116\056\130 $$$ \034\353\063\320\317\206\140\311\332\373\200\057\236\114\140\204 \170\075\041\144\326\373\101\037\030\017\347\311\165\161\275\275  $\label{eq:condition} $$ 134\336\064\207\076\101\260\016\366\271\326\077\011\023\226\024$$  $\begin{tabular}{l} $$ \057\336\232\035\132\271\126\316\065\072\260\137\160\115\136\343 \end{tabular}$ \051\361\043\050\162\131\266\253\302\214\146\046\034\167\054\046 \166\065\213\050\247\151\240\371\073\365\043\335\205\020\164\311 \220\003\126\221\347\257\272\107\324\022\227\021\042\343\242\111 \224\154\347\267\224\113\272\055\244\332\063\213\114\246\104\377 \132\074\306\035\144\330\265\061\344\246\074\172\250\127\013\333

\355\141\032\313\361\316\163\167\143\244\207\157\114\121\070\326 \344\137\307\237\266\201\052\344\205\110\171\130\136\073\370\333 \002\202\147\301\071\333\303\164\113\075\066\036\371\051\223\210 \150\133\250\104\031\041\360\247\350\201\015\054\350\223\066\264  $\label{eq:condition} $$ \067\262\312\260\033\046\172\232\045\037\232\232\232\200\236\113\052$$ \077\373\243\232\376\163\062\161\302\236\306\162\341\212\150\047 \361\344\017\264\304\114\245\141\223\370\227\020\007\052\060\045 \251\271\310\161\270\357\150\314\055\176\365\340\176\017\202\250 \157\266\272\154\203\103\167\315\212\222\027\241\236\133\170\026 \075\105\342\063\162\335\341\146\312\231\323\311\305\046\375\015 \150\004\106\256\266\331\233\214\276\031\276\261\306\362\031\343 \134\002\312\054\330\157\112\007\331\311\065\332\100\165\362\304 \247\031\157\236\102\020\230\165\346\225\213\140\274\355\305\022 \327\212\316\325\230\134\126\226\003\305\356\167\006\065\377\317 \344\356\077\023\141\356\333\332\055\205\360\315\256\235\262\030  $\label{eq:condition} $$ \11105\303\222\241\162\027\374\107\266\240\013\054\361\304\336$ \103\150\010\152\137\073\360\166\143\373\314\006\054\246\306\342 \016\265\271\276\044\217

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Certum Trusted Network CA 2"
- # Issuer: CN=Certum Trusted Network CA 2,OU=Certum Certification Authority,O=Unizeto Technologies S.A..C=PL
- # Serial Number:21:d6:d0:4a:4f:25:0f:c9:32:37:fc:aa:5e:12:8d:e9
- # Subject: CN=Certum Trusted Network CA 2,OU=Certum Certification Authority,O=Unizeto Technologies S.A.,C=PL
- # Not Valid Before: Thu Oct 06 08:39:56 2011
- # Not Valid After: Sat Oct 06 08:39:56 2046
- # Fingerprint (SHA-256):

B6:76:F2:ED:DA:E8:77:5C:D3:6C:B0:F6:3C:D1:D4:60:39:61:F4:9E:62:65:BA:01:3A:2F:03:07:B6:D0:B8:04

# Fingerprint (SHA1): D3:DD:48:3E:2B:BF:4C:05:E8:AF:10:F5:FA:76:26:CF:D3:DC:30:92

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Certum Trusted Network CA 2"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\323\335\110\076\053\277\114\005\350\257\020\365\372\166\046\317

323 334 060 222

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\155\106\236\331\045\155\010\043\133\136\164\175\036\047\333\362

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\201\200\061\013\060\011\006\003\125\004\006\023\002\120\114

\061\042\060\040\006\003\125\004\012\023\031\125\156\151\172\145  $\label{eq:condition} $$ 164\157\040\124\145\143\150\156\157\154\157\147\151\145\163\040$$ \123\056\101\056\061\047\060\045\006\003\125\004\013\023\036\103 \145\162\164\165\155\040\103\145\162\164\151\146\151\143\141\164  $\label{eq:condition} $$ \frac{151}{157}\frac{6}{040}\frac{101}{165}\frac{164}{150}\frac{157}{162}\frac{151}{164}\frac{171}{061}\frac{044}{060} $$$ \042\006\003\125\004\003\023\033\103\145\162\164\165\155\040\124 \162\165\163\164\145\144\040\116\145\164\167\157\162\153\040\103 \101\040\062 **END** CKA SERIAL NUMBER MULTILINE OCTAL  $\label{eq:condition} $$ \002\020\041\326\320\112\117\045\017\311\062\067\374\252\136\022$$ \215\351 **END** CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE # Certificate "Hellenic Academic and Research Institutions RootCA 2015" # Issuer: CN=Hellenic Academic and Research Institutions RootCA 2015,O=Hellenic Academic and Research Institutions Cert. Authority, L=Athens, C=GR # Serial Number: 0 (0x0) # Subject: CN=Hellenic Academic and Research Institutions RootCA 2015,O=Hellenic Academic and Research Institutions Cert. Authority, L=Athens, C=GR # Not Valid Before: Tue Jul 07 10:11:21 2015 # Not Valid After: Sat Jun 30 10:11:21 2040 # Fingerprint (SHA-256): A0:40:92:9A:02:CE:53:B4:AC:F4:F2:FF:C6:98:1C:E4:49:6F:75:5E:6D:45:FE:0B:2A:69:2B:CD:52:52:3F:36 # Fingerprint (SHA1): 01:0C:06:95:A6:98:19:14:FF:BF:5F:C6:B0:B6:95:EA:29:E9:12:A6 CKA CLASS CK OBJECT CLASS CKO CERTIFICATE CKA\_TOKEN CK\_BBOOL CK\_TRUE CKA PRIVATE CK BBOOL CK FALSE CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE CKA\_LABEL UTF8 "Hellenic Academic and Research Institutions RootCA 2015" CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA\_SUBJECT MULTILINE\_OCTAL  $\label{eq:condition} $$ \060\201\246\061\013\060\011\006\003\125\004\006\023\002\107\122 $$$ \061\017\060\015\006\003\125\004\007\023\006\101\164\150\145\156 \163\061\104\060\102\006\003\125\004\012\023\073\110\145\154\154 \145\156\151\143\040\101\143\141\144\145\155\151\143\040\141\156 \144\040\122\145\163\145\141\162\143\150\040\111\156\163\164\151 \164\165\164\151\157\156\163\040\103\145\162\164\056\040\101\165 \164\150\157\162\151\164\171\061\100\060\076\006\003\125\004\003 \023\067\110\145\154\154\145\156\151\143\040\101\143\141\144\145 \155\151\143\040\141\156\144\040\122\145\163\145\141\162\143\150 \040\111\156\163\164\151\164\165\164\151\157\156\163\040\122\157

\157\164\103\101\040\062\060\061\065

**END** 

CKA ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\001\000

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

\060\202\006\013\060\202\003\363\240\003\002\001\002\002\001\000 \060\015\006\011\052\206\110\206\367\015\001\001\013\005\000\060  $\label{eq:condition} $$ \201\246\061\013\060\011\006\003\125\004\006\023\002\107\122\061 $$$ \017\060\015\006\003\125\004\007\023\006\101\164\150\145\156\163 \061\104\060\102\006\003\125\004\012\023\073\110\145\154\154\145 \156\151\143\040\101\143\141\144\145\155\151\143\040\141\156\144 \040\122\145\163\145\141\162\143\150\040\111\156\163\164\151\164 \150\157\162\151\164\171\061\100\060\076\006\003\125\004\003\023 \067\110\145\154\154\145\156\151\143\040\101\143\141\144\145\155  $\label{eq:condition} $$ \frac{151}143\\040\\141\\156\\144\\040\\122\\145\\163\\145\\141\\162\\143\\150\\040$ \111\156\163\164\151\164\165\164\151\157\156\163\040\122\157\157 \164\103\101\040\062\060\061\065\060\036\027\015\061\065\060\067 \060\067\061\060\061\061\062\061\132\027\015\064\060\060\066\063 \060\061\060\061\061\062\061\132\060\201\246\061\013\060\011\006 \003\125\004\006\023\002\107\122\061\017\060\015\006\003\125\004 \007\023\006\101\164\150\145\156\163\061\104\060\102\006\003\125  $\\ \\004\\012\\023\\073\\110\\145\\154\\154\\154\\145\\156\\151\\143\\040\\101\\143\\141$  $\\ 144\\145\\155\\151\\143\\040\\141\\156\\144\\040\\122\\145\\163\\145\\141\\162$ \143\150\040\111\156\163\164\151\164\165\164\151\157\156\163\040 \103\145\162\164\056\040\101\165\164\150\157\162\151\164\171\061 \151\143\040\101\143\141\144\145\155\151\143\040\141\156\144\040 \122\145\163\145\141\162\143\150\040\111\156\163\164\151\164\165 \164\151\157\156\163\040\122\157\157\164\103\101\040\062\060\061 \065\060\202\002\042\060\015\006\011\052\206\110\206\367\015\001 \001\001\005\000\003\202\002\017\000\060\202\002\012\002\202\002 \001\000\302\370\251\077\033\211\374\074\074\004\135\075\220\066

\260\221\072\171\074\146\132\357\155\071\001\111\032\264\267\317 \177\115\043\123\267\220\000\343\023\052\050\246\061\361\221\000 \343\050\354\256\041\101\316\037\332\375\175\022\133\001\203\017 \271\260\137\231\341\362\022\203\200\115\006\076\337\254\257\347 \241\210\153\061\257\360\213\320\030\063\270\333\105\152\064\364 \002\200\044\050\012\002\025\225\136\166\052\015\231\072\024\133 \366\313\313\123\274\023\115\001\210\067\224\045\033\102\274\042 \330\216\243\226\136\072\331\062\333\076\350\360\020\145\355\164  $\label{eq:condition} $$ 341\057\247\174\257\047\064\273\051\175\233\266\317\011\310\345$$ \323\012\374\210\145\145\164\012\334\163\034\134\315\100\261\034 \324\266\204\214\114\120\317\150\216\250\131\256\302\047\116\202 \242\065\335\024\364\037\377\262\167\325\207\057\252\156\175\044 \047\347\306\313\046\346\345\376\147\007\143\330\105\015\335\072  $\label{eq:condition} $$ \frac{131}145\sqrt{071}130\sqrt{172}222\sqrt{231}162\sqrt{075}234\sqrt{204}136\sqrt{210}\sqrt{41}270\sqrt{325}$ \364\054\374\331\160\122\117\170\270\275\074\053\213\225\230\365 \263\321\150\317\040\024\176\114\134\137\347\213\345\365\065\201  $\label{eq:condition} $$ \031\067\327\021\010\267\146\276\323\112\316\203\127\000\072\303$ \201\370\027\313\222\066\135\321\243\330\165\033\341\213\047\352 \172\110\101\375\105\031\006\255\047\231\116\301\160\107\335\265 \237\201\123\022\345\261\214\110\135\061\103\027\343\214\306\172 \143\226\113\051\060\116\204\116\142\031\136\074\316\227\220\245 \177\001\353\235\340\370\213\211\335\045\230\075\222\266\176\357  $\label{eq:condition} $$ \frac{331}{361}121\frac{175}{055}\frac{310}{151}\frac{131}{141}\frac{340}{254}\frac{152}{270}\frac{052}{152} $$$ \066\021\004\172\120\275\062\204\276\057\334\162\325\327\035\026  $\label{eq:condition} $$ 107\344\107\146\040\077\364\226\305\257\216\001\172\245\017\172$ \144\365\015\030\207\331\256\210\325\372\204\301\072\300\151\050 \055\362\015\150\121\252\343\245\167\306\244\220\016\241\067\213  $\label{eq:condition} $$ \061\043\107\301\011\010\353\156\367\170\233\327\202\374\204\040 $$$ \231\111\031\266\022\106\261\373\105\125\026\251\243\145\254\234 \007\017\352\153\334\037\056\006\162\354\206\210\022\344\055\333  $\label{eq:condition} $$ 137\005\057\344\360\003\323\046\063\347\200\302\315\102\241\027$ \064\013\002\003\001\000\001\243\102\060\100\060\017\006\003\125 \035\023\001\001\377\004\005\060\003\001\001\377\060\016\006\003 \125\035\017\001\001\377\004\004\003\002\001\006\060\035\006\003 \125\035\016\004\026\004\024\161\025\147\310\310\311\275\165\135 \162\320\070\030\152\235\363\161\044\124\013\060\015\006\011\052 \206\110\206\367\015\001\001\013\005\000\003\202\002\001\000\165 \273\155\124\113\252\020\130\106\064\362\142\327\026\066\135\010 \136\325\154\310\207\275\264\056\106\362\061\370\174\352\102\265 \223\026\125\334\241\014\022\240\332\141\176\017\130\130\163\144 \162\307\350\105\216\334\251\362\046\077\306\171\214\261\123\010 \063\201\260\126\023\276\346\121\134\330\233\012\117\113\234\126 \123\002\351\117\366\015\140\352\115\102\125\350\174\033\041\041 \323\033\072\314\167\362\270\220\361\150\307\371\132\376\372\055 \364\277\311\365\105\033\316\070\020\052\067\212\171\243\264\343 \011\154\205\206\223\377\211\226\047\170\201\217\147\343\106\164 \124\216\331\015\151\342\112\364\115\164\003\377\262\167\355\225 \147\227\344\261\305\253\277\152\043\350\324\224\342\104\050\142

\304\113\342\360\330\342\051\153\032\160\176\044\141\223\173\117 \003\062\045\015\105\044\053\226\264\106\152\277\112\013\367\232 \217\301\254\032\305\147\363\157\064\322\372\163\143\214\357\026 \260\250\244\106\052\370\353\022\354\162\264\357\370\053\176\214 \122\300\213\204\124\371\057\076\343\125\250\334\146\261\331\341 \137\330\263\214\131\064\131\244\253\117\154\273\037\030\333\165 \253\330\313\222\315\224\070\141\016\007\006\037\113\106\020\361  $\label{eq:condition} $$ \25\276\215\205\134\073\112\053\201\171\017\264\151\237\111\120 $$$ \227\115\367\016\126\135\300\225\152\302\066\303\033\150\311\365 \052\334\107\232\276\262\316\305\045\350\372\003\271\332\371\026 \156\221\204\365\034\050\310\374\046\314\327\034\220\126\247\137  $\label{eq:condition} $$ \frac{157}072\\004\\274\\315\\170\\211\\013\\216\\017\\057\\243\\252\\117\\242\\033$ \022\075\026\010\100\017\361\106\114\327\252\173\010\301\012\365 \155\047\336\002\217\312\303\265\053\312\351\353\310\041\123\070 \245\314\073\330\167\067\060\242\117\331\157\321\362\100\255\101  $\label{eq:condition} $$ \frac{326}{112}065\frac{112}{67}101\frac{325}{174}206\frac{177}{125}115\frac{303}{172} = \frac{112}{112} = \frac{112$  $\label{eq:condition} $$ \frac{112}245\frac{3000072}{257}220\frac{361}{232}044\frac{216}{331}\frac{161}{312} $$$ \173\270\206\332\262\217\231\076\035\023\015\022\021\356\324\253 \360\351\025\166\002\344\340\337\252\040\036\133\141\205\144\100 \251\220\227\015\255\123\322\132\035\207\152\000\227\145\142\264 \276\157\152\247\365\054\102\355\062\255\266\041\236\276\274 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Hellenic Academic and Research Institutions RootCA 2015"
- # Issuer: CN=Hellenic Academic and Research Institutions RootCA 2015,O=Hellenic Academic and Research Institutions Cert. Authority,L=Athens,C=GR
- # Serial Number: 0 (0x0)
- # Subject: CN=Hellenic Academic and Research Institutions RootCA 2015,O=Hellenic Academic and Research Institutions Cert. Authority,L=Athens,C=GR
- # Not Valid Before: Tue Jul 07 10:11:21 2015
- # Not Valid After: Sat Jun 30 10:11:21 2040
- # Fingerprint (SHA-256):

A0:40:92:9A:02:CE:53:B4:AC:F4:F2:FF:C6:98:1C:E4:49:6F:75:5E:6D:45:FE:0B:2A:69:2B:CD:52:52:3F:36

# Fingerprint (SHA1): 01:0C:06:95:A6:98:19:14:FF:BF:5F:C6:B0:B6:95:EA:29:E9:12:A6

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Hellenic Academic and Research Institutions RootCA 2015"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \001\014\006\225\246\230\031\024\377\277\137\306\260\266\225\352 $$$ 

\051\351\022\246

**END** 

 ${\sf CKA\_CERT\_MD5\_HASH\ MULTILINE\_OCTAL}$ 

\312\377\342\333\003\331\313\113\351\017\255\204\375\173\030\316

```
END
CKA ISSUER MULTILINE OCTAL
\060\201\246\061\013\060\011\006\003\125\004\006\023\002\107\122
\145\156\151\143\040\101\143\141\144\145\155\151\143\040\141\156
\144\040\122\145\163\145\141\162\143\150\040\111\156\163\164\151
\164\150\157\162\151\164\171\061\100\060\076\006\003\125\004\003
\023\067\110\145\154\154\145\156\151\143\040\101\143\141\144\145
\label{eq:condition} $$ \frac{155}{151}\frac{43}{040}\frac{141}{156}\frac{44}{040}\frac{122}{145}\frac{163}{145}\frac{141}{162}\frac{143}{150}$
\\ \langle 040 \rangle 111 \rangle 156 \rangle 163 \rangle 164 \rangle 151 \rangle 164 \rangle 165 \rangle 164 \rangle 151 \rangle 157 \rangle 156 \rangle 163 \rangle 040 \rangle 122 \rangle 157 \rangle 156 \rangle 163 \rangle 164 \rangle 151 \rangle 164 \rangle 165 \rangle 164 \rangle 165 \rangle 164 \rangle 165 \rangle 164 \rangle 165 \rangle 
\157\164\103\101\040\062\060\061\065
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\000
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "Hellenic Academic and Research Institutions ECC RootCA 2015"
# Issuer: CN=Hellenic Academic and Research Institutions ECC RootCA 2015,O=Hellenic Academic and Research
Institutions Cert. Authority, L=Athens, C=GR
# Serial Number: 0 (0x0)
# Subject: CN=Hellenic Academic and Research Institutions ECC RootCA 2015,O=Hellenic Academic and
Research Institutions Cert. Authority, L=Athens, C=GR
# Not Valid Before: Tue Jul 07 10:37:12 2015
# Not Valid After: Sat Jun 30 10:37:12 2040
# Fingerprint (SHA-256):
44:B5:45:AA:8A:25:E6:5A:73:CA:15:DC:27:FC:36:D2:4C:1C:B9:95:3A:06:65:39:B1:15:82:DC:48:7B:48:33
# Fingerprint (SHA1): 9F:F1:71:8D:92:D5:9A:F3:7D:74:97:B4:BC:6F:84:68:0B:BA:B6:66
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Hellenic Academic and Research Institutions ECC RootCA 2015"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\252\061\013\060\011\006\003\125\004\006\023\002\107\122
```

\164\150\157\162\151\164\171\061\104\060\102\006\003\125\004\003\\023\073\110\145\154\154\145\156\151\143\040\101\143\141\144\145\\155\151\143\040\141\156\144\040\122\145\163\145\141\162\143\150\\040\111\156\163\164\151\164\165\164\151\157\156\163\040\105\103\\103\040\122\157\157\156\163\104\0105\103\\103\040\122\157\157\156\163\104\103\101\040\062\060\061\065\

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\201\252\061\013\060\0011\006\003\125\004\007\023\006\101\164\150\145\156\163\061\104\060\102\006\003\125\004\0012\023\073\110\145\154\154\145\156\151\143\040\101\143\141\144\145\155\151\143\040\111\156\163\164\151\157\156\163\040\103\145\162\164\056\040\101\165\164\150\157\162\151\164\171\061\104\060\102\006\003\125\004\003\125\004\003\125\103\103\145\143\140\143\141\144\145\156\151\143\140\141\156\151\143\141\143\141\144\145\156\151\143\143\141\1162\143\150\144\145\156\151\143\145\141\162\143\150\1040\111\156\163\164\151\164\165\164\151\157\156\163\040\105\103\103\040\122\157\157\164\103\101\040\062\060\061\065$ 

**END** 

 ${\tt CKA\_SERIAL\_NUMBER\ MULTILINE\_OCTAL}$ 

\002\001\000

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\202\002\303\060\202\002\112\240\003\002\001\0002\0001\000$ \060\012\006\010\052\206\110\316\075\004\003\002\060\201\252\061 \013\060\011\006\003\125\004\006\023\002\107\122\061\017\060\015  $\label{eq:condition} $$ \006\003\125\004\007\023\006\101\164\150\145\156\163\061\104\060 $$$ \102\006\003\125\004\012\023\073\110\145\154\154\145\156\151\143 \040\101\143\141\144\145\155\151\143\040\141\156\144\040\122\145 \157\156\163\040\103\145\162\164\056\040\101\165\164\150\157\162 \151\164\171\061\104\060\102\006\003\125\004\003\023\073\110\145 \154\154\145\156\151\143\040\101\143\141\144\145\155\151\143\040 \141\156\144\040\122\145\163\145\141\162\143\150\040\111\156\163 \164\151\164\165\164\151\157\156\163\040\105\103\103\040\122\157 \157\164\103\101\040\062\060\061\065\060\036\027\015\061\065\060  $\label{eq:condition} $$ \067\060\067\061\060\063\067\061\062\132\027\015\064\060\066\$  $\label{eq:condition} $$ \063\060\061\060\063\067\061\062\132\060\201\252\061\013\060\011 $$$  $\label{eq:condition} $$ \006\003\125\004\006\023\002\107\122\061\017\060\015\006\003\125\$ \004\007\023\006\101\164\150\145\156\163\061\104\060\102\006\003 \125\004\012\023\073\110\145\154\154\154\156\151\143\040\101\143 \141\144\145\155\151\143\040\141\156\144\040\122\145\163\145\141 \162\143\150\040\111\156\163\164\151\164\165\164\151\157\156\163 \040\103\145\162\164\056\040\101\165\164\150\157\162\151\164\171 \061\104\060\102\006\003\125\004\003\023\073\110\145\154\154\145 \156\151\143\040\101\143\141\144\145\155\151\143\040\141\156\144 \040\122\145\163\145\141\162\143\150\040\111\156\163\164\151\164

\165\164\151\157\156\163\040\105\103\103\040\122\157\157\164\103 \101\040\062\060\061\065\060\166\060\020\006\007\052\206\110\316  $\label{eq:condition} $$ 101\350\113\202\204\134\342\370\061\021\231\206\144\116\011\045$$  $\begin{tabular}{ll} $$ \begin{tabular}{ll} $$ \begin{tabular}{ll}$ \346\077\160\225\360\005\104\107\246\162\070\120\166\225\002\132 \216\256\050\236\371\055\116\231\357\054\110\157\114\045\051\350  $\label{eq:condition} $$ \frac{321}{161}\frac{33}{337}\frac{375}{301}\frac{65}{067}\frac{264}{327}\frac{372}{173}\frac{172}{102}\frac{234}{152} $$$ \012\126\132\174\151\013\252\200\011\044\154\176\301\106\243\102 \060\100\060\017\006\003\125\035\023\001\001\377\004\005\060\003  $\label{eq:condition} $$ \001\001\377\060\016\006\003\125\035\017\001\001\377\004\004\003$  $\label{eq:condition} $$ \000\001\006\003\006\003\125\035\016\004\026\004\024\264\042 $$$ \013\202\231\044\001\016\234\273\344\016\375\277\373\227\040\223 \231\052\060\012\006\010\052\206\110\316\075\004\003\002\003\147  $\label{eq:condition} $$ \000\060\144\002\060\147\316\026\142\070\242\254\142\105\247\251 $$$ \225\044\300\032\047\234\062\073\300\300\325\272\251\347\370\004 \103\123\205\356\122\041\336\235\365\045\203\076\236\130\113\057 \327\147\023\016\041\002\060\005\341\165\001\336\150\355\052\037  $\label{eq:condition} $$ 162\041\027\313\042\101\016\214\023\230\070\232\124\155\233\312$ \342\174\352\002\130\042\221

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Hellenic Academic and Research Institutions ECC RootCA 2015"
- # Issuer: CN=Hellenic Academic and Research Institutions ECC RootCA 2015,O=Hellenic Academic and Research Institutions Cert. Authority,L=Athens,C=GR
- # Serial Number: 0 (0x0)
- # Subject: CN=Hellenic Academic and Research Institutions ECC RootCA 2015,O=Hellenic Academic and Research Institutions Cert. Authority,L=Athens,C=GR
- # Not Valid Before: Tue Jul 07 10:37:12 2015
- # Not Valid After: Sat Jun 30 10:37:12 2040
- # Fingerprint (SHA-256):
- 44:B5:45:AA:8A:25:E6:5A:73:CA:15:DC:27:FC:36:D2:4C:1C:B9:95:3A:06:65:39:B1:15:82:DC:48:7B:48:33
- # Fingerprint (SHA1): 9F:F1:71:8D:92:D5:9A:F3:7D:74:97:B4:BC:6F:84:68:0B:BA:B6:66

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Hellenic Academic and Research Institutions ECC RootCA 2015"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \237\361\161\215\222\325\232\363\175\164\227\264\274\157\204\150$$ 

\013\272\266\146

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\201\345\264\027\353\302\365\341\113\015\101\173\111\222\376\357

```
END
CKA ISSUER MULTILINE OCTAL
\060\201\252\061\013\060\011\006\003\125\004\006\023\002\107\122
\163\061\104\060\102\006\003\125\004\012\023\073\110\145\154\154
\145\156\151\143\040\101\143\141\144\145\155\151\143\040\141\156
\144\040\122\145\163\145\141\162\143\150\040\111\156\163\164\151
\164\150\157\162\151\164\171\061\104\060\102\006\003\125\004\003
\023\073\110\145\154\154\154\145\156\151\143\040\101\143\141\144\145
\label{eq:condition} $$ \frac{155}{151}\frac{43}{040}\frac{141}{156}\frac{44}{040}\frac{122}{145}\frac{163}{145}\frac{141}{162}\frac{143}{150}$
\\ \\ 040\\ \\ 111\\ \\ 156\\ 163\\ \\ 164\\ \\ 151\\ \\ 164\\ \\ 165\\ \\ 164\\ \\ 151\\ \\ 157\\ \\ 156\\ \\ 163\\ \\ 040\\ \\ 105\\ \\ 103\\ \\ 105\\ \\ 103\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ \\ 105\\ 
\103\040\122\157\157\164\103\101\040\062\060\061\065
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\000
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "ISRG Root X1"
# Issuer: CN=ISRG Root X1,O=Internet Security Research Group,C=US
# Serial Number:00:82:10:cf:b0:d2:40:e3:59:44:63:e0:bb:63:82:8b:00
# Subject: CN=ISRG Root X1,O=Internet Security Research Group,C=US
# Not Valid Before: Thu Jun 04 11:04:38 2015
# Not Valid After: Mon Jun 04 11:04:38 2035
# Fingerprint (SHA-256):
96:BC:EC:06:26:49:76:F3:74:60:77:9A:CF:28:C5:A7:CF:E8:A3:C0:AA:E1:1A:8F:FC:EE:05:C0:BD:DF:08:C6
# Fingerprint (SHA1): CA:BD:2A:79:A1:07:6A:31:F2:1D:25:36:35:CB:03:9D:43:29:A5:E8
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "ISRG Root X1"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\117\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\145\164\040\123\145\143\165\162\151\164\171\040\122\145\163\145
\141\162\143\150\040\107\162\157\165\160\061\025\060\023\006\003
\125\004\003\023\014\111\123\122\107\040\122\157\157\164\040\130
```

\061 END

CKA\_ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \00011\006\003\125\004\006\023\002\125\123\061 $$ \051\060\047\006\003\125\004\012\023\040\111\156\164\145\162\156 $$ \145\164\040\123\145\143\165\162\151\164\171\040\122\145\163\145 $$ \141\162\143\150\040\107\162\157\165\160\061\025\060\023\006\003 $$ \125\004\003\023\014\111\123\122\107\040\122\157\157\164\040\130 $$ \061$$ 

**END** 

### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\021\000\202\020\317\260\322\100\343\131\104\143\340\273\143 \202\213\000

**END** 

### CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \060\202\005\153\060\202\003\123\240\003\002\001\002\002\002\1000$ \202\020\317\260\322\100\343\131\104\143\340\273\143\202\213\000 \060\015\006\011\052\206\110\206\367\015\001\001\013\005\000\060 \060\047\006\003\125\004\012\023\040\111\156\164\145\162\156\145 \164\040\123\145\143\165\162\151\164\171\040\122\145\163\145\141 \162\143\150\040\107\162\157\165\160\061\025\060\023\006\003\125 \004\003\023\014\111\123\122\107\040\122\157\157\164\040\130\061 \060\036\027\015\061\065\060\066\060\064\061\061\060\064\063\070  $\label{eq:condition} $$ 132\027\015\063\065\060\066\060\064\061\060\064\063\070\132$ \060\117\061\013\060\011\006\003\125\004\006\023\002\125\123\061 \051\060\047\006\003\125\004\012\023\040\111\156\164\145\162\156 \145\164\040\123\145\143\165\162\151\164\171\040\122\145\163\145 \141\162\143\150\040\107\162\157\165\160\061\025\060\023\006\003 \125\004\003\023\014\111\123\122\107\040\122\157\157\164\040\130 \061\060\202\002\042\060\015\006\011\052\206\110\206\367\015\001 \001\001\005\000\003\202\002\017\000\060\202\002\012\002\202\002  $\label{eq:condition} $$ \001\000\255\350\044\163\364\024\067\363\233\236\053\127\050\034$ \207\276\334\267\337\070\220\214\156\074\346\127\240\170\367\165 \302\242\376\365\152\156\366\000\117\050\333\336\150\206\154\104 \223\266\261\143\375\024\022\153\277\037\322\352\061\233\041\176 \321\063\074\272\110\365\335\171\337\263\270\377\022\361\041\232 \113\301\212\206\161\151\112\146\146\154\217\176\074\160\277\255 \051\042\006\363\344\300\346\200\256\342\113\217\267\231\176\224  $\label{eq:condition} $$ \003\237\323\107\227\174\231\110\043\123\350\070\256\117\012\157$ \203\056\321\111\127\214\200\164\266\332\057\320\070\215\173\003 \160\041\033\165\362\060\074\372\217\256\335\332\143\253\353\026 \117\302\216\021\113\176\317\013\350\377\265\167\056\364\262\173 \112\340\114\022\045\014\160\215\003\051\240\341\123\044\354\023 \331\356\031\277\020\263\112\214\077\211\243\141\121\336\254\207 \007\224\364\143\161\354\056\342\157\133\230\201\341\211\134\064 \171\154\166\357\073\220\142\171\346\333\244\232\057\046\305\320 \020\341\016\336\331\020\216\026\373\267\367\250\367\307\345\002 \007\230\217\066\010\225\347\342\067\226\015\066\165\236\373\016 \162\261\035\233\274\003\371\111\005\330\201\335\005\264\052\326

\101\351\254\001\166\225\012\017\330\337\325\275\022\037\065\057 \050\027\154\322\230\301\250\011\144\167\156\107\067\272\316\254 \131\136\150\235\177\162\326\211\305\006\101\051\076\131\076\335 \046\365\044\311\021\247\132\243\114\100\037\106\241\231\265\247 \072\121\156\206\073\236\175\162\247\022\005\170\131\355\076\121 \170\025\013\003\217\215\320\057\005\262\076\173\112\034\113\163 \005\022\374\306\352\340\120\023\174\103\223\164\263\312\164\347 \216\037\001\010\320\060\324\133\161\066\264\007\272\301\060\060  $\label{eq:condition} $$ \frac{134}10\267\202\073\230\246\175\140\212\242\243\051\202\314\272}$ \275\203\004\033\242\203\003\101\241\326\005\361\033\302\266\360 \250\174\206\073\106\250\110\052\210\334\166\232\166\277\037\152 \245\075\031\217\353\070\363\144\336\310\053\015\012\050\377\367 \333\342\025\102\324\042\320\047\135\341\171\376\030\347\160\210 \255\116\346\331\213\072\306\335\047\121\156\377\274\144\365\063 \103\117\002\003\001\000\001\243\102\060\100\060\016\006\003\125 \035\017\001\001\377\004\004\003\002\001\006\060\017\006\003\125  $\label{eq:condition} $$ \035\023\001\001\377\004\005\060\003\001\001\377\060\035\006\003$ \125\035\016\004\026\004\024\171\264\131\346\173\266\345\344\001 \163\200\010\210\310\032\130\366\351\233\156\060\015\006\011\052 \206\110\206\367\015\001\001\013\005\000\003\202\002\001\000\125 \037\130\251\274\262\250\120\320\014\261\330\032\151\040\047\051 \010\254\141\165\134\212\156\370\202\345\151\057\325\366\126\113  $\label{eq:condition} $$ \271\270\163\020\131\323\041\227\176\347\114\161\373\262\322\140 $$$ \255\071\250\013\352\027\041\126\205\361\120\016\131\353\316\340 \131\351\272\311\025\357\206\235\217\204\200\366\344\351\221\220 \334\027\233\142\033\105\360\146\225\322\174\157\302\352\073\357 \037\317\313\326\256\047\361\251\260\310\256\375\175\176\232\372  $\\ \langle 042 \rangle 004 \rangle 353 \rangle 377 \rangle 331 \rangle 177 \rangle 352 \rangle 221 \rangle 053 \rangle 042 \rangle 261 \rangle 027 \rangle 016 \rangle 217 \rangle 362 \rangle 212 \rangle 212 \rangle 212 \rangle 212 \rangle 213 \rangle$ \064\133\130\330\374\001\311\124\271\270\046\314\212\210\063\211 \114\055\204\074\202\337\356\226\127\005\272\054\273\367\304\267  $\label{eq:condition} $$ 307\116\073\202\276\061\310\042\163\163\222\321\302\200\244\071 $$$ \071\020\063\043\202\114\074\237\206\262\125\230\035\276\051\206 \214\042\233\236\342\153\073\127\072\202\160\115\334\011\307\211 \313\012\007\115\154\350\135\216\311\357\316\253\307\273\265\053 \116\105\326\112\320\046\314\345\162\312\010\152\245\225\343\025 \241\367\244\355\311\054\137\245\373\377\254\050\002\056\276\327 \173\273\343\161\173\220\026\323\007\136\106\123\174\067\007\102 \214\323\304\226\234\325\231\265\052\340\225\032\200\110\256\114  $\label{eq:condition} $$ \071\007\316\314\107\244\122\225\053\272\270\373\255\322\063\123$ \175\345\035\115\155\325\241\261\307\102\157\346\100\047\065\134 \243\050\267\007\215\347\215\063\220\347\043\237\373\120\234\171 \154\106\325\264\025\263\226\156\176\233\014\226\072\270\122\055 \077\326\133\341\373\010\302\204\376\044\250\243\211\332\254\152 \341\030\052\261\250\103\141\133\323\037\334\073\215\166\362\055 \350\215\165\337\027\063\154\075\123\373\173\313\101\137\377\334 \242\320\141\070\341\226\270\254\135\213\067\327\165\325\063\300 \231\021\256\235\101\301\162\165\204\276\002\101\102\137\147\044  $\label{eq:condition} $$ 110\224\321\233\047\276\007\077\271\270\117\201\164\121\341\172$  \267\355\235\043\342\276\340\325\050\0004\023\074\061\003\236\335 \172\154\217\306\007\030\306\177\336\107\216\077\050\236\004\006 \317\245\124\064\167\275\354\211\233\351\027\103\337\133\333\137 \376\216\036\127\242\315\100\235\176\142\042\332\336\030\047 END

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "ISRG Root X1"
- # Issuer: CN=ISRG Root X1,O=Internet Security Research Group,C=US
- # Serial Number:00:82:10:cf:b0:d2:40:e3:59:44:63:e0:bb:63:82:8b:00
- # Subject: CN=ISRG Root X1,O=Internet Security Research Group,C=US
- # Not Valid Before: Thu Jun 04 11:04:38 2015
- # Not Valid After: Mon Jun 04 11:04:38 2035
- # Fingerprint (SHA-256):

96:BC:EC:06:26:49:76:F3:74:60:77:9A:CF:28:C5:A7:CF:E8:A3:C0:AA:E1:1A:8F:FC:EE:05:C0:BD:DF:08:C6

# Fingerprint (SHA1): CA:BD:2A:79:A1:07:6A:31:F2:1D:25:36:35:CB:03:9D:43:29:A5:E8

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "ISRG Root X1"

CKA CERT SHA1 HASH MULTILINE OCTAL

 $\label{eq:condition} $$ \frac{312}275\\052\\171\\241\\007\\152\\061\\362\\035\\045\\066\\065\\313\\003\\235$ 

\103\051\245\350

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \014\322\371\340\332\027\163\351\355\206\115\245\343\160\347\116$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\11\006\003\125\004\006\023\002\125\123\061 $$$ 

\051\060\047\006\003\125\004\012\023\040\111\156\164\145\162\156

\145\164\040\123\145\143\165\162\151\164\171\040\122\145\163\145

 $\label{eq:condition} $$ 141\162\143\150\040\107\162\157\165\160\061\025\060\023\006\003$ 

\125\004\003\023\014\111\123\122\107\040\122\157\157\164\040\130

\061

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\021\000\202\020\317\260\322\100\343\131\104\143\340\273\143$ 

\202\213\000

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

 ${\tt CKA\_TRUST\_CODE\_SIGNING\ CK\_TRUST\ CKT\_NSS\_MUST\_VERIFY\_TRUST}$ 

CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "AC RAIZ FNMT-RCM"

#

# Issuer: OU=AC RAIZ FNMT-RCM,O=FNMT-RCM,C=ES

# Serial Number:5d:93:8d:30:67:36:c8:06:1d:1a:c7:54:84:69:07

# Subject: OU=AC RAIZ FNMT-RCM,O=FNMT-RCM,C=ES

# Not Valid Before: Wed Oct 29 15:59:56 2008

# Not Valid After: Tue Jan 01 00:00:00 2030

# Fingerprint (SHA-256):

EB:C5:57:0C:29:01:8C:4D:67:B1:AA:12:7B:AF:12:F7:03:B4:61:1E:BC:17:B7:DA:B5:57:38:94:17:9B:93:FA

# Fingerprint (SHA1): EC:50:35:07:B2:15:C4:95:62:19:E2:A8:9A:5B:42:99:2C:4C:2C:20

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "AC RAIZ FNMT-RCM"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA\_SUBJECT MULTILINE\_OCTAL

\060\073\061\013\060\011\006\003\125\004\006\023\002\105\123\061

\021\060\017\006\003\125\004\012\014\010\106\116\115\124\055\122

\122\101\111\132\040\106\116\115\124\055\122\103\115

**END** 

CKA\_ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

**END** 

### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\017\135\223\215\060\147\066\310\006\035\032\307\124\204\151 \007

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

\202\002\012\002\202\002\001\000\272\161\200\172\114\206\156\177 \310\023\155\300\306\175\034\000\227\217\054\014\043\273\020\232 \100\251\032\267\207\210\370\233\126\152\373\346\173\216\213\222 \216\247\045\135\131\021\333\066\056\267\121\027\037\251\010\037 \004\027\044\130\252\067\112\030\337\345\071\324\127\375\327\301 \054\221\001\221\342\042\324\003\300\130\374\167\107\354\217\076 \164\103\272\254\064\215\115\070\166\147\216\260\310\157\060\063 \130\161\134\264\365\153\156\324\001\120\270\023\176\154\112\243 \111\321\040\031\356\274\300\051\030\145\247\336\376\357\335\012 \220\041\347\032\147\222\102\020\230\137\117\060\274\076\034\105  $\label{eq:condition} $$ \264\020\327\150\100\024\300\100\372\347\167\027\172\346\013\217 $$$ \145\133\074\331\232\122\333\265\275\236\106\317\075\353\221\005 \002\300\226\262\166\114\115\020\226\073\222\372\234\177\017\231 \337\276\043\065\105\036\002\134\376\265\250\233\231\045\332\136 \363\042\303\071\365\344\052\056\323\306\037\304\154\252\305\034 \152\001\005\112\057\322\305\301\250\064\046\135\146\245\322\002  $\label{eq:condition} $$ \041\371\030\267\006\365\116\231\157\250\253\114\121\350\317\120 $$$ \030\305\167\310\071\011\054\111\222\062\231\250\273\027\027\171 \260\132\305\346\243\304\131\145\107\065\203\136\251\350\065\013 \231\273\344\315\040\306\233\112\006\071\265\150\374\042\272\356 \125\214\053\116\352\363\261\343\374\266\231\232\325\102\372\161 \115\010\317\207\036\152\161\175\371\323\264\351\245\161\201\173  $\label{eq:condition} $$ 302\116\107\226\245\366\166\205\243\050\217\351\200\156\201\123$ \245\155\137\270\110\371\302\371\066\246\056\111\377\270\226\302 \214\007\263\233\210\130\374\353\033\034\336\055\160\342\227\222 \060\241\211\343\274\125\250\047\326\113\355\220\255\213\372\143 \045\131\055\250\065\335\312\227\063\274\345\315\307\235\321\354  $\label{eq:condition} $$ \frac{357}{136}016\frac{112}{220}006046\frac{143}{255}\frac{271}{331}065\frac{055}{007}\frac{272}{166} $$$ \145\054\254\127\217\175\364\007\224\327\201\002\226\135\243\007 \111\325\172\320\127\371\033\347\123\106\165\252\260\171\102\313  $\label{eq:condition} $$ \frac{150}{161}010\\351\\140\\275\\071\\151\\316\\364\\257\\303\\126\\100\\307\\255$ \122\242\011\344\157\206\107\212\037\353\050\047\135\203\040\257 \004\311\154\126\232\213\106\365\002\003\001\000\001\243\201\203 \060\201\200\060\017\006\003\125\035\023\001\001\377\004\005\060 \003\001\001\377\060\016\006\003\125\035\017\001\001\377\004\004 \003\002\001\006\060\035\006\003\125\035\016\004\026\004\024\367 \175\305\375\304\350\232\033\167\144\247\365\035\240\314\277\207 \140\232\155\060\076\006\003\125\035\040\004\067\060\065\060\063  $\label{eq:condition} $$ \006\004\125\035\040\000\060\053\060\051\006\010\053\006\001\005$ \056\143\145\162\164\056\146\156\155\164\056\145\163\057\144\160 \143\163\057\060\015\006\011\052\206\110\206\367\015\001\001\013 \005\000\003\202\002\001\000\007\220\112\337\363\043\116\360\303 \234\121\145\233\234\042\242\212\014\205\363\163\051\153\115\376 \001\342\251\014\143\001\277\004\147\245\235\230\137\375\001\023 \372\354\232\142\351\206\376\266\142\322\156\114\224\373\300\165 \105\174\145\014\370\262\067\317\254\017\317\215\157\371\031\367  $\label{eq:condition} $$ \frac{354}{360}\frac{360}{362}160 \frac{360}{312}270 \frac{357}{267}\frac{377}{166}\frac{6133}{360} $$$ 

\366\156\210\363\257\142\062\042\223\015\072\152\216\024\146\014 \055\123\164\127\145\036\325\262\335\043\201\073\245\146\043\047  $\\ 147 \\ 011 \\ 217 \\ 341 \\ 167 \\ 252 \\ 103 \\ 315 \\ 145 \\ 121 \\ 010 \\ 355 \\ 121 \\ 130 \\ 376 \\ 346$  $\label{eq:condition} $$ \071\371\313\107\204\244\025\361\166\273\244\356\244\073\304\137$ \357\262\063\226\021\030\267\311\145\276\030\341\243\244\334\372  $\label{eq:condition} $$ \030\371\323\274\023\233\071\172\064\272\323\101\373\372\062\212$ \052\267\053\206\013\151\203\070\276\315\212\056\013\160\255\215  $\\ \langle 046 \rangle 222 \rangle 356 \rangle 036 \rangle 365 \rangle 001 \rangle 053 \rangle 012 \rangle 331 \rangle 326 \rangle 227 \rangle 233 \rangle 156 \rangle 340 \rangle 250 \rangle 031$ \034\072\041\213\014\036\100\255\003\347\335\146\176\365\271\040 \015\003\350\226\371\202\105\324\071\340\240\000\135\327\230\346 \175\236\147\163\303\232\052\367\253\213\241\072\024\357\064\274 \316\370\120\174\117\034\156\004\103\233\371\326\073\043\030\351 \352\216\321\115\106\215\361\073\344\152\312\272\373\043\267\233 \372\231\001\051\132\130\132\055\343\371\324\155\016\046\255\301 \156\064\274\062\370\014\005\372\145\243\333\073\067\203\042\351 \326\334\162\063\375\135\362\040\275\166\074\043\332\050\367\371 \033\353\131\144\325\334\137\162\176\040\374\315\211\265\220\147 \115\142\172\077\116\255\035\303\071\376\172\364\050\026\337\101 \366\110\200\005\327\017\121\171\254\020\253\324\354\003\146\346 \152\260\272\061\222\102\100\152\276\072\323\162\341\152\067\125 \274\254\035\225\267\151\141\362\103\221\164\346\240\323\012\044  $\label{eq:condition} $$ 106\241\010\257\326\332\105\031\226\324\123\035\133\204\171\360 $$$ \300\367\107\357\213\217\305\006\256\235\114\142\235\377\106\004 \370\323\311\266\020\045\100\165\376\026\252\311\112\140\206\057 \272\357\060\167\344\124\342\270\204\231\130\200\252\023\213\121 \072\117\110\366\213\266\263

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "AC RAIZ FNMT-RCM"
```

# Issuer: OU=AC RAIZ FNMT-RCM,O=FNMT-RCM,C=ES

# Serial Number:5d:93:8d:30:67:36:c8:06:1d:1a:c7:54:84:69:07

# Subject: OU=AC RAIZ FNMT-RCM,O=FNMT-RCM,C=ES

# Not Valid Before: Wed Oct 29 15:59:56 2008

# Not Valid After: Tue Jan 01 00:00:00 2030

# Fingerprint (SHA-256):

EB:C5:57:0C:29:01:8C:4D:67:B1:AA:12:7B:AF:12:F7:03:B4:61:1E:BC:17:B7:DA:B5:57:38:94:17:9B:93:FA

# Fingerprint (SHA1): EC:50:35:07:B2:15:C4:95:62:19:E2:A8:9A:5B:42:99:2C:4C:2C:20

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "AC RAIZ FNMT-RCM"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\354\120\065\007\262\025\304\225\142\031\342\250\232\133\102\231

```
\054\114\054\040
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\342\011\004\264\323\275\321\240\024\375\032\322\107\304\127\035
END
CKA ISSUER MULTILINE OCTAL
\060\073\061\013\060\011\006\003\125\004\006\023\002\105\123\061
\021\060\017\006\003\125\004\012\014\010\106\116\115\124\055\122
\103\115\061\031\060\027\006\003\125\004\013\014\020\101\103\040
\122\101\111\132\040\106\116\115\124\055\122\103\115
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\017\135\223\215\060\147\066\310\006\035\032\307\124\204\151
\007
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
#
# Certificate "Amazon Root CA 1"
# Issuer: CN=Amazon Root CA 1,O=Amazon,C=US
# Serial Number:06:6c:9f:cf:99:bf:8c:0a:39:e2:f0:78:8a:43:e6:96:36:5b:ca
# Subject: CN=Amazon Root CA 1,O=Amazon,C=US
# Not Valid Before: Tue May 26 00:00:00 2015
# Not Valid After: Sun Jan 17 00:00:00 2038
# Fingerprint (SHA-256):
8E:CD:E6:88:4F:3D:87:B1:12:5B:A3:1A:C3:FC:B1:3D:70:16:DE:7F:57:CC:90:4F:E1:CB:97:C6:AE:98:19:6E
# Fingerprint (SHA1): 8D:A7:F9:65:EC:5E:FC:37:91:0F:1C:6E:59:FD:C1:CC:6A:6E:DE:16
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "Amazon Root CA 1"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA_SUBJECT MULTILINE_OCTAL
\label{eq:condition} $$ \060\071\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$
\061\031\060\027\006\003\125\004\003\023\020\101\155\141\172\157
\156\040\122\157\157\164\040\103\101\040\061
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
```

\060\071\061\013\060\011\006\003\125\004\006\023\002\125\123\061 \017\060\015\006\003\125\004\012\023\006\101\155\141\172\157\156 \061\031\060\027\006\003\125\004\003\023\020\101\155\141\172\157 \156\040\122\157\157\164\040\103\101\040\061

**END** 

### CKA SERIAL NUMBER MULTILINE OCTAL

\002\023\006\154\237\317\231\277\214\012\071\342\360\170\212\103 \346\226\066\133\312

**END** 

### CKA VALUE MULTILINE OCTAL

\060\202\003\101\060\202\002\051\240\003\002\001\002\002\023\006 \154\237\317\231\277\214\012\071\342\360\170\212\103\346\226\066 \133\312\060\015\006\011\052\206\110\206\367\015\001\001\013\005 \000\060\071\061\013\060\011\006\003\125\004\006\023\002\125\123 \156\061\031\060\027\006\003\125\004\003\023\020\101\155\141\172 \157\156\040\122\157\157\164\040\103\101\040\061\060\036\027\015 \070\060\061\061\067\060\060\060\060\060\060\060\132\060\071\061\013  $\label{eq:condition} $$ \000\01\000\023\002\125\123\061\017\060\015\006 $$$ \003\125\004\012\023\006\101\155\141\172\157\156\061\031\060\027 \006\003\125\004\003\023\020\101\155\141\172\157\156\040\122\157  $\label{eq:condition} $$ \frac{157}{164}040\\103\\101\\040\\061\\060\\202\\001\\042\\060\\015\\006\\011\\052$ \206\110\206\367\015\001\001\001\005\000\003\202\001\017\000\060 \202\001\012\002\202\001\001\000\262\170\200\161\312\170\325\343  $\label{eq:condition} $$ 161\257\107\200\120\164\175\156\330\327\210\166\364\231\150\367$ \130\041\140\371\164\204\001\057\254\002\055\206\323\240\103\172 \116\262\244\320\066\272\001\276\215\333\110\310\007\027\066\114 \364\356\210\043\307\076\353\067\365\265\031\370\111\150\260\336 \327\271\166\070\035\141\236\244\376\202\066\245\345\112\126\344 \105\341\371\375\264\026\372\164\332\234\233\065\071\057\372\260 \040\120\006\154\172\320\200\262\246\371\257\354\107\031\217\120 \070\007\334\242\207\071\130\370\272\325\251\371\110\147\060\226  $\label{eq:condition} $$ 356 \ 224 \ 170 \ 136 \ 157 \ 211 \ 243 \ 121 \ 300 \ 060 \ 206 \ 146 \ 241 \ 105 \ 146 \ 272 \ 106$ \124\353\243\303\221\371\110\334\377\321\350\060\055\175\055\164 \160\065\327\210\044\367\236\304\131\156\273\163\207\027\362\062 \106\050\270\103\372\267\035\252\312\264\362\237\044\016\055\113 \367\161\134\136\151\377\352\225\002\313\070\212\256\120\070\157 \333\373\055\142\033\305\307\036\124\341\167\340\147\310\017\234 \207\043\326\077\100\040\177\040\200\304\200\114\076\073\044\046 \216\004\256\154\232\310\252\015\002\003\001\000\001\243\102\060  $\label{eq:condition} $$ 100\06\017\006\003\125\035\023\001\001\377\004\005\060\003\001 $$$  $\label{eq:condition} $$ \001\377\060\016\0006\003\125\035\017\001\001\377\004\004\003\002$ \001\206\060\035\006\003\125\035\016\004\026\004\024\204\030\314 \205\064\354\274\014\224\224\056\010\131\234\307\262\020\116\012 \003\202\001\001\000\230\362\067\132\101\220\241\032\305\166\121 \050\040\066\043\016\256\346\050\273\252\370\224\256\110\244\060 \177\033\374\044\215\113\264\310\241\227\366\266\361\172\160\310 \123\223\314\010\050\343\230\045\317\043\244\371\336\041\323\174  $\label{eq:condition} $$ \205\011\255\116\232\165\072\302\013\152\211\170\166\104\107\030 $$$ 

 $\label{eq:control} $$ \frac{145\\154\\215\\101\\216\\073\\177\\232\\313\\364\\265\\247\\120\\327\\005\\054\\067\\350\\003\\113\\255\\351\\141\\240\\002\\156\\365\\362\\360\\305\\262\\355\\133\\267\\334\\372\\224\\134\\167\\236\\023\\245\\177\\122\\255\\225\\362\\370\\223\\073\\336\\213\\134\\133\\312\\132\\122\\133\\140\\257\\024\\367\\113\\357\\243\\373\\237\\100\\225\\155\\061\\1124\\374\\102\\323\\307\\106\\037\\043\\255\\331\\017\\110\\160\\232\\331\\165\\170\\161\\321\\162\\103\\064\\165\\156\\127\\131\\302\\002\\134\\046\\140\\051\\317\\043\\031\\026\\216\\210\\103\\245\\324\\344\\313\\010\\373\\043\\021\\103\\350\\103\\350\\103\\051\\162\\142\\241\\251\\135\\136\\010\\324\\220\\256\\270\\330\\316\\024\\302\\320\\125\\362\\206\\366\\304\\223\\103\\167\\146\\141\\300\\271\\350\\101\\327\\227\\170\\140\\003\\156\\112\\162\\256\\245\\321\\175\\272\\020\\236\\206\\154\\033\\212\\271\\131\\063\\370\\353\\304\\220\\276\\361\\271$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "Amazon Root CA 1"

# Issuer: CN=Amazon Root CA 1,O=Amazon,C=US

# Serial Number:06:6c:9f:cf:99:bf:8c:0a:39:e2:f0:78:8a:43:e6:96:36:5b:ca

# Subject: CN=Amazon Root CA 1,O=Amazon,C=US

# Not Valid Before: Tue May 26 00:00:00 2015

# Not Valid After: Sun Jan 17 00:00:00 2038

# Fingerprint (SHA-256):

8E:CD:E6:88:4F:3D:87:B1:12:5B:A3:1A:C3:FC:B1:3D:70:16:DE:7F:57:CC:90:4F:E1:CB:97:C6:AE:98:19:6E

# Fingerprint (SHA1): 8D:A7:F9:65:EC:5E:FC:37:91:0F:1C:6E:59:FD:C1:CC:6A:6E:DE:16

CKA CLASS CK OBJECT CLASS CKO NSS TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Amazon Root CA 1"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\215\247\371\145\354\136\374\067\221\017\034\156\131\375\301\314 \152\156\336\026

**END** 

CKA CERT MD5 HASH MULTILINE OCTAL

 $\label{eq:condition} $$103\306\277\256\354\376\255\057\030\306\210\150\060\374\310\346$$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\023\006\154\237\317\231\277\214\012\071\342\360\170\212\103 \346\226\066\133\312

END

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "Amazon Root CA 2"

#

- # Issuer: CN=Amazon Root CA 2,O=Amazon,C=US
- # Serial Number:06:6c:9f:d2:96:35:86:9f:0a:0f:e5:86:78:f8:5b:26:bb:8a:37
- # Subject: CN=Amazon Root CA 2,O=Amazon,C=US
- # Not Valid Before: Tue May 26 00:00:00 2015
- # Not Valid After: Sat May 26 00:00:00 2040
- # Fingerprint (SHA-256):

1B:A5:B2:AA:8C:65:40:1A:82:96:01:18:F8:0B:EC:4F:62:30:4D:83:CE:C4:71:3A:19:C3:9C:01:1E:A4:6D:B4

# Fingerprint (SHA1): 5A:8C:EF:45:D7:A6:98:59:76:7A:8C:8B:44:96:B5:78:CF:47:4B:1A

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA LABEL UTF8 "Amazon Root CA 2"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\071\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$$ 

 $\label{eq:condition} $$ \006\003\125\004\012\023\006\101\155\141\172\157\156$$ 

 $\label{eq:condition} $$ \061\031\060\027\006\003\125\004\003\023\020\101\155\141\172\157 $$$ 

\156\040\122\157\157\164\040\103\101\040\062

**END** 

CKA ID UTF8 "0"

### CKA\_ISSUER MULTILINE\_OCTAL

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

 $\label{eq:cond} $$\002\023\006\154\237\322\226\065\206\237\012\017\345\206\170\370\133\046\273\212\067$ 

END

# CKA\_VALUE MULTILINE\_OCTAL

\060\060\065\062\066\060\060\060\060\060\060\132\060\071\061\013 \060\011\006\003\125\004\006\023\002\125\123\061\017\060\015\006 \003\125\004\012\023\006\101\155\141\172\157\156\061\031\060\027 \157\164\040\103\101\040\062\060\202\002\042\060\015\006\011\052 \206\110\206\367\015\001\001\001\005\000\003\202\002\017\000\060 \202\002\012\002\202\002\001\000\255\226\237\055\234\112\114\112 \201\171\121\231\354\212\313\153\140\121\023\274\115\155\006\374 \260\010\215\335\031\020\152\307\046\014\065\330\300\157\040\204 \351\224\261\233\205\003\303\133\333\112\350\310\370\220\166\331 \133\117\343\114\350\006\066\115\314\232\254\075\014\220\053\222 \324\006\031\140\254\067\104\171\205\201\202\255\132\067\340\015 \314\235\246\114\122\166\352\103\235\267\004\321\120\366\125\340 \325\322\246\111\205\351\067\351\312\176\256\134\225\115\110\232  $\label{eq:condition} $$ \077\256\040\132\155\210\225\331\064\270\122\032\103\220\260\277$ \154\005\271\266\170\267\352\320\344\072\074\022\123\142\377\112 \362\173\276\065\005\251\022\064\343\363\144\164\142\054\075\000 \111\132\050\376\062\104\273\207\335\145\047\002\161\073\332\112 \367\037\332\315\367\041\125\220\117\017\354\256\202\341\237\153 \331\105\323\273\360\137\207\355\074\054\071\206\332\077\336\354 \162\125\353\171\243\255\333\335\174\260\272\034\316\374\336\117 \065\166\317\017\370\170\037\152\066\121\106\047\141\133\351\236  $\label{eq:condition} $$ \frac{317}{360}\frac{242}{125}\frac{175}{174}\frac{045}{212}\frac{157}{057}\frac{264}{305}\frac{317}{204}\frac{056}{053} $$$ \375\015\121\020\154\373\137\033\274\033\176\305\256\073\230\001 \061\222\377\013\127\364\232\262\271\127\351\253\357\015\166\321 \360\356\364\316\206\247\340\156\351\264\151\241\337\151\366\063 \306\151\056\227\023\236\245\207\260\127\020\201\067\311\123\263 \273\177\366\222\321\234\320\030\364\222\156\332\203\117\246\143 \231\114\245\373\136\357\041\144\172\040\137\154\144\205\025\313 \067\351\142\014\013\052\026\334\001\056\062\332\076\113\365\236  $\label{eq:condition} $$ \072\366\027\100\224\357\236\221\010\206\372\276\143\250\132\063$ \354\313\164\103\225\371\154\151\122\066\307\051\157\374\125\003  $\label{eq:condition} $$ 134\037\373\237\275\107\353\347\111\107\225\013\116\211\042\011 $$$ \111\340\365\141\036\361\277\056\212\162\156\200\131\377\127\072 \371\165\062\243\116\137\354\355\050\142\331\115\163\362\314\201 \027\140\355\315\353\334\333\247\312\305\176\002\275\362\124\010 \124\375\264\055\011\054\027\124\112\230\321\124\341\121\147\010 \322\355\156\176\157\077\322\055\201\131\051\146\313\220\071\225  $\label{eq:condition} $$ \021\036\164\047\376\335\353\257\002\003\001\000\001\243\102\060 $$$  $\label{eq:condition} $$ 100\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001 $$$ \001\377\060\016\006\003\125\035\017\001\001\377\004\004\003\002  $\label{eq:condition} $$ \001\206\06\003\125\035\016\004\026\004\024\260\014\360 $$$ \114\060\364\005\130\002\110\375\063\345\122\257\113\204\343\146 \122\060\015\006\011\052\206\110\206\367\015\001\001\014\005\000  $\label{eq:condition} $$ \003\202\002\001\000\252\250\200\217\016\170\243\340\242\324\315 $$$ \346\365\230\172\073\352\000\003\260\227\016\223\274\132\250\366  $\label{eq:condition} $$ \054\214\162\207\251\261\374\177\163\375\143\161\170\245\207\131 $$$ \317\060\341\015\020\262\023\132\155\202\365\152\346\200\237\240

\005\013\150\344\107\153\307\152\337\266\375\167\062\162\345\030 \372\011\364\240\223\054\135\322\214\165\205\166\145\220\014\003 \171\267\061\043\143\255\170\203\011\206\150\204\312\377\371\317  $\\ \\ \langle 046 \rangle 232 \rangle 222 \rangle 171 \rangle 347 \rangle 315 \rangle 113 \rangle 305 \rangle 347 \rangle 141 \rangle 247 \rangle 027 \rangle 313 \rangle 363 \rangle 251 \rangle 022$ \223\223\153\247\350\057\123\222\304\140\130\260\314\002\121\030 \133\205\215\142\131\143\266\255\264\336\232\373\046\367\000\047 \300\135\125\067\164\231\311\120\177\343\131\056\104\343\054\045 \356\354\114\062\167\264\237\032\351\113\135\040\305\332\375\034 \207\026\306\103\350\324\273\046\232\105\160\136\251\013\067\123 \342\106\173\047\375\340\106\362\211\267\314\102\266\313\050\046 \156\331\245\311\072\310\101\023\140\367\120\214\025\256\262\155  $\label{eq:condition} $$ \032\025\032\127\170\346\222\052\331\145\220\202\077\154\002\257 $$$ \256\022\072\047\226\066\004\327\035\242\200\143\251\233\361\345 \272\264\174\024\260\116\311\261\037\164\137\070\366\121\352\233  $\label{eq:condition} $$ \372\054\242\021\324\251\055\047\032\105\261\257\262\116\161\015$ \300\130\106\326\151\006\313\123\313\263\376\153\101\315\101\176 \175\114\017\174\162\171\172\131\315\136\112\016\254\233\251\230 \163\171\174\264\364\314\271\270\007\014\262\164\134\270\307\157 \210\241\220\247\364\252\371\277\147\072\364\032\025\142\036\267 \237\276\075\261\051\257\147\241\022\362\130\020\031\123\003\060 \033\270\032\211\366\234\275\227\003\216\243\011\363\035\213\041 \361\264\337\344\034\321\237\145\002\006\352\134\326\023\263\204 \357\242\245\134\214\167\051\247\150\300\153\256\100\322\250\264 \352\315\360\215\113\070\234\031\232\033\050\124\270\211\220\357 \312\165\201\076\036\362\144\044\307\030\257\116\377\107\236\007 \366\065\145\244\323\012\126\377\365\027\144\154\357\250\042\045 \111\223\266\337\000\027\332\130\176\135\356\305\033\260\321\321  $\label{eq:condition} $$ \frac{137}041\\020\\307\\371\\363\\272\\002\\012\\047\\007\\305\\361\\326\\307\\323$ \340\373\011\140\154

END

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Amazon Root CA 2"
```

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Amazon Root CA 2"

<sup>#</sup> Issuer: CN=Amazon Root CA 2,O=Amazon,C=US

<sup>#</sup> Serial Number:06:6c:9f:d2:96:35:86:9f:0a:0f:e5:86:78:f8:5b:26:bb:8a:37

<sup>#</sup> Subject: CN=Amazon Root CA 2,O=Amazon,C=US

<sup>#</sup> Not Valid Before: Tue May 26 00:00:00 2015

<sup>#</sup> Not Valid After: Sat May 26 00:00:00 2040

<sup>#</sup> Fingerprint (SHA-256):

<sup>1</sup>B:A5:B2:AA:8C:65:40:1A:82:96:01:18:F8:0B:EC:4F:62:30:4D:83:CE:C4:71:3A:19:C3:9C:01:1E:A4:6D:B4

<sup>#</sup> Fingerprint (SHA1): 5A:8C:EF:45:D7:A6:98:59:76:7A:8C:8B:44:96:B5:78:CF:47:4B:1A

```
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\132\214\357\105\327\246\230\131\166\172\214\213\104\226\265\170
\317\107\113\032
END
CKA CERT MD5 HASH MULTILINE OCTAL
\310\345\215\316\250\102\342\172\300\052\134\174\236\046\277\146
END
CKA ISSUER MULTILINE OCTAL
\060\071\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\017\060\015\006\003\125\004\012\023\006\101\155\141\172\157\156
\label{eq:condition} $$ \061\031\060\027\006\003\125\004\003\023\020\101\155\141\172\157 $$
\156\040\122\157\157\164\040\103\101\040\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\label{eq:condition} $$ \002\023\006\154\237\322\226\065\206\237\012\017\345\206\170\370 $$
\133\046\273\212\067
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "Amazon Root CA 3"
# Issuer: CN=Amazon Root CA 3,O=Amazon,C=US
# Serial Number:06:6c:9f:d5:74:97:36:66:3f:3b:0b:9a:d9:e8:9e:76:03:f2:4a
# Subject: CN=Amazon Root CA 3,O=Amazon,C=US
# Not Valid Before: Tue May 26 00:00:00 2015
# Not Valid After: Sat May 26 00:00:00 2040
# Fingerprint (SHA-256):
18:CE:6C:FE:7B:F1:4E:60:B2:E3:47:B8:DF:E8:68:CB:31:D0:2E:BB:3A:DA:27:15:69:F5:03:43:B4:6D:B3:A4
# Fingerprint (SHA1): 0D:44:DD:8C:3C:8C:1A:1A:58:75:64:81:E9:0F:2E:2A:FF:B3:D2:6E
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Amazon Root CA 3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\071\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\\017\\060\\015\\006\\003\\125\\004\\012\\023\\006\\101\\155\\141\\172\\157\\156
\061\031\060\027\006\003\125\004\003\023\020\101\155\141\172\157
\156\040\122\157\157\164\040\103\101\040\063
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\071\061\013\060\011\006\003\125\004\006\023\002\125\123\061
```

\017\060\015\006\003\125\004\012\023\006\101\155\141\172\157\156 \061\031\060\027\006\003\125\004\003\023\020\101\155\141\172\157 \156\040\122\157\157\164\040\103\101\040\063

**END** 

### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\023\006\154\237\325\164\227\066\146\077\073\013\232\331\350 \236\166\003\362\112

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

\060\202\001\266\060\202\001\133\240\003\002\001\002\002\023\006 \154\237\325\164\227\066\146\077\073\013\232\331\350\236\166\003 \362\112\060\012\006\010\052\206\110\316\075\004\003\002\060\071 \061\013\060\011\006\003\125\004\006\023\002\125\123\061\017\060  $\label{eq:condition} $$ \006\003\125\004\012\023\006\101\155\141\172\157\156\061\031\$  $\label{eq:condition} $$ \000\027\006\003\125\004\003\023\020\101\155\141\172\157\156\040 $$$ \122\157\157\164\040\103\101\040\063\060\036\027\015\061\065\060 \065\062\066\060\060\060\060\060\060\132\027\015\064\060\060\065 \062\066\060\060\060\060\060\060\060\132\060\071\061\013\060\011\006 \003\125\004\006\023\002\125\123\061\017\060\015\006\003\125\004  $\label{eq:condition} $$ \012\023\006\101\155\141\172\157\156\061\031\060\027\006\003\125 $$$ \004\003\023\020\101\155\141\172\157\156\040\122\157\157\164\040  $\label{eq:condition} $$103\101\040\063\060\131\060\023\006\007\052\206\110\316\075\002$  $\label{eq:condition} $$ \001\006\010\052\206\110\316\075\003\001\007\003\102\000\004\051 $$$ \227\247\306\101\177\300\015\233\350\001\033\126\306\362\122\245 \272\055\262\022\350\322\056\327\372\311\305\330\252\155\037\163 \201\073\073\230\153\071\174\063\245\305\116\206\216\200\027\150 \142\105\127\175\104\130\035\263\067\345\147\010\353\146\336\243 \102\060\100\060\017\006\003\125\035\023\001\001\377\004\005\060 \003\001\001\377\060\016\006\003\125\035\017\001\001\377\004\004 \003\002\001\206\060\035\006\003\125\035\016\004\026\004\024\253 \266\333\327\006\236\067\254\060\206\007\221\160\307\234\304\031 \261\170\300\060\012\006\010\052\206\110\316\075\004\003\002\003 \111\000\060\106\002\041\000\340\205\222\243\027\267\215\371\053 \006\245\223\254\032\230\150\141\162\372\341\241\320\373\034\170 \140\246\103\231\305\270\304\002\041\000\234\002\357\361\224\234 \263\226\371\353\306\052\370\266\054\376\072\220\024\026\327\214 \143\044\110\034\337\060\175\325\150\073

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Amazon Root CA 3"
- # Issuer: CN=Amazon Root CA 3,O=Amazon,C=US
- # Serial Number:06:6c:9f:d5:74:97:36:66:3f:3b:0b:9a:d9:e8:9e:76:03:f2:4a
- # Subject: CN=Amazon Root CA 3,O=Amazon,C=US
- # Not Valid Before: Tue May 26 00:00:00 2015 # Not Valid After : Sat May 26 00:00:00 2040

```
18:CE:6C:FE:7B:F1:4E:60:B2:E3:47:B8:DF:E8:68:CB:31:D0:2E:BB:3A:DA:27:15:69:F5:03:43:B4:6D:B3:A4
# Fingerprint (SHA1): 0D:44:DD:8C:3C:8C:1A:1A:58:75:64:81:E9:0F:2E:2A:FF:B3:D2:6E
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "Amazon Root CA 3"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\015\104\335\214\074\214\032\032\130\165\144\201\351\017\056\052
\377\263\322\156
END
CKA CERT MD5 HASH MULTILINE OCTAL
\240\324\357\013\367\265\330\111\225\052\354\365\304\374\201\207
END
CKA ISSUER MULTILINE OCTAL
\060\071\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\017\060\015\006\003\125\004\012\023\006\101\155\141\172\157\156
\\ \backslash 061 \backslash 031 \backslash 060 \backslash 027 \backslash 006 \backslash 003 \backslash 125 \backslash 004 \backslash 003 \backslash 023 \backslash 020 \backslash 101 \backslash 155 \backslash 141 \backslash 172 \backslash 157
\156\040\122\157\157\164\040\103\101\040\063
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\label{eq:condition} $$ \002\023\006\154\237\325\164\227\066\146\077\073\013\232\331\350 $$
\236\166\003\362\112
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Amazon Root CA 4"
# Issuer: CN=Amazon Root CA 4,O=Amazon,C=US
# Serial Number:06:6c:9f:d7:c1:bb:10:4c:29:43:e5:71:7b:7b:2c:c8:1a:c1:0e
# Subject: CN=Amazon Root CA 4,O=Amazon,C=US
# Not Valid Before: Tue May 26 00:00:00 2015
# Not Valid After: Sat May 26 00:00:00 2040
# Fingerprint (SHA-256):
E3:5D:28:41:9E:D0:20:25:CF:A6:90:38:CD:62:39:62:45:8D:A5:C6:95:FB:DE:A3:C2:2B:0B:FB:25:89:70:92
# Fingerprint (SHA1): F6:10:84:07:D6:F8:BB:67:98:0C:C2:E2:44:C2:EB:AE:1C:EF:63:BE
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Amazon Root CA 4"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
```

# Fingerprint (SHA-256):

\060\071\061\013\060\011\006\003\125\004\006\023\002\125\123\061 \017\060\015\006\003\125\004\012\023\006\101\155\141\172\157\156 \061\031\060\027\006\003\125\004\003\023\020\101\155\141\172\157 \156\040\122\157\157\164\040\103\101\040\064

**END** 

CKA ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

**END** 

### CKA SERIAL NUMBER MULTILINE OCTAL

\002\023\006\154\237\327\301\273\020\114\051\103\345\161\173\173 \054\310\032\301\016

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\001\362\060\202\001\170\240\003\002\001\002\002\003\006 \154\237\327\301\273\020\114\051\103\345\161\173\173\054\310\032 \301\016\060\012\006\010\052\206\110\316\075\004\003\003\060\071 \061\013\060\011\006\003\125\004\006\023\002\125\123\061\017\060 \015\006\003\125\004\012\023\006\101\155\141\172\157\156\061\031  $\\ \begin{tabular}{l} $\langle 060 \rangle 027 \rangle 006 \rangle 003 \rangle 125 \rangle 004 \rangle 003 \rangle 023 \rangle 020 \rangle 101 \rangle 155 \rangle 141 \rangle 172 \rangle 157 \rangle 156 \rangle 040 \rangle 172 \rangle 172$ \122\157\157\164\040\103\101\040\064\060\036\027\015\061\065\060 \065\062\066\060\060\060\060\060\060\132\027\015\064\060\060\065 \062\066\060\060\060\060\060\060\060\132\060\071\061\013\060\011\006 \003\125\004\006\023\002\125\123\061\017\060\015\006\003\125\004  $\label{eq:condition} $$ \012\023\006\101\155\141\172\157\156\061\031\060\027\006\003\125$$ \004\003\023\020\101\155\141\172\157\156\040\122\157\157\164\040 \103\101\040\064\060\166\060\020\006\007\052\206\110\316\075\002  $\label{eq:condition} $$ \001\006\005\053\201\004\000\042\003\142\000\004\322\253\212\067 $$$ \117\243\123\015\376\301\212\173\113\250\173\106\113\143\260\142 \366\055\033\333\010\161\041\322\000\350\143\275\232\047\373\360 \071\156\135\352\075\245\311\201\252\243\133\040\230\105\135\026 \333\375\350\020\155\343\234\340\343\275\137\204\142\363\160\144 \063\240\313\044\057\160\272\210\241\052\240\165\370\201\256\142 \006\304\201\333\071\156\051\260\036\372\056\134\243\102\060\100  $\label{eq:condition} $$ \000\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001\$ \377\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001 \206\060\035\006\003\125\035\016\004\026\004\024\323\354\307\072 \145\156\314\341\332\166\232\126\373\234\363\206\155\127\345\201 \145\002\060\072\213\041\361\275\176\021\255\320\357\130\226\057 \326\353\235\176\220\215\053\317\146\125\303\054\343\050\251\160 \012\107\016\360\067\131\022\377\055\231\224\050\116\052\117\065 \115\063\132\002\061\000\352\165\000\116\073\304\072\224\022\221 \311\130\106\235\041\023\162\247\210\234\212\344\114\112\333\226 \324\254\213\153\153\111\022\123\063\255\327\344\276\044\374\265

```
\012\166\324\245\274\020
END
CKA_NSS_MOZILLA_CA_POLICY CK_BBOOL CK_TRUE
CKA_NSS_SERVER_DISTRUST_AFTER CK_BBOOL CK_FALSE
CKA_NSS_EMAIL_DISTRUST_AFTER CK_BBOOL CK_FALSE
# Trust for "Amazon Root CA 4"
# Issuer: CN=Amazon Root CA 4,O=Amazon,C=US
# Serial Number:06:6c:9f:d7:c1:bb:10:4c:29:43:e5:71:7b:7b:2c:c8:1a:c1:0e
# Subject: CN=Amazon Root CA 4,O=Amazon,C=US
# Not Valid Before: Tue May 26 00:00:00 2015
# Not Valid After: Sat May 26 00:00:00 2040
# Fingerprint (SHA-256):
E3:5D:28:41:9E:D0:20:25:CF:A6:90:38:CD:62:39:62:45:8D:A5:C6:95:FB:DE:A3:C2:2B:0B:FB:25:89:70:92
# Fingerprint (SHA1): F6:10:84:07:D6:F8:BB:67:98:0C:C2:E2:44:C2:EB:AE:1C:EF:63:BE
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Amazon Root CA 4"
CKA CERT SHA1 HASH MULTILINE OCTAL
\label{eq:condition} $$ 366\020\204\007\326\370\273\147\230\014\302\342\104\302\353\256$
\034\357\143\276
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\211\274\047\325\353\027\215\006\152\151\325\375\211\107\264\315
END
CKA_ISSUER MULTILINE_OCTAL
\060\071\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\017\060\015\006\003\125\004\012\023\006\101\155\141\172\157\156
\label{eq:condition} $$ \001\031\060\027\006\003\125\004\003\023\020\101\155\141\172\157 
\156\040\122\157\157\164\040\103\101\040\064
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\023\006\154\237\327\301\273\020\114\051\103\345\161\173\173
\054\310\032\301\016
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
#
# Certificate "Symantec Class 1 Public Primary Certification Authority - G6"
```

# Issuer: CN=Symantec Class 1 Public Primary Certification Authority - G6,OU=Symantec Trust

Network,O=Symantec Corporation,C=US

# Serial Number: 24:32:75:f2:1d:2f:d2:09:33:f7:b4:6a:ca:d0:f3:98

# Subject: CN=Symantec Class 1 Public Primary Certification Authority - G6,OU=Symantec Trust

Network,O=Symantec Corporation,C=US

# Not Valid Before: Tue Oct 18 00:00:00 2011

# Not Valid After: Tue Dec 01 23:59:59 2037

# Fingerprint (SHA-256):

9D:19:0B:2E:31:45:66:68:5B:E8:A8:89:E2:7A:A8:C7:D7:AE:1D:8A:AD:DB:A3:C1:EC:F9:D2:48:63:CD:34:B9

# Fingerprint (SHA1): 51:7F:61:1E:29:91:6B:53:82:FB:72:E7:44:D9:8D:C3:CC:53:6D:64

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Symantec Class 1 Public Primary Certification Authority - G6"

CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\201\224\061\013\060\011\006\003\125\004\006\023\002\125\123$ 

 $\label{eq:condition} $$ 164\145\143\040\103\157\162\160\157\162\141\164\151\157\156\061$$ 

\037\060\035\006\003\125\004\013\023\026\123\171\155\141\156\164

\145\143\040\124\162\165\163\164\040\116\145\164\167\157\162\153

\164\145\143\040\103\154\141\163\163\040\061\040\120\165\142\154

 $\label{eq:local_$ 

\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151

\164\171\040\055\040\107\066

**END** 

CKA ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000\201\224\061\013\060\0011\006\003\125\004\012\023\024\123\171\155\141\156\164\145\143\040\103\157\162\160\157\162\141\164\151\155\141\156\164\145\143\040\124\165\163\164\040\116\145\164\167\157\162\153\164\145\143\040\103\103\152\004\003\023\074\123\171\155\141\156\164\145\143\040\103\154\141\163\163\040\061\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151$ 

\164\171\040\055\040\107\066

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\020\044\062\165\362\035\057\322\011\063\367\264\152\312\320\363\230$ 

\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

\143\040\103\157\162\160\157\162\141\164\151\157\156\061\037\060 \035\006\003\125\004\013\023\026\123\171\155\141\156\164\145\143 \040\124\162\165\163\164\040\116\145\164\167\157\162\153\061\105 \060\103\006\003\125\004\003\023\074\123\171\155\141\156\164\145 \143\040\103\154\141\163\163\040\061\040\120\165\142\154\151\143  $\label{eq:condition} $$ \040\120\162\151\155\141\162\171\040\103\145\162\164\151\146\151 $$$ \143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171 \040\055\040\107\066\060\036\027\015\061\061\061\060\061\070\060 \060\060\060\060\060\132\027\015\063\067\061\062\060\061\062\063 \065\071\065\071\132\060\201\224\061\013\060\011\006\003\125\004 \006\023\002\125\123\061\035\060\033\006\003\125\004\012\023\024  $\label{eq:local_$ \164\151\157\156\061\037\060\035\006\003\125\004\013\023\026\123 \171\155\141\156\164\145\143\040\124\162\165\163\164\040\116\145 \164\167\157\162\153\061\105\060\103\006\003\125\004\003\023\074 \123\171\155\141\156\164\145\143\040\103\154\141\163\163\040\061  $\\ \\ \langle 040 \rangle 120 \rangle 165 \rangle 142 \rangle 154 \rangle 151 \rangle 143 \rangle 040 \rangle 120 \rangle 162 \rangle 151 \rangle 155 \rangle 141 \rangle 162 \rangle 171 \rangle 040 \rangle 120 \rangle 162 \rangle 162$ \103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165 \164\150\157\162\151\164\171\040\055\040\107\066\060\202\001\042  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\001\005\000\003$ \202\001\017\000\060\202\001\012\002\202\001\001\000\307\071\327 \111\144\251\231\202\042\114\352\105\331\007\026\343\173\364\203 \350\231\163\372\153\261\066\340\232\167\240\100\302\201\215\001 \307\314\214\275\217\175\367\171\343\172\114\003\115\331\373\375 \207\070\050\054\335\232\213\124\010\333\147\373\033\214\376\050 \222\057\276\267\262\110\247\201\241\330\136\210\303\314\071\100 \101\132\321\334\345\332\020\237\057\332\001\115\375\056\106\174 \371\056\047\012\151\067\356\221\243\033\152\314\104\277\033\307 \303\324\021\262\120\140\227\011\275\056\042\365\101\204\146\237 \315\100\246\251\000\200\301\037\225\222\237\336\363\110\357\333  $\label{eq:condition} $$ \035\167\141\374\177\337\356\226\244\162\320\266\076\377\170\047 $$$ \257\313\222\025\151\010\333\143\020\342\346\227\254\156\334\254 \366\242\316\036\107\231\271\211\267\022\346\241\324\315\131\021 \147\303\157\205\330\102\116\050\276\131\125\131\004\225\253\217 \067\200\277\015\360\374\037\072\144\061\130\201\170\327\342\065 \366\040\077\051\270\217\026\156\076\110\334\265\114\007\341\362 \032\352\176\012\171\326\250\275\353\135\206\053\115\002\003\001 \000\001\243\102\060\100\060\016\006\003\125\035\017\001\001\377  $\label{eq:condition} $$ \004\004\003\002\001\006\060\017\006\003\125\035\023\001\001\377 $$$ \004\024\063\101\350\310\071\022\025\223\110\362\226\062\056\132 \365\332\224\137\123\140\060\015\006\011\052\206\110\206\367\015  $\label{eq:condition} $$ \001\001\013\005\000\003\202\001\001\000\025\343\163\127\261\027\$ \266\137\111\151\104\246\366\136\172\147\254\322\336\165\111\253 \376\045\125\307\072\311\104\025\020\156\277\061\153\313\331\007 \223\177\034\205\143\000\343\062\022\340\314\313\373\071\154\217 \342\123\342\074\100\063\331\244\214\107\346\255\130\373\211\257 \343\336\206\051\126\064\054\105\270\022\372\104\211\156\055\024

 $\label{eq:control_control_control_control_control} $$ \odds_{050}\odds_{120$ 

**END** 

CKA NSS MOZILLA CA POLICY CK BBOOL CK TRUE

CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# For Email Distrust After: Wed Aug 31 00:00:00 2022

 $CKA\_NSS\_EMAIL\_DISTRUST\_AFTER\ MULTILINE\_OCTAL$ 

\062\062\060\070\063\061\060\060\060\060\060\060\132

**END** 

- # Trust for "Symantec Class 1 Public Primary Certification Authority G6"
- # Issuer: CN=Symantec Class 1 Public Primary Certification Authority G6,OU=Symantec Trust

Network,O=Symantec Corporation,C=US

- # Serial Number:24:32:75:f2:1d:2f:d2:09:33:f7:b4:6a:ca:d0:f3:98
- # Subject: CN=Symantec Class 1 Public Primary Certification Authority G6,OU=Symantec Trust

Network,O=Symantec Corporation,C=US

- # Not Valid Before: Tue Oct 18 00:00:00 2011
- # Not Valid After: Tue Dec 01 23:59:59 2037
- # Fingerprint (SHA-256):
- 9D:19:0B:2E:31:45:66:68:5B:E8:A8:89:E2:7A:A8:C7:D7:AE:1D:8A:AD:DB:A3:C1:EC:F9:D2:48:63:CD:34:B9
- # Fingerprint (SHA1): 51:7F:61:1E:29:91:6B:53:82:FB:72:E7:44:D9:8D:C3:CC:53:6D:64

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA LABEL UTF8 "Symantec Class 1 Public Primary Certification Authority - G6"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \frac{121\\177\\141\\036\\051\\221\\153\\123\\202\\373\\162\\347\\104\\331\\215\\303$ 

\314\123\155\144

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\057\250\264\332\366\144\113\036\202\371\106\075\124\032\174\260

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\201\224\061\013\060\011\006\003\125\004\006\023\002\125\123 \061\035\060\033\006\003\125\004\012\023\024\123\171\155\141\156

\164\145\143\040\103\157\162\160\157\162\141\164\151\157\156\061

 $\label{eq:condition} $$ \006\003\125\004\013\023\026\123\171\155\141\156\164$$ 

\145\143\040\124\162\165\163\164\040\116\145\164\167\157\162\153

```
\061\105\060\103\006\003\125\004\003\023\074\123\171\155\141\156
\164\145\143\040\103\154\141\163\163\040\061\040\120\165\142\154
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
 \\ 146 \\ 151 \\ 143 \\ 141 \\ 164 \\ 151 \\ 157 \\ 156 \\ 040 \\ 101 \\ 165 \\ 164 \\ 150 \\ 157 \\ 162 \\ 151 \\
\164\171\040\055\040\107\066
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \002\020\044\062\165\362\035\057\322\011\063\367\264\152\312\320 $$
\363\230
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Symantec Class 2 Public Primary Certification Authority - G6"
# Issuer: CN=Symantec Class 2 Public Primary Certification Authority - G6,OU=Symantec Trust
Network,O=Symantec Corporation,C=US
# Serial Number:64:82:9e:fc:37:1e:74:5d:fc:97:ff:97:c8:b1:ff:41
# Subject: CN=Symantec Class 2 Public Primary Certification Authority - G6,OU=Symantec Trust
Network,O=Symantec Corporation,C=US
# Not Valid Before: Tue Oct 18 00:00:00 2011
# Not Valid After: Tue Dec 01 23:59:59 2037
# Fingerprint (SHA-256):
CB:62:7D:18:B5:8A:D5:6D:DE:33:1A:30:45:6B:C6:5C:60:1A:4E:9B:18:DE:DC:EA:08:E7:DA:AA:07:81:5F:F0
# Fingerprint (SHA1): 40:B3:31:A0:E9:BF:E8:55:BC:39:93:CA:70:4F:4E:C2:51:D4:1D:8F
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "Symantec Class 2 Public Primary Certification Authority - G6"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA SUBJECT MULTILINE OCTAL
\060\201\224\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\035\060\033\006\003\125\004\012\023\024\123\171\155\141\156
\164\145\143\040\103\157\162\160\157\162\141\164\151\157\156\061
\label{eq:condition} $$ \037\060\035\006\003\125\004\013\023\026\123\171\155\141\156\164$$
\145\143\040\124\162\165\163\164\040\116\145\164\167\157\162\153
\061\105\060\103\006\003\125\004\003\023\074\123\171\155\141\156
\164\145\143\040\103\154\141\163\163\040\062\040\120\165\142\154
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\055\040\107\066
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
```

 $\label{eq:control_loss} $$ \000\201\224\061\013\060\0011\006\003\125\004\012\023\024\123\171\155\141\156\164\145\143\040\103\157\162\160\157\162\141\164\151\155\141\156\164\145\143\040\124\162\165\163\164\040\116\145\164\167\157\162\153\164\145\143\040\103\154\141\163\163\040\062\040\120\165\142\154\151\143\040\120\162\151\155\141\162\151\143\141\164\151\155\141\162\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\146\171\040\055\040\107\066$ 

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\020\144\202\236\374\067\036\164\135\374\227\377\227\310\261\377\101$ 

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

\060\202\003\366\060\202\002\336\240\003\002\001\002\002\020\144 \202\236\374\067\036\164\135\374\227\377\227\310\261\377\101\060 \015\006\011\052\206\110\206\367\015\001\001\013\005\000\060\201 \224\061\013\060\011\006\003\125\004\006\023\002\125\123\061\035 \060\033\006\003\125\004\012\023\024\123\171\155\141\156\164\145 \143\040\103\157\162\160\157\162\141\164\151\157\156\061\037\060  $\\ \\035\\006\\003\\125\\004\\013\\023\\026\\123\\171\\155\\141\\156\\164\\145\\143$ \040\124\162\165\163\164\040\116\145\164\167\157\162\153\061\105 \060\103\006\003\125\004\003\023\074\123\171\155\141\156\164\145 \143\040\103\154\141\163\163\040\062\040\120\165\142\154\151\143 \040\120\162\151\155\141\162\171\040\103\145\162\164\151\146\151  $\\ 143 \\ 141 \\ 164 \\ 151 \\ 157 \\ 156 \\ 040 \\ 101 \\ 165 \\ 164 \\ 150 \\ 157 \\ 162 \\ 151 \\ 164 \\ 171 \\$ \040\055\040\107\066\060\036\027\015\061\061\061\060\061\070\060 \060\060\060\060\060\132\027\015\063\067\061\062\060\061\062\063 \006\023\002\125\123\061\035\060\033\006\003\125\004\012\023\024 \123\171\155\141\156\164\145\143\040\103\157\162\160\157\162\141 \164\151\157\156\061\037\060\035\006\003\125\004\013\023\026\123 \171\155\141\156\164\145\143\040\124\162\165\163\164\040\116\145 \164\167\157\162\153\061\105\060\103\006\003\125\004\003\023\074 \123\171\155\141\156\164\145\143\040\103\154\141\163\163\040\062  $\\ \\ \langle 040 \rangle 120 \rangle 165 \rangle 142 \rangle 154 \rangle 151 \rangle 143 \rangle 040 \rangle 120 \rangle 162 \rangle 151 \rangle 155 \rangle 141 \rangle 162 \rangle 171 \rangle 040 \rangle 162 \rangle 162 \rangle 162 \rangle 163 \rangle 163$ \060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003 \202\001\017\000\060\202\001\012\002\202\001\001\000\315\314\351 \005\310\143\205\313\077\100\143\027\275\030\372\065\346\004\147 \127\145\230\051\244\117\311\134\217\017\064\322\370\332\250\023 \142\252\270\036\120\147\170\260\026\114\240\071\251\025\172\256 \355\322\242\300\360\220\067\051\030\046\134\350\015\074\266\154 \111\077\301\340\334\331\113\266\024\031\013\246\323\226\341\326 \011\343\031\046\034\371\037\145\113\371\032\103\034\000\203\326

\320\252\111\242\324\333\346\142\070\272\120\024\103\155\371\061 \370\126\026\331\070\002\221\317\353\154\335\273\071\116\231\341 \060\147\105\361\324\360\215\303\337\376\362\070\007\041\175\000  $\label{eq:condition} $$ 136\126\104\263\344\140\275\221\053\234\253\133\004\162\017\262$ \050\331\162\253\005\040\102\045\251\133\003\152\040\020\314\061 \360\053\332\065\054\320\373\232\227\116\360\202\113\053\330\137 \066\243\013\055\257\143\015\035\045\177\241\156\134\142\241\215 \050\076\241\374\034\040\370\001\057\272\125\232\021\260\031\322 \310\120\171\153\016\152\005\327\252\004\066\262\243\362\341\137 \167\247\167\234\345\036\334\351\337\152\301\145\135\002\003\001 \000\001\243\102\060\100\060\016\006\003\125\035\017\001\001\377  $\label{eq:condition} $$ \004\004\003\002\001\006\060\017\006\003\125\035\023\001\001\377 $$$ \004\005\060\003\001\001\377\060\035\006\003\125\035\016\004\026  $\label{eq:condition} $$ \004\024\207\214\040\225\310\230\112\321\326\200\006\112\220\064$$$  $\label{eq:condition} $$ 104\337\034\115\277\260\060\015\006\011\052\206\110\206\367\015 $$$ \001\001\013\005\000\003\202\001\001\000\201\216\262\245\146\226 \267\041\245\266\357\157\043\132\137\333\201\305\102\245\170\301 \151\375\364\074\327\371\134\153\160\162\032\374\132\227\115\000 \200\210\210\202\212\303\161\015\216\305\211\233\054\355\215\013 \322\162\124\365\175\324\134\103\127\351\363\256\245\002\021\366 \166\053\201\127\335\175\332\164\060\375\124\107\366\340\026\156 \246\264\012\110\346\347\165\007\017\051\031\071\316\171\364\266 \154\305\137\231\325\037\113\372\337\155\054\074\015\124\200\160 \360\210\013\200\317\306\150\242\270\035\160\331\166\214\374\356 \245\311\317\255\035\317\231\045\127\132\142\105\313\026\153\275 \111\315\245\243\214\151\171\045\256\270\114\154\213\100\146\113 \026\077\317\002\032\335\341\154\153\007\141\152\166\025\051\231 \177\033\335\210\200\301\277\265\217\163\305\246\226\043\204\246 \050\206\044\063\152\001\056\127\163\045\266\136\277\217\346\035 \141\250\100\051\147\035\207\233\035\177\233\237\231\315\061\326  $\label{eq:condition} $$ \frac{124}276\frac{42}273\sqrt{071}254\frac{150}{022}\frac{110}{221}\sqrt{40}\frac{245}{313}\frac{261}{335}\sqrt{376} $$$ \157\374\132\344\202\125\131\257\061\251

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
# For Email Distrust After: Wed Aug 31 00:00:00 2022
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER MULTILINE\_OCTAL
\062\062\060\070\063\061\060\060\060\060\060\060\060\132
END

# Trust for "Symantec Class 2 Public Primary Certification Authority - G6"

# Issuer: CN=Symantec Class 2 Public Primary Certification Authority - G6,OU=Symantec Trust

Network,O=Symantec Corporation,C=US

# Serial Number:64:82:9e:fc:37:1e:74:5d:fc:97:ff:97:c8:b1:ff:41

# Subject: CN=Symantec Class 2 Public Primary Certification Authority - G6,OU=Symantec Trust

Network,O=Symantec Corporation,C=US

# Not Valid Before: Tue Oct 18 00:00:00 2011

# Not Valid After: Tue Dec 01 23:59:59 2037

```
CB:62:7D:18:B5:8A:D5:6D:DE:33:1A:30:45:6B:C6:5C:60:1A:4E:9B:18:DE:DC:EA:08:E7:DA:AA:07:81:5F:F0
# Fingerprint (SHA1): 40:B3:31:A0:E9:BF:E8:55:BC:39:93:CA:70:4F:4E:C2:51:D4:1D:8F
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "Symantec Class 2 Public Primary Certification Authority - G6"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\100\263\061\240\351\277\350\125\274\071\223\312\160\117\116\302
\121\324\035\217
END
CKA CERT MD5 HASH MULTILINE OCTAL
\175\013\203\345\373\174\255\007\117\040\251\265\337\143\355\171
END
CKA ISSUER MULTILINE OCTAL
\060\201\224\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\035\060\033\006\003\125\004\012\023\024\123\171\155\141\156
\label{eq:condition} $$ 164\145\143\040\103\157\162\160\157\162\141\164\151\157\156\061$
\label{eq:condition} $$ \037\060\035\006\003\125\004\013\023\026\123\171\155\141\156\164$
\145\143\040\124\162\165\163\164\040\116\145\164\167\157\162\153
\label{eq:condition} $$ \061\105\060\103\006\003\125\004\003\023\074\123\171\155\141\156
 \\ 164 \\ 145 \\ 143 \\ 040 \\ 103 \\ 154 \\ 141 \\ 163 \\ 163 \\ 040 \\ 062 \\ 040 \\ 120 \\ 165 \\ 142 \\ 154 \\
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\055\040\107\066
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\144\202\236\374\067\036\164\135\374\227\377\227\310\261
\377\101
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
#
# Certificate "D-TRUST Root CA 3 2013"
# Issuer: CN=D-TRUST Root CA 3 2013,O=D-Trust GmbH,C=DE
# Serial Number: 1039788 (0xfddac)
# Subject: CN=D-TRUST Root CA 3 2013,O=D-Trust GmbH,C=DE
# Not Valid Before: Fri Sep 20 08:25:51 2013
# Not Valid After: Wed Sep 20 08:25:51 2028
# Fingerprint (SHA-256):
A1:A8:6D:04:12:1E:B8:7F:02:7C:66:F5:33:03:C2:8E:57:39:F9:43:FC:84:B3:8A:D6:AF:00:90:35:DD:94:57
# Fingerprint (SHA1): 6C:7C:CC:E7:D4:AE:51:5F:99:08:CD:3F:F6:E8:C3:78:DF:6F:EF:97
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
```

# Fingerprint (SHA-256):

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA LABEL UTF8 "D-TRUST Root CA 3 2013"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA\_SUBJECT\_MULTILINE\_OCTAL

**END** 

CKA ID UTF8 "0"

## CKA\_ISSUER MULTILINE\_OCTAL

**END** 

CKA SERIAL NUMBER MULTILINE OCTAL

\002\003\017\335\254

**END** 

### CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \060\202\004\016\060\202\002\366\240\003\002\001\002\002\003\017 $$$ \335\254\060\015\006\011\052\206\110\206\367\015\001\001\013\005 \000\060\105\061\013\060\011\006\003\125\004\006\023\002\104\105 \163\164\040\107\155\142\110\061\037\060\035\006\003\125\004\003 \014\026\104\055\124\122\125\123\124\040\122\157\157\164\040\103 \101\040\063\040\062\060\061\063\060\036\027\015\061\063\060\071 \062\060\060\070\062\065\065\061\132\027\015\062\070\060\071\062 \060\060\070\062\065\065\061\132\060\105\061\013\060\011\006\003 \125\004\006\023\002\104\105\061\025\060\023\006\003\125\004\012 \014\014\104\055\124\162\165\163\164\040\107\155\142\110\061\037 \060\035\006\003\125\004\003\014\026\104\055\124\122\125\123\124 \040\122\157\157\164\040\103\101\040\063\040\062\060\061\063\060 \202\001\042\060\015\006\011\052\206\110\206\367\015\001\001\001  $\label{eq:condition} $$ \005\000\003\202\001\017\000\060\202\001\012\002\202\001\001\000$ \304\173\102\222\202\037\354\355\124\230\216\022\300\312\011\337 \223\156\072\223\134\033\344\020\167\236\116\151\210\154\366\341 \151\362\366\233\242\141\261\275\007\040\164\230\145\361\214\046 \010\315\250\065\312\200\066\321\143\155\350\104\172\202\303\154 \136\336\273\350\066\322\304\150\066\214\237\062\275\204\042\340 \334\302\356\020\106\071\155\257\223\071\256\207\346\303\274\011 \311\054\153\147\133\331\233\166\165\114\013\340\273\305\327\274 \076\171\362\137\276\321\220\127\371\256\366\146\137\061\277\323 \155\217\247\272\112\363\043\145\273\267\357\243\045\327\012\352

\130\266\357\210\372\372\171\262\122\130\325\360\254\214\241\121 \164\051\225\252\121\073\220\062\003\237\034\162\164\220\336\075 \355\141\322\345\343\375\144\107\345\271\267\112\251\367\037\256 \226\206\004\254\057\343\244\201\167\267\132\026\377\330\017\077 \366\267\170\314\244\257\372\133\074\022\133\250\122\211\162\357  $\label{eq:condition} $$ \frac{325}{104}201\\206\\225\\043\\237\\173\\335\\274\\331\\064\\357\\174$ \224\074\252\300\101\302\343\235\120\032\300\344\031\042\374\263 \002\003\001\000\001\243\202\001\005\060\202\001\001\006\017\006  $\label{eq:condition} $$ \003\125\035\023\001\001\377\004\005\060\003\001\001\377\060\035$ \006\003\125\035\016\004\026\004\024\077\220\310\175\307\025\157 \363\044\217\251\303\057\113\242\017\041\262\057\347\060\016\006  $\label{eq:condition} $$ \003\125\035\017\001\001\377\004\004\003\002\001\006\060\201\276$ \006\003\125\035\037\004\201\266\060\201\263\060\164\240\162\240  $\label{eq:condition} $$ 160\206\156\154\144\141\160\072\057\057\144\151\162\145\143\164$$$ \157\162\171\056\144\055\164\162\165\163\164\056\156\145\164\057 \103\116\075\104\055\124\122\125\123\124\045\062\060\122\157\157 \164\045\062\060\103\101\045\062\060\063\045\062\060\062\060\061 \063\054\117\075\104\055\124\162\165\163\164\045\062\060\107\155 \142\110\054\103\075\104\105\077\143\145\162\164\151\146\151\143 \141\164\145\162\145\166\157\143\141\164\151\157\156\154\151\163 \164\060\073\240\071\240\067\206\065\150\164\164\160\072\057\057 \143\162\154\056\144\055\164\162\165\163\164\056\156\145\164\057  $\\ 143 \\ 162 \\ 154 \\ 057 \\ 144 \\ 055 \\ 164 \\ 162 \\ 165 \\ 163 \\ 164 \\ 137 \\ 162 \\ 157 \\ 157 \\ 164 \\$ \137\143\141\137\063\137\062\060\061\063\056\143\162\154\060\015  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\013\005\000\003\202\001 $$$ \001\000\016\131\016\130\344\164\110\043\104\317\064\041\265\234 \024\032\255\232\113\267\263\210\155\134\251\027\160\360\052\237 \215\173\371\173\205\372\307\071\350\020\010\260\065\053\137\317 \002\322\323\234\310\013\036\356\005\124\256\067\223\004\011\175 \154\217\302\164\274\370\034\224\276\061\001\100\055\363\044\040 \267\204\125\054\134\310\365\164\112\020\031\213\243\307\355\065 \326\011\110\323\016\300\272\071\250\260\106\002\260\333\306\210 \131\302\276\374\173\261\053\317\176\142\207\125\226\314\001\157 \233\147\041\225\065\213\370\020\374\161\033\267\113\067\151\246 \073\326\354\213\356\301\260\363\045\311\217\222\175\241\352\303 \312\104\277\046\245\164\222\234\343\164\353\235\164\331\313\115 \207\330\374\264\151\154\213\240\103\007\140\170\227\351\331\223  $\label{eq:condition} $$ \frac{174\302\106\274\233\067\122\243\355\212\074\023\251\173\123\113}{113} $$$ \111\232\021\005\054\013\156\126\254\037\056\202\154\340\151\147 \265\016\155\055\331\344\300\025\361\077\372\030\162\341\025\155 \047\133\055\060\050\053\237\110\232\144\053\231\357\362\165\111 \137\134

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "D-TRUST Root CA 3 2013"

```
# Serial Number: 1039788 (0xfddac)
# Subject: CN=D-TRUST Root CA 3 2013,O=D-Trust GmbH,C=DE
# Not Valid Before: Fri Sep 20 08:25:51 2013
# Not Valid After: Wed Sep 20 08:25:51 2028
# Fingerprint (SHA-256):
A1:A8:6D:04:12:1E:B8:7F:02:7C:66:F5:33:03:C2:8E:57:39:F9:43:FC:84:B3:8A:D6:AF:00:90:35:DD:94:57
# Fingerprint (SHA1): 6C:7C:CC:E7:D4:AE:51:5F:99:08:CD:3F:F6:E8:C3:78:DF:6F:EF:97
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "D-TRUST Root CA 3 2013"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\label{eq:condition} $$ \frac{154}174\sqrt{314}\sqrt{324}\sqrt{56}121\sqrt{137}\sqrt{231}010\sqrt{315}\sqrt{77}\sqrt{366}\sqrt{350}\sqrt{303}\sqrt{170} 
\337\157\357\227
END
CKA CERT MD5 HASH MULTILINE OCTAL
\267\042\146\230\176\326\003\340\301\161\346\165\315\126\105\277
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\105\061\013\060\011\006\003\125\004\006\023\002\104\105\061 $$
\025\060\023\006\003\125\004\012\014\014\104\055\124\162\165\163
\164\040\107\155\142\110\061\037\060\035\006\003\125\004\003\014
\026\104\055\124\122\125\123\124\040\122\157\157\164\040\103\101
\040\063\040\062\060\061\063
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\003\017\335\254
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "TUBITAK Kamu SM SSL Kok Sertifikasi - Surum 1"
# Issuer: CN=TUBITAK Kamu SM SSL Kok Sertifikasi - Surum 1,OU=Kamu Sertifikasyon Merkezi - Kamu
SM,O=Turkiye Bilimsel ve Teknolojik Arastirma Kurumu - TUBITAK,L=Gebze - Kocaeli,C=TR
# Serial Number: 1 (0x1)
# Subject: CN=TUBITAK Kamu SM SSL Kok Sertifikasi - Surum 1,OU=Kamu Sertifikasyon Merkezi - Kamu
SM,O=Turkiye Bilimsel ve Teknolojik Arastirma Kurumu - TUBITAK,L=Gebze - Kocaeli,C=TR
# Not Valid Before: Mon Nov 25 08:25:55 2013
# Not Valid After: Sun Oct 25 08:25:55 2043
# Fingerprint (SHA-256):
46:ED:C3:68:90:46:D5:3A:45:3F:B3:10:4A:B8:0D:CA:EC:65:8B:26:60:EA:16:29:DD:7E:86:79:90:64:87:16
# Fingerprint (SHA1): 31:43:64:9B:EC:CE:27:EC:ED:3A:3F:0B:8F:0D:E4:E8:91:DD:EE:CA
```

# Issuer: CN=D-TRUST Root CA 3 2013,O=D-Trust GmbH,C=DE

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA LABEL UTF8 "TUBITAK Kamu SM SSL Kok Sertifikasi - Surum 1"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \000\201\322\0061\013\000\011\000\003\125\0004\0006\0023\0017\107\145\142\172\145\004\0055\040\113\157\143\141\145\154\151\1061\102\060\100\006\003\125\0004\012\151\154\151\155\163\145\154\040\166\145\040\124\145\153\156\157\154\157\152\151\153\040\101\162\141\163\164\151\162\155\141\040\113\165\162\165\155\165\040\123\141\163\171\157\156\040\113\141\155\165\040\113\141\155\165\040\113\141\155\165\040\113\141\155\165\040\113\141\155\165\040\113\141\113\040\113\141\155\165\040\113\141\113\040\113\141\155\165\040\113\157\153\040\113\141\155\165\164\151\146\151\153\141\163\151\040\1055\040\113\157\153\040\123\145\162\164\151\146\151\153\141\163\151\040\055\040\113\157\153\040\123\145\162\164\151\146\151\153\141\163\151\040\055\040\1123\165\162\165\155\040\061$ 

**END** 

CKA\_ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \060\201\322\061\013\060\0011\006\003\125\004\007\023\017\107\145\142\172\145\040\055\040\113\157\143\141\145\154\151\061\102\060\100\006\003\125\004\012\151\154\151\155\163\145\154\040\166\145\040\124\145\153\156\157\154\157\152\151\153\040\101\162\141\163\164\151\162\155\141\040\113\165\162\165\155\165\040\0055\040\113\141\155\165\040\115\145\162\153\141\163\171\157\156\040\115\145\162\153\141\163\171\157\156\040\113\141\155\165\040\123\115\066\060\064\006\003\125\004\003\023\0055\124\125\102\111\124\101\113\040\113\141\155\165\040\123\115\040\123\115\040\123\115\040\123\165\162\164\151\146\151\146\151\153\141\163\151\040\055\040\113\157\153\040\123\115\153\141\163\151\040\055\040\123\165\162\165\155\040\061$ 

**END** 

 $CKA\_SERIAL\_NUMBER\ MULTILINE\_OCTAL$ 

\002\001\001

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\200\4\143\060\202\003\113\240\003\002\001\002\0002\001\001\\ \noindent \noin$ 

\004\012\023\071\124\165\162\153\151\171\145\040\102\151\154\151 \155\163\145\154\040\166\145\040\124\145\153\156\157\154\157\152 \151\153\040\101\162\141\163\164\151\162\155\141\040\113\165\162 \165\155\165\040\055\040\124\125\102\111\124\101\113\061\055\060 \053\006\003\125\004\013\023\044\113\141\155\165\040\123\145\162 \172\151\040\055\040\113\141\155\165\040\123\115\061\066\060\064 \006\003\125\004\003\023\055\124\125\102\111\124\101\113\040\113 \145\162\164\151\146\151\153\141\163\151\040\055\040\123\165\162 \165\155\040\061\060\036\027\015\061\063\061\061\062\065\060\070 \065\065\065\132\060\201\322\061\013\060\011\006\003\125\004\006  $\label{eq:condition} $$ \023\02\124\122\061\030\060\026\006\003\125\004\007\023\017\107$  $\\ 145\\142\\172\\145\\040\\055\\040\\113\\157\\143\\141\\145\\154\\151\\061\\102$ \060\100\006\003\125\004\012\023\071\124\165\162\153\151\171\145  $\\ \langle 040 \rangle 102 \rangle 151 \rangle 154 \rangle 151 \rangle 163 \rangle 145 \rangle 154 \rangle 040 \rangle 166 \rangle 145 \rangle 040 \rangle 124 \rangle 145 \rangle 153 \rangle 163 \rangle 163 \rangle 164 \rangle 164 \rangle 164 \rangle 164 \rangle 165 \rangle 164 \rangle 165 \rangle 164 \rangle 165 \rangle 164 \rangle 165 \rangle$ \156\157\154\157\152\151\153\040\101\162\141\163\164\151\162\155 \141\040\113\165\162\165\155\165\040\055\040\124\125\102\111\124 \165\040\123\145\162\164\151\146\151\153\141\163\171\157\156\040 \115\145\162\153\145\172\151\040\055\040\113\141\155\165\040\123 \124\101\113\040\113\141\155\165\040\123\115\040\123\123\114\040 \055\040\123\165\162\165\155\040\061\060\202\001\042\060\015\006 \011\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017  $\label{eq:condition} $$ \000\060\202\001\012\002\202\001\001\000\257\165\060\063\252\273 $$$ \153\323\231\054\022\067\204\331\215\173\227\200\323\156\347\377 \233\120\225\076\220\225\126\102\327\031\174\046\204\215\222\372  $\label{eq:condition} $$ \072\017\342\144\070\267\214\274\350\210\371\213\044\253 $$$ \056\243\365\067\344\100\216\030\045\171\203\165\037\073\377\154 \250\305\306\126\370\264\355\212\104\243\253\154\114\374\035\320 \334\357\150\275\317\344\252\316\360\125\367\242\064\324\203\153 \067\174\034\302\376\265\003\354\127\316\274\264\265\305\355\000 \017\123\067\052\115\364\117\014\203\373\206\317\313\376\214\116 \275\207\371\247\213\041\127\234\172\337\003\147\211\054\235\227  $\label{eq:condition} $$ \frac{141}247\\020\\270\\125\\220\\177\\016\\055\\047\\070\\164\\337\\347\\375\\332$ \116\022\343\115\025\042\002\310\340\340\374\017\255\212\327\311 \124\120\314\073\017\312\026\200\204\320\121\126\303\216\126\177 \211\042\063\057\346\205\012\275\245\250\033\066\336\323\334\054 \155\073\307\023\275\131\043\054\346\345\244\367\330\013\355\352 \220\100\104\250\225\273\223\325\320\200\064\266\106\170\016\037 \000\223\106\341\356\351\371\354\117\027\002\003\001\000\001\243 \102\060\100\060\035\006\003\125\035\016\004\026\004\024\145\077 \307\212\206\306\074\335\074\124\134\065\370\072\355\122\014\107 \127\310\060\016\006\003\125\035\017\001\001\377\004\004\003\002  $\label{eq:condition} $$ \001\006\000\17\006\003\125\035\023\001\001\377\004\005\060\003\$ 

\001\001\377\060\015\006\011\052\206\110\206\367\015\001\001\013 \005\000\003\202\001\001\000\052\077\341\361\062\216\256\341\230 \134\113\136\317\153\036\152\011\322\042\251\022\307\136\127\175 \163\126\144\200\204\172\223\344\011\271\020\315\237\052\047\341  $\label{eq:condition} $$ \000\167\276\110\310\065\250\201\237\344\270\054\311\177\016\260 $$$ \322\113\067\135\352\271\325\013\136\064\275\364\163\051\303\355 \046\025\234\176\010\123\212\130\215\320\113\050\337\301\263\337  $\\ \langle 040 \rangle 363 \rangle 371 \rangle 343 \rangle 343 \rangle 072 \rangle 337 \rangle 314 \rangle 234 \rangle 224 \rangle 330 \rangle 116 \rangle 117 \rangle 303 \rangle 153 \rangle 027 \rangle 343 \rangle$ \267\367\162\350\255\146\063\265\045\123\253\340\370\114\251\235 \375\362\015\272\256\271\331\252\306\153\371\223\273\256\253\270  $\label{eq:condition} $$ \227\074\003\032\272\103\306\226\271\105\162\070\263\247\241\226$  $\label{eq:condition} $$ \075\221\173\176\300\041\123\114\207\355\362\013\124\225\121\223$ \325\042\245\015\212\361\223\016\076\124\016\260\330\311\116\334 \362\061\062\126\352\144\371\352\265\235\026\146\102\162\363\177  $\label{eq:condition} $$ 323 \times 61 \times 1061 \times 374 \times 44 \times 16 \times 7361 \times 55 \times 43 \times 253 \times 224 \times 46 \times 370 \times 255 \times 61 \times 1061 \times 106$ \373\017\010\156\046\055\177\027\007\011\262\214\373\120\300\237 \226\215\317\266\375\000\235\132\024\232\277\002\104\365\301\302 \237\042\136\242\017\241\343

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "TUBITAK Kamu SM SSL Kok Sertifikasi - Surum 1"

# Issuer: CN=TUBITAK Kamu SM SSL Kok Sertifikasi - Surum 1,OU=Kamu Sertifikasyon Merkezi - Kamu SM,O=Turkiye Bilimsel ve Teknolojik Arastirma Kurumu - TUBITAK,L=Gebze - Kocaeli,C=TR # Serial Number: 1 (0x1)

# Subject: CN=TUBITAK Kamu SM SSL Kok Sertifikasi - Surum 1,OU=Kamu Sertifikasyon Merkezi - Kamu SM,O=Turkiye Bilimsel ve Teknolojik Arastirma Kurumu - TUBITAK,L=Gebze - Kocaeli,C=TR

# Not Valid Before: Mon Nov 25 08:25:55 2013

# Not Valid After : Sun Oct 25 08:25:55 2043

# Fingerprint (SHA-256):

46:ED:C3:68:90:46:D5:3A:45:3F:B3:10:4A:B8:0D:CA:EC:65:8B:26:60:EA:16:29:DD:7E:86:79:90:64:87:16

# Fingerprint (SHA1): 31:43:64:9B:EC:CE:27:EC:ED:3A:3F:0B:8F:0D:E4:E8:91:DD:EE:CA

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "TUBITAK Kamu SM SSL Kok Sertifikasi - Surum 1"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\061\103\144\233\354\316\047\354\355\072\077\013\217\015\344\350

 $\verb|\langle 221 | 335 | 356 | 312|$ 

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\334\000\201\334\151\057\076\057\260\073\366\075\132\221\216\111

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\201\322\061\013\060\011\006\003\125\004\006\023\002\124\122

\061\030\060\026\006\003\125\004\007\023\017\107\145\142\172\145 \040\055\040\113\157\143\141\145\154\151\061\102\060\100\006\003 \125\004\012\023\071\124\165\162\153\151\171\145\040\102\151\154  $\label{eq:condition} $$ \frac{151}{155}\frac{163}{145}\frac{154}{040}\frac{166}{145}\frac{124}{145}\frac{153}{156}\frac{157}{154}\frac{157}{154}$  $\label{eq:local_$ \162\165\155\165\040\055\040\124\125\102\111\124\101\113\061\055 \060\053\006\003\125\004\013\023\044\113\141\155\165\040\123\145 \145\172\151\040\055\040\113\141\155\165\040\123\115\061\066\060 \064\006\003\125\004\003\023\055\124\125\102\111\124\101\113\040 \123\145\162\164\151\146\151\153\141\163\151\040\055\040\123\165 \162\165\155\040\061 **END** CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL \002\001\001 **END** CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE # Certificate "GDCA TrustAUTH R5 ROOT" # Issuer: CN=GDCA TrustAUTH R5 ROOT,O="GUANG DONG CERTIFICATE AUTHORITY CO..LTD.".C=CN # Serial Number:7d:09:97:fe:f0:47:ea:7a # Subject: CN=GDCA TrustAUTH R5 ROOT,O="GUANG DONG CERTIFICATE AUTHORITY CO.,LTD.",C=CN # Not Valid Before: Wed Nov 26 05:13:15 2014 # Not Valid After: Mon Dec 31 15:59:59 2040 # Fingerprint (SHA-256): BF:FF:8F:D0:44:33:48:7D:6A:8A:A6:0C:1A:29:76:7A:9F:C2:BB:B0:5E:42:0F:71:3A:13:B9:92:89:1D:38:93 # Fingerprint (SHA1): 0F:36:38:5B:81:1A:25:C3:9B:31:4E:83:CA:E9:34:66:70:CC:74:B4 CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE CKA\_TOKEN CK\_BBOOL CK\_TRUE CKA\_PRIVATE CK\_BBOOL CK\_FALSE CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE CKA\_LABEL UTF8 "GDCA TrustAUTH R5 ROOT" CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA\_SUBJECT MULTILINE\_OCTAL \060\142\061\013\060\011\006\003\125\004\006\023\002\103\116\061 \062\060\060\006\003\125\004\012\014\051\107\125\101\116\107\040 \104\117\116\107\040\103\105\122\124\111\106\111\103\101\124\105 \040\101\125\124\110\117\122\111\124\131\040\103\117\056\054\114 \124\104\056\061\037\060\035\006\003\125\004\003\014\026\107\104 \103\101\040\124\162\165\163\164\101\125\124\110\040\122\065\040

\122\117\117\124

**END** 

CKA ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000142\001\006\003\125\004\006\023\002\103\116\061\062\060\060\006\003\125\004\012\014\051\107\125\101\116\107\040\104\117\116\107\040\103\105\122\124\111\106\111\103\101\124\105\004\0103\117\056\054\114\124\104\056\061\037\060\035\006\003\125\004\003\014\026\107\104\103\101\040\124\162\165\163\164\101\125\124\110\040\122\065\040\122\117\117\124$ 

**END** 

CKA SERIAL NUMBER MULTILINE OCTAL

 $\label{eq:condition} $$ \002\010\175\011\227\376\360\107\352\172$$ 

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \0.060\202\005\210\060\202\003\160\240\003\002\001\002\002\010\175$ \011\227\376\360\107\352\172\060\015\006\011\052\206\110\206\367 \015\001\001\013\005\000\060\142\061\013\060\011\006\003\125\004  $\label{eq:condition} $$ \006\023\002\103\116\061\062\060\060\006\003\125\004\012\014\051\$ \107\125\101\116\107\040\104\117\116\107\040\103\105\122\124\111 \106\111\103\101\124\105\040\101\125\124\110\117\122\111\124\131  $\\ \\ \langle 040 \rangle 103 \rangle 117 \\ \langle 056 \rangle 054 \\ \langle 114 \rangle 124 \\ \langle 104 \rangle 056 \\ \langle 061 \rangle 037 \\ \langle 060 \rangle 035 \\ \langle 006 \rangle 003 \\ \langle 125 \rangle 006 \\ \langle 015 \rangle 006 \\ \langle 01$ \004\003\014\026\107\104\103\101\040\124\162\165\163\164\101\125 \124\110\040\122\065\040\122\117\117\124\060\036\027\015\061\064 \061\061\062\066\060\065\061\063\061\065\132\027\015\064\060\061 \062\063\061\061\065\065\071\065\071\132\060\142\061\013\060\011 \006\003\125\004\006\023\002\103\116\061\062\060\060\006\003\125  $\\ \\004\\012\\014\\051\\107\\125\\101\\1116\\107\\040\\104\\117\\116\\107\\040\\103$ \105\122\124\111\106\111\103\101\124\105\040\101\125\124\110\117  $\label{eq:lambda} $$ 122\111\124\131\040\103\117\056\054\114\124\104\056\061\037\060$$ \035\006\003\125\004\003\014\026\107\104\103\101\040\124\162\165 \163\164\101\125\124\110\040\122\065\040\122\117\117\124\060\202 \002\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005 \000\003\202\002\017\000\060\202\002\012\002\202\002\001\000\331 \243\026\360\310\164\164\167\233\357\063\015\073\006\176\125\374 \265\140\217\166\206\022\102\175\126\146\076\210\202\355\162\143  $\label{eq:condition} $$ \064\236\213\335\064\054\002\121\121\303\031\375\131\124\204\311\ .$ \361\153\263\114\260\351\350\106\135\070\306\242\247\056\021\127 \272\202\025\242\234\217\155\260\231\112\012\362\353\211\160\143 \116\171\304\267\133\275\242\135\261\362\101\002\053\255\251\072 \243\354\171\012\354\137\072\343\375\357\200\074\255\064\233\032 \253\210\046\173\126\242\202\206\037\353\065\211\203\177\137\256 \051\116\075\266\156\354\256\301\360\047\233\256\343\364\354\357 \256\177\367\206\075\162\172\353\245\373\131\116\247\353\225\214 \042\071\171\341\055\010\217\314\274\221\270\101\367\024\301\043 \251\303\255\232\105\104\263\262\327\054\315\306\051\342\120\020 \256\134\313\202\216\027\030\066\175\227\346\210\232\260\115\064

\011\364\054\271\132\146\052\260\027\233\236\036\166\235\112\146 \061\101\337\077\373\305\006\357\033\266\176\032\106\066\367\144 \143\073\343\071\030\043\347\147\165\024\325\165\127\222\067\275 \276\152\033\046\120\362\066\046\006\220\305\160\001\144\155\166 \146\341\221\333\156\007\300\141\200\056\262\056\057\214\160\247 \321\073\074\263\221\344\156\266\304\073\160\362\154\222\227\011 \315\107\175\030\300\363\273\236\017\326\213\256\007\266\132\017 \316\013\014\107\247\345\076\270\275\175\307\233\065\240\141\227  $\label{eq:condition} $$ \072\101\165\027\314\053\226\167\052\222\041\036\331\225\166\040 $$$ \147\150\317\015\275\337\326\037\011\152\232\342\314\163\161\244  $\label{eq:condition} $$ \057\175\022\200\267\123\060\106\136\113\124\231\017\147\311\245 $$$ \310\362\040\301\202\354\235\021\337\302\002\373\032\073\321\355 \040\232\357\145\144\222\020\015\052\342\336\160\361\030\147\202 \214\141\336\270\274\321\057\234\373\017\320\053\355\033\166\271 \344\071\125\370\370\241\035\270\252\200\000\114\202\347\262\177 \011\270\274\060\240\057\015\365\122\236\216\367\222\263\012\000  $\label{eq:condition} $$ \000\124\227\006\340\261\007\331\307\017\134\145\175\074\155$$ \131\127\344\355\245\215\351\100\123\237\025\113\240\161\366\032 \041\343\332\160\006\041\130\024\207\205\167\171\252\202\171\002  $\label{eq:condition} $$ \003\001\000\001\243\102\060\100\060\035\006\003\125\035\016\004$ \026\004\024\342\311\100\237\115\316\350\232\241\174\317\016\077 \145\305\051\210\152\031\121\060\017\006\003\125\035\023\001\001 \377\004\005\060\003\001\001\377\060\016\006\003\125\035\017\001 \001\377\004\004\003\002\001\206\060\015\006\011\052\206\110\206  $\label{eq:condition} $$ \367\015\001\001\013\005\000\003\202\002\001\000\321\111\127\340 $$$ \247\314\150\130\272\001\017\053\031\315\215\260\141\105\254\021 \355\143\120\151\370\037\177\276\026\217\375\235\353\013\252\062 \107\166\322\147\044\355\275\174\063\062\227\052\307\005\206\146 \015\027\175\024\025\033\324\353\375\037\232\366\136\227\151\267 \032\045\244\012\263\221\077\137\066\254\213\354\127\250\076\347  $\label{eq:condition} $$ \201\212\030\127\071\205\164\032\102\307\351\133\023\137\217\371 $$$ \010\351\222\164\215\365\107\322\253\073\326\373\170\146\116\066 \175\371\351\222\351\004\336\375\111\143\374\155\373\024\161\223 \147\057\107\112\267\271\377\036\052\163\160\106\060\277\132\362 \057\171\245\341\215\014\331\371\262\143\067\214\067\145\205\160 \152\134\133\011\162\271\255\143\074\261\335\370\374\062\277\067 \206\344\273\216\230\047\176\272\037\026\341\160\021\362\003\337  $\label{eq:condition} $$ \045\142\062\047\046\030\062\204\237\377\000\072\023\272\232\115$$ \364\117\270\024\160\042\261\312\053\220\316\051\301\160\364\057 \235\177\362\220\036\326\132\337\267\106\374\346\206\372\313\340 \040\166\172\272\246\313\365\174\336\142\245\261\213\356\336\202 \146\212\116\072\060\037\077\200\313\255\047\272\014\136\327\320 \261\126\312\167\161\262\265\165\241\120\251\100\103\027\302\050 \331\317\122\213\133\310\143\324\102\076\240\063\172\106\056\367  $\label{eq:condition} $$ \012\040\106\124\176\152\117\061\361\201\176\102\164\070\145\163$ \047\356\306\174\270\216\327\245\072\327\230\241\234\214\020\125 \323\333\113\354\100\220\362\315\156\127\322\142\016\174\127\223 \261\247\155\315\235\203\273\052\347\345\266\073\161\130\255\375

 $\label{eq:control_co$ 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "GDCA TrustAUTH R5 ROOT"

# Issuer: CN=GDCA TrustAUTH R5 ROOT,O="GUANG DONG CERTIFICATE AUTHORITY CO.,LTD.",C=CN

# Serial Number:7d:09:97:fe:f0:47:ea:7a

# Subject: CN=GDCA TrustAUTH R5 ROOT,O="GUANG DONG CERTIFICATE AUTHORITY

CO.,LTD.",C=CN

**END** 

# Not Valid Before: Wed Nov 26 05:13:15 2014 # Not Valid After: Mon Dec 31 15:59:59 2040

# Fingerprint (SHA-256):

BF:FF:8F:D0:44:33:48:7D:6A:8A:A6:0C:1A:29:76:7A:9F:C2:BB:B0:5E:42:0F:71:3A:13:B9:92:89:1D:38:93

# Fingerprint (SHA1): 0F:36:38:5B:81:1A:25:C3:9B:31:4E:83:CA:E9:34:66:70:CC:74:B4

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "GDCA TrustAUTH R5 ROOT"

 $CKA\_CERT\_SHA1\_HASH\ MULTILINE\_OCTAL$ 

 $\label{eq:condition} $$ \017\066\070\133\201\032\045\303\233\061\116\203\312\351\064\146 $$$ 

\160\314\164\264

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\143\314\331\075\064\065\134\157\123\243\342\010\160\110\037\264

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000142\061\013\060\011\060\003\125\004\006\023\002\103\116\061\062\060\060\006\003\125\004\012\110\1125\110\116\107\040\103\112\110\111\106\111\1103\111\1124\110\1124\110\1124\111\1124\113\1040\103\117\056\054\114\1124\104\056\061\037\060\035\006\003\125\004\003\014\026\107\104\103\101\040\124\162\165\163\164\101\125\124\110\040\122\065\040\122\117\117\124$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\010\175\011\227\376\360\107\352\172$$ 

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END
```

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "TrustCor RootCert CA-1"

#

# Issuer: CN=TrustCor RootCert CA-1,OU=TrustCor Certificate Authority,O=TrustCor Systems S. de

R.L.,L=Panama City,ST=Panama,C=PA

# Serial Number:00:da:9b:ec:71:f3:03:b0:19

# Subject: CN=TrustCor RootCert CA-1,OU=TrustCor Certificate Authority,O=TrustCor Systems S. de

R.L.,L=Panama City,ST=Panama,C=PA

# Not Valid Before: Thu Feb 04 12:32:16 2016

# Not Valid After: Mon Dec 31 17:23:16 2029

# Fingerprint (SHA-256):

D4:0E:9C:86:CD:8F:E4:68:C1:77:69:59:F4:9E:A7:74:FA:54:86:84:B6:C4:06:F3:90:92:61:F4:DC:E2:57:5C

# Fingerprint (SHA1): FF:BD:CD:E7:82:C8:43:5E:3C:6F:26:86:5C:CA:A8:3A:45:5B:C3:0A

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "TrustCor RootCert CA-1"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

\060\201\244\061\013\060\011\006\003\125\004\006\023\002\120\101

 $\label{eq:condition} $$ \006\0015\006\003\125\004\010\014\006\120\141\156\141\155$$ 

 $\label{eq:condition} $$ 141\061\024\060\022\006\003\125\004\007\014\013\120\141\156\141 $$$ 

\155\141\040\103\151\164\171\061\044\060\042\006\003\125\004\012

 $\label{eq:condition} $$ \014\033\124\162\165\163\164\103\157\162\040\123\171\163\164\145$$ 

\155\163\040\123\056\040\144\145\040\122\056\114\056\061\047\060

\045\006\003\125\004\013\014\036\124\162\165\163\164\103\157\162

\150\157\162\151\164\171\061\037\060\035\006\003\125\004\003\014

 $\label{eq:condition} $$ \026\124\162\165\163\164\103\157\162\040\122\157\157\164\103\145$$ 

\162\164\040\103\101\055\061

**END** 

CKA\_ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\201\244\061\013\060\0011\006\003\125\004\000\120\141\156\141\155\141\061\024\060\022\006\003\125\004\007\014\013\120\141\156\141\155\141\040\103\151\164\171\061\044\060\042\006\003\125\004\012\014\13\171\163\164\145\155\163\040\123\056\040\144\145\040\122\056\114\056\061\047\060\045\006\003\125\004\013\014\036\124\162\165\163\164\103\157\162\040\103\157\162\040\103\145\162\164\151\146\151\143\141\164\145\040\101\165\164$ 

\150\157\162\151\164\171\061\037\060\035\006\003\125\004\003\014 \026\124\162\165\163\164\103\157\162\040\122\157\157\164\103\145 \162\164\040\103\101\055\061

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\011\000\332\233\354\161\363\003\260\031

**END** 

### CKA VALUE MULTILINE OCTAL

\060\202\004\060\060\202\003\030\240\003\002\001\002\002\011\000 \332\233\354\161\363\003\260\031\060\015\006\011\052\206\110\206 \367\015\001\001\013\005\000\060\201\244\061\013\060\011\006\003 \014\006\120\141\156\141\155\141\061\024\060\022\006\003\125\004  $\\ \\007\\ \\014\\ \\013\\ \\120\\ \\141\\ \\156\\ \\141\\ \\155\\ \\141\\ \\040\\ \\103\\ \\151\\ \\164\\ \\171\\ \\061\\ \\044$  $\label{eq:condition} $$ \004\003\125\004\012\014\033\124\162\165\163\164\103\157$$ \162\040\123\171\163\164\145\155\163\040\123\056\040\144\145\040  $\label{eq:condition} $$ \frac{122}056\\114\\056\\061\\047\\060\\045\\006\\003\\125\\004\\013\\014\\036\\124$ \162\165\163\164\103\157\162\040\103\145\162\164\151\146\151\143 \141\164\145\040\101\165\164\150\157\162\151\164\171\061\037\060  $\label{eq:condition} $$ \006\003\125\004\003\014\026\124\162\165\163\164\103\157\162 $$$ \040\122\157\157\164\103\145\162\164\040\103\101\055\061\060\036 \027\015\061\066\060\062\060\064\061\062\063\062\061\066\132\027 \244\061\013\060\011\006\003\125\004\006\023\002\120\101\061\017 \060\015\006\003\125\004\010\014\006\120\141\156\141\155\141\061 \040\103\151\164\171\061\044\060\042\006\003\125\004\012\014\033 \040\123\056\040\144\145\040\122\056\114\056\061\047\060\045\006 \003\125\004\013\014\036\124\162\165\163\164\103\157\162\040\103 \145\162\164\151\146\151\143\141\164\145\040\101\165\164\150\157 \162\151\164\171\061\037\060\035\006\003\125\004\003\014\026\124 \162\165\163\164\103\157\162\040\122\157\157\164\103\145\162\164 \040\103\101\055\061\060\202\001\042\060\015\006\011\052\206\110 \206\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001 \012\002\202\001\001\000\277\216\267\225\342\302\046\022\153\063 \031\307\100\130\012\253\131\252\215\000\243\374\200\307\120\173 \216\324\040\046\272\062\022\330\043\124\111\045\020\042\230\235 \106\322\301\311\236\116\033\056\054\016\070\363\032\045\150\034 \246\132\005\346\036\213\110\277\230\226\164\076\151\312\351\265 \170\245\006\274\325\000\136\011\012\362\047\172\122\374\055\325 \261\352\264\211\141\044\363\032\023\333\251\317\122\355\014\044 \272\271\236\354\176\000\164\372\223\255\154\051\222\256\121\264 \273\323\127\277\263\363\250\215\234\364\044\113\052\326\231\236 \364\236\376\300\176\102\072\347\013\225\123\332\267\150\016\220 \114\373\160\077\217\112\054\224\363\046\335\143\151\251\224\330 \020\116\305\107\010\220\231\033\027\115\271\154\156\357\140\225 \021\216\041\200\265\275\240\163\330\320\262\167\304\105\352\132

\046\373\146\166\166\370\006\037\141\155\017\125\305\203\267\020 \126\162\006\007\245\363\261\032\003\005\144\016\235\132\212\326  $\label{eq:condition} $$ \206\160\033\044\336\376\050\212\053\320\152\260\374\172\242\334$  $\label{eq:condition} $$ \262\171\016\213\145\017\002\003\001\000\001\243\143\060\141\060 $$$ \035\006\003\125\035\016\004\026\004\024\356\153\111\074\172\077  $\label{eq:condition} $$ \015\343\261\011\267\212\310\253\031\237\163\063\120\347\060\037$ \006\003\125\035\043\004\030\060\026\200\024\356\153\111\074\172  $\label{eq:condition} $$ \077\015\343\261\011\267\212\310\253\031\237\163\063\120\347\060 $$$ \017\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377 \060\016\006\003\125\035\017\001\001\377\004\004\003\002\001\206  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\013\005\000\003$  $\label{eq:condition} $$ \202\001\000\045\030\324\221\217\023\356\217\036\035\021\123$ \332\055\104\051\031\240\036\153\061\236\115\016\236\255\075\134  $\label{eq:condition} $$ 101\157\225\053\044\241\171\230\072\070\066\373\273\146\236\110 $$$ \377\220\220\357\075\324\270\233\264\207\165\077\040\233\316\162 \317\241\125\301\115\144\242\031\006\241\007\063\014\013\051\345 \361\352\253\243\354\265\012\164\220\307\175\162\362\327\134\237 \221\357\221\213\267\334\355\146\242\317\216\146\073\274\237\072  $\label{eq:condition} $$ \02340\047\335\026\230\300\225\324\012\244\344\201\232\165\224 $$$  $\label{eq:condition} $$ \065\234\220\137\210\067\006\255\131\225\012\260\321\147\323\031\$ \312\211\347\062\132\066\034\076\202\250\132\223\276\306\320\144 \221\266\317\331\266\030\317\333\176\322\145\243\246\304\216\027  $\label{eq:condition} $$ \061\301\373\176\166\333\323\205\343\130\262\167\172\166\073\154$$$ \057\120\034\347\333\366\147\171\037\365\202\225\232\007\247\024 \257\217\334\050\041\147\011\322\326\115\132\034\031\034\216\167 \134\303\224\044\075\062\153\113\176\324\170\224\203\276\067\115 \316\137\307\036\116\074\340\211\063\225\013\017\245\062\326\074 \132\171\054\031

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "TrustCor RootCert CA-1"
```

# Issuer: CN=TrustCor RootCert CA-1,OU=TrustCor Certificate Authority,O=TrustCor Systems S. de

R.L.,L=Panama City,ST=Panama,C=PA

# Serial Number:00:da:9b:ec:71:f3:03:b0:19

# Subject: CN=TrustCor RootCert CA-1,OU=TrustCor Certificate Authority,O=TrustCor Systems S. de

R.L.,L=Panama City,ST=Panama,C=PA

# Not Valid Before: Thu Feb 04 12:32:16 2016

# Not Valid After: Mon Dec 31 17:23:16 2029

# Fingerprint (SHA-256):

D4:0E:9C:86:CD:8F:E4:68:C1:77:69:59:F4:9E:A7:74:FA:54:86:84:B6:C4:06:F3:90:92:61:F4:DC:E2:57:5C

# Fingerprint (SHA1): FF:BD:CD:E7:82:C8:43:5E:3C:6F:26:86:5C:CA:A8:3A:45:5B:C3:0A

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

```
CKA CERT SHA1 HASH MULTILINE OCTAL
\377\275\315\347\202\310\103\136\074\157\046\206\134\312\250\072
\105\133\303\012
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\156\205\361\334\032\000\323\042\325\262\262\254\153\067\005\105
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\244\061\013\060\011\006\003\125\004\006\023\002\120\101
\label{eq:condition} $$ 141\061\024\060\022\006\003\125\004\007\014\013\120\141\156\141 $$
\155\141\040\103\151\164\171\061\044\060\042\006\003\125\004\012
\155\163\040\123\056\040\144\145\040\122\056\114\056\061\047\060
\045\006\003\125\004\013\014\036\124\162\165\163\164\103\157\162
\040\103\145\162\164\151\146\151\143\141\164\145\040\101\165\164
\150\157\162\151\164\171\061\037\060\035\006\003\125\004\003\014
\026\124\162\165\163\164\103\157\162\040\122\157\157\164\103\145
\162\164\040\103\101\055\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\011\000\332\233\354\161\363\003\260\031
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "TrustCor RootCert CA-2"
# Issuer: CN=TrustCor RootCert CA-2,OU=TrustCor Certificate Authority,O=TrustCor Systems S. de
R.L.,L=Panama City,ST=Panama,C=PA
# Serial Number:25:a1:df:ca:33:cb:59:02
# Subject: CN=TrustCor RootCert CA-2,OU=TrustCor Certificate Authority,O=TrustCor Systems S. de
R.L.,L=Panama City,ST=Panama,C=PA
# Not Valid Before: Thu Feb 04 12:32:23 2016
# Not Valid After: Sun Dec 31 17:26:39 2034
# Fingerprint (SHA-256):
07:53:E9:40:37:8C:1B:D5:E3:83:6E:39:5D:AE:A5:CB:83:9E:50:46:F1:BD:0E:AE:19:51:CF:10:FE:C7:C9:65
# Fingerprint (SHA1): B8:BE:6D:CB:56:F1:55:B9:63:D4:12:CA:4E:06:34:C7:94:B2:1C:C0
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "TrustCor RootCert CA-2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
```

CKA LABEL UTF8 "TrustCor RootCert CA-1"

### CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \000\201\244\061\013\060\0011\006\003\125\004\000\120\141\156\141\155\141\061\024\060\022\006\003\125\004\007\014\013\120\141\156\141\155\141\040\103\151\164\171\061\044\060\042\006\003\125\004\012\163\164\145\155\163\040\123\157\162\040\123\171\163\164\145\155\163\040\123\056\040\144\145\040\122\056\114\056\061\047\060\155\163\164\151\146\151\143\141\164\145\040\101\165\164\150\157\162\151\164\171\061\037\060\003\125\004\003\014\162\165\163\164\103\157\162\151\164\171\061\037\060\003\125\004\003\014\145\162\165\163\164\103\157\162\157\164\103\145\162\164\103\157\162\040\122\157\157\164\103\145\162\164\103\101\055\062$ 

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\201\244\061\013\060\0011\006\003\125\004\000\120\141\156\141\155\141\061\024\060\022\006\003\125\004\007\014\013\120\141\156\141\155\141\040\103\151\164\171\061\044\060\042\006\003\125\004\012\163\164\145\155\163\040\123\056\040\144\145\040\122\056\114\056\061\047\060\045\006\003\125\004\013\141\162\165\163\164\103\157\162\040\123\157\162\164\151\146\151\146\151\143\141\164\145\040\101\165\164\150\157\162\151\164\171\061\037\060\035\006\003\125\004\003\014\162\165\163\164\103\157\162\157\164\103\145\162\164\103\157\162\157\164\103\145\162\164\103\157\162\040\122\157\157\164\103\145\162\164\103\101\055\062$ 

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\010\045\241\337\312\063\313\131\002

END

## CKA\_VALUE MULTILINE\_OCTAL

\060\202\006\057\060\202\004\027\240\003\002\001\002\002\010\045 \241\337\312\063\313\131\002\060\015\006\011\052\206\110\206\367 \015\001\001\013\005\000\060\201\244\061\013\060\011\006\003\125 \004\006\023\002\120\101\061\017\060\015\006\003\125\004\010\014 \006\120\141\156\141\155\141\061\024\060\022\006\003\125\004\007 \014\013\120\141\156\141\155\141\040\103\151\164\171\061\044\060 \042\006\003\125\004\012\014\033\124\162\165\163\164\103\157\162  $\\ \\ \langle 040 \rangle 123 \rangle 171 \rangle 163 \rangle 164 \rangle 145 \rangle 155 \rangle 163 \rangle 040 \rangle 123 \rangle 056 \rangle 040 \rangle 144 \rangle 145 \rangle 040 \rangle 122 \rangle 123 \rangle 123$  $\label{eq:condition} $$ \0.056\114\0.056\0.061\0.047\0.060\0.045\0.006\0.03\1.25\0.04\0.13\0.14\0.036\1.24\1.62$ \165\163\164\103\157\162\040\103\145\162\164\151\146\151\143\141 \006\003\125\004\003\014\026\124\162\165\163\164\103\157\162\040 \122\157\157\164\103\145\162\164\040\103\101\055\062\060\036\027 \015\061\066\060\062\060\064\061\062\063\062\063\132\027\015 \063\064\061\062\063\061\061\067\062\066\063\071\132\060\201\244 \061\013\060\011\006\003\125\004\006\023\002\120\101\061\017\060 \015\006\003\125\004\010\014\006\120\141\156\141\155\141\061\024

\060\022\006\003\125\004\007\014\013\120\141\156\141\155\141\040 \103\151\164\171\061\044\060\042\006\003\125\004\012\014\033\124 \162\165\163\164\103\157\162\040\123\171\163\164\145\155\163\040 \123\056\040\144\145\040\122\056\114\056\061\047\060\045\006\003 \125\004\013\014\036\124\162\165\163\164\103\157\162\040\103\145 \151\164\171\061\037\060\035\006\003\125\004\003\014\026\124\162 \165\163\164\103\157\162\040\122\157\157\164\103\145\162\164\040  $\label{eq:condition} $$ 103\101\055\062\060\202\002\042\060\015\006\011\052\206\110\206$ \367\015\001\001\001\005\000\003\202\002\017\000\060\202\002\012  $\label{eq:condition} $$ \002\202\001\000\247\040\156\302\052\242\142\044\225\220\166$$  $\label{eq:condition} $$ \frac{310}070\\176\\200\\322\\253\\301\\233\\145\\005\\224\\364\\301\\012\\020\\325$ \002\254\355\237\223\307\207\310\260\047\053\102\014\075\012\076 \101\132\236\165\335\215\312\340\233\354\150\062\244\151\222\150 \214\013\201\016\126\240\076\032\335\054\045\024\202\057\227\323 \144\106\364\124\251\334\072\124\055\061\053\231\202\362\331\052  $\label{eq:condition} $$ 327\357\161\000\270\061\244\276\172\044\007\303\102\040\362\212$ \324\222\004\033\145\126\114\154\324\373\266\141\132\107\043\264 \330\151\264\267\072\320\164\074\014\165\241\214\116\166\241\351 \333\052\245\073\372\316\260\377\176\152\050\375\047\034\310\261 \351\051\361\127\156\144\264\320\301\025\155\016\276\056\016\106 \310\136\364\121\376\357\016\143\072\073\161\272\317\157\131\312  $\label{eq:condition} $$ \014\343\233\135\111\270\114\342\127\261\230\212\102\127\234\166$$ \357\357\275\321\150\250\322\364\011\273\167\065\276\045\202\010  $\label{eq:condition} $$ 304\026\054\104\040\126\251\104\021\167\357\135\264\035\252\136$$ \153\076\213\062\366\007\057\127\004\222\312\365\376\235\302\351 \350\263\216\114\113\002\061\331\344\074\110\202\047\367\030\202 \166\110\072\161\261\023\241\071\325\056\305\064\302\035\142\205 \337\003\376\115\364\257\075\337\134\133\215\372\160\341\245\176 \047\307\206\056\152\217\022\306\204\136\103\121\120\234\031\233  $\label{eq:condition} $$ 170\346\374\366\355\107\176\173\075\146\357\023\023\210\137\074$ \241\143\373\371\254\207\065\237\363\202\236\244\077\012\234\061 \151\213\231\244\210\112\216\156\146\115\357\026\304\017\171\050 \041\140\015\205\026\175\327\124\070\361\222\126\375\265\063\114 \203\334\327\020\237\113\375\306\370\102\275\272\174\163\002\340 \377\175\315\133\341\324\254\141\173\127\325\112\173\133\324\205 \130\047\135\277\370\053\140\254\240\046\256\024\041\047\306\167 \232\063\200\074\136\106\077\367\303\261\243\206\063\306\350\136 \015\271\065\054\252\106\301\205\002\165\200\240\353\044\373\025 \252\344\147\177\156\167\077\364\004\212\057\174\173\343\027\141 \360\335\011\251\040\310\276\011\244\320\176\104\303\262\060\112 \070\252\251\354\030\232\007\202\053\333\270\234\030\255\332\340  $\label{eq:condition} $$ 106\027\254\317\135\002\003\001\000\001\243\143\060\141\060\035 $$$ \006\003\125\035\016\004\026\004\024\331\376\041\100\156\224\236 \274\233\075\234\175\230\040\031\345\214\060\142\262\060\037\006 \003\125\035\043\004\030\060\026\200\024\331\376\041\100\156\224 \236\274\233\075\234\175\230\040\031\345\214\060\142\262\060\017 \006\003\125\035\023\001\001\377\004\005\060\003\001\001\377\060

\016\006\003\125\035\017\001\001\377\004\004\003\002\001\206\060 \015\006\011\052\206\110\206\367\015\001\001\013\005\000\003\202  $\label{eq:condition} $$ \002\001\000\236\105\236\014\073\266\357\341\072\310\174\321\000 $$$  $\label{eq:condition} $$ \075\317\342\352\006\265\262\072\273\006\113\150\172\320\043\227 $$$ \164\247\054\360\010\330\171\132\327\132\204\212\330\022\232\033 \331\175\134\115\160\305\245\371\253\345\243\211\211\335\001\372 \354\335\371\351\222\227\333\260\106\102\363\323\142\252\225\376  $\label{eq:condition} $$ \061\147\024\151\130\220\012\252\013\356\067\043\307\120\121\264$$$ \365\176\236\343\173\367\344\314\102\062\055\111\014\313\377\111 \014\233\036\064\375\156\156\226\212\171\003\266\157\333\011\313  $\label{eq:condition} $$ \375\137\145\024\067\341\070\365\363\141\026\130\344\265\155\015$$  $\label{eq:condition} $$ \03\07\120\055\177\263\307\172\032\026\200\140\370\212 $$$ \037\351\033\052\306\371\272\001\032\151\277\322\130\307\124\127  $\label{eq:condition} $$ \010\217\341\071\140\167\113\254\131\204\032\210\361\335\313\117 $$$ \170\327\347\341\063\055\374\356\101\372\040\260\276\313\367\070 \224\300\341\320\205\017\273\355\054\163\253\355\376\222\166\032  $\\ 144\\177\\133\\015\\063\\011\\007\\063\\173\\006\\077\\021\\244\\134\\160\\074$ \205\300\317\343\220\250\203\167\372\333\346\305\214\150\147\020  $\\ 147\\245\\122\\055\\360\\304\\231\\217\\177\\277\\321\\153\\342\\265\\107\\326$  $\label{eq:condition} $$ \frac{331}{320} 205 231 115 224 233 017 113 215 356 000 132 107 035 021$ \003\254\101\030\257\207\267\157\014\072\217\312\317\334\003\301 \242\011\310\345\375\200\136\310\140\102\001\033\032\123\132\273  $\label{eq:condition} $$ \067\246\267\274\272\204\351\036\154\032\324\144\332\324\103\376$ \223\213\113\362\054\171\026\020\324\223\013\210\217\241\330\206  $\label{eq:condition} $$ \024\106\221\107\233\050\044\357\127\122\116\134\102\234\252\367 $$$ \111\354\047\350\100\036\263\246\211\042\162\234\365\015\063\264 \130\243\060\073\335\324\152\124\223\276\032\115\363\223\224\367 \374\204\013\077\204\040\134\064\003\104\305\332\255\274\012\301 \002\317\036\345\224\331\363\216\133\330\114\360\235\354\141\027 \273\024\062\124\014\002\051\223\036\222\206\366\177\357\347\222  $\label{eq:condition} $$ \005\016\131\335\231\010\056\056\372\234\000\122\323\305\146\051 $$$ \344\247\227\104\244\016\050\201\023\065\305\366\157\144\346\101 \304\325\057\314\064\105\045\317\101\000\226\075\112\056\302\226  $\verb|230|117|116|112|234|227|267|333|037|222|062|310|377|017|121|156|$ \326\354\011

END

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "TrustCor RootCert CA-2"
```

# Issuer: CN=TrustCor RootCert CA-2,OU=TrustCor Certificate Authority,O=TrustCor Systems S. de

R.L.,L=Panama City,ST=Panama,C=PA

# Serial Number:25:a1:df:ca:33:cb:59:02

# Subject: CN=TrustCor RootCert CA-2,OU=TrustCor Certificate Authority,O=TrustCor Systems S. de

R.L.,L=Panama City,ST=Panama,C=PA

# Not Valid Before: Thu Feb 04 12:32:23 2016 # Not Valid After : Sun Dec 31 17:26:39 2034

```
# Fingerprint (SHA-256):
07:53:E9:40:37:8C:1B:D5:E3:83:6E:39:5D:AE:A5:CB:83:9E:50:46:F1:BD:0E:AE:19:51:CF:10:FE:C7:C9:65
# Fingerprint (SHA1): B8:BE:6D:CB:56:F1:55:B9:63:D4:12:CA:4E:06:34:C7:94:B2:1C:C0
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "TrustCor RootCert CA-2"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\270\276\155\313\126\361\125\271\143\324\022\312\116\006\064\307
\224\262\034\300
END
CKA CERT MD5 HASH MULTILINE OCTAL
\label{eq:condition} $\242\341\370\030\013\272\105\325\307\101\052\273\067\122\105\144$
END
CKA ISSUER MULTILINE OCTAL
\060\201\244\061\013\060\011\006\003\125\004\006\023\002\120\101
\061\017\060\015\006\003\125\004\010\014\006\120\141\156\141\155
\141\061\024\060\022\006\003\125\004\007\014\013\120\141\156\141
\155\141\040\103\151\164\171\061\044\060\042\006\003\125\004\012
\014\033\124\162\165\163\164\103\157\162\040\123\171\163\164\145
\155\163\040\123\056\040\144\145\040\122\056\114\056\061\047\060
\040\103\145\162\164\151\146\151\143\141\164\145\040\101\165\164
\150\157\162\151\164\171\061\037\060\035\006\003\125\004\003\014
\026\124\162\165\163\164\103\157\162\040\122\157\157\164\103\145
\162\164\040\103\101\055\062
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\010\045\241\337\312\063\313\131\002
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
#
# Certificate "TrustCor ECA-1"
# Issuer: CN=TrustCor ECA-1,OU=TrustCor Certificate Authority,O=TrustCor Systems S. de R.L.,L=Panama
City,ST=Panama,C=PA
# Serial Number:00:84:82:2c:5f:1c:62:d0:40
# Subject: CN=TrustCor ECA-1,OU=TrustCor Certificate Authority,O=TrustCor Systems S. de R.L.,L=Panama
City,ST=Panama,C=PA
# Not Valid Before: Thu Feb 04 12:32:33 2016
# Not Valid After: Mon Dec 31 17:28:07 2029
# Fingerprint (SHA-256):
5A:88:5D:B1:9C:01:D9:12:C5:75:93:88:93:8C:AF:BB:DF:03:1A:B2:D4:8E:91:EE:15:58:9B:42:97:1D:03:9C
```

# Fingerprint (SHA1): 58:D1:DF:95:95:67:6B:63:C0:F0:5B:1C:17:4D:8B:84:0B:C8:78:BD

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA LABEL UTF8 "TrustCor ECA-1"

CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:control_loss} $$ \004\01\234\061\013\060\011\006\003\125\004\000\120\141\156\141\155\141\061\024\060\022\006\003\125\004\007\014\013\120\141\156\141\155\141\040\103\151\164\171\061\044\060\042\006\003\125\004\012\163\164\145\155\163\040\123\056\040\144\145\040\122\056\114\056\061\047\060\045\006\003\125\004\013\014\036\124\162\165\163\164\103\157\162\040\103\145\162\164\151\146\151\143\141\164\145\040\101\165\164\150\157\162\151\164\171\061\027\060\025\006\003\125\004\003\014\016\124\162\165\163\164\103\157\162\040\105\103\101\055\061\ END$ 

CKA\_ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000\201\234\061\013\060\0011\006\003\125\0004\0003\125\0004\0006\120\141\156\141\155\141\061\024\060\022\006\003\125\0004\0007\014\013\120\141\156\141\155\141\040\103\151\164\171\061\044\060\042\006\003\125\0004\012\163\164\103\157\162\040\123\171\163\164\145\155\163\040\123\056\040\144\145\040\122\056\114\056\061\047\060\045\0006\003\125\0004\013\014\036\124\162\165\163\164\103\157\162\040\101\165\164\151\146\151\143\141\164\145\040\101\165\164\150\157\162\151\164\171\061\027\060\025\0006\003\125\0004\003\014\016\124\162\165\163\164\103\157\162\040\105\103\101\055\061\ END$ 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\011\000\204\202\054\137\034\142\320\100

**END** 

#### CKA VALUE MULTILINE OCTAL

\040\105\103\101\055\061\060\036\027\015\061\066\060\062\060\064 \061\062\063\062\063\063\132\027\015\062\071\061\062\063\061\061 \067\062\070\060\067\132\060\201\234\061\013\060\011\006\003\125 \004\006\023\002\120\101\061\017\060\015\006\003\125\004\010\014 \006\120\141\156\141\155\141\061\024\060\022\006\003\125\004\007 \014\013\120\141\156\141\155\141\040\103\151\164\171\061\044\060 \042\006\003\125\004\012\014\033\124\162\165\163\164\103\157\162 \040\123\171\163\164\145\155\163\040\123\056\040\144\145\040\122 \056\114\056\061\047\060\045\006\003\125\004\013\014\036\124\162 \165\163\164\103\157\162\040\103\145\162\164\151\146\151\143\141  $\label{eq:condition} $$ \006\003\125\004\003\014\016\124\162\165\163\164\103\157\162\040 $$$ \105\103\101\055\061\060\202\001\042\060\015\006\011\052\206\110 \206\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001  $\label{eq:condition} $$ \012\002\202\001\000\317\217\340\021\265\237\250\166\166\333 $$$ \337\017\124\357\163\143\051\202\255\107\306\243\153\355\376\137  $\label{eq:condition} $$ \063\370\103\121\351\032\063\221\061\027\240\164\304\324\247\001 $$$ \346\262\222\076\152\235\355\016\371\164\230\100\323\077\003\200 \006\202\100\350\261\342\247\121\247\035\203\046\153\253\336\372  $\label{eq:condition} $$ \027\221\053\330\306\254\036\261\236\031\001\325\227\246\352\015$$ \267\304\125\037\047\174\322\010\325\166\037\051\025\207\100\071 \335\070\105\021\165\320\232\247\064\340\277\315\310\122\035\271  $\label{eq:condition} $$ 107\176\015\270\273\306\014\366\163\127\026\132\176\103\221\037$ \125\072\306\155\104\004\252\234\251\234\247\114\211\027\203\256 \243\004\136\122\200\213\036\022\045\021\031\327\014\175\175\061 \104\101\352\333\257\260\034\357\201\320\054\305\232\041\233\075 \355\102\073\120\046\362\354\316\161\141\006\142\041\124\116\177  $\label{eq:condition} $$ 301\235\076\177\040\214\200\313\052\330\227\142\310\203\063\221 $$$ \175\260\242\132\017\127\350\073\314\362\045\262\324\174\057\354 \115\306\241\072\025\172\347\266\135\065\365\366\110\112\066\105  $\\ 146\\ 324\\ 272\\ 230\\ 130\\ 301\\ 002\\ 003\\ 001\\ 000\\ 001\\ 243\\ 143\\ 060\\ 141\\ 060$ \035\006\003\125\035\016\004\026\004\024\104\236\110\365\314\155 \110\324\240\113\177\376\131\044\057\203\227\231\232\206\060\037 \006\003\125\035\043\004\030\060\026\200\024\104\236\110\365\314 \155\110\324\240\113\177\376\131\044\057\203\227\231\232\206\060 \017\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377 \060\016\006\003\125\035\017\001\001\377\004\004\003\002\001\206  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\013\005\000\003$  $\label{eq:condition} $$ \202\001\000\005\076\065\134\025\160\233\311\307\163\141\157 $$$ \162\053\324\302\217\362\103\135\002\316\304\224\271\224\021\203 \147\135\342\147\154\165\166\277\273\014\252\066\306\255\107\223 \143\334\036\176\326\336\056\376\351\031\062\070\003\177\024\366 \226\367\053\047\233\325\044\314\035\335\301\072\340\230\104\260 \304\344\076\167\261\163\251\144\054\366\034\001\174\077\135\105 \205\300\205\347\045\217\225\334\027\363\074\237\032\156\260\312 \343\035\052\351\114\143\372\044\141\142\326\332\176\266\034\154 \365\002\035\324\052\335\125\220\353\052\021\107\074\056\136\164

 $\label{eq:condition} $$ \262\202\042\245\175\123\037\105\354\047\221\175\347\042\026\350\300\150\066\330\306\361\117\200\104\062\371\341\321\321\035\252\336\250\253\234\004\257\255\040\016\144\230\115\245\153\300\110\130\226\151\115\334\007\214\121\223\242\337\237\017\075\213\140\264\202\215\252\010\116\142\105\340\371\013\322\340\340\074\133\336\134\161\047\045\302\346\003\201\213\020\123\343\307\125\242\264\237\327\346$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "TrustCor ECA-1"

# Issuer: CN=TrustCor ECA-1,OU=TrustCor Certificate Authority,O=TrustCor Systems S. de R.L.,L=Panama City,ST=Panama,C=PA

# Serial Number:00:84:82:2c:5f:1c:62:d0:40

# Subject: CN=TrustCor ECA-1,OU=TrustCor Certificate Authority,O=TrustCor Systems S. de R.L.,L=Panama City,ST=Panama,C=PA

# Not Valid Before: Thu Feb 04 12:32:33 2016 # Not Valid After : Mon Dec 31 17:28:07 2029

# Fingerprint (SHA-256):

5A:88:5D:B1:9C:01:D9:12:C5:75:93:88:93:8C:AF:BB:DF:03:1A:B2:D4:8E:91:EE:15:58:9B:42:97:1D:03:9C

# Fingerprint (SHA1): 58:D1:DF:95:95:67:6B:63:C0:F0:5B:1C:17:4D:8B:84:0B:C8:78:BD

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "TrustCor ECA-1"

CKA CERT SHA1 HASH MULTILINE OCTAL

\130\321\337\225\225\147\153\143\300\360\133\034\027\115\213\204\013\310\170\275

1013/310/170

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\\ \langle 047 \rangle 222 \rangle 043 \rangle 035 \rangle 012 \rangle 365 \rangle 100 \rangle 174 \rangle 351 \rangle 346 \rangle 153 \rangle 235 \rangle 330 \rangle 365 \rangle 347 \rangle 154$ 

**END** 

CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000\201\234\061\013\060\0011\006\003\125\0004\0003\125\0004\0006\120\141\156\141\155\141\061\024\060\022\006\003\125\0004\0007\014\013\120\141\156\141\155\141\040\103\151\164\171\061\044\060\042\006\003\125\0004\012\163\164\143\157\162\040\123\171\163\164\145\155\163\040\123\056\004\0144\145\040\122\056\114\056\061\047\060\045\006\003\125\0004\013\014\036\124\162\165\163\164\103\157\162\040\101\165\164\151\146\151\143\141\164\145\040\101\165\164\150\157\162\151\164\171\061\027\060\025\006\003\125\0004\003\014\016\124\162\165\163\164\103\157\162\040\105\103\101\055\061\ END$ 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

```
\002\011\000\204\202\054\137\034\142\320\100
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "SSL.com Root Certification Authority RSA"
# Issuer: CN=SSL.com Root Certification Authority RSA,O=SSL Corporation,L=Houston,ST=Texas,C=US
# Serial Number:7b:2c:9b:d3:16:80:32:99
# Subject: CN=SSL.com Root Certification Authority RSA,O=SSL Corporation,L=Houston,ST=Texas,C=US
# Not Valid Before: Fri Feb 12 17:39:39 2016
# Not Valid After: Tue Feb 12 17:39:39 2041
# Fingerprint (SHA-256):
85:66:6A:56:2E:E0:BE:5C:E9:25:C1:D8:89:0A:6F:76:A8:7E:C1:6D:4D:7D:5F:29:EA:74:19:CF:20:12:3B:69
# Fingerprint (SHA1): B7:AB:33:08:D1:EA:44:77:BA:14:80:12:5A:6F:BD:A9:36:49:0C:BB
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "SSL.com Root Certification Authority RSA"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA_SUBJECT MULTILINE_OCTAL
\060\174\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\016\060\014\006\003\125\004\010\014\005\124\145\170\141\163\061
\label{eq:condition} $$ \020\060\016\006\003\125\004\007\014\007\110\157\165\163\164\157 
\156\061\030\060\026\006\003\125\004\012\014\017\123\123\114\040
\103\157\162\160\157\162\141\164\151\157\156\061\061\060\057\006
\label{eq:condition} $$ \003\125\004\003\014\050\123\123\114\056\143\157\155\040\122\157 
\157\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171\040\122\123\101
END
CKA ID UTF8 "0"
CKA ISSUER MULTILINE OCTAL
\060\174\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\label{eq:condition} $$ \020\060\016\006\003\125\004\007\014\007\110\157\165\163\164\157 
\103\157\162\160\157\162\141\164\151\157\156\061\061\060\057\006
\label{eq:condition} $$ \003\125\004\003\014\050\123\123\114\056\143\157\155\040\122\157 $$
\157\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171\040\122\123\101
```

Open Source Used In Edge Intelligence Edge\_1.10.2 746

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\010\173\054\233\323\026\200\062\231

**END** 

**END** 

### CKA VALUE MULTILINE OCTAL

\060\202\005\335\060\202\003\305\240\003\002\001\002\002\010\173 \054\233\323\026\200\062\231\060\015\006\011\052\206\110\206\367 \015\001\001\013\005\000\060\174\061\013\060\011\006\003\125\004 \006\023\002\125\123\061\016\060\014\006\003\125\004\010\014\005 \124\145\170\141\163\061\020\060\016\006\003\125\004\007\014\007 \110\157\165\163\164\157\156\061\030\060\026\006\003\125\004\012 \014\017\123\123\114\040\103\157\162\160\157\162\141\164\151\157 \143\157\155\040\122\157\157\164\040\103\145\162\164\151\146\151 \143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171 \040\122\123\101\060\036\027\015\061\066\060\062\061\062\061\067 \063\071\063\071\132\027\015\064\061\060\062\061\062\061\067\063 \071\063\071\132\060\174\061\013\060\011\006\003\125\004\006\023  $\label{eq:condition} $$ \002\125\123\061\016\060\014\006\003\125\004\010\014\005\124\145 $$$ \170\141\163\061\020\060\016\006\003\125\004\007\014\007\110\157 \123\123\114\040\103\157\162\160\157\162\141\164\151\157\156\061 \061\060\057\006\003\125\004\003\014\050\123\123\114\056\143\157  $\label{eq:condition} $$ \frac{155}040\\122\\157\\157\\164\\040\\103\\145\\162\\164\\151\\146\\151\\146\\151\\143\\141$ \164\151\157\156\040\101\165\164\150\157\162\151\164\171\040\122 \123\101\060\202\002\042\060\015\006\011\052\206\110\206\367\015 \002\001\000\371\017\335\243\053\175\313\320\052\376\354\147\205 \246\347\056\033\272\167\341\343\365\257\244\354\372\112\135\221 \304\127\107\153\030\167\153\166\362\375\223\344\075\017\302\026 \236\013\146\303\126\224\236\027\203\205\316\126\357\362\026\375  $\label{eq:condition} $$ \000\142\365\042\011\124\350\145\027\116\101\271\340\117\106\227 $$$ \252\033\310\270\156\142\136\151\261\137\333\052\002\176\374\154 \312\363\101\330\355\320\350\374\077\141\110\355\260\003\024\035  $\label{eq:condition} $$ \020\016\113\031\340\273\116\354\206\145\377\066\363\136\147\002$ \013\235\206\125\141\375\172\070\355\376\342\031\000\267\157\241 \120\142\165\164\074\240\372\310\045\222\264\156\172\042\307\370 \036\241\343\262\335\221\061\253\053\035\004\377\245\112\004\067 \351\205\244\063\053\375\342\326\125\064\174\031\244\112\150\307 \262\250\323\267\312\241\223\210\353\301\227\274\214\371\035\331 \042\204\044\164\307\004\075\152\251\051\223\314\353\270\133\341 \376\137\045\252\064\130\310\301\043\124\235\033\230\021\303\070 \234\176\075\206\154\245\017\100\206\174\002\364\134\002\117\050 \313\256\161\237\017\072\310\063\376\021\045\065\352\374\272\305 \140\075\331\174\030\325\262\251\323\165\170\003\162\042\312\072 \303\037\357\054\345\056\251\372\236\054\266\121\106\375\257\003 \326\352\140\150\352\205\026\066\153\205\351\036\300\263\335\304 \044\334\200\052\201\101\155\224\076\310\340\311\201\101\000\236  $\label{eq:condition} $$ 136\277\177\305\010\230\242\030\054\102\100\263\371\157\070\047 $$$ \113\116\200\364\075\201\107\340\210\174\352\034\316\265\165\134 \121\056\034\053\177\032\162\050\347\000\265\321\164\306\327\344 \237\255\007\223\266\123\065\065\374\067\344\303\366\135\026\276

\041\163\336\222\012\370\240\143\152\274\226\222\152\076\370\274 \145\125\233\336\365\015\211\046\004\374\045\032\246\045\151\313 \302\155\312\174\342\131\137\227\254\353\357\056\310\274\327\033 \131\074\053\314\362\031\310\223\153\047\143\031\317\374\351\046 \370\312\161\233\177\223\376\064\147\204\116\231\353\374\263\170  $\label{eq:condition} $$ \011\063\160\272\146\246\166\355\033\163\353\032\245\015\304\042 $$$ \023\040\224\126\012\116\054\154\116\261\375\317\234\011\272\242 \063\355\207\002\003\001\000\001\243\143\060\141\060\035\006\003 \123\022\222\225\356\070\200\045\015\246\131\060\017\006\003\125 \035\023\001\001\377\004\005\060\003\001\001\377\060\037\006\003 \125\035\043\004\030\060\026\200\024\335\004\011\007\242\365\172 \175\122\123\022\222\225\356\070\200\045\015\246\131\060\016\006 \003\125\035\017\001\001\377\004\004\003\002\001\206\060\015\006  $\label{eq:condition} $$ \011\052\206\110\206\367\015\001\001\013\005\000\003\202\002\001 $$$ \000\040\030\021\224\051\373\046\235\034\036\036\160\141\361\225 \162\223\161\044\255\150\223\130\216\062\257\033\263\160\003\374 \045\053\164\205\220\075\170\152\364\271\213\245\227\073\265\030 \221\273\036\247\371\100\133\221\371\125\231\257\036\021\320\134  $\label{eq:condition} $$ \035\247\146\343\261\224\007\014\062\071\246\352\033\260\171\330 $$$ \035\234\160\104\343\212\335\304\371\225\037\212\070\103\077\001 \205\245\107\247\075\106\262\274\345\042\150\367\173\234\330\054  $\label{eq:condition} $$ \076\012\041\310\055\063\254\277\305\201\231\061\164\301\165\161 $$$ \305\276\261\360\043\105\364\235\153\374\031\143\235\243\274\004 \306\030\013\045\273\123\211\017\263\200\120\336\105\356\104\177 \253\224\170\144\230\323\366\050\335\207\330\160\145\164\373\016 \271\023\353\247\017\141\251\062\226\314\336\273\355\143\114\030 \273\251\100\367\240\124\156\040\210\161\165\030\352\172\264\064 \162\340\043\047\167\134\266\220\352\206\045\100\253\357\063\017 \313\237\202\276\242\040\373\366\265\055\032\346\302\205\261\164  $\label{eq:condition} $$ \017\373\310\145\002\244\122\001\107\335\111\042\301\277\330\353$ \153\254\176\336\354\143\063\025\267\043\010\217\306\017\215\101 \132\335\216\305\271\217\345\105\077\170\333\272\322\033\100\261 \376\161\115\077\340\201\242\272\136\264\354\025\340\223\335\010 \037\176\341\125\231\013\041\336\223\236\012\373\346\243\111\275 \066\060\376\347\167\262\240\165\227\265\055\201\210\027\145\040 \367\332\220\000\237\311\122\314\062\312\065\174\365\075\017\330  $\label{eq:condition} $$ \053\327\365\046\154\311\006\064\226\026\352\160\131\032\062\171 $$$  $\label{eq:condition} $$ \frac{171}013\\266\\210\\177\\017\\122\\110\\075\\277\\154\\330\\242\\104\\056\\321$ \116\267\162\130\323\211\023\225\376\104\253\370\327\213\033\156 \234\274\054\240\133\325\152\000\257\137\067\341\325\372\020\013 \230\234\206\347\046\217\316\360\354\156\212\127\013\200\343\116 \262\300\240\143\141\220\272\125\150\067\164\152\266\222\333\237 \241\206\042\266\145\047\016\354\266\237\102\140\344\147\302\265 \332\101\013\304\323\213\141\033\274\372\037\221\053\327\104\007 \136\272\051\254\331\305\351\357\123\110\132\353\200\361\050\130 \041\315\260\006\125\373\047\077\123\220\160\251\004\036\127\047 \271

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END
```

 $\label{lem:cka_nss_mozilla_ca_policy} CKa\_nss\_mozilla\_ca\_policy CK\_bbool CK\_true \\ CKa\_nss\_server\_distrust\_after CK\_bbool CK\_false$ 

CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "SSL.com Root Certification Authority RSA"
- # Issuer: CN=SSL.com Root Certification Authority RSA,O=SSL Corporation,L=Houston,ST=Texas,C=US
- # Serial Number:7b:2c:9b:d3:16:80:32:99
- # Subject: CN=SSL.com Root Certification Authority RSA,O=SSL Corporation,L=Houston,ST=Texas,C=US
- # Not Valid Before: Fri Feb 12 17:39:39 2016
- # Not Valid After: Tue Feb 12 17:39:39 2041
- # Fingerprint (SHA-256):

85:66:6A:56:2E:E0:BE:5C:E9:25:C1:D8:89:0A:6F:76:A8:7E:C1:6D:4D:7D:5F:29:EA:74:19:CF:20:12:3B:69

# Fingerprint (SHA1): B7:AB:33:08:D1:EA:44:77:BA:14:80:12:5A:6F:BD:A9:36:49:0C:BB

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "SSL.com Root Certification Authority RSA"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\267\253\063\010\321\352\104\167\272\024\200\022\132\157\275\251

\066\111\014\273

**END** 

CKA CERT MD5 HASH MULTILINE OCTAL

\206\151\022\300\160\361\354\254\254\302\325\274\245\133\241\051

**END** 

CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \060\174\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$$ 

\016\060\014\006\003\125\004\010\014\005\124\145\170\141\163\061

 $\label{eq:condition} $$ \020\060\016\006\003\125\004\007\014\007\110\157\165\163\164\157$ 

\003\125\004\003\014\050\123\123\114\056\143\157\155\040\122\157

 $\label{thm:local_local_state} $$157\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156$$ 

 $\label{eq:condition} $$ \040\101\165\164\150\157\162\151\164\171\040\122\123\101$$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\010\173\054\233\323\026\200\062\231

**END** 

 ${\tt CKA\_TRUST\_SERVER\_AUTH\ CK\_TRUST\ CKT\_NSS\_TRUSTED\_DELEGATOR}$ 

CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "SSL.com Root Certification Authority ECC"

#

# Issuer: CN=SSL.com Root Certification Authority ECC,O=SSL Corporation,L=Houston,ST=Texas,C=US

- # Serial Number:75:e6:df:cb:c1:68:5b:a8
- # Subject: CN=SSL.com Root Certification Authority ECC,O=SSL Corporation,L=Houston,ST=Texas,C=US
- # Not Valid Before: Fri Feb 12 18:14:03 2016
- # Not Valid After: Tue Feb 12 18:14:03 2041
- # Fingerprint (SHA-256):
- 34:17:BB:06:CC:60:07:DA:1B:96:1C:92:0B:8A:B4:CE:3F:AD:82:0E:4A:A3:0B:9A:CB:C4:A7:4E:BD:CE:BC:65
- # Fingerprint (SHA1): C3:19:7C:39:24:E6:54:AF:1B:C4:AB:20:95:7A:E2:C3:0E:13:02:6A
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA PRIVATE CK BBOOL CK FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA\_LABEL UTF8 "SSL.com Root Certification Authority ECC"
- CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
- CKA\_SUBJECT MULTILINE\_OCTAL
- $\label{eq:condition} $$ \060\174\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$$
- $\label{eq:condition} $$ \0.016\0.0014\0.005\0.003\1.25\0.004\0.010\0.014\0.005\1.24\1.45\1.70\1.41\1.63\0.61 $$$
- $\label{eq:condition} $$ \020\060\016\006\003\125\004\007\014\007\110\157\165\163\164\157 $$$
- \156\061\030\060\026\006\003\125\004\012\014\017\123\123\114\040
- \103\157\162\160\157\162\141\164\151\157\156\061\061\060\057\006
- $\label{eq:condition} $$ \003\125\004\003\014\050\123\123\114\056\143\157\155\040\122\157$
- $\label{eq:condition} $$ \frac{157}{164}040\\103\\145\\162\\164\\151\\146\\151\\143\\141\\164\\151\\157\\156$
- \040\101\165\164\150\157\162\151\164\171\040\105\103\103

**END** 

CKA ID UTF8 "0"

### CKA\_ISSUER MULTILINE\_OCTAL

\060\174\061\013\060\011\006\003\125\004\006\023\002\125\123\061

\016\060\014\006\003\125\004\010\014\005\124\145\170\141\163\061

 $\label{eq:condition} $$ \000\0016\0006\003\125\004\007\014\007\110\157\165\163\164\157 $$$ 

\156\061\030\060\026\006\003\125\004\012\014\017\123\123\114\040

\103\157\162\160\157\162\141\164\151\157\156\061\061\060\057\006

 $\label{eq:condition} $$ \003\125\004\003\014\050\123\123\114\056\143\157\155\040\122\157 $$$ 

\040\101\165\164\150\157\162\151\164\171\040\105\103\103

END

## CKA SERIAL NUMBER MULTILINE OCTAL

\002\010\165\346\337\313\301\150\133\250

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\202\002\215\060\202\002\002\0001\0002\001\002\0001\0165 $$ \346\337\313\301\150\133\250\060\012\006\010\052\206\110\316\075 $$ \004\003\002\060\174\061\013\060\011\006\003\125\004\0005\124\145\170 $$ \125\123\061\016\060\016\006\003\125\004\007\014\007\110\157\165 $$ \163\164\157\156\061\030\060\026\006\003\125\004\0012\014\017\123 $$ \123\114\040\103\157\162\160\157\162\141\164\151\157\156\061\061 $$ \040\122\157\157\164\040\103\145\162\164\151\146\151\143\141\164 $$ \151\157\156\040\101\165\164\150\157\162\151\164\171\040\105\103 $$$ 

\103\060\036\027\015\061\066\060\062\061\062\061\070\061\064\060 \063\132\027\015\064\061\060\062\061\062\061\070\061\064\060\063 \132\060\174\061\013\060\011\006\003\125\004\006\023\002\125\123  $\label{eq:condition} $$ \061\016\060\014\006\003\125\004\010\014\005\124\145\170\141\163$$ \061\020\060\016\006\003\125\004\007\014\007\110\157\165\163\164  $\label{eq:condition} $$ \frac{157}{156}061\\030\\060\\026\\006\\003\\125\\004\\012\\014\\017\\123\\123\\114$ \040\103\157\162\160\157\162\141\164\151\157\156\061\061\060\057 \006\003\125\004\003\014\050\123\123\114\056\143\157\155\040\122 \157\157\164\040\103\145\162\164\151\146\151\143\141\164\151\157 \156\040\101\165\164\150\157\162\151\164\171\040\105\103\103\060  $\label{eq:condition} $$ \004\000\042\003\142\000\004\105\156\251\120\304\246\043\066\236 $$$ \137\050\215\027\313\226\042\144\077\334\172\216\035\314\010\263 \242\161\044\272\216\111\271\004\033\107\226\130\253\055\225\310 \133\017\153\061\122\143\101\073\211\315\354\354\266\215\031\323  $\label{eq:condition} $$ \064\007\334\273\306\006\177\302\105\225\354\313\177\250\043\340 $$$ \011\351\201\372\363\107\323\243\143\060\141\060\035\006\003\125 \035\016\004\026\004\024\202\321\205\163\060\347\065\004\323\216  $\\ \langle 002 \rangle 222 \rangle 373 \rangle 345 \rangle 244 \rangle 321 \rangle 304 \rangle 041 \rangle 350 \rangle 315 \rangle 060 \rangle 017 \rangle 006 \rangle 003 \rangle 125 \rangle 035 \rangle 036 \rangle 036 \rangle 037 \rangle$ \023\001\001\377\004\005\060\003\001\001\377\060\037\006\003\125 \035\043\004\030\060\026\200\024\202\321\205\163\060\347\065\004 \323\216\002\222\373\345\244\321\304\041\350\315\060\016\006\003 \125\035\017\001\001\377\004\004\003\002\001\206\060\012\006\010 \052\206\110\316\075\004\003\002\003\147\000\060\144\002\060\157 \347\353\131\021\244\140\317\141\260\226\173\355\005\371\057\023 \221\334\355\345\374\120\153\021\106\106\263\034\041\000\142\273 \276\303\347\350\315\007\231\371\015\013\135\162\076\304\252\002 \060\037\274\272\013\342\060\044\373\174\155\200\125\012\231\076 \200\015\063\345\146\243\263\243\273\245\325\213\217\011\054\246 \135\176\342\360\007\010\150\155\322\174\151\156\137\337\345\152 \145

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "SSL.com Root Certification Authority ECC"
```

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

<sup>#</sup> Issuer: CN=SSL.com Root Certification Authority ECC,O=SSL Corporation,L=Houston,ST=Texas,C=US

<sup>#</sup> Serial Number:75:e6:df:cb:c1:68:5b:a8

<sup>#</sup> Subject: CN=SSL.com Root Certification Authority ECC,O=SSL Corporation,L=Houston,ST=Texas,C=US

<sup>#</sup> Not Valid Before: Fri Feb 12 18:14:03 2016

<sup>#</sup> Not Valid After: Tue Feb 12 18:14:03 2041

<sup>#</sup> Fingerprint (SHA-256):

<sup>34:17:</sup>BB:06:CC:60:07:DA:1B:96:1C:92:0B:8A:B4:CE:3F:AD:82:0E:4A:A3:0B:9A:CB:C4:A7:4E:BD:CE:BC:65

<sup>#</sup> Fingerprint (SHA1): C3:19:7C:39:24:E6:54:AF:1B:C4:AB:20:95:7A:E2:C3:0E:13:02:6A

```
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "SSL.com Root Certification Authority ECC"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\label{eq:condition} $$ \303\031\174\071\044\346\124\257\033\304\253\040\225\172\342\303
\016\023\002\152
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\056\332\344\071\177\234\217\067\321\160\237\046\027\121\072\216
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\174\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$
\016\060\014\006\003\125\004\010\014\005\124\145\170\141\163\061
\label{eq:condition} $$ \020\060\016\006\003\125\004\007\014\007\110\157\165\163\164\157 
\103\157\162\160\157\162\141\164\151\157\156\061\061\060\057\006
\label{eq:condition} $$ \003\125\004\003\014\050\123\123\114\056\143\157\155\040\122\157 
\157\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156
 \\040\\101\\165\\164\\150\\157\\162\\151\\164\\171\\040\\105\\103\\103
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \002\010\165\346\337\313\301\150\133\250$
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "SSL.com EV Root Certification Authority RSA R2"
# Issuer: CN=SSL.com EV Root Certification Authority RSA R2,O=SSL Corporation,L=Houston,ST=Texas,C=US
# Serial Number:56:b6:29:cd:34:bc:78:f6
# Subject: CN=SSL.com EV Root Certification Authority RSA R2,O=SSL
Corporation,L=Houston,ST=Texas,C=US
# Not Valid Before: Wed May 31 18:14:37 2017
# Not Valid After: Fri May 30 18:14:37 2042
# Fingerprint (SHA-256):
2E:7B:F1:6C:C2:24:85:A7:BB:E2:AA:86:96:75:07:61:B0:AE:39:BE:3B:2F:E9:D0:CC:6D:4E:F7:34:91:42:5C
# Fingerprint (SHA1): 74:3A:F0:52:9B:D0:32:A0:F4:4A:83:CD:D4:BA:A9:7B:7C:2E:C4:9A
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "SSL.com EV Root Certification Authority RSA R2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\202\061\013\060\011\006\003\125\004\006\023\002\125\123
```

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

 $\label{eq:control} $$ \061\016\060\014\006\003\125\004\010\014\005\124\145\170\141\163\061\020\060\016\006\003\125\0004\007\014\007\110\157\165\163\164\157\156\061\030\060\0026\0006\003\125\0004\012\014\017\123\123\114\040\103\157\162\160\157\162\141\164\151\157\156\060\1067\060\065\123\123\114\056\143\157\155\040\105\126\040\122\157\157\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040\122\123\101\040\122\062$ 

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\201\202\061\013\060\011\006\003\125\004\010\014\006\023\002\125\123\061\016\060\014\006\003\125\0004\010\014\007\110\157\165\163\164\157\156\061\030\060\026\006\003\125\0004\012\014\017\123\123\114\040\103\157\162\160\157\162\141\164\151\157\156\061\067\060\065\006\003\125\0004\003\014\056\123\123\114\056\143\157\155\040\105\126\040\122\157\157\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040\122\123\101\040\122\062$ 

**END** 

CKA SERIAL NUMBER MULTILINE OCTAL

 $\label{eq:condition} $$ \002\010\126\266\051\315\064\274\170\366$$$ 

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\353\060\202\003\323\240\003\002\001\002\002\010\126 \266\051\315\064\274\170\366\060\015\006\011\052\206\110\206\367 \004\006\023\002\125\123\061\016\060\014\006\003\125\004\010\014 \005\124\145\170\141\163\061\020\060\016\006\003\125\004\007\014  $\\ \\007\\110\\157\\165\\163\\164\\157\\156\\061\\030\\060\\026\\0006\\003\\125\\004$ \012\014\017\123\123\114\040\103\157\162\160\157\162\141\164\151 \157\156\061\067\060\065\006\003\125\004\003\014\056\123\123\114 \056\143\157\155\040\105\126\040\122\157\157\164\040\103\145\162 \164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157 \162\151\164\171\040\122\123\101\040\122\062\060\036\027\015\061 \067\060\065\063\061\061\070\061\064\063\067\132\027\015\064\062 \060\065\063\060\061\070\061\064\063\067\132\060\201\202\061\013 \003\125\004\007\014\007\110\157\165\163\164\157\156\061\030\060 \026\006\003\125\004\012\014\017\123\123\114\040\103\157\162\160 \157\162\141\164\151\157\156\061\067\060\065\006\003\125\004\003 \014\056\123\123\114\056\143\157\155\040\105\126\040\122\157\157 \164\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040 \101\165\164\150\157\162\151\164\171\040\122\123\101\040\122\062 \060\202\002\042\060\015\006\011\052\206\110\206\367\015\001\001 \001\005\000\003\202\002\017\000\060\202\002\012\002\202\002\001

\000\217\066\145\100\341\326\115\300\327\264\351\106\332\153\352 \063\107\315\114\371\175\175\276\275\055\075\360\333\170\341\206 \245\331\272\011\127\150\355\127\076\240\320\010\101\203\347\050 \101\044\037\343\162\025\320\001\032\373\136\160\043\262\313\237 \071\343\317\305\116\306\222\155\046\306\173\273\263\332\047\235  $\label{eq:condition} $$ \012\206\351\201\067\005\376\360\161\161\354\303\034\351\143\242 $$$ \027\024\235\357\033\147\323\205\125\002\002\326\111\311\314\132 \341\261\367\157\062\237\311\324\073\210\101\250\234\275\313\253  $\label{eq:condition} $$ \33\155\173\011\037\242\114\162\220\332\053\010\374\317\074\124 $$$ \316\147\017\250\317\135\226\031\013\304\343\162\353\255\321\175  $\label{eq:condition} $$ \035\047\357\222\353\020\277\133\353\073\257\317\200\335\301\322$  $\verb| | 226 | 004 | 133 | 172 | 176 | 244 | 251 | 074 | 070 | 166 | 244 | 142 | 216 | 240 | 071 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 | 136 |$ \352\167\317\135\000\131\217\146\054\076\007\242\243\005\046\021  $\label{eq:condition} $$ \frac{151}{227}\frac{352}{205}\frac{267}{017}\frac{113}{310}\frac{100}{341}\frac{120}{272}\frac{120}{056}\frac{12}{212} $$$ \313\367\017\232\042\347\177\232\067\023\315\362\115\023\153\041 \321\300\314\042\362\241\106\366\104\151\234\312\141\065\007\000  $\label{eq:condition} $$ \frac{157}{326}141 \cdot 010 \cdot 021 \cdot 352 \cdot 272 \cdot 270 \cdot 366 \cdot 351 \cdot 263 \cdot 140 \cdot 345 \cdot 115 \cdot 271 \cdot 354 \cdot 1263 \cdot 140 \cdot 345 \cdot 115 \cdot 271 \cdot 354 \cdot 1263 \cdot 140 \cdot 345 \cdot 115 \cdot 1271 \cdot 354 \cdot 1263 \cdot 140 \cdot 345 \cdot 115 \cdot 1271 \cdot 354 \cdot 1263 \cdot 140 \cdot 345 \cdot 1263 \cdot 140 \cdot 1263 \cdot 1263 \cdot 140 \cdot 1263 \cdot 1263$ \237\024\146\311\127\130\333\315\207\151\370\212\206\022\003\107 \277\146\023\166\254\167\175\064\044\205\203\315\327\252\234\220  $\label{eq:condition} $$ \032\237\041\054\177\170\267\144\270\330\350\246\364\170\263\125$$ \313\204\322\062\304\170\256\243\217\141\335\316\010\123\255\354 \210\374\025\344\232\015\346\237\032\167\316\114\217\270\024\025  $\label{eq:condition} $$ \075\142\234\206\070\006\000\146\022\344\131\166\132\123\300\002 $$$ \230\242\020\053\150\104\173\216\171\316\063\112\166\252\133\201  $\label{eq:condition} $$ \026\033\265\212\330\320\000\173\136\142\264\011\326\206\143\016$$ \246\005\225\111\272\050\213\210\223\262\064\034\330\244\125\156 \267\034\320\336\231\125\073\043\364\042\340\371\051\146\046\354  $\label{eq:condition} $$ \040\120\167\333\112\013\217\276\345\002\140\160\101\136\324\256$$ \120\071\042\024\046\313\262\073\163\164\125\107\007\171\201\071 \250\060\023\104\345\004\212\256\226\023\045\102\017\271\123\304  $\label{eq:condition} $$ \233\374\315\344\034\336\074\372\253\326\006\112\037\147\246\230 $$$ \060\034\335\054\333\334\030\225\127\146\306\377\134\213\126\365 \167\002\003\001\000\001\243\143\060\141\060\017\006\003\125\035 \023\001\001\377\004\005\060\003\001\001\377\060\037\006\003\125 \035\043\004\030\060\026\200\024\371\140\273\324\343\325\064\366 \270\365\006\200\045\247\163\333\106\151\250\236\060\035\006\003 \125\035\016\004\026\004\024\371\140\273\324\343\325\064\366\270 \365\006\200\045\247\163\333\106\151\250\236\060\016\006\003\125  $\label{eq:condition} $$ \035\017\001\001\377\004\004\003\002\001\206\060\015\006\011\052$ \206\110\206\367\015\001\001\013\005\000\003\202\002\001\000\126 \263\216\313\012\235\111\216\277\244\304\221\273\146\027\005\121 \230\165\373\345\120\054\172\236\361\024\372\253\323\212\076\377 \221\051\217\143\213\330\264\251\124\001\015\276\223\206\057\371 \112\155\307\136\365\127\371\312\125\034\022\276\107\017\066\305 \337\152\267\333\165\302\107\045\177\271\361\143\370\150\055\125 \004\321\362\215\260\244\317\274\074\136\037\170\347\245\240\040 \160\260\004\305\267\367\162\247\336\042\015\275\063\045\106\214  $\\ 144\\222\\046\\343\\076\\056\\143\\226\\332\\233\\214\\075\\370\\030\\011\\327$ 

\003\314\175\206\202\340\312\004\007\121\120\327\377\222\325\014 \357\332\206\237\231\327\353\267\257\150\342\071\046\224\272\150  $\label{eq:condition} $$ \267\277\203\323\352\172\147\075\142\147\256\045\345\162\350\342$$ \344\354\256\022\366\113\053\074\237\351\260\100\363\070\124\263 \375\267\150\310\332\306\217\121\074\262\373\221\334\034\347\233 \235\341\267\015\162\217\342\244\304\251\170\371\353\024\254\306 \103\005\302\145\071\050\030\002\303\202\262\235\005\276\145\355  $\verb|\| 226\\137\\145\\164\\074\\373\\011\\065\\056\\173\\234\\023\\375\\033\\017\\135$ \307\155\201\072\126\017\314\073\341\257\002\057\042\254\106\312 \106\074\240\034\114\326\104\264\136\056\134\025\146\011\341\046  $\label{eq:condition} $$ \051\376\306\122\141\272\261\163\377\303\014\234\345\154\152\224 $$$  $\label{eq:condition} $$ \077\024\312\100\026\225\204\363\131\251\254\137\114\141\223\155$$ \321\073\314\242\225\014\042\246\147\147\104\056\271\331\322\212 \101\263\146\013\132\373\175\043\245\362\032\260\377\336\233\203  $\label{eq:condition} $$ \224\056\321\077\337\222\267\221\257\005\073\145\307\240\154\261 $$$ \315\142\022\303\220\033\343\045\316\064\274\157\167\166\261\020  $\label{eq:condition} $$ 303\367\005\032\300\326\257\164\142\110\027\167\222\151\220\141 $$$ \034\336\225\200\164\124\217\030\034\303\363\003\320\277\244\103 \165\206\123\030\172\012\056\011\034\066\237\221\375\202\212\042  $\label{eq:condition} $$ \frac{321}{016}\frac{325}{335}\frac{313}{003}\frac{014}{027}\frac{311}{203}\frac{000}{010}\frac{116}{065} $$$ \115\212\213\355\360\002\224\146\054\104\177\313\225\047\226\027 \255\011\060\254\266\161\027\156\213\027\366\034\011\324\055\073 \230\245\161\323\124\023\331\140\363\365\113\146\117\372\361\356 \040\022\215\264\254\127\261\105\143\241\254\166\251\302\373 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "SSL.com EV Root Certification Authority RSA R2"
- $\#\ Issuer:\ CN=SSL.com\ EV\ Root\ Certification\ Authority\ RSA\ R2,O=SSL\ Corporation, L=Houston, ST=Texas, C=US$
- # Serial Number:56:b6:29:cd:34:bc:78:f6
- # Subject: CN=SSL.com EV Root Certification Authority RSA R2,O=SSL

Corporation, L=Houston, ST=Texas, C=US

- # Not Valid Before: Wed May 31 18:14:37 2017
- # Not Valid After: Fri May 30 18:14:37 2042
- # Fingerprint (SHA-256):
- 2E:7B:F1:6C:C2:24:85:A7:BB:E2:AA:86:96:75:07:61:B0:AE:39:BE:3B:2F:E9:D0:CC:6D:4E:F7:34:91:42:5C
- # Fingerprint (SHA1): 74:3A:F0:52:9B:D0:32:A0:F4:4A:83:CD:D4:BA:A9:7B:7C:2E:C4:9A

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "SSL.com EV Root Certification Authority RSA R2"

 ${\tt CKA\_CERT\_SHA1\_HASH\ MULTILINE\_OCTAL}$ 

 $\label{eq:condition} $$ 164\072\360\122\233\320\062\240\364\112\203\315\324\272\251\173$ 

\174\056\304\232

**END** 

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\label{eq:condition} $$ 341 \times 0.030 \times 0.032 \times 0.023 \times 0.02366 \times 0.027 \times 0.021 \times 0.023 \times 0.02
END
CKA ISSUER MULTILINE OCTAL
\060\201\202\061\013\060\011\006\003\125\004\006\023\002\125\123
\\ \backslash 061 \backslash 016 \backslash 060 \backslash 014 \backslash 006 \backslash 003 \backslash 125 \backslash 004 \backslash 010 \backslash 014 \backslash 005 \backslash 124 \backslash 145 \backslash 170 \backslash 141 \backslash 163
\061\020\060\016\006\003\125\004\007\014\007\110\157\165\163\164
\label{eq:condition} $$ \frac{157}{156}061 \times 030 \times 060 \times 026 \times 006 \times 03125 \times 04012 \times 014 \times 017123 \times 123114 \times 0160 \times 
\040\103\157\162\160\157\162\141\164\151\157\156\061\067\060\065
\006\003\125\004\003\014\056\123\123\114\056\143\157\155\040\105
\label{eq:condition} $$ 164\151\157\156\040\101\165\164\150\157\162\151\164\171\040\122$
\123\101\040\122\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\010\126\266\051\315\064\274\170\366
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "SSL.com EV Root Certification Authority ECC"
# Issuer: CN=SSL.com EV Root Certification Authority ECC,O=SSL Corporation,L=Houston,ST=Texas,C=US
# Serial Number:2c:29:9c:5b:16:ed:05:95
# Subject: CN=SSL.com EV Root Certification Authority ECC,O=SSL Corporation,L=Houston,ST=Texas,C=US
# Not Valid Before: Fri Feb 12 18:15:23 2016
 # Not Valid After: Tue Feb 12 18:15:23 2041
# Fingerprint (SHA-256):
22:A2:C1:F7:BD:ED:70:4C:C1:E7:01:B5:F4:08:C3:10:88:0F:E9:56:B5:DE:2A:4A:44:F9:9C:87:3A:25:A7:C8
# Fingerprint (SHA1): 4C:DD:51:A3:D1:F5:20:32:14:B0:C6:C5:32:23:03:91:C7:46:42:6D
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "SSL.com EV Root Certification Authority ECC"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\177\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\020\060\016\006\003\125\004\007\014\007\110\157\165\163\164\157
\156\061\030\060\026\006\003\125\004\012\014\017\123\123\114\040
\103\157\162\160\157\162\141\164\151\157\156\061\064\060\062\006
\003\125\004\003\014\053\123\123\114\056\143\157\155\040\105\126
\040\122\157\157\164\040\103\145\162\164\151\146\151\143\141\164
\151\157\156\040\101\165\164\150\157\162\151\164\171\040\105\103
```

\103

**END** 

CKA ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:control} $$ \000\17\061\013\060\011\006\003\125\004\000\023\002\125\123\061\016\060\014\006\003\125\004\001\014\0005\124\145\170\141\163\061\020\060\0016\0006\003\125\0004\0012\014\0017\123\123\114\040\103\157\162\160\157\162\141\164\151\157\156\061\064\060\062\006\003\125\0004\003\125\0004\003\123\123\114\056\143\157\155\040\105\126\004\122\157\157\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156\004\0101\165\164\150\157\162\151\164\171\004\0105\103\103\103$ 

**END** 

#### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\010\054\051\234\133\026\355\005\225$$ 

**END** 

#### CKA\_VALUE MULTILINE\_OCTAL

\060\202\002\224\060\202\002\032\240\003\002\001\002\002\010\054  $\label{eq:condition} $$ \051\234\133\026\355\005\225\060\012\006\010\052\206\110\316\075$$ \004\003\002\060\177\061\013\060\011\006\003\125\004\006\023\002 \125\123\061\016\060\014\006\003\125\004\010\014\005\124\145\170  $\label{eq:condition} $$ 141\163\061\020\060\016\0006\003\125\004\007\014\007\110\157\165 $$$ \163\164\157\156\061\030\060\026\006\003\125\004\012\014\017\123 \123\114\040\103\157\162\160\157\162\141\164\151\157\156\061\064 \060\062\006\003\125\004\003\014\053\123\123\114\056\143\157\155 \040\105\126\040\122\157\157\164\040\103\145\162\164\151\146\151  $\\ 143 \\ 141 \\ 164 \\ 151 \\ 157 \\ 156 \\ 040 \\ 101 \\ 165 \\ 164 \\ 150 \\ 157 \\ 162 \\ 151 \\ 164 \\ 171 \\$ \040\105\103\103\060\036\027\015\061\066\060\062\061\062\061\070 \061\065\062\063\132\027\015\064\061\060\062\061\062\061\070\061  $\label{eq:condition} $$ \065\062\063\132\060\177\061\013\060\011\006\003\125\004\006\023$ \002\125\123\061\016\060\014\006\003\125\004\010\014\005\124\145 \170\141\163\061\020\060\016\006\003\125\004\007\014\007\110\157 \165\163\164\157\156\061\030\060\026\006\003\125\004\012\014\017 \123\123\114\040\103\157\162\160\157\162\141\164\151\157\156\061 \064\060\062\006\003\125\004\003\014\053\123\123\114\056\143\157 \155\040\105\126\040\122\157\157\164\040\103\145\162\164\151\146 \151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164  $\label{eq:condition} $$ 171\040\105\103\103\060\166\060\020\006\007\052\206\110\316\075$ \002\001\006\005\053\201\004\000\042\003\142\000\004\252\022\107 \220\230\033\373\357\303\100\007\203\040\116\361\060\202\242\006 \321\362\222\206\141\362\366\041\150\312\000\304\307\352\103\000 \124\206\334\375\037\337\000\270\101\142\134\334\160\026\062\336 \037\231\324\314\305\007\310\010\037\141\026\007\121\075\175\134 \007\123\343\065\070\214\337\315\237\331\056\015\112\266\031\056 \132\160\132\006\355\276\360\241\260\312\320\011\051\243\143\060 \141\060\035\006\003\125\035\016\004\026\004\024\133\312\136\345 \336\322\201\252\315\250\055\144\121\266\331\162\233\227\346\117

 $\label{eq:controller} $$ \000\017\006\003\125\035\023\001\001\377\004\005\060\003\0001\001\377\060\037\006\003\125\035\043\004\030\060\026\200\024\133\312\136\345\336\322\201\252\315\250\055\144\121\266\331\162\233\227\346\117\060\016\006\003\125\035\017\001\001\377\004\004\003\002\003\150\000\060\145\0002\061\000\212\346\100\211\067\353\351\325\023\331\312\324\153\044\363\260\075\207\106\130\032\354\261\337\157\373\126\272\160\153\307\070\314\350\261\214\117\017\367\361\147\166\016\203\320\036\121\217\002\060\075\366\043\050\046\114\306\140\207\223\046\233\262\065\036\272\326\367\074\321\034\316\372\045\074\246\032\201\025\133\363\022\017\154\356\145\212\311\207\250\371\007\340\142\232\214\113\112$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "SSL.com EV Root Certification Authority ECC"
- # Issuer: CN=SSL.com EV Root Certification Authority ECC,O=SSL Corporation,L=Houston,ST=Texas,C=US
- # Serial Number:2c:29:9c:5b:16:ed:05:95
- # Subject: CN=SSL.com EV Root Certification Authority ECC,O=SSL Corporation,L=Houston,ST=Texas,C=US
- # Not Valid Before: Fri Feb 12 18:15:23 2016
- # Not Valid After: Tue Feb 12 18:15:23 2041
- # Fingerprint (SHA-256):
- 22:A2:C1:F7:BD:ED:70:4C:C1:E7:01:B5:F4:08:C3:10:88:0F:E9:56:B5:DE:2A:4A:44:F9:9C:87:3A:25:A7:C8
- # Fingerprint (SHA1): 4C:DD:51:A3:D1:F5:20:32:14:B0:C6:C5:32:23:03:91:C7:46:42:6D
- CKA CLASS CK OBJECT CLASS CKO NSS TRUST
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA PRIVATE CK BBOOL CK FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA\_LABEL UTF8 "SSL.com EV Root Certification Authority ECC"
- CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

**END** 

CKA CERT MD5 HASH MULTILINE OCTAL

 $\label{eq:condition} $$ 131\123\042\145\203\102\001\124\300\316\102\271\132\174\362\220 $$$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\17\061\013\060\011\006\003\125\004\000\0123\002\125\123\061\016\060\014\006\003\125\004\001\014\0005\124\145\170\141\163\061\020\060\0016\0006\003\125\004\001\100\157\165\163\164\157\156\061\003\060\0026\006\003\125\004\0012\014\017\123\123\114\040\103\157\162\160\157\162\141\164\151\157\156\061\064\060\062\006\003\125\004\003\014\005\123\123\114\056\143\157\155\040\105\126\040\102\157\157\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040\105\103\103$ 

```
END
```

CKA SERIAL NUMBER MULTILINE OCTAL

\002\010\054\051\234\133\026\355\005\225

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST

CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "GlobalSign Root CA - R6"

#

- # Issuer: CN=GlobalSign,O=GlobalSign,OU=GlobalSign Root CA R6
- # Serial Number:45:e6:bb:03:83:33:c3:85:65:48:e6:ff:45:51
- # Subject: CN=GlobalSign,O=GlobalSign,OU=GlobalSign Root CA R6
- # Not Valid Before: Wed Dec 10 00:00:00 2014
- # Not Valid After: Sun Dec 10 00:00:00 2034
- # Fingerprint (SHA-256):

2C:AB:EA:FE:37:D0:6C:A2:2A:BA:73:91:C0:03:3D:25:98:29:52:C4:53:64:73:49:76:3A:3A:B5:AD:6C:CF:69

# Fingerprint (SHA1): 80:94:64:0E:B5:A7:A1:CA:11:9C:1F:DD:D5:9F:81:02:63:A7:FB:D1

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "GlobalSign Root CA - R6"

CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \000\114\061\040\060\036\006\003\125\004\013\023\027\107\154\157 $$$ 

\142\141\154\123\151\147\156\040\122\157\157\164\040\103\101\040

\055\040\122\066\061\023\060\021\006\003\125\004\012\023\012\107

\004\003\023\012\107\154\157\142\141\154\123\151\147\156

**END** 

CKA\_ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

\060\114\061\040\060\036\006\003\125\004\013\023\027\107\154\157

 $\\ 142\\141\\154\\123\\151\\147\\156\\040\\122\\157\\157\\164\\040\\103\\101\\040$ 

\055\040\122\066\061\023\060\021\006\003\125\004\012\023\012\107

 $\label{eq:condition} $$ \frac{154\\157\\142\\141\\154\\123\\151\\147\\156\\061\\023\\060\\021\\006\\003\\125$ 

**END** 

#### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\016\105\346\273\003\203\063\303\205\145\110\346\377\105\121 $$$ 

**END** 

#### CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\202\005\203\060\202\003\153\240\003\002\001\0002\0002\0016\105$ 

\346\273\003\203\063\303\205\145\110\346\377\105\121\060\015\006

\011\052\206\110\206\367\015\001\001\014\005\000\060\114\061\040

\060\036\006\003\125\004\013\023\027\107\154\157\142\141\154\123 \151\147\156\040\122\157\157\164\040\103\101\040\055\040\122\066 \061\023\060\021\006\003\125\004\012\023\012\107\154\157\142\141 \154\123\151\147\156\061\023\060\021\006\003\125\004\003\023\012 \107\154\157\142\141\154\123\151\147\156\060\036\027\015\061\064  $\label{eq:condition} $$ \061\062\061\060\060\060\060\060\060\132\027\015\063\064\061 $$$ \062\061\060\060\060\060\060\060\060\132\060\114\061\040\060\036 \006\003\125\004\013\023\027\107\154\157\142\141\154\123\151\147  $\label{eq:condition} $$ \frac{156\040\122\157\157\164\040\103\101\040\055\040\122\066\061\023}{101\040\055\040\122\066\061\023} $$$ \060\021\006\003\125\004\012\023\012\107\154\157\142\141\154\123 \151\147\156\061\023\060\021\006\003\125\004\003\023\012\107\154 \157\142\141\154\123\151\147\156\060\202\002\042\060\015\006\011 \052\206\110\206\367\015\001\001\001\005\000\003\202\002\017\000  $\label{eq:condition} $$ \000\202\002\002\000\000\225\007\350\163\312\146\371 $$$  $\label{eq:condition} $$ \frac{354}024\frac{312}173\sqrt{074}\frac{367}015\sqrt{010}\frac{361}264\sqrt{105}\sqrt{013}\sqrt{054}\frac{202}264\sqrt{110}$$ \306\353\133\074\256\203\270\101\222\063\024\244\157\177\351\052 \314\306\260\210\153\305\266\211\321\306\262\377\024\316\121\024 \041\354\112\335\033\132\306\326\207\356\115\072\025\006\355\144 \146\013\222\200\312\104\336\163\224\116\363\247\211\177\117\170  $\label{eq:condition} $$ \frac{143}010\\310\\022\\120\\155\\102\\146\\057\\115\\271\\171\\050\\115\\122\\032$ \212\032\200\267\031\201\016\176\304\212\274\144\114\041\034\103 \150\327\075\074\212\305\262\146\325\220\232\267\061\006\305\276  $\label{eq:condition} $$ 342\155\062\006\246\036\371\271\353\252\243\270\277\276\202\143$ \120\320\360\030\211\337\344\017\171\365\352\242\037\052\322\160  $\label{eq:condition} $$ \056\173\347\274\223\273\155\123\342\110\174\214\020\007\070\377$ \146\262\167\141\176\340\352\214\074\252\264\244\366\363\225\112 \022\007\155\375\214\262\211\317\320\240\141\167\310\130\164\260 \324\043\072\367\135\072\312\242\333\235\011\336\135\104\055\220 \361\201\315\127\222\372\176\274\120\004\143\064\337\153\223\030 \276\153\066\262\071\344\254\044\066\267\360\357\266\034\023\127 \223\266\336\262\370\342\205\267\163\242\270\065\252\105\362\340 \235\066\241\157\124\212\361\162\126\156\056\210\305\121\102\104 \025\224\356\243\305\070\226\233\116\116\132\013\107\363\006\066 \111\167\060\274\161\067\345\246\354\041\010\165\374\346\141\026 \077\167\325\331\221\227\204\012\154\324\002\115\164\300\024\355 \375\071\373\203\362\136\024\241\004\260\013\351\376\356\217\341 \156\013\262\010\263\141\146\011\152\261\006\072\145\226\131\300 \360\065\375\311\332\050\215\032\021\207\160\201\012\250\232\165 \035\236\072\206\005\000\236\333\200\326\045\371\334\005\236\047 \131\114\166\071\133\352\371\245\241\330\203\017\321\377\337\060 \021\371\205\317\063\110\365\312\155\144\024\054\172\130\117\323 \113\010\111\305\225\144\032\143\016\171\075\365\263\214\312\130 \255\234\102\105\171\156\016\207\031\134\124\261\145\266\277\214 \233\334\023\351\015\157\270\056\334\147\156\311\213\021\265\204 \024\212\000\031\160\203\171\221\227\221\324\032\047\277\067\036 \062\007\330\024\143\074\050\114\257\002\003\001\000\001\243\143 \060\141\060\016\006\003\125\035\017\001\001\377\004\004\003\002  $\label{eq:condition} $$ \001\006\000\17\006\003\125\035\023\001\001\377\004\005\060\003\$ 

\001\001\377\060\035\006\003\125\035\016\004\026\004\024\256\154 \005\243\223\023\342\242\347\342\327\034\326\307\360\177\310\147 \123\240\060\037\006\003\125\035\043\004\030\060\026\200\024\256 \154\005\243\223\023\342\242\347\342\327\034\326\307\360\177\310 \147\123\240\060\015\006\011\052\206\110\206\367\015\001\001\014  $\label{eq:condition} $$ \005\000\003\202\002\001\000\203\045\355\350\321\375\225\122\315 $$$ \236\300\004\240\221\151\346\134\320\204\336\334\255\242\117\350  $\label{eq:condition} $$ 107\170\326\145\230\251\133\250\074\207\174\002\212\321\156\267 $$$ \026\163\346\137\300\124\230\325\164\276\301\315\342\021\221\255 \043\030\075\335\341\162\104\226\264\225\136\300\173\216\231\170  $\label{eq:condition} $$ \026\103\023\126\127\263\242\263\073\265\167\334\100\162\254\243$ \353\233\065\076\261\010\041\241\347\304\103\067\171\062\276\265 \347\234\054\114\274\103\051\231\216\060\323\254\041\340\343\035 \372\330\007\063\166\124\000\042\052\271\115\040\056\160\150\332 \345\123\374\203\134\323\235\362\377\104\014\104\146\362\322\343 \275\106\000\032\155\002\272\045\135\215\241\061\121\335\124\106  $\label{eq:condition} $$ \034\115\333\231\226\357\032\034\004\134\246\025\357\170\340\171$ \376\135\333\076\252\114\125\375\232\025\251\157\341\246\373\337 \160\060\351\303\356\102\106\355\302\223\005\211\372\175\143\173  $\label{eq:condition} $$ \077\320\161\201\174\000\350\230\256\016\170\064\303\045\373\257 $$$ \012\237\040\153\335\073\023\217\022\214\342\101\032\110\172\163 \240\167\151\307\266\134\177\202\310\036\376\130\033\050\053\250  $\label{eq:condition} $$ \frac{154}255\frac{300}{005}\frac{322}{173}\frac{267}{353}\frac{300}{376}\frac{376}{002}$$$ \233\150\254\102\135\303\356\365\314\334\360\120\165\322\066\151 \234\346\173\004\337\156\006\151\266\336\012\011\110\131\207\353 \173\024\140\172\144\252\151\103\357\221\307\114\354\030\335\154 \357\123\055\214\231\341\136\362\162\076\317\124\310\275\147\354  $\label{eq:condition} $$ \244\017\114\105\377\323\271\060\043\007\114\217\020\277\206\226$ \331\231\132\264\231\127\034\244\314\273\025\211\123\272\054\005 \017\344\304\236\031\261\030\064\325\114\235\272\355\367\037\257  $\\ \\ 044\\ \\ 225\\ \\ 004\\ \\ 170\\ \\ 250\\ \\ 003\\ \\ 273\\ \\ 356\\ \\ 201\\ \\ 345\\ \\ 332\\ \\ 137\\ \\ 174\\ \\ 213\\ \\ 112\\ \\ 241$ \220\164\045\247\263\076\113\310\054\126\275\307\310\357\070\342 \134\222\360\171\367\234\204\272\164\055\141\001\040\176\176\321 \362\117\007\131\137\213\055\103\122\353\106\014\224\341\365\146 \107\171\167\325\124\133\037\255\044\067\313\105\132\116\240\104 \110\310\330\260\231\305\025\204\011\366\326\111\111\300\145\270 \346\032\161\156\240\250\361\202\350\105\076\154\326\002\327\012 \147\203\005\132\311\244\020

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

<sup>#</sup> Trust for "GlobalSign Root CA - R6"

<sup>#</sup> Issuer: CN=GlobalSign,O=GlobalSign,OU=GlobalSign Root CA - R6

<sup>#</sup> Serial Number:45:e6:bb:03:83:33:c3:85:65:48:e6:ff:45:51

<sup>#</sup> Subject: CN=GlobalSign,O=GlobalSign,OU=GlobalSign Root CA - R6

<sup>#</sup> Not Valid Before: Wed Dec 10 00:00:00 2014

```
# Fingerprint (SHA-256):
2C:AB:EA:FE:37:D0:6C:A2:2A:BA:73:91:C0:03:3D:25:98:29:52:C4:53:64:73:49:76:3A:3A:B5:AD:6C:CF:69
# Fingerprint (SHA1): 80:94:64:0E:B5:A7:A1:CA:11:9C:1F:DD:D5:9F:81:02:63:A7:FB:D1
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GlobalSign Root CA - R6"
CKA CERT SHA1 HASH MULTILINE OCTAL
\200\224\144\016\265\247\241\312\021\234\037\335\325\237\201\002
\143\247\373\321
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\117\335\007\344\324\042\144\071\036\014\067\102\352\321\306\256
END
CKA_ISSUER MULTILINE_OCTAL
\060\114\061\040\060\036\006\003\125\004\013\023\027\107\154\157
\142\141\154\123\151\147\156\040\122\157\157\164\040\103\101\040
\label{eq:condition} $$ \055\040\122\066\061\023\060\021\006\003\125\004\012\023\012\107 
\154\157\142\141\154\123\151\147\156\061\023\060\021\006\003\125
\004\003\023\012\107\154\157\142\141\154\123\151\147\156
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\016\105\346\273\003\203\063\303\205\145\110\346\377\105\121
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "OISTE WISeKey Global Root GC CA"
# Issuer: CN=OISTE WISeKey Global Root GC CA,OU=OISTE Foundation Endorsed,O=WISeKey,C=CH
# Serial Number:21:2a:56:0c:ae:da:0c:ab:40:45:bf:2b:a2:2d:3a:ea
# Subject: CN=OISTE WISeKey Global Root GC CA,OU=OISTE Foundation Endorsed,O=WISeKey,C=CH
# Not Valid Before: Tue May 09 09:48:34 2017
# Not Valid After: Fri May 09 09:58:33 2042
# Fingerprint (SHA-256):
85:60:F9:1C:36:24:DA:BA:95:70:B5:FE:A0:DB:E3:6F:F1:1A:83:23:BE:94:86:85:4F:B3:F3:4A:55:71:19:8D
# Fingerprint (SHA1): E0:11:84:5E:34:DE:BE:88:81:B9:9C:F6:16:26:D1:96:1F:C3:B9:31
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "OISTE WISeKey Global Root GC CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
```

# Not Valid After: Sun Dec 10 00:00:00 2034

#### CKA SUBJECT MULTILINE OCTAL

 $\label{eq:continuous} $$ \0011\006\003\125\004\006\023\002\103\110\061\020\060\016\006\003\125\004\012\023\007\127\111\123\145\113\145\171\061\042\060\040\006\003\125\004\013\023\031\117\111\123\124\105\040\106\157\165\144\141\164\151\157\156\040\105\156\144\141\164\151\157\156\040\105\156\144\157\162\163\145\144\061\050\060\046\006\003\125\004\003\023\037\117\111\123\124\105\040\127\111\123\145\113\145\171\040\107\154\157\142\141\154\040\122\157\157\164\040\107\103\040\103\101\ END$ 

CKA ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

#### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\041\052\126\014\256\332\014\253\100\105\277\053\242\055 \072\352

**END** 

#### CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\202\002\151\060\202\001\357\240\003\002\001\002\002\002\0041 $$$ \052\126\014\256\332\014\253\100\105\277\053\242\055\072\352\060 \012\006\010\052\206\110\316\075\004\003\003\060\155\061\013\060 \125\004\012\023\007\127\111\123\145\113\145\171\061\042\060\040 \006\003\125\004\013\023\031\117\111\123\124\105\040\106\157\165 \156\144\141\164\151\157\156\040\105\156\144\157\162\163\145\144 \061\050\060\046\006\003\125\004\003\023\037\117\111\123\124\105 \040\127\111\123\145\113\145\171\040\107\154\157\142\141\154\040 \122\157\157\164\040\107\103\040\103\101\060\036\027\015\061\067 \060\065\060\071\060\071\064\070\063\064\132\027\015\064\062\060 \065\060\071\060\071\065\070\063\063\132\060\155\061\013\060\011 \006\003\125\004\006\023\002\103\110\061\020\060\016\006\003\125 \004\012\023\007\127\111\123\145\113\145\171\061\042\060\040\006  $\\ \\003\\125\\004\\013\\023\\031\\117\\111\\123\\124\\105\\040\\106\\157\\165\\156$ \144\141\164\151\157\156\040\105\156\144\157\162\163\145\144\061 \050\060\046\006\003\125\004\003\023\037\117\111\123\124\105\040 \127\111\123\145\113\145\171\040\107\154\157\142\141\154\040\122 \157\157\164\040\107\103\040\103\101\060\166\060\020\006\007\052 \206\110\316\075\002\001\006\005\053\201\004\000\042\003\142\000 \004\114\351\120\300\306\017\162\030\274\330\361\272\263\211\342 \171\112\243\026\247\153\124\044\333\121\377\352\364\011\044\303 \013\042\237\313\152\047\202\201\015\322\300\257\061\344\164\202 \156\312\045\331\214\165\235\361\333\320\232\242\113\041\176\026

 $\label{eq:control} $$ \arraycolimits and the control of the cont$ 

END

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "OISTE WISeKey Global Root GC CA"
- # Issuer: CN=OISTE WISeKey Global Root GC CA,OU=OISTE Foundation Endorsed,O=WISeKey,C=CH
- # Serial Number:21:2a:56:0c:ae:da:0c:ab:40:45:bf:2b:a2:2d:3a:ea
- # Subject: CN=OISTE WISeKey Global Root GC CA,OU=OISTE Foundation Endorsed,O=WISeKey,C=CH
- # Not Valid Before: Tue May 09 09:48:34 2017
- # Not Valid After : Fri May 09 09:58:33 2042
- # Fingerprint (SHA-256):
- 85:60:F9:1C:36:24:DA:BA:95:70:B5:FE:A0:DB:E3:6F:F1:1A:83:23:BE:94:86:85:4F:B3:F3:4A:55:71:19:8D
- # Fingerprint (SHA1): E0:11:84:5E:34:DE:BE:88:81:B9:9C:F6:16:26:D1:96:1F:C3:B9:31

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "OISTE WISeKey Global Root GC CA"

CKA CERT SHA1 HASH MULTILINE OCTAL

\340\021\204\136\064\336\276\210\201\271\234\366\026\046\321\226 \037\303\271\061

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\verb|251|326|271|055|057|223|144|370|245|151|312|221|351|150|007|043|$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \0011006\003\125\004\006\023\002\103\110\061\020\060\016\006\003\125\004\012\023\007\127\111\123\145\113\145\171\061\042\060\040\006\003\125\004\013\023\031\117\111\123\124\105\040\106\157\165\156\144\141\164\151\157\156\040\105\156\144\157\162\163\145\144\061\050\060\046\006\003\125\004\003\023\037\117\111\123\124\105\040\127\111\123\145\113\145\171\040\107\154$ 

```
\157\142\141\154\040\122\157\157\164\040\107\103\040\103\101
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \002\020\041\052\126\014\256\332\014\253\100\105\277\053\242\055$
\072\352
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
#
# Certificate "UCA Global G2 Root"
# Issuer: CN=UCA Global G2 Root,O=UniTrust,C=CN
# Serial Number:5d:df:b1:da:5a:a3:ed:5d:be:5a:65:20:65:03:90:ef
# Subject: CN=UCA Global G2 Root,O=UniTrust,C=CN
# Not Valid Before: Fri Mar 11 00:00:00 2016
# Not Valid After: Mon Dec 31 00:00:00 2040
# Fingerprint (SHA-256):
9B:EA:11:C9:76:FE:01:47:64:C1:BE:56:A6:F9:14:B5:A5:60:31:7A:BD:99:88:39:33:82:E5:16:1A:A0:49:3C
# Fingerprint (SHA1): 28:F9:78:16:19:7A:FF:18:25:18:AA:44:FE:C1:A0:CE:5C:B6:4C:8A
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "UCA Global G2 Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\075\061\013\060\011\006\003\125\004\006\023\002\103\116\061
\label{eq:condition} $$ \021\060\017\006\003\125\004\012\014\010\125\156\151\124\162\165
\163\164\061\033\060\031\006\003\125\004\003\014\022\125\103\101
\040\107\154\157\142\141\154\040\107\062\040\122\157\157\164
END
CKA ID UTF8 "0"
CKA ISSUER MULTILINE OCTAL
\060\075\061\013\060\011\006\003\125\004\006\023\002\103\116\061
\021\060\017\006\003\125\004\012\014\010\125\156\151\124\162\165
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\020\135\337\261\332\132\243\355\135\276\132\145\040\145\003
\220\357
END
CKA_VALUE MULTILINE_OCTAL
\060\202\005\106\060\202\003\056\240\003\002\001\002\002\020\135
\337\261\332\132\243\355\135\276\132\145\040\145\003\220\357\060
```

\015\006\011\052\206\110\206\367\015\001\001\013\005\000\060\075 \061\013\060\011\006\003\125\004\006\023\002\103\116\061\021\060 \017\006\003\125\004\012\014\010\125\156\151\124\162\165\163\164 \061\033\060\031\006\003\125\004\003\014\022\125\103\101\040\107 \154\157\142\141\154\040\107\062\040\122\157\157\164\060\036\027 \015\061\066\060\063\061\061\060\060\060\060\060\060\060\132\027\015 \064\060\061\062\063\061\060\060\060\060\060\060\060\132\060\075\061 \013\060\011\006\003\125\004\006\023\002\103\116\061\021\060\017 \033\060\031\006\003\125\004\003\014\022\125\103\101\040\107\154 \157\142\141\154\040\107\062\040\122\157\157\164\060\202\002\042  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\001\005\000\003$ \202\002\017\000\060\202\002\012\002\202\002\001\000\305\346\053  $\label{eq:condition} $$ \frac{157}174\357\046\005\047\243\201\044\332\157\313\001\371\231\232}{157}$$  $\label{eq:condition} $$ \frac{302}{042}207\frac{141}{101}221\frac{303}{313}303\frac{50}{033}006\frac{305}{114} $$$ \251\053\301\147\027\042\035\053\355\371\051\211\223\242\170\275 \222\153\240\243\015\242\176\312\223\263\246\321\214\065\325\165 \371\027\366\317\105\305\345\172\354\167\223\240\217\043\256\016 \032\003\177\276\324\320\355\056\173\253\106\043\133\377\054\346 \124\172\224\300\052\025\360\311\215\260\172\073\044\341\327\150 \342\061\074\006\063\106\266\124\021\246\245\057\042\124\052\130 \015\001\002\361\372\025\121\147\154\300\372\327\266\033\177\321  $\label{eq:condition} $$ 126\210\057\032\072\215\073\273\202\021\340\107\000\320\122\207 $$$ \253\373\206\176\017\044\153\100\235\064\147\274\215\307\055\206 \157\171\076\216\251\074\027\113\177\260\231\343\260\161\140\334 \013\365\144\303\316\103\274\155\161\271\322\336\047\133\212\350 \330\306\256\341\131\175\317\050\055\065\270\225\126\032\361\262 \130\113\267\022\067\310\174\263\355\113\200\341\215\372\062\043 \266\157\267\110\225\010\261\104\116\205\214\072\002\124\040\057 \337\277\127\117\073\072\220\041\327\301\046\065\124\040\354\307  $\label{eq:condition} $$ \sqrt{077} 107 \ 354 \ 357 \ 132 \ 277 \ 113 \ 172 \ 301 \ 255 \ 073 \ 027 \ 120 \ 134 \ 142 \ 330$ \017\113\112\334\053\372\156\274\163\222\315\354\307\120\350\101 \226\327\251\176\155\330\351\035\217\212\265\271\130\222\272\112 \222\053\014\126\375\200\353\010\360\136\051\156\033\034\014\257 \217\223\211\255\333\275\243\236\041\312\211\031\354\337\265\303 \032\353\026\376\170\066\114\326\156\320\076\027\034\220\027\153 \046\272\373\172\057\277\021\034\030\016\055\163\003\217\240\345  $\label{eq:condition} $$ \065\240\132\342\114\165\035\161\341\071\070\123\170\100\314\203$ \223\327\012\236\235\133\217\212\344\345\340\110\344\110\262\107 \315\116\052\165\052\173\362\042\366\311\276\011\221\226\127\172 \210\210\254\356\160\254\371\334\051\343\014\034\073\022\116\104 \326\247\116\260\046\310\363\331\032\227\221\150\352\357\215\106 \073\244\064\211\267\171\022\057\107\305\347\251\227\151\374\246 \167\147\265\337\173\361\172\145\025\344\141\126\145\002\003\001 \000\001\243\102\060\100\060\016\006\003\125\035\017\001\001\377 \004\004\003\002\001\006\060\017\006\003\125\035\023\001\001\377 

\004\024\201\304\214\314\365\344\060\377\245\014\010\137\214\025 \147\041\164\001\337\337\060\015\006\011\052\206\110\206\367\015  $\label{eq:condition} $$ \001\001\013\005\000\003\202\002\001\000\023\145\042\365\216\053$$ \255\104\344\313\377\271\150\346\303\200\110\075\004\173\372\043  $\begin{tabular}{l} $$ \begin{tabular}{l} $\begin{tabular}{l} $\b$ \067\062\241\310\145\266\256\070\075\065\033\076\274\073\266\004 \320\274\371\111\365\233\367\205\305\066\266\313\274\370\310\071  $\label{eq:condition} $$ 325\344\137\007\275\025\124\227\164\312\312\355\117\272\272\144$ \166\237\201\270\204\105\111\114\215\157\242\353\261\314\321\303 \224\332\104\302\346\342\352\030\350\242\037\047\005\272\327\345 \326\251\315\335\357\166\230\215\000\016\315\033\372\003\267\216  $\verb|\200\130\016\047\077\122\373\224\242\312\136\145\311\326\204\332$ \271\065\161\363\046\300\117\167\346\201\047\322\167\073\232\024  $\label{eq:condition} $$ \frac{157}171\364\366\320\341\323\224\272\320\127\121\275\047\005\015}$  $\label{eq:condition} $$ 301\375\310\022\060\356\157\215\021\053\010\235\324\324\277\200 $$$ \105\024\232\210\104\332\060\352\264\247\343\356\357\133\202\325  $\\ \begin{tabular}{l} $\langle 0.76 \rangle 3.26 \rangle 2.55 \rangle 1.70 \rangle 2.22 \rangle 3.33 \rangle 1.34 \rangle 0.74 \rangle 3.63 \rangle 3.30 \rangle 2.55 \rangle 3.72 \rangle 2.70 \rangle 1.53 \rangle 1.77 \rangle 3.04 \rangle 3.26 \rangle 2.55 \rangle 1.70 \rangle 2.22 \rangle 3.33 \rangle 1.34 \rangle 0.74 \rangle 3.63 \rangle 3.30 \rangle 2.55 \rangle 3.72 \rangle 2.70 \rangle 1.53 \rangle 1.77 \rangle 3.04 \rangle 3.26 \rangle 2.55 \rangle 3.72 \rangle 2.70 \rangle 1.53 \rangle 1.77 \rangle 3.04 \rangle 3.26 \rangle 2.55 \rangle 3.72 \rangle 2.70 \rangle 1.53 \rangle 1.77 \rangle 3.04 \rangle 3.27 \rangle 3.27$ \066\050\266\002\025\212\124\054\234\260\027\163\216\320\067\243 \024\074\230\225\000\014\051\005\133\236\111\111\261\137\307\343  $\label{eq:condition} $$ \frac{313}{317}047\frac{45}{216}065\frac{27}{267}\frac{127}{310}060\frac{331}{101}\frac{133}{271}024 $$ \266\350\302\017\224\061\247\224\230\314\152\353\265\341\047\365 \020\250\001\350\216\022\142\350\210\314\265\177\106\227\300\233  $\label{eq:condition} $$ \020\146\070\032\066\106\137\042\150\075\337\311\306\023\047\253$ \123\006\254\242\074\206\006\145\157\261\176\261\051\104\232\243  $\label{eq:condition} $$ \272\111\151\050\151\217\327\345\137\255\004\206\144\157\032\240 $$$ \014\305\010\142\316\200\243\320\363\354\150\336\276\063\307\027 \133\177\200\304\114\114\261\246\204\212\303\073\270\011\315\024  $\label{eq:condition} $$ \201\272\030\343\124\127\066\376\333\057\174\107\241\072\063\310 $$$ \371\130\073\104\117\261\312\002\211\004\226\050\150\305\113\270 \046\211\273\326\063\057\120\325\376\232\211\272\030\062\222\124 \306\133\340\235\371\136\345\015\042\233\366\332\342\310\041\262 \142\041\252\206\100\262\056\144\323\137\310\343\176\021\147\105 \037\005\376\343\242\357\263\250\263\363\175\217\370\014\037\042 \037\055\160\264\270\001\064\166\060\000\345\043\170\247\126\327 \120\037\212\373\006\365\302\031\360\320

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "UCA Global G2 Root"
```

<sup>#</sup> Issuer: CN=UCA Global G2 Root,O=UniTrust,C=CN

<sup>#</sup> Serial Number:5d:df:b1:da:5a:a3:ed:5d:be:5a:65:20:65:03:90:ef

<sup>#</sup> Subject: CN=UCA Global G2 Root,O=UniTrust,C=CN

<sup>#</sup> Not Valid Before: Fri Mar 11 00:00:00 2016 # Not Valid After : Mon Dec 31 00:00:00 2040

<sup>#</sup> Fingerprint (SHA-256):

<sup>9</sup>B:EA:11:C9:76:FE:01:47:64:C1:BE:56:A6:F9:14:B5:A5:60:31:7A:BD:99:88:39:33:82:E5:16:1A:A0:49:3C

```
# Fingerprint (SHA1): 28:F9:78:16:19:7A:FF:18:25:18:AA:44:FE:C1:A0:CE:5C:B6:4C:8A
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "UCA Global G2 Root"
CKA CERT SHA1 HASH MULTILINE OCTAL
\label{eq:condition} $$ \050\371\170\026\031\172\377\030\045\030\252\104\376\301\240\316
\134\266\114\212
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\200\376\360\304\112\360\134\142\062\237\034\272\170\251\120\370
END
CKA_ISSUER MULTILINE_OCTAL
\label{eq:condition} $$ \060\075\061\013\060\011\006\003\125\004\006\023\002\103\116\061 $$
\021\060\017\006\003\125\004\012\014\010\125\156\151\124\162\165
\163\164\061\033\060\031\006\003\125\004\003\014\022\125\103\101
\040\107\154\157\142\141\154\040\107\062\040\122\157\157\164
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\135\337\261\332\132\243\355\135\276\132\145\040\145\003
\220\357
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "UCA Extended Validation Root"
# Issuer: CN=UCA Extended Validation Root,O=UniTrust,C=CN
# Serial Number:4f:d2:2b:8f:f5:64:c8:33:9e:4f:34:58:66:23:70:60
# Subject: CN=UCA Extended Validation Root,O=UniTrust,C=CN
# Not Valid Before: Fri Mar 13 00:00:00 2015
# Not Valid After: Fri Dec 31 00:00:00 2038
# Fingerprint (SHA-256):
D4:3A:F9:B3:54:73:75:5C:96:84:FC:06:D7:D8:CB:70:EE:5C:28:E7:73:FB:29:4E:B4:1E:E7:17:22:92:4D:24
# Fingerprint (SHA1): A3:A1:B0:6F:24:61:23:4A:E3:36:A5:C2:37:FC:A6:FF:DD:F0:D7:3A
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "UCA Extended Validation Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\107\061\013\060\011\006\003\125\004\006\023\002\103\116\061
\021\060\017\006\003\125\004\012\014\010\125\156\151\124\162\165
```

\163\164\061\045\060\043\006\003\125\004\003\014\034\125\103\101 \040\105\170\164\145\156\144\145\144\040\126\141\154\151\144\141 \164\151\157\156\040\122\157\157\164

**END** 

CKA ID UTF8 "0"

#### CKA\_ISSUER MULTILINE\_OCTAL

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

 $\label{eq:condition} $$ \002\020\117\322\053\217\365\144\310\063\236\117\064\130\146\043\160\140$ 

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\132\060\202\003\102\240\003\002\001\002\002\020\117 \322\053\217\365\144\310\063\236\117\064\130\146\043\160\140\060  $\label{eq:condition} $$ \0.015\0.06\0.01\0.05\0.00\0.060\0.015\0.001\0.01\0.01\0.05\0.00\0.060\0.107$ \061\013\060\011\006\003\125\004\006\023\002\103\116\061\021\060 \017\006\003\125\004\012\014\010\125\156\151\124\162\165\163\164 \170\164\145\156\144\145\144\040\126\141\154\151\144\141\164\151 \157\156\040\122\157\157\164\060\036\027\015\061\065\060\063\061 \063\060\060\060\060\060\060\060\132\027\015\063\070\061\062\063\061 \060\060\060\060\060\060\060\132\060\107\061\013\060\011\006\003\125 \004\006\023\002\103\116\061\021\060\017\006\003\125\004\012\014 \010\125\156\151\124\162\165\163\164\061\045\060\043\006\003\125 \004\003\014\034\125\103\101\040\105\170\164\145\156\144\145\144  $\\ \\ \langle 040 \rangle 126 \rangle 141 \rangle 154 \rangle 151 \rangle 144 \rangle 141 \rangle 164 \rangle 151 \rangle 157 \rangle 156 \rangle 040 \rangle 122 \rangle 157 \rangle 164$ \060\202\002\042\060\015\006\011\052\206\110\206\367\015\001\001 \001\005\000\003\202\002\017\000\060\202\002\012\002\202\002\001 \000\251\011\007\050\023\002\260\231\340\144\252\036\103\026\172 \163\261\221\240\165\076\250\372\343\070\000\172\354\211\152\040 \017\213\305\260\233\063\003\132\206\306\130\206\325\301\205\273 \117\306\234\100\115\312\276\356\151\226\270\255\201\060\232\174 \222\005\353\005\053\232\110\320\270\166\076\226\310\040\273\322 \260\361\217\330\254\105\106\377\252\147\140\264\167\176\152\037  $\label{eq:condition} $$ \074\032\122\172\004\075\007\074\205\015\204\320\037\166\012\367$ \152\024\337\162\343\064\174\127\116\126\001\076\171\361\252\051 \073\154\372\370\217\155\115\310\065\337\256\353\334\044\356\171 \105\247\205\266\005\210\336\210\135\045\174\227\144\147\011\331 \277\132\025\005\206\363\011\036\354\130\062\063\021\363\167\144 \260\166\037\344\020\065\027\033\362\016\261\154\244\052\243\163 \374\011\037\036\062\031\123\021\347\331\263\054\056\166\056\241 \243\336\176\152\210\011\350\362\007\212\370\262\315\020\347\342 \163\100\223\273\010\321\077\341\374\013\224\263\045\357\174\246

\327\321\257\237\377\226\232\365\221\173\230\013\167\324\176\350 \007\322\142\265\225\071\343\363\361\155\017\016\145\204\212\143 \124\305\200\266\340\236\113\175\107\046\247\001\010\135\321\210 \236\327\303\062\104\372\202\112\012\150\124\177\070\123\003\314 \244\000\063\144\121\131\013\243\202\221\172\136\354\026\302\363 \052\346\142\332\052\333\131\142\020\045\112\052\201\013\107\007 \103\006\160\207\322\372\223\021\051\172\110\115\353\224\307\160 \115\257\147\325\121\261\200\040\001\001\264\172\010\246\220\177 \116\340\357\007\101\207\257\152\245\136\213\373\317\120\262\232 \124\257\303\211\272\130\055\365\060\230\261\066\162\071\176\111  $\\ \\004\\375\\051\\247\\114\\171\\344\\005\\127\\333\\224\\271\\026\\123\\215\\106$  $\label{eq:condition} $$ \263\035\225\141\127\126\177\257\360\026\133\141\130\157\066\120 $$$ \021\013\330\254\053\225\026\032\016\037\010\315\066\064\145\020 \142\146\325\200\137\024\040\137\055\014\240\170\012\150\326\054  $\label{eq:condition} $$ 327\351\157\053\322\112\005\223\374\236\157\153\147\377\210\361$ \116\245\151\112\122\067\005\352\306\026\215\322\304\231\321\202 \053\073\272\065\165\367\121\121\130\363\310\007\335\344\264\003 \177\002\003\001\000\001\243\102\060\100\060\035\006\003\125\035 \016\004\026\004\024\331\164\072\344\060\075\015\367\022\334\176 \132\005\237\036\064\232\367\341\024\060\017\006\003\125\035\023 \001\001\377\004\005\060\003\001\001\377\060\016\006\003\125\035 \017\001\001\377\004\004\003\002\001\206\060\015\006\011\052\206  $\label{eq:condition} $$ \frac{110}{206}\frac{367}{015}\frac{001}{001}\frac{003}{005}\frac{000}{003}\frac{202}{002}\frac{001}{000}\frac{66}{215} $$$ \227\314\102\025\144\051\067\233\046\054\326\373\256\025\151\054 \153\032\032\367\137\266\371\007\114\131\352\363\311\310\271\256 \314\272\056\172\334\300\365\260\055\300\073\257\237\160\005\021 \152\237\045\117\001\051\160\343\345\014\341\352\132\174\334\111 \273\301\036\052\201\365\026\113\162\221\310\242\061\271\252\332 \374\235\037\363\135\100\002\023\374\116\034\006\312\263\024\220 \124\027\031\022\032\361\037\327\014\151\132\366\161\170\364\224  $\label{eq:condition} $$ \frac{175}{221}013\frac{216}{354}\frac{220}{124}\frac{216}{274}\frac{157}{241}\frac{114}{253}\frac{374}{164}\frac{144}{144} $$$ \375\161\232\370\101\007\241\315\221\344\074\232\340\233\062\071 \163\253\052\325\151\310\170\221\046\061\175\342\307\060\361\374 \024\170\167\022\016\023\364\335\026\224\277\113\147\173\160\123 \205\312\260\273\363\070\115\054\220\071\300\015\302\135\153\351 \342\345\325\210\215\326\054\277\253\033\276\265\050\207\022\027 \164\156\374\175\374\217\320\207\046\260\033\373\271\154\253\342 \236\075\025\301\073\056\147\002\130\221\237\357\370\102\037\054 \267\150\365\165\255\317\265\366\377\021\175\302\360\044\245\255 \323\372\240\074\251\372\135\334\245\240\357\104\244\276\326\350 \345\344\023\226\027\173\006\076\062\355\307\267\102\274\166\243 \330\145\070\053\070\065\121\041\016\016\157\056\064\023\100\341 \053\147\014\155\112\101\060\030\043\132\062\125\231\311\027\340 \074\336\366\354\171\255\053\130\031\242\255\054\042\032\225\216 \276\226\220\135\102\127\304\371\024\003\065\053\034\055\121\127 \010\247\072\336\077\344\310\264\003\163\302\301\046\200\273\013 \102\037\255\015\257\046\162\332\314\276\263\243\203\130\015\202 \305\037\106\121\343\234\030\314\215\233\215\354\111\353\165\120  $\label{eq:control} $$ 325\214\050\131\312\164\064\332\214\013\041\253\036\352\033\345 \307\375\025\076\300\027\252\373\043\156\046\106\313\372\371\261 \162\153\151\317\042\204\013\142\017\254\331\031\000\224\242\166 \074\324\055\232\355\004\236\055\006\142\020\067\122\034\205\162 \033\047\345\314\306\061\354\067\354\143\131\233\013\035\166\314 \176\062\232\210\225\010\066\122\273\336\166\137\166\111\111\255 \177\275\145\040\262\311\301\053\166\030\166\237\126\261 \END$ 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "UCA Extended Validation Root"

# Issuer: CN=UCA Extended Validation Root,O=UniTrust,C=CN

# Serial Number:4f:d2:2b:8f:f5:64:c8:33:9e:4f:34:58:66:23:70:60

# Subject: CN=UCA Extended Validation Root,O=UniTrust,C=CN

# Not Valid Before: Fri Mar 13 00:00:00 2015

# Not Valid After: Fri Dec 31 00:00:00 2038

# Fingerprint (SHA-256):

D4:3A:F9:B3:54:73:75:5C:96:84:FC:06:D7:D8:CB:70:EE:5C:28:E7:73:FB:29:4E:B4:1E:E7:17:22:92:4D:24

# Fingerprint (SHA1): A3:A1:B0:6F:24:61:23:4A:E3:36:A5:C2:37:FC:A6:FF:DD:F0:D7:3A

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA LABEL UTF8 "UCA Extended Validation Root"

CKA CERT SHA1 HASH MULTILINE OCTAL

\243\241\260\157\044\141\043\112\343\066\245\302\067\374\246\377

\335\360\327\072

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\verb|241|363|137|103|306|064|233|332|277|214|176|005|123|255|226|342|$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\107\061\013\060\011\006\003\125\004\006\023\002\103\116\061 $$$ 

\021\060\017\006\003\125\004\012\014\010\125\156\151\124\162\165

\040\105\170\164\145\156\144\145\144\040\126\141\154\151\144\141

\164\151\157\156\040\122\157\157\164

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\020\117\322\053\217\365\144\310\063\236\117\064\130\146\043 $$$ 

\160\140

END

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

 ${\tt CKA\_TRUST\_EMAIL\_PROTECTION\ CK\_TRUST\ CKT\_NSS\_MUST\_VERIFY\_TRUST}$ 

CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

# Certificate "Certigna Root CA"

#

- # Issuer: CN=Certigna Root CA,OU=0002 48146308100036,O=Dhimyotis,C=FR
- # Serial Number:00:ca:e9:1b:89:f1:55:03:0d:a3:e6:41:6d:c4:e3:a6:e1
- # Subject: CN=Certigna Root CA,OU=0002 48146308100036,O=Dhimyotis,C=FR
- # Not Valid Before: Tue Oct 01 08:32:27 2013
- # Not Valid After: Sat Oct 01 08:32:27 2033
- # Fingerprint (SHA-256):

D4:8D:3D:23:EE:DB:50:A4:59:E5:51:97:60:1C:27:77:4B:9D:7B:18:C9:4D:5A:05:95:11:A1:02:50:B9:31:68

# Fingerprint (SHA1): 2D:0D:52:14:FF:9E:AD:99:24:01:74:20:47:6E:6C:85:27:27:F5:43

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Certigna Root CA"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \060\132\061\013\060\011\006\003\125\004\006\023\002\106\122\061 $$$ 

\022\060\020\006\003\125\004\012\014\011\104\150\151\155\171\157

\060\062\040\064\070\061\064\066\063\060\070\061\060\060\063

 $\label{eq:condition} $$ \066\061\031\060\027\006\003\125\004\003\014\020\103\145\162\164$ 

\151\147\156\141\040\122\157\157\164\040\103\101

**END** 

CKA ID UTF8 "0"

## CKA\_ISSUER MULTILINE\_OCTAL

\151\147\156\141\040\122\157\157\164\040\103\101

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

\002\021\000\312\351\033\211\361\125\003\015\243\346\101\155\304 \343\246\341

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\147\156\141\040\122\157\157\164\040\103\101\060\036\027\015\061 \063\061\060\060\061\060\070\063\062\062\067\132\027\015\063\063 \061\060\060\061\060\070\063\062\062\067\132\060\132\061\013\060 \011\006\003\125\004\006\023\002\106\122\061\022\060\020\006\003 \125\004\012\014\011\104\150\151\155\171\157\164\151\163\061\034 \060\032\006\003\125\004\013\014\023\060\060\060\062\040\064\070 \061\064\066\063\060\070\061\060\060\060\063\066\061\031\060\027 \006\003\125\004\003\014\020\103\145\162\164\151\147\156\141\040 \122\157\157\164\040\103\101\060\202\002\042\060\015\006\011\052 \206\110\206\367\015\001\001\001\005\000\003\202\002\017\000\060 \202\002\012\002\202\002\001\000\315\030\071\145\032\131\261\352  $\\ 144\\026\\016\\214\\224\\044\\225\\174\\203\\323\\305\\071\\046\\334\\014\\357$ \026\127\215\327\330\254\243\102\177\202\312\355\315\133\333\016 \267\055\355\105\010\027\262\331\263\313\326\027\122\162\050\333 \216\116\236\212\266\013\371\236\204\232\115\166\336\042\051\134 \322\263\322\006\076\060\071\251\164\243\222\126\034\241\157\114 \012\040\155\237\043\172\264\306\332\054\344\035\054\334\263\050 \320\023\362\114\116\002\111\241\124\100\236\346\345\005\240\055 \204\310\377\230\154\320\353\212\032\204\010\036\267\150\043\356 \043\325\160\316\155\121\151\020\356\241\172\302\321\042\061\302 \202\205\322\362\125\166\120\174\045\172\311\204\134\013\254\335 \102\116\053\347\202\242\044\211\313\220\262\320\356\043\272\146  $\\ 114 \\ 273 \\ 142 \\ 244 \\ 371 \\ 123 \\ 132 \\ 144 \\ 173 \\ 174 \\ 230 \\ 372 \\ 243 \\ 110 \\ 236 \\ 017 \\ 124 \\ 173 \\ 174 \\ 1$ \225\256\247\030\364\152\354\056\003\105\257\360\164\370\052\315 \172\135\321\276\104\046\062\051\361\361\365\154\314\176\002\041 \013\237\157\244\077\276\235\123\342\317\175\251\054\174\130\032 \227\341\075\067\067\030\146\050\322\100\305\121\212\214\303\055 \316\123\210\044\130\144\060\026\305\252\340\326\012\246\100\337 \170\366\365\004\174\151\023\204\274\321\321\247\006\317\001\367 \150\300\250\127\273\072\141\255\004\214\223\343\255\374\360\333  $\label{eq:condition} $$ 104\155\131\334\111\131\256\254\232\231\066\060\101\173\166\063$ \042\207\243\302\222\206\156\371\160\356\256\207\207\225\033\304 \172\275\061\363\324\322\345\231\377\276\110\354\165\365\170\026 \035\246\160\301\177\074\033\241\222\373\317\310\074\326\305\223 \012\217\365\125\072\166\225\316\131\230\212\011\225\167\062\232 \203\272\054\004\072\227\275\324\057\276\327\154\233\242\312\175 \155\046\311\125\325\317\303\171\122\010\011\231\007\044\055\144  $\\ \langle 045 \rangle 153 \rangle 246 \rangle 041 \rangle 151 \rangle 233 \rangle 152 \rangle 335 \rangle 164 \rangle 115 \rangle 153 \rangle 227 \rangle 172 \rangle 101 \rangle 275 \rangle 253$ \027\371\220\027\110\217\066\371\055\325\305\333\356\252\205\105  $\label{eq:condition} $$ 101\372\315\072\105\261\150\346\066\114\233\220\127\354\043\271 $$$ \207\010\302\304\011\361\227\206\052\050\115\342\164\300\332\304 \214\333\337\342\241\027\131\316\044\131\164\061\332\177\375\060 \155\331\334\341\152\341\374\137\002\003\001\000\001\243\202\001 \032\060\202\001\026\060\017\006\003\125\035\023\001\001\377\004  $\label{eq:condition} $$ \005\060\003\001\001\377\060\016\006\003\125\035\017\001\001\377$ \004\004\003\002\001\006\060\035\006\003\125\035\016\004\026\004 \024\030\207\126\340\156\167\356\044\065\074\116\163\232\037\326 \341\342\171\176\053\060\037\006\003\125\035\043\004\030\060\026

\200\024\030\207\126\340\156\167\356\044\065\074\116\163\232\037 \326\341\342\171\176\053\060\104\006\003\125\035\040\004\075\060  $\label{eq:condition} $$ \006\001\005\005\007\002\001\026\043\150\164\164\160\163\072\057\$ \057\167\167\167\167\056\143\145\162\164\151\147\156\141\056\146 \125\035\037\004\146\060\144\060\057\240\055\240\053\206\051\150 \164\164\160\072\057\057\143\162\154\056\143\145\162\164\151\147 \156\141\056\146\162\057\143\145\162\164\151\147\156\141\162\157 \157\164\143\141\056\143\162\154\060\061\240\057\240\055\206\053  $\label{eq:condition} $$ \frac{150}{164}\frac{4}{160}\frac{072}{057}\frac{143}{162}\frac{154}{056}\frac{144}{150}\frac{151}{155}\frac{171}{150} $$$  $\label{eq:condition} $$ \frac{157}{164}\frac{151}{163}\frac{056}{143}\frac{157}{155}\frac{057}{143}\frac{145}{162}\frac{164}{151}\frac{147}{156} $$$ \141\162\157\157\164\143\141\056\143\162\154\060\015\006\011\052 \206\110\206\367\015\001\001\013\005\000\003\202\002\001\000\224 \270\236\117\360\343\225\010\042\347\315\150\101\367\034\125\325 \174\000\342\055\072\211\135\150\070\057\121\042\013\112\215\313  $\label{eq:condition} $$ \frac{351}{273}\frac{135}{076}\frac{273}{134}\frac{075}{261}\frac{376}{344}\frac{123}{125}\frac{317}{241} $$$ \220\033\002\035\137\146\106\011\063\050\341\015\044\227\160\323 \020\037\352\144\127\226\273\135\332\347\304\214\117\114\144\106  $\label{eq:condition} $$ \035\134\207\343\131\336\102\321\233\250\176\246\211\335\217\034$ \311\060\202\355\073\234\315\300\351\031\340\152\330\002\165\067 \253\367\064\050\050\221\362\004\012\117\065\343\140\046\001\372  $\label{eq:condition} $$ 320\021\214\371\021\152\356\257\075\303\120\323\217\137\063\171$ \074\206\250\163\105\220\214\040\266\162\163\027\043\276\007\145 \345\170\222\015\272\001\300\353\214\034\146\277\254\206\167\001 \224\015\234\346\351\071\215\037\246\121\214\231\014\071\167\341 \264\233\372\034\147\127\157\152\152\216\251\053\114\127\171\172  $\label{eq:condition} $$ \frac{127}042\frac{317}{315}\frac{137}143\frac{06}{215}\frac{134}{131}\frac{072}{206}\frac{370}{062}\frac{107}{142} $$$ \243\147\015\030\221\334\373\246\153\365\110\141\163\043\131\216 \002\247\274\104\352\364\111\235\361\124\130\371\140\257\332\030 \244\057\050\105\334\172\240\210\206\135\363\073\347\377\051\065 \200\374\144\103\224\346\343\034\157\276\255\016\052\143\231\053 \311\176\205\366\161\350\006\003\225\376\336\217\110\034\132\324 \222\350\053\356\347\061\333\272\004\152\207\230\347\305\137\357 \175\247\042\367\001\330\115\371\211\320\016\232\005\131\244\236 \230\331\157\053\312\160\276\144\302\125\243\364\351\257\303\222 \051\334\210\026\044\231\074\215\046\230\266\133\267\314\316\267 \067\007\375\046\331\230\205\044\377\131\043\003\232\355\235\235  $\label{eq:condition} $$ \250\344\136\070\316\327\122\015\157\322\077\155\261\005\153\111 $$$ \316\212\221\106\163\364\366\057\360\250\163\167\016\145\254\241 \215\146\122\151\176\113\150\014\307\036\067\047\203\245\214\307 \002\344\024\315\111\001\260\163\263\375\306\220\072\157\322\154 \355\073\356\354\221\276\242\103\135\213\000\112\146\045\104\160 \336\100\017\370\174\025\367\242\316\074\327\136\023\214\201\027 \030\027\321\275\361\167\020\072\324\145\071\301\047\254\127\054 \045\124\377\242\332\117\212\141\071\136\256\075\112\214\275 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE

# CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Certigna Root CA"
# Issuer: CN=Certigna Root CA,OU=0002 48146308100036,O=Dhimyotis,C=FR
# Serial Number:00:ca:e9:1b:89:f1:55:03:0d:a3:e6:41:6d:c4:e3:a6:e1
# Subject: CN=Certigna Root CA,OU=0002 48146308100036,O=Dhimyotis,C=FR
# Not Valid Before: Tue Oct 01 08:32:27 2013
# Not Valid After: Sat Oct 01 08:32:27 2033
# Fingerprint (SHA-256):
D4:8D:3D:23:EE:DB:50:A4:59:E5:51:97:60:1C:27:77:4B:9D:7B:18:C9:4D:5A:05:95:11:A1:02:50:B9:31:68
# Fingerprint (SHA1): 2D:0D:52:14:FF:9E:AD:99:24:01:74:20:47:6E:6C:85:27:27:F5:43
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Certigna Root CA"
CKA CERT SHA1 HASH MULTILINE OCTAL
\055\015\122\024\377\236\255\231\044\001\164\040\107\156\154\205
\047\047\365\103
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\label{eq:condition} $$ \016\134\060\142\047\353\133\274\327\256\142\272\351\325\337\167 $$
END
CKA_ISSUER MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\106\122\061
\022\060\020\006\003\125\004\012\014\011\104\150\151\155\171\157
\164\151\163\061\034\060\032\006\003\125\004\013\014\023\060\060
\060\062\040\064\070\061\064\066\063\060\070\061\060\060\063
\066\061\031\060\027\006\003\125\004\003\014\020\103\145\162\164
\151\147\156\141\040\122\157\157\164\040\103\101
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\021\000\312\351\033\211\361\125\003\015\243\346\101\155\304
\343\246\341
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "emSign Root CA - G1"
# Issuer: CN=emSign Root CA - G1,O=eMudhra Technologies Limited,OU=emSign PKI,C=IN
# Serial Number:31:f5:e4:62:0c:6c:58:ed:d6:d8
# Subject: CN=emSign Root CA - G1,O=eMudhra Technologies Limited,OU=emSign PKI,C=IN
# Not Valid Before: Sun Feb 18 18:30:00 2018
```

# Not Valid After: Wed Feb 18 18:30:00 2043

# Fingerprint (SHA-256):

40:F6:AF:03:46:A9:9A:A1:CD:1D:55:5A:4E:9C:CE:62:C7:F9:63:46:03:EE:40:66:15:83:3D:C8:C8:D0:03:67

# Fingerprint (SHA1): 8A:C7:AD:8F:73:AC:4E:C1:B5:75:4D:A5:40:F4:FC:CF:7C:B5:8E:8C

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "emSign Root CA - G1"

CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000147\061\013\060\011\006\003\125\004\006\023\002\111\116\061 $$ \023\060\021\006\003\125\004\013\023\012\145\155\123\151\147\156 $$ \040\120\13\111\061\045\060\043\006\003\125\004\012\023\034\145 $$ \115\165\144\150\162\141\040\124\145\143\150\156\157\154\157\147 $$ \151\145\163\040\114\151\155\123\151\147\156\040\122\157\157 $$ \164\040\103\101\040\055\040\107\061 $$$ 

**END** 

CKA\_ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000147\061\013\060\011\006\003\125\004\006\023\002\111\116\061 $$ \023\060\021\006\003\125\004\013\023\012\145\155\123\151\147\156 $$ \040\120\13\111\061\045\060\043\006\003\125\004\012\023\034\145 $$ \115\165\144\150\162\141\040\124\145\143\150\156\157\154\157\147 $$ \151\145\163\040\114\151\155\123\151\147\156\040\122\157\157 $$ \164\040\103\101\040\055\040\107\061 $$$ 

**END** 

#### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\012\061\365\344\142\014\154\130\355\326\330

**END** 

#### CKA VALUE MULTILINE OCTAL

 $\label{eq:constraints} $$ \ensuremath{$000}\ensuremath{$ 

\147\151\145\163\040\114\151\155\151\164\145\144\061\034\060\032 \006\003\125\004\003\023\023\145\155\123\151\147\156\040\122\157 \157\164\040\103\101\040\055\040\107\061\060\202\001\042\060\015 \006\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001 \017\000\060\202\001\012\002\202\001\001\000\223\113\273\351\146  $\label{eq:condition} $$ \frac{356}235\\133\\325\\064\\223\\320\\033\\036\\303\\347\\236\\270\\144\\063$ \177\143\170\150\264\315\056\161\165\327\233\040\306\115\051\274 \266\150\140\212\367\041\232\126\065\132\363\166\275\330\315\232  $\label{eq:condition} $$ 377\223\126\113\245\131\006\241\223\064\051\335\026\064\165\116$ \362\201\264\307\226\116\255\031\025\122\112\376\074\160\165\160 \315\257\053\253\025\232\063\074\252\263\213\252\315\103\375\365  $\label{eq:condition} $$ \frac{352}{60} 377 \frac{355}{317} \frac{021}{073} \frac{224}{316} \frac{116}{062} \frac{026}{323} \frac{043}{100} \frac{052}{052}$ \167\263\257\074\001\054\154\355\231\054\213\331\116\151\230\262 \367\217\101\260\062\170\141\326\015\137\303\372\242\100\222\035 \134\027\346\160\076\065\347\242\267\302\142\342\253\244\070\114 \265\071\065\157\352\003\151\372\072\124\150\205\155\326\362\057 \103\125\036\221\015\016\330\325\152\244\226\321\023\074\054\170 \120\350\072\222\322\027\126\345\065\032\100\034\076\215\054\355 \071\337\102\340\203\101\164\337\243\315\302\206\140\110\150\343 \302\314\261\267\255\327\174\160\212\307\205\002\003\001\000\001 \243\102\060\100\060\035\006\003\125\035\016\004\026\004\024\373  $\label{eq:condition} $$ \frac{357}{015} 206 236 260 343 335 251 271 361 041 027 177 076 374 360 }$ \167\053\032\060\016\006\003\125\035\017\001\001\377\004\004\003  $\label{eq:condition} $$ \002\001\006\000\017\006\003\125\035\023\001\001\377\004\005\060 $$$ \003\001\001\377\060\015\006\011\052\206\110\206\367\015\001\001 \013\005\000\003\202\001\001\000\131\377\362\214\365\207\175\161  $\label{eq:condition} $$ \075\243\237\033\133\321\332\370\323\234\153\066\275\233\251\141$ \353\336\026\054\164\075\236\346\165\332\327\272\247\274\102\027 \347\075\221\353\345\175\335\076\234\361\317\222\254\154\110\314  $\label{eq:condition} $$ 302\042\077\151\073\305\266\025\057\243\065\306\150\052\034\127 $$$ \257\071\357\215\320\065\303\030\014\173\000\126\034\315\213\031 \164\336\276\017\022\340\320\252\241\077\002\064\261\160\316\235 \030\326\010\003\011\106\356\140\340\176\266\304\111\004\121\175 \160\140\274\252\262\377\171\162\172\246\035\075\137\052\370\312 \342\375\071\267\107\271\353\176\337\004\043\257\372\234\006\007 \351\373\143\223\200\100\265\306\154\012\061\050\316\014\237\317  $\label{eq:condition} $$ \263\043\065\200\101\215\154\304\067\173\201\057\200\241\100\102$ \205\351\331\070\215\350\241\123\315\001\277\151\350\132\006\362 \105\013\220\372\256\341\277\235\362\256\127\074\245\256\262\126 \364\213\145\100\351\375\061\201\054\364\071\011\330\356\153\247 \264\246\035\025\245\230\367\001\201\330\205\175\363\121\134\161 \210\336\272\314\037\200\176\112

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Issuer: CN=emSign Root CA - G1,O=eMudhra Technologies Limited,OU=emSign PKI,C=IN
# Serial Number:31:f5:e4:62:0c:6c:58:ed:d6:d8
# Subject: CN=emSign Root CA - G1,O=eMudhra Technologies Limited,OU=emSign PKI,C=IN
# Not Valid Before: Sun Feb 18 18:30:00 2018
# Not Valid After: Wed Feb 18 18:30:00 2043
# Fingerprint (SHA-256):
40:F6:AF:03:46:A9:9A:A1:CD:1D:55:5A:4E:9C:CE:62:C7:F9:63:46:03:EE:40:66:15:83:3D:C8:C8:D0:03:67
# Fingerprint (SHA1): 8A:C7:AD:8F:73:AC:4E:C1:B5:75:4D:A5:40:F4:FC:CF:7C:B5:8E:8C
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "emSign Root CA - G1"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\212\307\255\217\163\254\116\301\265\165\115\245\100\364\374\317
\174\265\216\214
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\234\102\204\127\335\313\013\247\056\225\255\266\363\332\274\254
END
CKA_ISSUER MULTILINE_OCTAL
\label{eq:condition} $$ \060\147\061\013\060\011\006\003\125\004\006\023\002\111\116\061 $$
\023\060\021\006\003\125\004\013\023\012\145\155\123\151\147\156
\040\120\113\111\061\045\060\043\006\003\125\004\012\023\034\145
\115\165\144\150\162\141\040\124\145\143\150\156\157\154\157\147
\151\145\163\040\114\151\155\151\164\145\144\061\034\060\032\006
\label{eq:condition} $$ \003\125\004\003\023\023\145\155\123\151\147\156\040\122\157\157
\164\040\103\101\040\055\040\107\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\012\061\365\344\142\014\154\130\355\326\330
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "emSign ECC Root CA - G3"
# Issuer: CN=emSign ECC Root CA - G3,O=eMudhra Technologies Limited,OU=emSign PKI,C=IN
# Serial Number:3c:f6:07:a9:68:70:0e:da:8b:84
# Subject: CN=emSign ECC Root CA - G3,O=eMudhra Technologies Limited,OU=emSign PKI,C=IN
# Not Valid Before: Sun Feb 18 18:30:00 2018
# Not Valid After: Wed Feb 18 18:30:00 2043
# Fingerprint (SHA-256):
86:A1:EC:BA:08:9C:4A:8D:3B:BE:27:34:C6:12:BA:34:1D:81:3E:04:3C:F9:E8:A8:62:CD:5C:57:A3:6B:BE:6B
```

# Trust for "emSign Root CA - G1"

# Fingerprint (SHA1): 30:43:FA:4F:F2:57:DC:A0:C3:80:EE:2E:58:EA:78:B2:3F:E6:BB:C1

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "emSign ECC Root CA - G3"

CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000153\001\006\003\125\004\0006\023\002\111\116\061 $$ \023\060\021\006\003\125\004\013\023\012\145\155\123\151\147\156 $$ \040\120\113\111\061\045\060\043\006\003\125\004\012\023\034\145 $$ \115\165\144\150\162\141\040\124\145\143\150\156\157\154\157\147 $$ \151\145\163\040\114\151\155\151\164\145\144\061\040\060\036\006 $$ \003\125\004\003\023\027\145\155\123\151\147\156\040\105\103\103 $$ \040\122\157\157\164\040\103\101\040\055\040\107\063 $$$ 

**END** 

CKA ID UTF8 "0"

#### CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000153\001\006\003\125\004\0006\023\002\111\116\061 $$ \023\060\021\006\003\125\004\013\023\012\145\155\123\151\147\156 $$ \040\120\13\111\061\045\060\043\006\003\125\004\012\023\034\145 $$ \115\165\144\150\162\141\040\124\145\143\150\156\157\154\157\147 $$ \151\145\163\040\114\151\155\151\164\145\144\061\040\060\036\006 $$ \003\125\004\003\023\027\145\155\123\151\147\156\040\105\103\103 $$ \040\122\157\157\164\040\103\101\040\055\040\107\063 $$ END$ 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\012\074\366\007\251\150\160\016\332\213\204$$ 

END

### CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \060\202\002\116\060\202\001\323\240\003\002\001\002\002\002\012\074$$$ \366\007\251\150\160\016\332\213\204\060\012\006\010\052\206\110 \316\075\004\003\003\060\153\061\013\060\011\006\003\125\004\006 \023\002\111\116\061\023\060\021\006\003\125\004\013\023\012\145 \004\012\023\034\145\115\165\144\150\162\141\040\124\145\143\150 \156\157\154\157\147\151\145\163\040\114\151\155\151\164\145\144 \061\040\060\036\006\003\125\004\003\023\027\145\155\123\151\147  $\label{eq:condition} $$ 156\040\105\103\103\040\122\157\157\164\040\103\101\040\055\040 $$$ \107\063\060\036\027\015\061\070\060\062\061\070\061\070\063\060 \060\060\132\027\015\064\063\060\062\061\070\061\070\063\060\060 \060\132\060\153\061\013\060\011\006\003\125\004\006\023\002\111 \116\061\023\060\021\006\003\125\004\013\023\012\145\155\123\151 \147\156\040\120\113\111\061\045\060\043\006\003\125\004\012\023 \034\145\115\165\144\150\162\141\040\124\145\143\150\156\157\154 \157\147\151\145\163\040\114\151\155\151\164\145\144\061\040\060 \036\006\003\125\004\003\023\027\145\155\123\151\147\156\040\105 \103\103\040\122\157\157\164\040\103\101\040\055\040\107\063\060

\166\060\020\006\007\052\206\110\316\075\002\001\006\005\053\201 \004\000\042\003\142\000\004\043\245\014\270\055\022\365\050\363 \261\262\335\342\002\022\200\236\071\137\111\115\237\311\045\064 \131\164\354\273\006\034\347\300\162\257\350\256\057\341\101\124 \207\024\250\112\262\350\174\202\346\133\152\265\334\263\165\316 \213\006\320\206\043\277\106\325\216\017\077\004\364\327\034\222 \176\366\245\143\302\365\137\216\056\117\241\030\031\002\053\062  $\label{eq:condition} $$ \020\144\175\026\223\321\243\102\060\100\060\035\006\003\125$$ \035\016\004\026\004\024\174\135\002\204\023\324\314\212\233\201 \316\027\034\056\051\036\234\110\143\102\060\016\006\003\125\035  $\label{eq:condition} $$ \017\001\001\377\004\004\003\002\001\006\060\017\006\003\125\035$$  $\label{eq:condition} $$ \023\001\001\377\004\005\060\003\001\001\377\060\012\006\010\052$ \206\110\316\075\004\003\003\003\151\000\060\146\002\061\000\276 \363\141\317\002\020\035\144\225\007\270\030\156\210\205\005\057 \203\010\027\220\312\037\212\114\350\015\033\172\261\255\325\201 \011\107\357\073\254\010\004\174\134\231\261\355\107\007\322\002  $\label{eq:condition} $$ \001\000\235\272\125\374\251\112\350\355\355\346\166\001\102\173$ \310\370\140\331\215\121\213\125\073\373\214\173\353\145\011\303 \370\226\315\107\250\202\362\026\125\167\044\176\022\020\225\004 \054\243

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "emSign ECC Root CA G3"
- # Issuer: CN=emSign ECC Root CA G3,O=eMudhra Technologies Limited,OU=emSign PKI,C=IN
- # Serial Number:3c:f6:07:a9:68:70:0e:da:8b:84
- # Subject: CN=emSign ECC Root CA G3,O=eMudhra Technologies Limited,OU=emSign PKI,C=IN
- # Not Valid Before: Sun Feb 18 18:30:00 2018
- # Not Valid After: Wed Feb 18 18:30:00 2043
- # Fingerprint (SHA-256):
- 86:A1:EC:BA:08:9C:4A:8D:3B:BE:27:34:C6:12:BA:34:1D:81:3E:04:3C:F9:E8:A8:62:CD:5C:57:A3:6B:BE:6B
- # Fingerprint (SHA1): 30:43:FA:4F:F2:57:DC:A0:C3:80:EE:2E:58:EA:78:B2:3F:E6:BB:C1
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA\_LABEL UTF8 "emSign ECC Root CA G3"
- CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL
- \060\103\372\117\362\127\334\240\303\200\356\056\130\352\170\262
- $\ \ \langle 077 \rangle 346 \rangle 273 \rangle 301$

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\316\013\162\321\237\210\216\320\120\003\350\343\270\213\147\100

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\153\061\013\060\011\006\003\125\004\006\023\002\111\116\061 $$$ 

```
\023\060\021\006\003\125\004\013\023\012\145\155\123\151\147\156
\040\120\113\111\061\045\060\043\006\003\125\004\012\023\034\145
\115\165\144\150\162\141\040\124\145\143\150\156\157\154\157\147
\151\145\163\040\114\151\155\151\164\145\144\061\040\060\036\006
\label{eq:condition} $$ \003\125\004\003\023\027\145\155\123\151\147\156\040\105\103\103
\040\122\157\157\164\040\103\101\040\055\040\107\063
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\012\074\366\007\251\150\160\016\332\213\204
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "emSign Root CA - C1"
# Issuer: CN=emSign Root CA - C1,O=eMudhra Inc,OU=emSign PKI,C=US
# Serial Number:00:ae:cf:00:ba:c4:cf:32:f8:43:b2
# Subject: CN=emSign Root CA - C1,O=eMudhra Inc,OU=emSign PKI,C=US
# Not Valid Before: Sun Feb 18 18:30:00 2018
# Not Valid After: Wed Feb 18 18:30:00 2043
# Fingerprint (SHA-256):
12:56:09:AA:30:1D:A0:A2:49:B9:7A:82:39:CB:6A:34:21:6F:44:DC:AC:9F:39:54:B1:42:92:F2:E8:C8:60:8F
# Fingerprint (SHA1): E7:2E:F1:DF:FC:B2:09:28:CF:5D:D4:D5:67:37:B1:51:CB:86:4F:01
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "emSign Root CA - C1"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\126\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\label{eq:condition} $$ \023\060\021\006\003\125\004\013\023\012\145\155\123\151\147\156
\040\120\113\111\061\024\060\022\006\003\125\004\012\023\013\145
\115\165\144\150\162\141\040\111\156\143\061\034\060\032\006\003
\125\004\003\023\023\145\155\123\151\147\156\040\122\157\157\164
\040\103\101\040\055\040\103\061
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\126\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\023\060\021\006\003\125\004\013\023\012\145\155\123\151\147\156
\040\120\113\111\061\024\060\022\006\003\125\004\012\023\013\145
\115\165\144\150\162\141\040\111\156\143\061\034\060\032\006\003
\125\004\003\023\023\145\155\123\151\147\156\040\122\157\157\164
\040\103\101\040\055\040\103\061
```

**END** 

# ${\sf CKA\_SERIAL\_NUMBER\ MULTILINE\_OCTAL}$

 $\label{eq:condition} $$ \000\256\317\000\272\304\317\062\370\103\262 $$$ 

**END** 

#### CKA\_VALUE MULTILINE\_OCTAL

\060\202\003\163\060\202\002\133\240\003\002\001\002\002\013\000 \256\317\000\272\304\317\062\370\103\262\060\015\006\011\052\206 \110\206\367\015\001\001\013\005\000\060\126\061\013\060\011\006  $\label{eq:condition} $$ \003\125\004\006\023\002\125\123\061\023\060\021\006\003\125\004$ \013\023\012\145\155\123\151\147\156\040\120\113\111\061\024\060 \022\006\003\125\004\012\023\013\145\115\165\144\150\162\141\040 \123\151\147\156\040\122\157\157\164\040\103\101\040\055\040\103  $\label{eq:condition} $$ \061\060\036\027\015\061\070\060\062\061\070\061\070\063\060\060 $$$ \060\132\027\015\064\063\060\062\061\070\061\070\063\060\060\060 \132\060\126\061\013\060\011\006\003\125\004\006\023\002\125\123 \156\040\120\113\111\061\024\060\022\006\003\125\004\012\023\013 \145\115\165\144\150\162\141\040\111\156\143\061\034\060\032\006  $\\ \\003\\125\\004\\003\\023\\023\\145\\155\\123\\151\\147\\156\\040\\122\\157\\157$ \164\040\103\101\040\055\040\103\061\060\202\001\042\060\015\006 \011\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017  $\label{eq:condition} $$ \000\060\202\001\012\002\202\001\001\000\317\353\251\271\361\231 $$$ \005\314\330\050\041\112\363\163\064\121\204\126\020\365\240\117 \054\022\343\372\023\232\047\320\317\371\171\032\164\137\035\171 \071\374\133\370\160\216\340\222\122\367\344\045\371\124\203\331 \035\323\310\132\205\077\136\307\266\007\356\076\300\316\232\257 \254\126\102\052\071\045\160\326\277\265\173\066\255\254\366\163 \334\315\327\035\212\203\245\373\053\220\025\067\153\034\046\107 \334\073\051\126\223\152\263\301\152\072\235\075\365\301\227\070 \130\005\213\034\021\343\344\264\270\135\205\035\203\376\170\137 \013\105\150\030\110\245\106\163\064\073\376\017\310\166\273\307 \030\363\005\321\206\363\205\355\347\271\331\062\255\125\210\316 \246\266\221\260\117\254\176\025\043\226\366\077\360\040\064\026 \336\012\306\304\004\105\171\177\247\375\276\322\251\245\257\234 \305\043\052\367\074\041\154\275\257\217\116\305\072\262\363\064 \022\374\337\200\032\111\244\324\251\225\367\236\211\136\242\211 \254\224\313\250\150\233\257\212\145\047\315\211\356\335\214\265  $\label{eq:condition} $$ \frac{153}051\\160\\103\\240\\151\\013\\344\\271\\017\\002\\003\\001\\000\\001\\243$  $\label{eq:condition} $$ 102\060\100\060\035\006\003\125\035\016\004\026\004\024\376\241 $$$ \340\160\036\052\003\071\122\132\102\276\134\221\205\172\030\252 \115\265\060\016\006\003\125\035\017\001\001\377\004\004\003\002 \001\006\060\017\006\003\125\035\023\001\001\377\004\005\060\003 \001\001\377\060\015\006\011\052\206\110\206\367\015\001\001\013 \005\000\003\202\001\001\000\302\112\126\372\025\041\173\050\242 \351\345\035\373\370\055\304\071\226\101\114\073\047\054\304\154 \030\025\200\306\254\257\107\131\057\046\013\343\066\260\357\073 \376\103\227\111\062\231\022\025\133\337\021\051\377\253\123\370

 $\label{eq:control} $$ \273\301\170\017\254\234\123\257\127\275\150\214\075\151\063\360 \243\240\043\143\073\144\147\042\104\255\325\161\313\126\052\170 \222\243\117\022\061\066\066\342\336\376\000\304\243\140\017\047 \255\240\260\212\265\066\172\122\241\275\047\364\040\047\142\350 \115\224\044\023\344\012\004\351\074\253\056\310\103\011\112\306 \141\004\345\111\064\176\323\304\310\365\017\300\252\351\272\124 \136\363\143\053\117\117\120\324\376\271\173\231\214\075\300\056 \274\002\053\323\304\100\344\212\007\061\036\233\316\046\231\023 \373\021\352\232\042\014\021\031\307\136\033\201\120\060\310\226 \022\156\347\313\101\177\221\073\242\107\267\124\200\033\334\000 \314\232\220\352\303\303\120\006\142\014\060\300\025\110\247\250 \131\174\341\256\042\242\342\012\172\017\372\142\253\122\114\341 \361\337\312\276\203\015\102$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "emSign Root CA C1"
- # Issuer: CN=emSign Root CA C1,O=eMudhra Inc,OU=emSign PKI,C=US
- # Serial Number:00:ae:cf:00:ba:c4:cf:32:f8:43:b2
- # Subject: CN=emSign Root CA C1,O=eMudhra Inc,OU=emSign PKI,C=US
- # Not Valid Before: Sun Feb 18 18:30:00 2018
- # Not Valid After: Wed Feb 18 18:30:00 2043
- # Fingerprint (SHA-256):

12:56:09:AA:30:1D:A0:A2:49:B9:7A:82:39:CB:6A:34:21:6F:44:DC:AC:9F:39:54:B1:42:92:F2:E8:C8:60:8F

# Fingerprint (SHA1): E7:2E:F1:DF:FC:B2:09:28:CF:5D:D4:D5:67:37:B1:51:CB:86:4F:01

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "emSign Root CA - C1"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\347\056\361\337\374\262\011\050\317\135\324\325\147\067\261\121 \313\206\117\001

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\330\343\135\001\041\372\170\132\260\337\272\322\356\052\137\150

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \0011\006\003\125\004\006\023\002\125\123\061\023\060\021\006\003\125\004\013\023\012\145\155\123\151\147\156\040\120\13\111\061\024\060\022\006\003\125\004\012\023\013\145\115\143\061\034\060\032\006\003\125\004\003\023\023\145\155\123\151\147\156\040\122\157\157\164\040\103\101\040\055\040\103\061$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

```
\002\013\000\256\317\000\272\304\317\062\370\103\262
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "emSign ECC Root CA - C3"
# Issuer: CN=emSign ECC Root CA - C3,O=eMudhra Inc,OU=emSign PKI,C=US
# Serial Number:7b:71:b6:82:56:b8:12:7c:9c:a8
# Subject: CN=emSign ECC Root CA - C3,O=eMudhra Inc,OU=emSign PKI,C=US
# Not Valid Before: Sun Feb 18 18:30:00 2018
# Not Valid After: Wed Feb 18 18:30:00 2043
# Fingerprint (SHA-256):
BC:4D:80:9B:15:18:9D:78:DB:3E:1D:8C:F4:F9:72:6A:79:5D:A1:64:3C:A5:F1:35:8E:1D:DB:0E:DC:0D:7E:B3
# Fingerprint (SHA1): B6:AF:43:C2:9B:81:53:7D:F6:EF:6B:C3:1F:1F:60:15:0C:EE:48:66
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "emSign ECC Root CA - C3"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA_SUBJECT MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\023\060\021\006\003\125\004\013\023\012\145\155\123\151\147\156
\label{eq:condition} $$ \040\120\113\111\061\024\060\022\006\003\125\004\012\023\013\145$
\115\165\144\150\162\141\040\111\156\143\061\040\060\036\006\003
\125\004\003\023\027\145\155\123\151\147\156\040\105\103\103\040
\122\157\157\164\040\103\101\040\055\040\103\063
END
CKA ID UTF8 "0"
CKA ISSUER MULTILINE OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\023\060\021\006\003\125\004\013\023\012\145\155\123\151\147\156
\040\120\113\111\061\024\060\022\006\003\125\004\012\023\013\145
\115\165\144\150\162\141\040\111\156\143\061\040\060\036\006\003
\125\004\003\023\027\145\155\123\151\147\156\040\105\103\103\040
\122\157\157\164\040\103\101\040\055\040\103\063
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\label{eq:condition} $$ \002\012\173\161\266\202\126\270\022\174\234\250$
END
```

CKA\_VALUE MULTILINE\_OCTAL

\060\202\002\0053\060\202\001\261\240\003\002\001\002\002\012\173 \161\266\202\126\270\022\174\234\250\060\012\006\010\052\206\110 \316\075\004\003\003\060\132\061\013\060\011\006\003\125\004\006

\023\002\125\123\061\023\060\021\006\003\125\004\013\023\012\145 \155\123\151\147\156\040\120\113\111\061\024\060\022\006\003\125 \004\012\023\013\145\115\165\144\150\162\141\040\111\156\143\061 \040\060\036\006\003\125\004\003\023\027\145\155\123\151\147\156 \040\105\103\103\040\122\157\157\164\040\103\101\040\055\040\103  $\label{eq:condition} $$ \063\060\036\027\015\061\070\060\062\061\070\061\070\063\060\060$ \060\132\027\015\064\063\060\062\061\070\061\070\063\060\060 \132\060\132\061\013\060\011\006\003\125\004\006\023\002\125\123  $\\ \backslash 061 \backslash 023 \backslash 060 \backslash 021 \backslash 006 \backslash 003 \backslash 125 \backslash 004 \backslash 013 \backslash 023 \backslash 012 \backslash 145 \backslash 155 \backslash 123 \backslash 151 \backslash 147$ \156\040\120\113\111\061\024\060\022\006\003\125\004\012\023\013 \145\115\165\144\150\162\141\040\111\156\143\061\040\060\036\006  $\label{eq:condition} $$ \003\125\004\003\023\027\145\155\123\151\147\156\040\105\103\103$ \040\122\157\157\164\040\103\101\040\055\040\103\063\060\166\060  $\label{eq:condition} $$ \020\006\007\052\206\110\316\075\002\001\006\005\053\201\004\000 $$$  $\\ \\042\\ \\003\\ \\142\\ \\000\\ \\004\\ \\375\\ \\245\\ \\141\\ \\256\\ \\173\\ \\046\\ \\020\\ \\035\\ \\351\\ \\267\\ \\042$ \060\256\006\364\201\263\261\102\161\225\071\274\323\122\343\257  $\label{eq:condition} $$ \257\371\362\222\066\106\016\207\225\215\271\071\132\351 $$$ \273\337\320\376\310\007\101\074\273\125\157\203\243\152\373\142 \260\201\211\002\160\175\110\305\112\343\351\042\124\042\115\223 \273\102\014\257\167\234\043\246\175\327\141\021\316\145\307\370 \177\376\365\362\251\243\102\060\100\060\035\006\003\125\035\016 \004\026\004\024\373\132\110\320\200\040\100\362\250\351\000\007 \001\377\004\004\003\002\001\006\060\017\006\003\125\035\023\001  $\label{eq:condition} $$ \001\377\004\005\060\003\001\001\377\060\012\006\010\052\206\110 $$$ \316\075\004\003\003\003\150\000\060\145\002\061\000\264\330\057 \002\211\375\266\114\142\272\103\116\023\204\162\265\256\335\034 \336\326\265\334\126\217\130\100\132\055\336\040\114\042\203\312 \223\250\176\356\022\100\307\326\207\117\370\337\205\002\060\034 \024\144\344\174\226\203\021\234\260\321\132\141\113\246\017\111 \323\000\374\241\374\344\245\377\177\255\327\060\320\307\167\177 \276\201\007\125\060\120\040\024\365\127\070\012\250\061\121 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "emSign ECC Root CA - C3"
```

BC:4D:80:9B:15:18:9D:78:DB:3E:1D:8C:F4:F9:72:6A:79:5D:A1:64:3C:A5:F1:35:8E:1D:DB:0E:DC:0D:7E:B3

# Fingerprint (SHA1): B6:AF:43:C2:9B:81:53:7D:F6:EF:6B:C3:1F:1F:60:15:0C:EE:48:66

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

<sup>#</sup> Issuer: CN=emSign ECC Root CA - C3,O=eMudhra Inc,OU=emSign PKI,C=US

<sup>#</sup> Serial Number:7b:71:b6:82:56:b8:12:7c:9c:a8

<sup>#</sup> Subject: CN=emSign ECC Root CA - C3,O=eMudhra Inc,OU=emSign PKI,C=US

<sup>#</sup> Not Valid Before: Sun Feb 18 18:30:00 2018

<sup>#</sup> Not Valid After: Wed Feb 18 18:30:00 2043

<sup>#</sup> Fingerprint (SHA-256):

```
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "emSign ECC Root CA - C3"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\266\257\103\302\233\201\123\175\366\357\153\303\037\037\140\025
\014\356\110\146
END
CKA CERT MD5 HASH MULTILINE OCTAL
\076\123\263\243\201\356\327\020\370\323\260\035\027\222\365\325
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\132\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$
\023\060\021\006\003\125\004\013\023\012\145\155\123\151\147\156
\label{eq:condition} $$ \040\120\113\111\061\024\060\022\006\003\125\004\012\023\013\145$
\115\165\144\150\162\141\040\111\156\143\061\040\060\036\006\003
\125\004\003\023\027\145\155\123\151\147\156\040\105\103\103\040
\122\157\157\164\040\103\101\040\055\040\103\063
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\012\173\161\266\202\126\270\022\174\234\250
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Hongkong Post Root CA 3"
# Issuer: CN=Hongkong Post Root CA 3,O=Hongkong Post,L=Hong Kong,ST=Hong Kong,C=HK
# Serial Number:08:16:5f:8a:4c:a5:ec:00:c9:93:40:df:c4:c6:ae:23:b8:1c:5a:a4
# Subject: CN=Hongkong Post Root CA 3,O=Hongkong Post,L=Hong Kong,ST=Hong Kong,C=HK
# Not Valid Before: Sat Jun 03 02:29:46 2017
# Not Valid After: Tue Jun 03 02:29:46 2042
# Fingerprint (SHA-256):
5A:2F:C0:3F:0C:83:B0:90:BB:FA:40:60:4B:09:88:44:6C:76:36:18:3D:F9:84:6E:17:10:1A:44:7F:B8:EF:D6
# Fingerprint (SHA1): 58:A2:D0:EC:20:52:81:5B:C1:F3:F8:64:02:24:4E:C2:8E:02:4B:02
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Hongkong Post Root CA 3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\label{eq:condition} $$ \060\157\061\013\060\011\006\003\125\004\006\023\002\110\113\061\
\022\060\020\006\003\125\004\010\023\011\110\157\156\147\040\113
\157\156\147\061\022\060\020\006\003\125\004\007\023\011\110\157
\156\147\040\113\157\156\147\061\026\060\024\006\003\125\004\012
```

**END** 

CKA ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000157\061\013\060\011\006\003\125\004\000\023\002\110\113\061\022\060\020\006\003\125\004\0007\023\011\110\157\156\147\040\113\157\156\147\061\026\060\024\006\003\125\004\012\023\015\110\157\156\147\153\157\156\147\040\120\157\156\147\153\157\156\147\040\120\157\156\147\153\157\156\147\040\120\157\156\147\153\157\156\147\040\120\157\163\164\040\122\157\157\164\040\103\101\040\063$ 

**END** 

#### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\024\010\026\137\212\114\245\354\000\311\223\100\337\304\306\256\043\270\034\132\244

**END** 

#### CKA VALUE MULTILINE OCTAL

\060\202\005\317\060\202\003\267\240\003\002\001\002\002\002\001  $\label{eq:condition} $$ \026\137\212\114\245\354\000\311\223\100\337\304\306\256\043\270 $$$ \034\132\244\060\015\006\011\052\206\110\206\367\015\001\001\013 \005\000\060\157\061\013\060\011\006\003\125\004\006\023\002\110 \113\061\022\060\020\006\003\125\004\010\023\011\110\157\156\147 \040\113\157\156\147\061\022\060\020\006\003\125\004\007\023\011  $\label{eq:condition} $$ \frac{110\157\156\147\040\113\157\156\147\061\026\060\024\006\003\125}{125} $$$ \004\012\023\015\110\157\156\147\153\157\156\147\040\120\157\163 \164\061\040\060\036\006\003\125\004\003\023\027\110\157\156\147 \153\157\156\147\040\120\157\163\164\040\122\157\157\164\040\103 \101\040\063\060\036\027\015\061\067\060\066\060\063\060\062\062 \071\064\066\132\027\015\064\062\060\066\060\063\060\062\062\071 \064\066\132\060\157\061\013\060\011\006\003\125\004\006\023\002 \110\113\061\022\060\020\006\003\125\004\010\023\011\110\157\156 \147\040\113\157\156\147\061\022\060\020\006\003\125\004\007\023 \011\110\157\156\147\040\113\157\156\147\061\026\060\024\006\003 \125\004\012\023\015\110\157\156\147\153\157\156\147\040\120\157  $\label{eq:condition} $$ 163\164\061\040\060\036\006\003\125\004\003\023\027\110\157\156$$  $\label{eq:local_$ \103\101\040\063\060\202\002\042\060\015\006\011\052\206\110\206 \367\015\001\001\001\005\000\003\202\002\017\000\060\202\002\012 \002\202\002\001\000\263\210\327\352\316\017\040\116\276\346\326 \003\155\356\131\374\302\127\337\051\150\241\203\016\076\150\307 \150\130\234\034\140\113\211\103\014\271\324\025\262\356\301\116 \165\351\265\247\357\345\351\065\231\344\314\034\347\113\137\215 \063\060\040\063\123\331\246\273\325\076\023\216\351\037\207\111 \255\120\055\120\312\030\276\001\130\242\023\160\226\273\211\210

\126\200\134\370\275\054\074\341\114\127\210\273\323\271\225\357 \313\307\366\332\061\164\050\246\346\124\211\365\101\061\312\345 \046\032\315\202\340\160\332\073\051\273\325\003\365\231\272\125 \365\144\321\140\016\263\211\111\270\212\057\005\322\204\105\050 \174\217\150\120\022\170\374\013\265\123\313\302\230\034\204\243 \236\260\276\043\244\332\334\310\053\036\332\156\105\036\211\230 \332\371\000\056\006\351\014\073\160\325\120\045\210\231\313\315 \163\140\367\325\377\065\147\305\241\274\136\253\315\112\270\105 \274\264\306\010\010\370\375\250\114\144\234\166\001\275\057\251 \154\063\017\330\077\050\270\074\151\001\102\206\176\151\301\311  $\label{eq:condition} $$ \006\312\345\172\106\145\351\302\326\120\101\056\077\267\344\355 $$$ \154\327\277\046\001\021\242\026\051\112\153\064\006\220\354\023 \322\266\373\152\166\322\074\355\360\326\055\335\341\025\354\243 \233\057\054\311\076\053\344\151\073\377\162\045\261\066\206\133 \307\177\153\213\125\033\112\305\040\141\075\256\313\120\341\010  $\label{eq:condition} $$ \072\276\260\217\143\101\123\060\010\131\074\230\035\167\272\143$ \221\172\312\020\120\140\277\360\327\274\225\207\217\227\305\376 \227\152\001\224\243\174\133\205\035\052\071\072\320\124\241\321 \071\161\235\375\041\371\265\173\360\342\340\002\217\156\226\044 \045\054\240\036\054\250\304\211\247\357\355\231\006\057\266\012 \114\117\333\242\314\067\032\257\107\205\055\212\137\304\064\064  $\label{eq:condition} $$ \frac{114\000\375\030\223\147\023\321\067\346\110\264\213\006\305\127}$$ \173\031\206\012\171\313\000\311\122\257\102\377\067\217\341\243 \036\172\075\120\253\143\006\347\025\265\077\266\105\067\224\067 \261\176\362\110\303\177\305\165\376\227\215\105\217\032\247\032 \162\050\032\100\017\002\003\001\000\001\243\143\060\141\060\017 \006\003\125\035\023\001\001\377\004\005\060\003\001\001\377\060 \016\006\003\125\035\017\001\001\377\004\004\003\002\001\006\060 \037\006\003\125\035\043\004\030\060\026\200\024\027\235\315\036  $\label{eq:condition} $$ \frac{326}071\\053\\160\\323\\134\\324\\240\\270\\037\\260\\000\\374\\305\\141$ \060\035\006\003\125\035\016\004\026\004\024\027\235\315\036\213 \326\071\053\160\323\134\324\240\270\037\260\000\374\305\141\060 \015\006\011\052\206\110\206\367\015\001\001\013\005\000\003\202 \002\001\000\126\325\173\156\346\042\001\322\102\233\030\325\016 \327\146\043\134\343\376\240\307\222\322\351\224\255\113\242\306 \354\022\174\164\325\110\322\131\024\231\300\353\271\321\353\364 \110\060\133\255\247\127\163\231\251\323\345\267\321\056\131\044 \130\334\150\056\056\142\330\152\344\160\013\055\040\120\040\244  $\label{eq:condition} $$ \062\225\321\000\230\273\323\375\367\062\362\111\256\306\172\340 $$$ \107\276\156\316\313\243\162\072\055\151\135\313\310\350\105\071 \324\372\102\301\021\114\167\135\222\373\152\377\130\104\345\353 \201\236\257\240\231\255\276\251\001\146\313\070\035\074\337\103 \037\364\115\156\264\272\027\106\374\175\375\207\201\171\152\015  $\label{eq:condition} $$ \063\017\372\057\370\024\271\200\263\135\115\252\227\341\371\344 $$$ \030\305\370\325\070\214\046\074\375\362\050\342\356\132\111\210  $\label{eq:condition} $$ \054\337\171\075\216\236\220\074\275\101\112\072\335\133\366\232$  $\verb| 264| 316| 077| 045| 060| 177| 062| 175| 242| 003| 224| 320| 334| 172| 241| 122|$ 

\336\156\223\215\030\046\375\125\254\275\217\233\322\317\257\347 \206\054\313\037\011\157\243\157\251\204\324\163\277\115\241\164 \033\116\043\140\362\314\016\252\177\244\234\114\045\250\262\146  $\label{eq:condition} $$ \073\070\377\331\224\060\366\162\204\276\150\125\020\017\306\163$ \054\026\151\223\007\376\261\105\355\273\242\125\152\260\332\265 \112\002\045\047\205\327\267\267\206\104\026\211\154\200\053\076 \227\251\234\325\176\125\114\306\336\105\020\034\352\351\073\237 \003\123\356\356\172\001\002\026\170\324\350\302\276\106\166\210 \023\077\042\273\110\022\035\122\000\264\002\176\041\032\036\234 \045\364\363\075\136\036\322\034\371\263\055\266\367\067\134\306 \313\041\116\260\367\231\107\030\205\301\053\272\125\256\006\352 \320\007\262\334\253\320\202\226\165\316\322\120\376\231\347\317 \057\237\347\166\321\141\052\373\041\273\061\320\252\237\107\244 \262\042\312\026\072\120\127\304\133\103\147\305\145\142\003\111  $\label{eq:condition} $$ \01\353\103\331\330\370\236\255\317\261\143\016\105\364\240\132$ \054\233\055\305\246\300\255\250\107\364\047\114\070\015\056\033 \111\073\122\364\350\210\203\053\124\050\324\362\065\122\264\062 \203\142\151\144\014\221\234\237\227\352\164\026\375\037\021\006 \232\233\364

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Hongkong Post Root CA 3"
- # Issuer: CN=Hongkong Post Root CA 3,O=Hongkong Post,L=Hong Kong,ST=Hong Kong,C=HK
- # Serial Number:08:16:5f:8a:4c:a5:ec:00:c9:93:40:df:c4:c6:ae:23:b8:1c:5a:a4
- # Subject: CN=Hongkong Post Root CA 3,O=Hongkong Post,L=Hong Kong,ST=Hong Kong,C=HK
- # Not Valid Before: Sat Jun 03 02:29:46 2017
- # Not Valid After: Tue Jun 03 02:29:46 2042
- # Fingerprint (SHA-256):
- 5A:2F:C0:3F:0C:83:B0:90:BB:FA:40:60:4B:09:88:44:6C:76:36:18:3D:F9:84:6E:17:10:1A:44:7F:B8:EF:D6
- # Fingerprint (SHA1): 58:A2:D0:EC:20:52:81:5B:C1:F3:F8:64:02:24:4E:C2:8E:02:4B:02

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Hongkong Post Root CA 3"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$130\242\320\354\040\122\201\133\301\363\370\144\002\044\116\302$ 

\216\002\113\002

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \021\374\237\275\163\060\002\212\375\077\363\130\271\313\040\360 $$$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\157\061\013\060\011\006\003\125\004\006\023\002\110\113\061 \022\060\020\006\003\125\004\010\023\011\110\157\156\147\040\113

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\157\156\147\061\022\060\020\006\003\125\004\007\023\011\110\157
\156\147\040\113\157\156\147\061\026\060\024\006\003\125\004\012
\023\015\110\157\156\147\153\157\156\147\040\120\157\163\164\061
\\ \langle 040 \rangle 060 \rangle 036 \rangle 006 \rangle 003 \rangle 125 \rangle 004 \rangle 003 \rangle 023 \rangle 027 \rangle 110 \rangle 157 \rangle 156 \rangle 147 \rangle 153 \rangle 157 \rangle 156 \rangle 147 \rangle 157 \rangle 
\label{eq:condition} $$ \frac{156}147 \cdot 040 \cdot 120 \cdot 157 \cdot 163 \cdot 164 \cdot 040 \cdot 122 \cdot 157 \cdot 157 \cdot 164 \cdot 040 \cdot 103 \cdot 101 \cdot 040 }{157} \cdot 164 \cdot 120 \cdot 120
\063
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\024\010\026\137\212\114\245\354\000\311\223\100\337\304\306
\256\043\270\034\132\244
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Entrust Root Certification Authority - G4"
# Issuer: CN=Entrust Root Certification Authority - G4,OU="(c) 2015 Entrust, Inc. - for authorized use
 only",OU=See www.entrust.net/legal-terms,O="Entrust, Inc.",C=US
# Serial Number:00:d9:b5:43:7f:af:a9:39:0f:00:00:00:00:55:65:ad:58
# Subject: CN=Entrust Root Certification Authority - G4,OU="(c) 2015 Entrust, Inc. - for authorized use
 only",OU=See www.entrust.net/legal-terms,O="Entrust, Inc.",C=US
# Not Valid Before: Wed May 27 11:11:16 2015
# Not Valid After: Sun Dec 27 11:41:16 2037
 # Fingerprint (SHA-256):
DB:35:17:D1:F6:73:2A:2D:5A:B9:7C:53:3E:C7:07:79:EE:32:70:A6:2F:B4:AC:42:38:37:24:60:E6:F0:1E:88
# Fingerprint (SHA1): 14:88:4E:86:26:37:B0:26:AF:59:62:5C:40:77:EC:35:29:BA:96:01
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "Entrust Root Certification Authority - G4"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\276\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\026\060\024\006\003\125\004\012\023\015\105\156\164\162\165
\163\164\054\040\111\156\143\056\061\050\060\046\006\003\125\004
\013\023\037\123\145\145\040\167\167\167\056\145\156\164\162\165
\163\164\056\156\145\164\057\154\145\147\141\154\055\164\145\162
\label{eq:condition} $$ \frac{155}{163}061\\071\\060\\067\\006\\003\\125\\004\\013\\023\\060\\050\\143\\051
\040\062\060\061\065\040\105\156\164\162\165\163\164\054\040\111
\156\143\056\040\055\040\146\157\162\040\141\165\164\150\157\162
\151\172\145\144\040\165\163\145\040\157\156\154\171\061\062\060
\060\006\003\125\004\003\023\051\105\156\164\162\165\163\164\040
\122\157\157\164\040\103\145\162\164\151\146\151\143\141\164\151
```

\157\156\040\101\165\164\150\157\162\151\164\171\040\055\040\107

\064

**END** 

CKA ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

 $\label{eq:condition} $$ \002\021\000\331\265\103\177\257\251\071\017\000\000\000\000\125\145\255\130$ 

**END** 

#### CKA\_VALUE MULTILINE\_OCTAL

\060\202\006\113\060\202\004\063\240\003\002\001\002\002\002\001 \331\265\103\177\257\251\071\017\000\000\000\000\125\145\255\130 \060\015\006\011\052\206\110\206\367\015\001\001\013\005\000\060 \201\276\061\013\060\011\006\003\125\004\006\023\002\125\123\061 \164\054\040\111\156\143\056\061\050\060\046\006\003\125\004\013 \023\037\123\145\145\040\167\167\167\056\145\156\164\162\165\163 \164\056\156\145\164\057\154\145\147\141\154\055\164\145\162\155 \163\061\071\060\067\006\003\125\004\013\023\060\050\143\051\040 \062\060\061\065\040\105\156\164\162\165\163\164\054\040\111\156 \143\056\040\055\040\146\157\162\040\141\165\164\150\157\162\151 \172\145\144\040\165\163\145\040\157\156\154\171\061\062\060\060 \006\003\125\004\003\023\051\105\156\164\162\165\163\164\040\122 \157\157\164\040\103\145\162\164\151\146\151\143\141\164\151\157 \156\040\101\165\164\150\157\162\151\164\171\040\055\040\107\064 \132\027\015\063\067\061\062\062\067\061\061\064\061\066\132 \060\201\276\061\013\060\011\006\003\125\004\006\023\002\125\123 \061\026\060\024\006\003\125\004\012\023\015\105\156\164\162\165 \163\164\054\040\111\156\143\056\061\050\060\046\006\003\125\004 \013\023\037\123\145\145\040\167\167\167\056\145\156\164\162\165 \163\164\056\156\145\164\057\154\145\147\141\154\055\164\145\162 \155\163\061\071\060\067\006\003\125\004\013\023\060\050\143\051 \040\062\060\061\065\040\105\156\164\162\165\163\164\054\040\111 \156\143\056\040\055\040\146\157\162\040\141\165\164\150\157\162

\151\172\145\144\040\165\163\145\040\157\156\154\171\061\062\060 \060\006\003\125\004\003\023\051\105\156\164\162\165\163\164\040 \122\157\157\164\040\103\145\162\164\151\146\151\143\141\164\151 \157\156\040\101\165\164\150\157\162\151\164\171\040\055\040\107 \064\060\202\002\042\060\015\006\011\052\206\110\206\367\015\001  $\label{eq:condition} $$ \001\001\005\000\003\202\002\017\000\060\202\002\012\002\202\002$ \001\000\261\354\054\102\356\342\321\060\377\245\222\107\342\055 \303\272\144\227\155\312\367\015\265\131\301\263\313\250\150\031 \330\257\204\155\060\160\135\176\363\056\322\123\231\341\376\037 \136\331\110\257\135\023\215\333\377\143\063\115\323\000\002\274 \304\370\321\006\010\224\171\130\212\025\336\051\263\375\375\304  $\label{eq:condition} $$ \frac{350}{252}\frac{342}{240}073\frac{3171}{315}\frac{277}{153}\frac{062}{335}\frac{331}{164}020$$ \271\367\364\150\324\273\320\207\325\252\113\212\052\157\052\004 \265\262\246\307\240\172\346\110\253\322\321\131\314\326\176\043  $\label{eq:condition} $\346\227\154\360\102\345\334\121\113\025\101\355\111\112\311\336$ \020\227\326\166\301\357\245\265\066\024\227\065\330\170\042\065 \122\357\103\275\333\047\333\141\126\202\064\334\313\210\140\014 \013\132\345\054\001\306\124\257\327\252\301\020\173\322\005\132 \270\100\236\206\247\303\220\206\002\126\122\011\172\234\322\047 \202\123\112\145\122\152\365\074\347\250\362\234\257\213\275\323 \016\324\324\136\156\207\236\152\075\105\035\321\135\033\364\351 \012\254\140\231\373\211\264\377\230\054\317\174\035\351\002\252  $\label{eq:condition} $$ 004\232\036\270\334\210\156\045\263\154\146\367\074\220\363\127 $$$ \301\263\057\365\155\362\373\312\241\370\051\235\106\213\263\152 \366\346\147\007\276\054\147\012\052\037\132\262\076\127\304\323 \041\041\143\145\122\221\033\261\231\216\171\176\346\353\215\000 \331\132\252\352\163\350\244\202\002\107\226\376\133\216\124\141 \243\353\057\113\060\260\213\043\165\162\174\041\074\310\366\361 \164\324\034\173\243\005\125\356\273\115\073\062\276\232\167\146 \236\254\151\220\042\007\037\141\072\226\276\345\232\117\314\005  $\label{eq:condition} $$ \074\050\131\323\301\014\124\250\131\141\275\310\162\114\350\334$$ \237\207\177\275\234\110\066\136\225\243\016\271\070\044\125\374 \165\146\353\002\343\010\064\051\112\306\343\053\057\063\240\332 \243\206\245\022\227\375\200\053\332\024\102\343\222\275\076\362 \135\136\147\164\056\034\210\107\051\064\137\342\062\250\234\045 \067\214\272\230\000\227\213\111\226\036\375\045\212\254\334\332 \330\135\164\156\146\260\377\104\337\241\030\306\276\110\057\067  $\label{eq:condition} $$ \224\170\370\225\112\077\177\023\136\135\131\375\164\206\103\143$  $\label{eq:condition} $$ 111\002\003\001\000\001\243\102\060\100\060\017\006\003\125$$  $\label{eq:condition} $$ \035\023\001\001\377\004\005\060\003\001\001\377\060\016\006\003$ \125\035\017\001\001\377\004\004\003\002\001\006\060\035\006\003 \125\035\016\004\026\004\024\237\070\304\126\043\303\071\350\240 \161\154\350\124\114\344\350\072\261\277\147\060\015\006\011\052 \206\110\206\367\015\001\001\013\005\000\003\202\002\001\000\022 \345\102\246\173\213\017\014\344\106\245\266\140\100\207\214\045 \176\255\270\150\056\133\306\100\166\074\003\370\311\131\364\363 \253\142\316\020\215\264\132\144\214\150\300\260\162\103\064\322 \033\013\366\054\123\322\312\220\113\206\146\374\252\203\042\364

\213\032\157\046\110\254\166\167\010\277\305\230\134\364\046\211  $\verb|236|173|303|271|144|062|001|177|323|303|335|130|155|354|261|253|$ \204\125\164\167\204\004\047\122\153\206\114\316\335\271\145\377 \326\306\136\237\232\020\231\113\165\152\376\152\351\227\040\344 \344\166\172\306\320\044\252\220\315\040\220\272\107\144\373\177  $\label{eq:condition} $$ \07\263\123\170\265\012\142\362\163\103\316\101\053\201\152\056$$ \205\026\224\123\324\153\137\162\042\253\121\055\102\325\000\234 \231\277\336\273\224\073\127\375\232\365\206\313\126\073\133\210 \001\345\174\050\113\003\371\111\203\174\262\177\174\343\355\216 \241\177\140\123\216\125\235\120\064\022\017\267\227\173\154\207 \112\104\347\365\155\354\200\067\360\130\031\156\112\150\166\360  $\label{eq:condition} $$ \037\222\344\352\265\222\323\141\121\020\013\255\247\331\137\307$ \137\334\037\243\134\214\241\176\233\267\236\323\126\157\146\136  $\\ \\007\\ \\226\\ \\040\\ \\355\\ \\013\\ \\164\\ \\373\\ \\146\\ \\116\\ \\213\\ \\021\\ \\025\\ \\351\\ \\201\\ \\111\\ \\176$ \157\260\324\120\177\042\327\137\145\002\015\246\364\205\036\330 \256\006\113\112\247\322\061\146\302\370\316\345\010\246\244\002 \226\104\150\127\304\325\063\317\031\057\024\304\224\034\173\244 \331\360\237\016\261\200\342\321\236\021\144\251\210\021\072\166 \202\345\142\302\200\330\244\203\355\223\357\174\057\220\260\062 \114\226\025\150\110\122\324\231\010\300\044\350\034\343\263\245 \041\016\222\300\220\037\317\040\137\312\073\070\307\267\155\072 \363\346\104\270\016\061\153\210\216\160\353\234\027\122\250\101  $\label{eq:condition} $$ \224\056\207\266\347\246\022\305\165\337\133\300\012\156\173\244 $$$ \344\136\206\371\066\224\337\167\303\351\015\300\071\361\171\273  $\label{eq:condition} $$ 106\216\253\103\131\047\267\040\273\043\351\126\100\041\354\061 $$$ \075\145\252\103\362\075\337\160\104\341\272\115\046\020\073\230 \237\363\310\216\033\070\126\041\152\121\223\323\221\312\106\332 \211\267\075\123\203\054\010\037\213\217\123\335\377\254\037 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE

```
# Trust for "Entrust Root Certification Authority - G4"
```

- # Issuer: CN=Entrust Root Certification Authority G4,OU="(c) 2015 Entrust, Inc. for authorized use only",OU=See www.entrust.net/legal-terms,O="Entrust, Inc.",C=US
- $\# \ Serial \ Number: 00:d9:b5:43:7f:af:a9:39:0f:00:00:00:00:55:65:ad:58$
- # Subject: CN=Entrust Root Certification Authority G4,OU="(c) 2015 Entrust, Inc. for authorized use only",OU=See www.entrust.net/legal-terms,O="Entrust, Inc.",C=US
- # Not Valid Before: Wed May 27 11:11:16 2015
- # Not Valid After: Sun Dec 27 11:41:16 2037
- # Fingerprint (SHA-256):

DB:35:17:D1:F6:73:2A:2D:5A:B9:7C:53:3E:C7:07:79:EE:32:70:A6:2F:B4:AC:42:38:37:24:60:E6:F0:1E:88

# Fingerprint (SHA1): 14:88:4E:86:26:37:B0:26:AF:59:62:5C:40:77:EC:35:29:BA:96:01

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Entrust Root Certification Authority - G4"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

```
\024\210\116\206\046\067\260\046\257\131\142\134\100\167\354\065
\051\272\226\001
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\label{eq:condition} $$ \frac{211}123\\361\\203\\043\\267\\174\\216\\005\\361\\214\\161\\070\\116\\037\\210
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\201\276\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\026\060\024\006\003\125\004\012\023\015\105\156\164\162\165
\163\164\054\040\111\156\143\056\061\050\060\046\006\003\125\004
\label{eq:condition} $$ \03\03\123\145\145\040\167\167\167\056\145\156\164\162\165$
\163\164\056\156\145\164\057\154\145\147\141\154\055\164\145\162
\155\163\061\071\060\067\006\003\125\004\013\023\060\050\143\051
\040\062\060\061\065\040\105\156\164\162\165\163\164\054\040\111
\156\143\056\040\055\040\146\157\162\040\141\165\164\150\157\162
\151\172\145\144\040\165\163\145\040\157\156\154\171\061\062\060
\060\006\003\125\004\003\023\051\105\156\164\162\165\163\164\040
\122\157\157\164\040\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\101\165\164\150\157\162\151\164\171\040\055\040\107
\064
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\label{eq:condition} $$ \002\021\000\331\265\103\177\257\251\071\017\000\000\000\000\125 
\145\255\130
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "Microsoft ECC Root Certificate Authority 2017"
# Issuer: CN=Microsoft ECC Root Certificate Authority 2017,O=Microsoft Corporation,C=US
# Serial Number:66:f2:3d:af:87:de:8b:b1:4a:ea:0c:57:31:01:c2:ec
# Subject: CN=Microsoft ECC Root Certificate Authority 2017,O=Microsoft Corporation,C=US
# Not Valid Before: Wed Dec 18 23:06:45 2019
# Not Valid After: Fri Jul 18 23:16:04 2042
# Fingerprint (SHA-256):
35:8D:F3:9D:76:4A:F9:E1:B7:66:E9:C9:72:DF:35:2E:E1:5C:FA:C2:27:AF:6A:D1:D7:0E:8E:4A:6E:DC:BA:02
# Fingerprint (SHA1): 99:9A:64:C3:7F:F4:7D:9F:AB:95:F1:47:69:89:14:60:EE:C4:C3:C5
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Microsoft ECC Root Certificate Authority 2017"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
```

 $\label{eq:condition} $$ \060\145\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$ \036\060\034\006\003\125\004\012\023\025\115\151\143\162\157\163 $$ \157\146\164\040\103\125\004\003\023\055\115\151\143\162\157\163 $$ \157\146\164\040\105\103\103\040\122\157\157\164\040\103\145\162 $$ \164\151\146\151\143\141\164\145\040\101\165\164\150\157\162\151 $$ \164\171\040\062\060\061\067$$ 

**END** 

## CKA ID UTF8 "0"

## CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000145\001\006\003\125\004\006\023\002\125\123\061\036\060\034\006\003\125\004\012\023\025\115\151\143\162\157\163\157\146\164\040\103\125\004\003\023\055\115\151\143\162\157\163\157\146\040\0105\103\103\040\122\157\157\164\040\103\145\162\151\143\141\164\151\143\141\164\151\145\040\101\165\164\150\157\162\151\164\171\040\062\060\061\067$$ 

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

\002\020\146\362\075\257\207\336\213\261\112\352\014\127\061\001 \302\354

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

\060\202\002\131\060\202\001\337\240\003\002\001\002\002\020\146 \362\075\257\207\336\213\261\112\352\014\127\061\001\302\354\060 \012\006\010\052\206\110\316\075\004\003\003\060\145\061\013\060 \011\006\003\125\004\006\023\002\125\123\061\036\060\034\006\003 \125\004\012\023\025\115\151\143\162\157\163\157\146\164\040\103 \157\162\160\157\162\141\164\151\157\156\061\066\060\064\006\003 \125\004\003\023\055\115\151\143\162\157\163\157\146\164\040\105  $\label{eq:condition} $$ 103\103\040\122\157\157\164\040\103\145\162\164\151\146\151\143$ \141\164\145\040\101\165\164\150\157\162\151\164\171\040\062\060 \061\067\060\036\027\015\061\071\061\062\061\070\062\063\060\066 \064\065\132\027\015\064\062\060\067\061\070\062\063\061\066\060 \064\132\060\145\061\013\060\011\006\003\125\004\006\023\002\125 \123\061\036\060\034\006\003\125\004\012\023\025\115\151\143\162 \157\163\157\146\164\040\103\157\162\160\157\162\141\164\151\157 \156\061\066\060\064\006\003\125\004\003\023\055\115\151\143\162  $\label{eq:condition} $$ \frac{157}{163}\frac{157}{146}\frac{040}{105}\frac{103}{103}\frac{040}{122}\frac{157}{157}\frac{164}{040}\frac{103}{103} $$$ \145\162\164\151\146\151\143\141\164\145\040\101\165\164\150\157 \162\151\164\171\040\062\060\061\067\060\166\060\020\006\007\052 \206\110\316\075\002\001\006\005\053\201\004\000\042\003\142\000 \004\324\274\075\002\102\165\101\023\043\315\200\004\206\002\121 \057\152\250\201\142\013\145\314\366\312\235\036\157\112\146\121 \242\003\331\235\221\372\266\026\261\214\156\336\174\315\333\171 \246\057\316\273\316\161\057\345\245\253\050\354\143\004\146\231 \370\372\362\223\020\005\341\201\050\102\343\306\150\364\346\033 \204\140\112\211\257\355\171\017\073\316\361\366\104\365\001\170

 $\label{eq:control_co$ 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Microsoft ECC Root Certificate Authority 2017"
- # Issuer: CN=Microsoft ECC Root Certificate Authority 2017,O=Microsoft Corporation,C=US
- # Serial Number:66:f2:3d:af:87:de:8b:b1:4a:ea:0c:57:31:01:c2:ec
- # Subject: CN=Microsoft ECC Root Certificate Authority 2017,O=Microsoft Corporation,C=US
- # Not Valid Before: Wed Dec 18 23:06:45 2019
- # Not Valid After: Fri Jul 18 23:16:04 2042
- # Fingerprint (SHA-256):
- # Fingerprint (SHA1): 99:9A:64:C3:7F:F4:7D:9F:AB:95:F1:47:69:89:14:60:EE:C4:C3:C5
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST
- CKA TOKEN CK BBOOL CK TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA\_LABEL UTF8 "Microsoft ECC Root Certificate Authority 2017"
- CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL
- \231\232\144\303\177\364\175\237\253\225\361\107\151\211\024\140 \356\304\303\305

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\335\241\003\346\112\223\020\321\277\360\031\102\313\376\355\147 END

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \00145\061\013\060\011\006\003\125\004\006\023\002\125\123\061\036\060\034\006\003\125\004\012\023\025\115\151\143\162\157\163\157\146\164\040\103\125\004\003\023\055\115\151\143\162\157\163\157\146\164\040\105\103\103\040\122\157\157\164\040\103\145\162\151\146\151\143\141\164\145\040\101\165\164\150\157\162\151\164\171\040\062\060\061\067$$ 

**END** 

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\label{eq:condition} $$ \002\020\146\362\075\257\207\336\213\261\112\352\014\127\061\001 $$
\302\354
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Microsoft RSA Root Certificate Authority 2017"
# Issuer: CN=Microsoft RSA Root Certificate Authority 2017,O=Microsoft Corporation,C=US
# Serial Number:1e:d3:97:09:5f:d8:b4:b3:47:70:1e:aa:be:7f:45:b3
# Subject: CN=Microsoft RSA Root Certificate Authority 2017,O=Microsoft Corporation,C=US
# Not Valid Before: Wed Dec 18 22:51:22 2019
# Not Valid After: Fri Jul 18 23:00:23 2042
# Fingerprint (SHA-256):
C7:41:F7:0F:4B:2A:8D:88:BF:2E:71:C1:41:22:EF:53:EF:10:EB:A0:CF:A5:E6:4C:FA:20:F4:18:85:30:73:E0
# Fingerprint (SHA1): 73:A5:E6:4A:3B:FF:83:16:FF:0E:DC:CC:61:8A:90:6E:4E:AE:4D:74
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "Microsoft RSA Root Certificate Authority 2017"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA SUBJECT MULTILINE OCTAL
\label{eq:condition} $$ \060\145\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$
\036\060\034\006\003\125\004\012\023\025\115\151\143\162\157\163
\157\146\164\040\103\157\162\160\157\162\141\164\151\157\156\061
\label{eq:condition} $$ \066\060\064\006\003\125\004\003\023\055\115\151\143\162\157\163$
\157\146\164\040\122\123\101\040\122\157\157\164\040\103\145\162
\164\151\146\151\143\141\164\145\040\101\165\164\150\157\162\151
\164\171\040\062\060\061\067
END
CKA ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\145\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\label{eq:condition} $$ \036\060\034\006\003\125\004\012\023\025\115\151\143\162\157\163
\157\146\164\040\103\157\162\160\157\162\141\164\151\157\156\061
\066\060\064\006\003\125\004\003\023\055\115\151\143\162\157\163
```

\157\146\164\040\122\123\101\040\122\157\157\164\040\103\145\162 \164\151\146\151\143\141\164\145\040\101\165\164\150\157\162\151 \164\171\040\062\060\061\067

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\020\036\323\227\011\137\330\264\263\107\160\036\252\276\177 $$$ \105\263

#### **END**

## CKA VALUE MULTILINE OCTAL

\060\202\005\250\060\202\003\220\240\003\002\001\002\002\003\036 \323\227\011\137\330\264\263\107\160\036\252\276\177\105\263\060 \015\006\011\052\206\110\206\367\015\001\001\014\005\000\060\145 \061\013\060\011\006\003\125\004\006\023\002\125\123\061\036\060 \034\006\003\125\004\012\023\025\115\151\143\162\157\163\157\146 \164\040\103\157\162\160\157\162\141\164\151\157\156\061\066\060 \064\006\003\125\004\003\023\055\115\151\143\162\157\163\157\146 \164\040\122\123\101\040\122\157\157\164\040\103\145\162\164\151  $\\ 146 \\ 151 \\ 143 \\ 141 \\ 164 \\ 145 \\ 040 \\ 101 \\ 165 \\ 164 \\ 150 \\ 157 \\ 162 \\ 151 \\ 164 \\ 171 \\$  $\label{eq:condition} $$ \040\062\060\061\067\060\036\027\015\061\071\061\062\061\070\062$ \062\065\061\062\062\132\027\015\064\062\060\067\061\070\062\063  $\label{eq:condition} $$ \023\02\125\123\061\036\060\034\006\003\125\004\012\023\025\115$$ \151\143\162\157\163\157\146\164\040\103\157\162\160\157\162\141 \151\143\162\157\163\157\146\164\040\122\123\101\040\122\157\157 \164\040\103\145\162\164\151\146\151\143\141\164\145\040\101\165 \164\150\157\162\151\164\171\040\062\060\061\067\060\202\002\042 \060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003 \202\002\017\000\060\202\002\012\002\202\002\001\000\312\133\276 \066\337\106\220\311\245\355\170\152\157\107\221\150\370\047\147 \120\063\035\241\246\373\340\345\103\243\204\002\127\001\135\234 \110\100\202\123\020\274\277\307\073\150\220\266\202\055\345\364 \145\320\314\155\031\314\225\371\173\254\112\224\255\016\336\113  $\label{eq:condition} $$ 103\035\207\007\222\023\220\200\203\144\065\071\004\374\345\351 $$$ \154\263\266\037\120\224\070\145\120\134\027\106\271\266\205\265 \034\265\027\350\326\105\235\330\262\046\260\312\304\160\112\256  $\label{eq:condition} $$ 140\244\335\263\331\354\374\073\325\127\162\274\077\310\311\262$ \336\113\153\370\043\154\003\300\005\275\225\307\315\163\073\146 \200\144\343\032\254\056\371\107\005\362\006\266\233\163\365\170 \063\133\307\241\373\047\052\241\264\232\221\214\221\323\072\202 \076\166\100\264\315\122\141\121\160\050\077\305\305\132\362\311 \214\111\273\024\133\115\310\377\147\115\114\022\226\255\365\376 \170\250\227\207\327\375\136\040\200\334\241\113\042\373\324\211  $\label{eq:condition} $$ \255\272\316\107\227\107\125\173\217\105\310\147\050\204\225\034$ \150\060\357\357\111\340\065\173\144\347\230\260\224\332\115\205 \073\076\125\304\050\257\127\363\236\023\333\106\047\237\036\242 \136\104\203\244\245\312\325\023\263\113\077\304\343\302\346\206 \141\244\122\060\271\172\040\117\157\017\070\123\313\063\014\023 \053\217\326\232\275\052\310\055\261\034\175\113\121\312\107\321 \110\047\162\135\207\353\325\105\346\110\145\235\257\122\220\272 \133\242\030\145\127\022\237\150\271\324\025\153\224\304\151\042 \230\364\063\340\355\371\121\216\101\120\311\064\117\166\220\254 \374\070\301\330\341\173\271\343\343\224\341\106\151\313\016\012 \120\153\023\272\254\017\067\132\267\022\265\220\201\036\126\256

\127\042\206\331\311\322\321\327\121\343\253\073\306\125\375\036 \016\323\164\012\321\332\252\352\151\270\227\050\217\110\304\007 \370\122\103\072\364\312\125\065\054\260\246\152\300\234\371\362 \201\341\022\152\300\105\331\147\263\316\377\043\242\211\012\124 \324\024\271\052\250\327\354\371\253\315\045\130\062\171\217\220 \133\230\071\304\010\006\301\254\177\016\075\000\245\002\003\001 \000\001\243\124\060\122\060\016\006\003\125\035\017\001\001\377 \004\004\003\002\001\206\060\017\006\003\125\035\023\001\001\377  $\\ \\004\\\\005\\\\060\\\\003\\\\001\\\\001\\\\377\\\\060\\\\035\\\\006\\\\003\\\\125\\\\035\\\\016\\\\004\\\\026$ \004\024\011\313\131\177\206\262\160\217\032\303\071\343\300\331 \351\277\273\115\262\043\060\020\006\011\053\006\001\004\001\202  $\label{eq:condition} $$ \001\004\003\002\001\000\060\015\006\011\052\206\110\206$ \367\015\001\001\001\014\005\000\003\202\002\001\000\254\257\076\135  $\label{eq:condition} $$ 302\021\226\211\216\243\347\222\326\227\025\270\023\242\246\102$  $\label{eq:condition} $$ \026\005\131\047\312\040\350\272\270\350\032\354\115 $$$ \250\227\126\256\145\103\261\217\000\233\122\315\125\315\123\071 \155\142\114\213\015\133\174\056\104\277\203\020\217\363\123\202 \200\303\117\072\307\156\021\077\346\343\026\221\204\373\155\204 \177\064\164\255\211\247\316\271\327\327\237\204\144\222\276\225 \241\255\011\123\063\335\356\012\352\112\121\216\157\125\253\272 \265\224\106\256\214\177\330\242\120\045\145\140\200\106\333\063 \004\256\154\265\230\164\124\045\334\223\344\370\343\125\025\075 \270\155\303\012\244\022\301\151\205\156\337\144\361\123\231\341 \112\165\040\235\225\017\344\326\334\003\361\131\030\350\107\211  $\label{eq:condition} $$ \262\127\132\224\266\251\330\027\053\027\111\345\166\313\301\126$ \231\072\067\261\377\151\054\221\221\223\341\337\114\243\067\166 \115\241\237\370\155\036\035\323\372\354\373\364\105\035\023\155 \317\367\131\345\042\047\162\053\206\363\127\273\060\355\044\115 \334\175\126\273\243\263\370\064\171\211\301\340\362\002\141\367 \246\374\017\273\034\027\013\256\101\331\174\275\047\243\375\056  $\label{eq:condition} $$ \072\321\223\224\261\163\035\044\213\257\133\040\211\255\267\147$ \146\171\365\072\306\246\226\063\376\123\222\310\106\261\021\221 \306\231\177\217\311\326\146\061\040\101\020\207\055\014\326\301 \257\064\230\312\144\203\373\023\127\321\301\360\074\172\214\245 \301\375\225\041\240\161\301\223\147\161\022\352\217\210\012\151 \031\144\231\043\126\373\254\052\056\160\276\146\304\014\204\357 \345\213\363\223\001\370\152\220\223\147\113\262\150\243\265\142  $\label{eq:condition} $$ \frac{351}{077} 214\frac{172}{073}\frac{136}{017}\frac{347}{214}\frac{270}{306}\frac{174}{357}\frac{375}{067} $$  $\label{eq:condition} $$ 164\342\310\117\063\162\341\224\071\155\275\022\257\276\014\116$ \160\174\033\157\215\263\062\223\163\104\026\155\350\364\367\340 \225\200\217\226\135\070\244\364\253\336\012\060\207\223\330\115 \000\161\142\105\047\113\072\102\204\133\177\145\267\147\064\122  $\label{eq:condition} $$ \055\234\026\153\252\250\330\173\243\102\114\161\307\014\312\076$ \203\344\246\357\267\001\060\136\121\243\171\365\160\151\246\101 \104\017\206\260\054\221\306\075\352\256\017\204

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Microsoft RSA Root Certificate Authority 2017"
# Issuer: CN=Microsoft RSA Root Certificate Authority 2017,O=Microsoft Corporation,C=US
# Serial Number:1e:d3:97:09:5f:d8:b4:b3:47:70:1e:aa:be:7f:45:b3
# Subject: CN=Microsoft RSA Root Certificate Authority 2017,O=Microsoft Corporation,C=US
# Not Valid Before: Wed Dec 18 22:51:22 2019
# Not Valid After: Fri Jul 18 23:00:23 2042
# Fingerprint (SHA-256):
C7:41:F7:0F:4B:2A:8D:88:BF:2E:71:C1:41:22:EF:53:EF:10:EB:A0:CF:A5:E6:4C:FA:20:F4:18:85:30:73:E0
# Fingerprint (SHA1): 73:A5:E6:4A:3B:FF:83:16:FF:0E:DC:CC:61:8A:90:6E:4E:AE:4D:74
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "Microsoft RSA Root Certificate Authority 2017"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\163\245\346\112\073\377\203\026\377\016\334\314\141\212\220\156
\116\256\115\164
END
CKA CERT MD5 HASH MULTILINE OCTAL
\020\377\000\377\317\311\370\307\172\300\356\065\216\311\017\107
END
CKA ISSUER MULTILINE OCTAL
\060\145\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\036\060\034\006\003\125\004\012\023\025\115\151\143\162\157\163
\157\146\164\040\103\157\162\160\157\162\141\164\151\157\156\061
\label{eq:condition} $$ \066\060\064\006\003\125\004\003\023\055\115\151\143\162\157\163
\157\146\164\040\122\123\101\040\122\157\157\164\040\103\145\162
\164\151\146\151\143\141\164\145\040\101\165\164\150\157\162\151
\164\171\040\062\060\061\067
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\020\036\323\227\011\137\330\264\263\107\160\036\252\276\177
\105\263
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "e-Szigno Root CA 2017"
# Issuer: CN=e-Szigno Root CA 2017,OID.2.5.4.97=VATHU-23584497,O=Microsec Ltd.,L=Budapest,C=HU
# Serial Number:01:54:48:ef:21:fd:97:59:0d:f5:04:0a
# Subject: CN=e-Szigno Root CA 2017,OID.2.5.4.97=VATHU-23584497,O=Microsec Ltd.,L=Budapest,C=HU
# Not Valid Before: Tue Aug 22 12:07:06 2017
```

# Not Valid After: Fri Aug 22 12:07:06 2042

# Fingerprint (SHA-256):

BE:B0:0B:30:83:9B:9B:C3:2C:32:E4:44:79:05:95:06:41:F2:64:21:B1:5E:D0:89:19:8B:51:8A:E2:EA:1B:99

# Fingerprint (SHA1): 89:D4:83:03:4F:9E:9A:48:80:5F:72:37:D4:A9:A6:EF:CB:7C:1F:D1

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "e-Szigno Root CA 2017"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \001\001\006\003\125\004\000\023\002\110\125\061\021\060\017\006\003\125\004\007\014\010\102\165\144\141\160\145\163\164\061\026\066\0024\006\003\125\004\012\014\015\115\115\1143\162\157\163\145\143\040\114\164\144\056\061\027\060\025\006\003\125\004\141\014\016\126\101\124\110\125\055\062\063\065\070\064\064\071\067\061\036\060\034\006\003\125\004\003\014\025\145\055\123\172\151\147\156\157\040\122\157\157\164\040\103\101\040\062\060\061\067$ 

**END** 

CKA ID UTF8 "0"

## CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \001\061\013\060\011\006\003\125\004\006\023\002\110\125\061\021\060\017\006\003\125\004\007\014\010\102\165\144\141\160\145\163\164\061\026\060\024\006\003\125\004\012\014\015\115\151\143\162\157\163\145\143\040\114\164\144\056\061\027\060\025\006\003\125\004\141\014\016\126\101\124\110\125\055\062\063\065\070\064\064\071\067\061\036\060\034\006\003\125\004\003\014\025\145\055\123\172\151\147\156\157\040\122\157\157\164\040\103\101\040\062\060\061\067$ 

**END** 

## CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\014\001\124\110\357\041\375\227\131\015\365\004\012 $$$ 

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

\004\007\014\010\102\165\144\141\160\145\163\164\061\026\060\024 \006\003\125\004\012\014\015\115\151\143\162\157\163\145\143\040 \101\124\110\125\055\062\063\065\070\064\064\071\067\061\036\060 \034\006\003\125\004\003\014\025\145\055\123\172\151\147\156\157  $\\ \langle 040 \rangle 122 \rangle 157 \rangle 164 \rangle 040 \rangle 103 \rangle 101 \rangle 040 \rangle 062 \rangle 060 \rangle 061 \rangle 067 \rangle 060 \rangle 131 \rangle 060$ \023\006\007\052\206\110\316\075\002\001\006\010\052\206\110\316  $\label{eq:condition} $$ \075\003\001\007\003\102\000\004\226\334\075\212\330\260\173\157$ \306\047\276\104\220\261\263\126\025\173\216\103\044\175\032\204 \131\356\143\150\262\306\136\207\320\025\110\036\250\220\255\275 \123\242\332\336\072\220\246\140\137\150\062\265\206\101\337\207 \133\054\173\305\376\174\172\332\243\143\060\141\060\017\006\003 \125\035\023\001\001\377\004\005\060\003\001\001\377\060\016\006 \003\125\035\017\001\001\377\004\004\003\002\001\006\060\035\006  $\label{eq:condition} $$ \03125\035\016\004\026\004\024\207\021\025\010\321\252\301\170 $$$ \014\261\257\316\306\311\220\357\277\060\004\300\060\037\006\003  $\label{eq:condition} $$ 125\035\043\004\030\060\026\200\024\207\021\025\010\321\252\301 $$$ \170\014\261\257\316\306\311\220\357\277\060\004\300\060\012\006  $\label{eq:condition} $$ \0.052\206\110\316\0.075\0.04\0.03\0.02\0.03\111\0.00\0.60\1.06\0.02\0.41 $$$  $\label{eq:condition} $$ \000\265\127\335\327\212\125\013\066\341\206\104\372\324\331\150 $$$ \215\270\334\043\212\212\015\324\057\175\352\163\354\277\115\154 \250\002\041\000\313\245\264\022\372\347\265\350\317\176\223\374 \363\065\217\157\116\132\174\264\274\116\262\374\162\252\133\131 \371\347\334\061

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "e-Szigno Root CA 2017"
```

- # Issuer: CN=e-Szigno Root CA 2017,OID.2.5.4.97=VATHU-23584497,O=Microsec Ltd.,L=Budapest,C=HU
- # Serial Number:01:54:48:ef:21:fd:97:59:0d:f5:04:0a
- # Subject: CN=e-Szigno Root CA 2017,OID.2.5.4.97=VATHU-23584497,O=Microsec Ltd.,L=Budapest,C=HU
- # Not Valid Before: Tue Aug 22 12:07:06 2017
- # Not Valid After : Fri Aug 22 12:07:06 2042
- # Fingerprint (SHA-256):

BE:B0:0B:30:83:9B:9B:C3:2C:32:E4:44:79:05:95:06:41:F2:64:21:B1:5E:D0:89:19:8B:51:8A:E2:EA:1B:99

# Fingerprint (SHA1): 89:D4:83:03:4F:9E:9A:48:80:5F:72:37:D4:A9:A6:EF:CB:7C:1F:D1

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "e-Szigno Root CA 2017"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\211\324\203\003\117\236\232\110\200\137\162\067\324\251\246\357

\313\174\037\321

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

```
\336\037\366\236\204\256\247\264\041\316\036\130\175\321\204\230
END
CKA ISSUER MULTILINE OCTAL
\060\161\061\013\060\011\006\003\125\004\006\023\002\110\125\061
\021\060\017\006\003\125\004\007\014\010\102\165\144\141\160\145
\163\164\061\026\060\024\006\003\125\004\012\014\015\115\151\143
\162\157\163\145\143\040\114\164\144\056\061\027\060\025\006\003
\125\004\141\014\016\126\101\124\110\125\055\062\063\065\070\064
\064\071\067\061\036\060\034\006\003\125\004\003\014\025\145\055
\123\172\151\147\156\157\040\122\157\157\164\040\103\101\040\062
\060\061\067
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \002\014\001\124\110\357\041\375\227\131\015\365\004\012 $$
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "certSIGN Root CA G2"
# Issuer: OU=certSIGN ROOT CA G2,O=CERTSIGN SA,C=RO
# Serial Number:11:00:34:b6:4e:c6:36:2d:36
# Subject: OU=certSIGN ROOT CA G2,O=CERTSIGN SA,C=RO
# Not Valid Before: Mon Feb 06 09:27:35 2017
# Not Valid After: Thu Feb 06 09:27:35 2042
# Fingerprint (SHA-256):
65:7C:FE:2F:A7:3F:AA:38:46:25:71:F3:32:A2:36:3A:46:FC:E7:02:09:51:71:07:02:CD:FB:B6:EE:DA:33:05
# Fingerprint (SHA1): 26:F9:93:B4:ED:3D:28:27:B0:B9:4B:A7:E9:15:1D:A3:8D:92:E5:32
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "certSIGN Root CA G2"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA_SUBJECT MULTILINE_OCTAL
\label{eq:condition} $$ \060\101\061\013\060\011\006\003\125\004\006\023\002\122\117\061 $$
\107\116\040\123\101\061\034\060\032\006\003\125\004\013\023\023
\143\145\162\164\123\111\107\116\040\122\117\117\124\040\103\101
\040\107\062
END
CKA ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\101\061\013\060\011\006\003\125\004\006\023\002\122\117\061
\024\060\022\006\003\125\004\012\023\013\103\105\122\124\123\111
```

\107\116\040\123\101\061\034\060\032\006\003\125\004\013\023\023 \143\145\162\164\123\111\107\116\040\122\117\117\124\040\103\101 \040\107\062

**END** 

 ${\sf CKA\_SERIAL\_NUMBER\ MULTILINE\_OCTAL}$ 

\002\011\021\000\064\266\116\306\066\055\066

**END** 

## CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \060\202\005\107\060\202\003\057\240\003\002\001\002\002\011\021$ \000\064\266\116\306\066\055\066\060\015\006\011\052\206\110\206 \367\015\001\001\013\005\000\060\101\061\013\060\011\006\003\125  $\label{eq:condition} $$ \004\006\023\002\122\117\061\024\060\022\006\003\125\004\012\023$ \013\103\105\122\124\123\111\107\116\040\123\101\061\034\060\032  $\label{eq:condition} $$ \006\003\125\004\013\023\023\143\145\162\164\123\111\107\116\040 $$$ \122\117\117\124\040\103\101\040\107\062\060\036\027\015\061\067 \060\062\060\066\060\071\062\067\063\065\132\027\015\064\062\060  $\label{eq:condition} $$ \062\060\060\071\062\067\063\065\132\060\101\061\013\060\011 $$$ \006\003\125\004\006\023\002\122\117\061\024\060\022\006\003\125 \004\012\023\013\103\105\122\124\123\111\107\116\040\123\101\061  $\label{eq:condition} $$ \034\060\032\006\003\125\004\013\023\023\143\145\162\164\123\111 $$$ \107\116\040\122\117\117\124\040\103\101\040\107\062\060\202\002 \042\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000  $\label{eq:condition} $$ \003\202\002\017\000\060\202\002\012\002\202\002\001\000\300\305 $$$ \165\031\221\175\104\164\164\207\376\016\073\226\334\330\001\026 \314\356\143\221\347\013\157\316\073\012\151\032\174\302\343\257 \202\216\206\327\136\217\127\353\323\041\131\375\071\067\102\060 \276\120\352\266\017\251\210\330\056\055\151\041\347\321\067\030 \271\123\145\017\035\102\345\217\317\005\323\356\334\014\032\331 \270\213\170\042\147\344\151\260\150\305\074\344\154\132\106\347 \315\307\372\357\304\354\113\275\152\244\254\375\314\050\121\357 \222\264\051\253\253\065\232\114\344\304\010\306\046\314\370\151 \237\344\234\360\051\323\134\371\306\026\045\236\043\303\040\301 \075\017\077\070\100\260\376\202\104\070\252\132\032\212\153\143 \130\070\264\025\323\266\021\151\173\036\124\356\214\032\042\254 \162\227\077\043\131\233\311\042\204\301\007\117\314\177\342\127 \312\022\160\273\246\145\363\151\165\143\275\225\373\033\227\315 \344\250\257\366\321\116\250\331\212\161\044\315\066\075\274\226 \304\361\154\251\256\345\317\015\156\050\015\260\016\265\312\121  $\label{eq:condition} $$173\170\024\303\040\057\177\373\024\125\341\021\231\375\325\012$ \241\236\002\343\142\137\353\065\113\054\270\162\350\076\075\117 \254\054\273\056\206\342\243\166\217\345\223\052\317\245\253\310 \134\215\113\006\377\022\106\254\170\313\024\007\065\340\251\337 \213\351\257\025\117\026\211\133\275\366\215\306\131\256\210\205 \016\301\211\353\037\147\305\105\216\377\155\067\066\053\170\146 \203\221\121\053\075\377\121\167\166\142\241\354\147\076\076\201 \203\340\126\251\120\037\037\172\231\253\143\277\204\027\167\361 \015\073\337\367\234\141\263\065\230\212\072\262\354\074\032\067

\077\176\217\222\317\331\022\024\144\332\020\002\025\101\377\117 \304\353\034\243\311\372\231\367\106\351\341\030\331\261\270\062 \055\313\024\014\120\330\203\145\203\356\271\134\317\313\005\132 \114\372\031\227\153\326\135\023\323\302\134\124\274\062\163\240 \170\365\361\155\036\313\237\245\246\237\042\334\321\121\236\202  $\label{eq:condition} $$ \frac{171}144\\140\\051\\023\\076\\243\\375\\117\\162\\152\\253\\342\\324\\345\\270$ \044\125\054\104\113\212\210\104\234\312\204\323\052\073\002\003 \001\000\001\243\102\060\100\060\017\006\003\125\035\023\001\001  $\label{eq:condition} $$ \sqrt{377} \cdot 004 \cdot 005 \cdot 060 \cdot 003 \cdot 001 \cdot 001 \cdot 377 \cdot 060 \cdot 016 \cdot 006 \cdot 003 \cdot 125 \cdot 035 \cdot 017 \cdot 001$ \001\377\004\004\003\002\001\006\060\035\006\003\125\035\016\004  $\label{eq:condition} $$ \026\004\024\202\041\055\146\306\327\240\340\025\353\316\114\011 $$$ \167\304\140\236\124\156\003\060\015\006\011\052\206\110\206\367 \015\001\001\013\005\000\003\202\002\001\000\140\336\032\270\347 \362\140\202\325\003\063\201\313\006\212\361\042\111\351\350\352 \221\177\306\063\136\150\031\003\206\073\103\001\317\007\160\344 \010\036\145\205\221\346\021\042\267\365\002\043\216\256\271\036 \175\037\176\154\346\275\045\325\225\032\362\005\246\257\205\002 \157\256\370\326\061\377\045\311\112\310\307\212\251\331\237\113 \111\233\021\127\231\222\103\021\336\266\063\244\314\327\215\144 \175\324\315\074\050\054\264\232\226\352\115\365\304\104\304\045 \252\040\200\330\051\125\367\340\101\374\006\046\377\271\066\365 \103\024\003\146\170\341\021\261\332\040\137\106\000\170\000\041  $\label{eq:condition} $$ 245\036\000\050\141\170\157\250\001\001\217\235\064\232\377\364 $$$ \070\220\373\270\321\263\162\006\311\161\346\201\305\171\355\013 \246\171\362\023\013\234\367\135\016\173\044\223\264\110\333\206 \137\336\120\206\170\347\100\346\061\250\220\166\160\141\257\234 \067\054\021\265\202\267\252\256\044\064\133\162\014\151\015\315 \131\237\366\161\257\234\013\321\012\070\371\006\042\203\123\045 \014\374\121\304\346\276\342\071\225\013\044\255\257\321\225\344 \226\327\164\144\153\161\116\002\074\252\205\363\040\243\103\071  $\label{eq:condition} $$ 166\133\154\120\376\232\234\024\036\145\024\212\025\275\243\202$ \105\132\111\126\152\322\234\261\143\062\345\141\340\123\042\016 \247\012\111\352\313\176\037\250\342\142\200\366\020\105\122\230 \006\030\336\245\315\057\177\252\324\351\076\010\162\354\043\003 \002\074\246\252\330\274\147\164\075\024\027\373\124\113\027\343 \323\171\075\155\153\111\311\050\016\056\164\120\277\014\331\106 \072\020\206\311\247\077\351\240\354\177\353\245\167\130\151\161 \346\203\012\067\362\206\111\152\276\171\010\220\366\002\026\144  $\label{eq:condition} $$ \076\345\332\114\176\014\064\311\371\137\266\263\050\121\247\247$  $\begin{tabular}{l} $$ \053\252\111\372\215\145\051\116\343\153\023\247\224\243\055\121\end{tabular}$ \155\170\014\104\313\337\336\010\157\316\243\144\253\323\225\204 \324\271\122\124\162\173\226\045\314\274\151\343\110\156\015\320 \307\235\047\232\252\370\023\222\335\036\337\143\237\065\251\026 \066\354\214\270\203\364\075\211\217\315\264\027\136\327\263\027 \101\020\135\047\163\140\205\127\111\042\007

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "certSIGN Root CA G2"
# Issuer: OU=certSIGN ROOT CA G2,O=CERTSIGN SA,C=RO
# Serial Number:11:00:34:b6:4e:c6:36:2d:36
# Subject: OU=certSIGN ROOT CA G2,O=CERTSIGN SA,C=RO
# Not Valid Before: Mon Feb 06 09:27:35 2017
# Not Valid After: Thu Feb 06 09:27:35 2042
# Fingerprint (SHA-256):
65:7C:FE:2F:A7:3F:AA:38:46:25:71:F3:32:A2:36:3A:46:FC:E7:02:09:51:71:07:02:CD:FB:B6:EE:DA:33:05
# Fingerprint (SHA1): 26:F9:93:B4:ED:3D:28:27:B0:B9:4B:A7:E9:15:1D:A3:8D:92:E5:32
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "certSIGN Root CA G2"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\046\371\223\264\355\075\050\047\260\271\113\247\351\025\035\243
\215\222\345\062
END
CKA CERT MD5 HASH MULTILINE OCTAL
\214\361\165\212\306\031\317\224\267\367\145\040\207\303\227\307
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\101\061\013\060\011\006\003\125\004\006\023\002\122\117\061 $$
\024\060\022\006\003\125\004\012\023\013\103\105\122\124\123\111
\107\116\040\123\101\061\034\060\032\006\003\125\004\013\023\023
\040\107\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\label{eq:condition} $$ \002\011\021\000\064\266\116\306\066\055\066$$
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Trustwave Global Certification Authority"
# Issuer: CN=Trustwave Global Certification Authority,O="Trustwave Holdings,
Inc.",L=Chicago,ST=Illinois,C=US
# Serial Number:05:f7:0e:86:da:49:f3:46:35:2e:ba:b2
# Subject: CN=Trustwave Global Certification Authority,O="Trustwave Holdings,
Inc.",L=Chicago,ST=Illinois,C=US
# Not Valid Before: Wed Aug 23 19:34:12 2017
# Not Valid After: Sat Aug 23 19:34:12 2042
```

# Fingerprint (SHA-256):

97:55:20:15:F5:DD:FC:3C:87:88:C0:06:94:45:55:40:88:94:45:00:84:F1:00:86:70:86:BC:1A:2B:B5:8D:C8

# Fingerprint (SHA1): 2F:8F:36:4F:E1:58:97:44:21:59:87:A5:2A:9A:D0:69:95:26:7F:B5

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "Trustwave Global Certification Authority"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \061\021\060\017\006\003\125\004\010\014\010\111\154\154\151\156$$ 

 $\label{eq:condition} $$ \frac{157}{151}\frac{000}{000}\frac{000}{000}\frac{125}{004}\frac{007}{014}\frac{103}{150} $$$ 

 $\label{eq:condition} $$ \frac{151}143\frac{141}147\frac{57}{061}\frac{041}{060}\frac{037}{006}\frac{003}{125}\frac{004}{012}\frac{014}{030} $$$ 

 $\label{eq:local_$ 

 $\\ 147 \\ 163 \\ 054 \\ 040 \\ 111 \\ 156 \\ 143 \\ 056 \\ 061 \\ 061 \\ 060 \\ 057 \\ 006 \\ 003 \\ 125 \\ 004$ 

 $\label{eq:condition} $$ \003\014\050\124\162\165\163\164\167\141\166\145\040\107\154\157 $$$ 

 $\\ 142\\141\\154\\040\\103\\145\\162\\164\\151\\146\\151\\143\\141\\164\\151\\157$ 

\156\040\101\165\164\150\157\162\151\164\171

**END** 

CKA ID UTF8 "0"

## CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000\201\210\061\013\060\011\006\003\125\004\010\014\010\111\154\154\151\156\157\151\163\061\020\060\016\006\003\125\004\007\014\007\103\150\151\143\141\147\157\061\041\060\037\006\003\125\004\012\014\030\124\162\165\163\164\167\141\166\145\040\110\157\154\144\151\156\147\163\054\040\111\156\143\056\061\061\060\057\006\003\125\004\003\125\004\003\124\162\165\163\164\167\141\166\145\040\107\154\157\142\141\154\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\157\162\151\164\171$ 

**END** 

## CKA SERIAL NUMBER MULTILINE OCTAL

\002\014\005\367\016\206\332\111\363\106\065\056\272\262

**END** 

#### CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \000\200\332\000\3002\001\0002\001\4005 \367\016\206\332\111\363\106\065\056\272\262\060\015\006\011\052 \206\110\206\367\015\001\001\001\3005\000\060\201\210\061\1013\060 \011\006\003\125\004\006\0023\002\125\123\061\002\1\060\017\006\003 \125\004\0007\111\154\151\156\157\151\163\061\020\060 \016\0003\125\004\0007\103\150\151\143\141\147\157\061 \041\060\037\006\003\125\004\012\014\030\124\162\165\163\164\167 \141\166\145\040\110\157\154\144\151\156\147\163\054\040\111\156 \163\164\167\141\166\145\040\107\154\157\142\141\154\040\103\145 \162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150 \157\162\151\164\171\060\036\027\015\061\067\060\070\062\063\061$ 

\071\063\064\061\062\132\027\015\064\062\060\070\062\063\061\071 \063\064\061\062\132\060\201\210\061\013\060\011\006\003\125\004 \006\023\002\125\123\061\021\060\017\006\003\125\004\010\014\010 \111\154\154\151\156\157\151\163\061\020\060\016\006\003\125\004 \007\014\007\103\150\151\143\141\147\157\061\041\060\037\006\003 \125\004\012\014\030\124\162\165\163\164\167\141\166\145\040\110 \157\154\144\151\156\147\163\054\040\111\156\143\056\061\061\060 \057\006\003\125\004\003\014\050\124\162\165\163\164\167\141\166  $\\ 145 \\ 040 \\ 107 \\ 154 \\ 157 \\ 142 \\ 141 \\ 154 \\ 040 \\ 103 \\ 145 \\ 162 \\ 164 \\ 151 \\ 146 \\ 151 \\$ \143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171 \060\202\002\042\060\015\006\011\052\206\110\206\367\015\001\001  $\label{eq:condition} $$ \001\005\000\003\202\002\017\000\060\202\002\012\002\202\002\01$ \000\271\135\121\050\113\074\067\222\321\202\316\275\035\275\315 \335\270\253\317\012\076\341\135\345\334\252\011\271\127\002\076 \346\143\141\337\362\017\202\143\256\243\367\254\163\321\174\347 \263\013\257\010\000\011\131\177\315\051\052\210\223\207\027\030  $\label{eq:condition} $$ \200\355\210\262\264\266\020\037\055\326\137\125\242\023\135\321 $$$ \306\353\006\126\211\210\376\254\062\235\375\134\303\005\307\156 \356\206\211\272\210\003\235\162\041\206\220\256\217\003\245\334  $\label{eq:condition} $$ \237\210\050\313\243\222\111\017\354\320\017\342\155\104\117\200 $$$ \152\262\324\347\240\012\123\001\272\216\227\221\166\156\274\374 \325\153\066\346\100\210\326\173\057\137\005\350\054\155\021\363  $\label{eq:condition} $$ 347\262\276\222\104\114\322\227\244\376\322\162\201\103\007\234 $$$ \351\021\076\365\213\032\131\175\037\150\130\335\004\000\054\226 \363\103\263\176\230\031\164\331\234\163\331\030\276\101\307\064 \171\331\364\142\302\103\271\263\047\260\042\313\371\075\122\307 \060\107\263\311\076\270\152\342\347\350\201\160\136\102\213\117  $\\ \langle 046 \rangle 245 \rangle 376 \rangle 072 \rangle 302 \rangle 040 \rangle 156 \rangle 273 \rangle 370 \rangle 026 \rangle 216 \rangle 315 \rangle 014 \rangle 251 \rangle 264 \rangle 033$ \154\166\020\341\130\171\106\076\124\316\200\250\127\011\067\051 \033\231\023\217\014\310\326\054\034\373\005\350\010\225\075\145  $\label{eq:condition} $$ 106\334\356\315\151\342\115\217\207\050\116\064\013\076\317\024$$ \331\273\335\266\120\232\255\167\324\031\326\332\032\210\310\116 \033\047\165\330\262\010\361\256\203\060\271\021\016\315\207\360 \204\215\025\162\174\241\357\314\362\210\141\272\364\151\273\014 \214\013\165\127\004\270\116\052\024\056\075\017\034\036\062\246 \142\066\356\146\342\042\270\005\100\143\020\042\363\063\035\164 \162\212\054\365\071\051\240\323\347\033\200\204\055\305\075\343 \115\261\375\032\157\272\145\007\073\130\354\102\105\046\373\330  $\label{eq:condition} $$ 32\045\162\304\366\000\261\042\171\275\343\174\131\142\112\234 $$$  $\label{eq:condition} $$ \05\157\075\316\346\326\107\143\231\306\044\157\162\022\310\254$$ \177\220\264\013\221\160\350\267\346\026\020\161\027\316\336\006 \267\010\230\114\345\021\031\256\102\200\334\373\220\005\324\370 \120\312\276\344\255\307\302\224\327\026\235\346\027\217\257\066 \373\002\003\001\000\001\243\102\060\100\060\017\006\003\125\035 \023\001\001\377\004\005\060\003\001\001\377\060\035\006\003\125 \035\016\004\026\004\024\231\340\031\147\015\142\333\166\263\332  $\label{eq:condition} $$ \075\270\133\350\375\102\322\061\016\207\060\016\006\003\125\035 $$$ 

\017\001\001\377\004\004\003\002\001\006\060\015\006\011\052\206 \110\206\367\015\001\001\013\005\000\003\202\002\001\000\230\163  $\label{eq:condition} $$ 160\342\260\323\355\071\354\114\140\331\251\022\206\027\036\226$  $\label{eq:condition} $$ 320\350\124\050\073\144\055\041\246\370\235\126\023\152\110\075$  $\label{eq:condition} $$ \frac{117}307}076\\051\\333\\155\\130\\203\\124\\075\\207\\175\\043\\005\\324\\344$ \034\334\350\070\145\206\305\165\247\132\333\065\005\275\167\336 \273\051\067\100\005\007\303\224\122\237\312\144\335\361\033\053 \334\106\012\020\002\061\375\112\150\015\007\144\220\346\036\365 \052\241\250\273\074\135\371\243\010\013\021\014\361\077\055\020 \224\157\376\342\064\207\203\326\317\345\033\065\155\322\003\341  $\label{eq:condition} $$ \260\015\250\240\252\106\047\202\066\247\025\266\010\246\102\124 $$$  $\label{eq:condition} $$ \frac{127}{266}\frac{231}{132}\frac{342}{013}\frac{171}{220}\frac{327}{127}\frac{022}{121}\frac{065}{031}\frac{210}{101} $$$ \150\045\324\067\027\204\025\373\001\162\334\225\336\122\046\040  $\label{eq:condition} $$ \230\046\342\166\365\047\157\372\000\073\112\141\331\015\313\121$ \223\052\375\026\006\226\247\043\232\043\110\376\121\275\266\304 \260\261\124\316\336\154\101\255\026\147\176\333\375\070\315\271  $\label{eq:condition} $$ \070\116\262\301\140\313\235\027\337\130\236\172\142\262\046\217 $$$ \164\225\233\344\133\035\322\017\335\230\034\233\131\271\043\323  $\label{eq:condition} $$ \061\240\246\377\070\335\317\040\117\351\130\126\072\147\303\321 $$$  $\label{eq:condition} $$ \366\231\231\235\272\066\266\200\057\210\107\117\206\277\104\072$ \200\344\067\034\246\272\352\227\230\021\320\204\142\107\144\036 \252\356\100\277\064\261\234\217\116\341\362\222\117\037\216\363 \236\227\336\363\246\171\152\211\161\117\113\047\027\110\376\354 \364\120\017\117\111\175\314\105\343\275\172\100\305\101\334\141  $\label{eq:condition} $$ \frac{126}047\\006\\151\\345\\162\\101\\201\\323\\266\\001\\211\\240\\057\\072\\162$ \171\376\072\060\277\101\354\307\142\076\221\113\307\331\061\166 \102\371\367\074\143\354\046\214\163\014\175\032\035\352\250\174  $\label{eq:condition} $$ \207\250\302\047\174\341\063\101\017\317\317\317\374\000\240\042\200 $$$ \236\112\247\157\000\260\101\105\267\042\312\150\110\305\102\242 \256\335\035\362\340\156\116\005\130\261\300\220\026\052\244\075  $\label{eq:condition} $$ \020\100\276\217\142\143\203\251\234\202\175\055\002\351\203\060$$ \174\313\047\311\375\036\146\000\260\056\323\041\057\216\063\026 \154\230\355\020\250\007\326\314\223\317\333\321\151\034\344\312 \311\340\266\234\351\316\161\161\336\154\077\026\244\171

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA NSS SERVER DISTRUST AFTER CK BBOOL CK FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Trustwave Global Certification Authority"
```

<sup>#</sup> Issuer: CN=Trustwave Global Certification Authority,O="Trustwave Holdings,

Inc.",L=Chicago,ST=Illinois,C=US

<sup>#</sup> Serial Number:05:f7:0e:86:da:49:f3:46:35:2e:ba:b2

<sup>#</sup> Subject: CN=Trustwave Global Certification Authority,O="Trustwave Holdings,

Inc.",L=Chicago,ST=Illinois,C=US

<sup>#</sup> Not Valid Before: Wed Aug 23 19:34:12 2017

<sup>#</sup> Not Valid After: Sat Aug 23 19:34:12 2042

<sup>#</sup> Fingerprint (SHA-256):

```
97:55:20:15:F5:DD:FC:3C:87:88:C0:06:94:45:55:40:88:94:45:00:84:F1:00:86:70:86:BC:1A:2B:B5:8D:C8
# Fingerprint (SHA1): 2F:8F:36:4F:E1:58:97:44:21:59:87:A5:2A:9A:D0:69:95:26:7F:B5
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "Trustwave Global Certification Authority"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\057\217\066\117\341\130\227\104\041\131\207\245\052\232\320\151
\225\046\177\265
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\370\034\030\055\057\272\137\155\241\154\274\307\253\221\307\016
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\210\061\013\060\011\006\003\125\004\006\023\002\125\123
\157\151\163\061\020\060\016\006\003\125\004\007\014\007\103\150
\label{eq:condition} $$ \frac{151}143\frac{141}147\frac{57}{061}\frac{041}{060}\frac{037}{006}\frac{003}{125}\frac{004}{012}\frac{014}{030} $$
\147\163\054\040\111\156\143\056\061\061\060\057\006\003\125\004
\003\014\050\124\162\165\163\164\167\141\166\145\040\107\154\157
\142\141\154\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\014\005\367\016\206\332\111\363\106\065\056\272\262
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Trustwave Global ECC P256 Certification Authority"
# Issuer: CN=Trustwave Global ECC P256 Certification Authority,O="Trustwave Holdings,
Inc.",L=Chicago,ST=Illinois,C=US
# Serial Number:0d:6a:5f:08:3f:28:5c:3e:51:95:df:5d
# Subject: CN=Trustwave Global ECC P256 Certification Authority,O="Trustwave Holdings,
Inc.",L=Chicago,ST=Illinois,C=US
# Not Valid Before: Wed Aug 23 19:35:10 2017
# Not Valid After: Sat Aug 23 19:35:10 2042
# Fingerprint (SHA-256):
94:5B:BC:82:5E:A5:54:F4:89:D1:FD:51:A7:3D:DF:2E:A6:24:AC:70:19:A0:52:05:22:5C:22:A7:8C:CF:A8:B4
# Fingerprint (SHA1): B4:90:82:DD:45:0C:BE:8B:5B:B1:66:D3:E2:A4:08:26:CD:ED:42:CF
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
```

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "Trustwave Global ECC P256 Certification Authority"

 ${\tt CKA\_CERTIFICATE\_TYPE\ CK\_CERTIFICATE\_TYPE\ CKC\_X\_509}$ 

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:control_loss} $$ \004\21\21\061\013\060\011\006\003\125\004\010\023\010\111\154\151\156\157\151\163\061\020\060\016\006\003\125\004\007\023\007\103\150\151\143\141\147\157\061\041\060\037\006\003\125\004\012\023\030\124\162\165\163\164\167\141\166\145\040\110\157\154\144\151\156\147\163\054\040\111\156\143\056\061\072\060\070\006\003\125\004\003\023\061\124\162\165\163\164\167\141\166\145\040\107\154\157\142\141\154\040\105\103\103\040\120\062\065\066\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171$ 

**END** 

CKA ID UTF8 "0"

## CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:control_loss} $$ \004\21\21\061\013\060\011\006\003\125\004\010\023\010\111\154\151\156\157\151\163\061\020\060\016\006\003\125\004\007\023\007\103\150\151\143\141\147\157\061\041\060\037\006\003\125\004\012\023\030\124\162\165\163\164\167\141\166\145\040\110\157\154\144\151\156\147\163\054\040\111\156\143\056\061\072\060\070\006\003\125\004\003\023\061\124\162\165\163\164\167\141\166\145\040\107\154\157\142\141\154\040\105\103\103\040\120\062\065\066\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171$ 

**END** 

## CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\014\015\152\137\010\077\050\134\076\121\225\337\135$ END$ 

## CKA VALUE MULTILINE OCTAL

\003\125\004\010\023\010\111\154\154\151\156\157\151\163\061\020 \060\016\006\003\125\004\007\023\007\103\150\151\143\141\147\157  $\\ 167 \\ 141 \\ 166 \\ 145 \\ 040 \\ 110 \\ 157 \\ 154 \\ 144 \\ 151 \\ 156 \\ 147 \\ 163 \\ 054 \\ 040 \\ 111 \\ 1$  $\label{eq:condition} $$ \frac{156}{143}056\\061\\072\\060\\070\\006\\003\\125\\004\\003\\023\\061\\124\\162$ \165\163\164\167\141\166\145\040\107\154\157\142\141\154\040\105 \103\103\040\120\062\065\066\040\103\145\162\164\151\146\151\143  $\\ 141\\164\\151\\157\\156\\040\\101\\165\\164\\150\\157\\162\\151\\164\\171\\060$ \131\060\023\006\007\052\206\110\316\075\002\001\006\010\052\206 \110\316\075\003\001\007\003\102\000\004\176\373\154\346\043\343  $\label{eq:condition} $$ 163\062\010\312\140\346\123\234\272\164\215\030\260\170\220\122$  $\label{eq:condition} $$\200\35\070\300\112\035\321\250\314\223\244\227\006\070\312\015$$ \025\142\306\216\001\052\145\235\252\337\064\221\056\201\301\344  $\label{eq:condition} $$ \063\222\061\304\375\011\072\246\077\255\243\103\060\101\060\017 $$$  $\\ \\006\\003\\125\\035\\023\\001\\001\\377\\004\\005\\060\\003\\001\\001\\377\\060$ \017\006\003\125\035\017\001\001\377\004\005\003\003\007\006\000  $\label{eq:condition} $$ \000\03\125\035\016\004\026\004\024\243\101\006\254\220 $$$ \155\321\112\353\165\245\112\020\231\263\261\241\213\112\367\060  $\label{eq:condition} $$ \012\006\010\052\206\110\316\075\004\003\002\003\107\000\060\104 $$$  $\label{eq:condition} $$ \002\040\007\346\124\332\016\240\132\262\256\021\237\207\305\266$$ \377\151\336\045\276\370\240\267\010\363\104\316\052\337\010\041  $\label{eq:condition} $$ \014\067\002\040\055\046\003\240\005\275\153\321\366\134\370\145 $$$ \314\206\155\263\234\064\110\143\204\011\305\215\167\032\342\314 \234\341\164\173

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "Trustwave Global ECC P256 Certification Authority"

# Issuer: CN=Trustwave Global ECC P256 Certification Authority,O="Trustwave Holdings,

Inc.",L=Chicago,ST=Illinois,C=US

# Serial Number:0d:6a:5f:08:3f:28:5c:3e:51:95:df:5d

# Subject: CN=Trustwave Global ECC P256 Certification Authority,O="Trustwave Holdings,

Inc.",L=Chicago,ST=Illinois,C=US

# Not Valid Before: Wed Aug 23 19:35:10 2017

# Not Valid After: Sat Aug 23 19:35:10 2042

# Fingerprint (SHA-256):

94:5B:BC:82:5E:A5:54:F4:89:D1:FD:51:A7:3D:DF:2E:A6:24:AC:70:19:A0:52:05:22:5C:22:A7:8C:CF:A8:B4

# Fingerprint (SHA1): B4:90:82:DD:45:0C:BE:8B:5B:B1:66:D3:E2:A4:08:26:CD:ED:42:CF

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Trustwave Global ECC P256 Certification Authority"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \264\220\202\335\105\014\276\213\133\261\146\323\342\244\010\046$$ 

\315\355\102\317

```
END
CKA CERT MD5 HASH MULTILINE OCTAL
\133\104\343\215\135\066\206\046\350\015\005\322\131\247\203\124
END
CKA ISSUER MULTILINE OCTAL
\060\201\221\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\021\060\017\006\003\125\004\010\023\010\111\154\154\151\156
\label{eq:condition} $$ \frac{157}{151}\frac{000}{000}\frac{000}{016}\frac{000}{003}\frac{125}{004}\frac{007}{023}\frac{103}{150} $$
\151\143\141\147\157\061\041\060\037\006\003\125\004\012\023\030
\124\162\165\163\164\167\141\166\145\040\110\157\154\144\151\156
\147\163\054\040\111\156\143\056\061\072\060\070\006\003\125\004
\label{eq:condition} $$ \003\023\061\124\162\165\163\164\167\141\166\145\040\107\154\157 $$
\142\141\154\040\105\103\103\040\120\062\065\066\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\014\015\152\137\010\077\050\134\076\121\225\337\135
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Trustwave Global ECC P384 Certification Authority"
# Issuer: CN=Trustwave Global ECC P384 Certification Authority,O="Trustwave Holdings,
Inc.",L=Chicago,ST=Illinois,C=US
# Serial Number:08:bd:85:97:6c:99:27:a4:80:68:47:3b
# Subject: CN=Trustwave Global ECC P384 Certification Authority,O="Trustwave Holdings,
Inc.",L=Chicago,ST=Illinois,C=US
# Not Valid Before: Wed Aug 23 19:36:43 2017
# Not Valid After: Sat Aug 23 19:36:43 2042
# Fingerprint (SHA-256):
55:90:38:59:C8:C0:C3:EB:B8:75:9E:CE:4E:25:57:22:5F:F5:75:8B:BD:38:EB:D4:82:76:60:1E:1B:D5:80:97
# Fingerprint (SHA1): E7:F3:A3:C8:CF:6F:C3:04:2E:6D:0E:67:32:C5:9E:68:95:0D:5E:D2
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Trustwave Global ECC P384 Certification Authority"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
```

\061\021\060\017\006\003\125\004\010\023\010\111\154\154\151\156 \157\151\163\061\020\060\016\006\003\125\004\007\023\007\103\150 \151\143\141\147\157\061\041\060\037\006\003\125\004\012\023\030

**END** 

CKA ID UTF8 "0"

#### CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:control} $$ \000\201\221\061\013\060\011\006\003\125\004\010\023\010\111\154\151\156\157\151\163\061\020\060\016\006\003\125\0004\007\023\007\103\150\151\143\141\147\157\061\041\060\037\006\003\125\0004\012\023\030\124\162\165\163\164\167\141\166\145\040\110\157\154\144\151\156\147\163\054\040\111\156\143\056\061\072\060\070\006\003\125\004\003\023\061\124\162\165\163\164\167\141\166\145\040\107\154\157\142\141\154\040\105\103\103\040\120\063\070\064\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171$ 

**END** 

## CKA SERIAL NUMBER MULTILINE OCTAL

\002\014\010\275\205\227\154\231\047\244\200\150\107\073

**END** 

## CKA VALUE MULTILINE OCTAL

\060\202\002\235\060\202\002\044\240\003\002\001\002\002\014\010 \275\205\227\154\231\047\244\200\150\107\073\060\012\006\010\052 \206\110\316\075\004\003\003\060\201\221\061\013\060\011\006\003 \125\004\006\023\002\125\123\061\021\060\017\006\003\125\004\010 \023\010\111\154\154\151\156\157\151\163\061\020\060\016\006\003 \125\004\007\023\007\103\150\151\143\141\147\157\061\041\060\037  $\label{eq:condition} $$ \006\003\125\004\012\023\030\124\162\165\163\164\167\141\166\145$$$ \040\110\157\154\144\151\156\147\163\054\040\111\156\143\056\061 \072\060\070\006\003\125\004\003\023\061\124\162\165\163\164\167 \141\166\145\040\107\154\157\142\141\154\040\105\103\103\040\120 \063\070\064\040\103\145\162\164\151\146\151\143\141\164\151\157 \156\040\101\165\164\150\157\162\151\164\171\060\036\027\015\061 \067\060\070\062\063\061\071\063\066\064\063\132\027\015\064\062 \060\070\062\063\061\071\063\066\064\063\132\060\201\221\061\013 \060\016\006\003\125\004\007\023\007\103\150\151\143\141\147\157 \061\041\060\037\006\003\125\004\012\023\030\124\162\165\163\164 \167\141\166\145\040\110\157\154\144\151\156\147\163\054\040\111 \156\143\056\061\072\060\070\006\003\125\004\003\023\061\124\162 \165\163\164\167\141\166\145\040\107\154\157\142\141\154\040\105 \103\103\040\120\063\070\064\040\103\145\162\164\151\146\151\143 \141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\060 \166\060\020\006\007\052\206\110\316\075\002\001\006\005\053\201

\004\000\042\003\142\000\004\153\332\015\165\065\010\061\107\005 \256\105\231\125\361\021\023\056\112\370\020\061\043\243\176\203 \323\177\050\010\072\046\032\072\317\227\202\037\200\267\047\011 \217\321\216\060\304\012\233\016\254\130\004\253\367\066\175\224 \043\244\233\012\212\213\253\353\375\071\045\146\361\136\376\214 \256\215\101\171\235\011\140\316\050\251\323\212\155\363\326\105 \324\362\230\204\070\145\240\243\103\060\101\060\017\006\003\125  $\label{eq:condition} $$ \035\023\001\001\377\004\005\060\003\001\001\377\060\017\006\003$ \125\035\017\001\001\377\004\005\003\003\007\006\000\060\035\006 \003\125\035\016\004\026\004\024\125\251\204\211\322\301\062\275 \030\313\154\246\007\116\310\347\235\276\202\220\060\012\006\010 \052\206\110\316\075\004\003\003\003\147\000\060\144\002\060\067 \001\222\227\105\022\176\240\363\076\255\031\072\162\335\364\120 \223\003\022\276\104\322\117\101\244\214\234\235\037\243\366\302 \222\347\110\024\376\116\233\245\221\127\256\306\067\162\273\002 \060\147\045\012\261\014\136\356\251\143\222\157\345\220\013\376 \146\042\312\107\375\212\061\367\203\376\172\277\020\276\030\053 \036\217\366\051\036\224\131\357\216\041\067\313\121\230\245\156 \113

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "Trustwave Global ECC P384 Certification Authority"

# Issuer: CN=Trustwave Global ECC P384 Certification Authority,O="Trustwave Holdings,

Inc.",L=Chicago,ST=Illinois,C=US

# Serial Number:08:bd:85:97:6c:99:27:a4:80:68:47:3b

# Subject: CN=Trustwave Global ECC P384 Certification Authority,O="Trustwave Holdings,

Inc.",L=Chicago,ST=Illinois,C=US

# Not Valid Before: Wed Aug 23 19:36:43 2017

# Not Valid After: Sat Aug 23 19:36:43 2042

# Fingerprint (SHA-256):

55:90:38:59:C8:C0:C3:EB:B8:75:9E:CE:4E:25:57:22:5F:F5:75:8B:BD:38:EB:D4:82:76:60:1E:1B:D5:80:97

# Fingerprint (SHA1): E7:F3:A3:C8:CF:6F:C3:04:2E:6D:0E:67:32:C5:9E:68:95:0D:5E:D2

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Trustwave Global ECC P384 Certification Authority"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \frac{347\363\243\310\317\157\303\004\056\155\016\147\062\305\236\150}{150}$$ 

**END** 

\225\015\136\322

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \frac{352}{317}140\frac{304}{073}\frac{271}{025}\frac{1100}{241}\frac{227}{355}\frac{170}{047}\frac{223}{326} $$$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

```
\060\201\221\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\021\060\017\006\003\125\004\010\023\010\111\154\154\151\156
\157\151\163\061\020\060\016\006\003\125\004\007\023\007\103\150
\label{eq:condition} $$ \frac{151}143\frac{141}147\frac{57}{061}\frac{041}{060}\frac{037}{006}\frac{003}{125}\frac{004}{012}\frac{023}{030} $$
\147\163\054\040\111\156\143\056\061\072\060\070\006\003\125\004
\003\023\061\124\162\165\163\164\167\141\166\145\040\107\154\157
\142\141\154\040\105\103\103\040\120\063\070\064\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\014\010\275\205\227\154\231\047\244\200\150\107\073
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "NAVER Global Root Certification Authority"
# Issuer: CN=NAVER Global Root Certification Authority,O=NAVER BUSINESS PLATFORM Corp.,C=KR
# Serial Number:01:94:30:1e:a2:0b:dd:f5:c5:33:2a:b1:43:44:71:f8:d6:50:4d:0d
# Subject: CN=NAVER Global Root Certification Authority,O=NAVER BUSINESS PLATFORM Corp.,C=KR
# Not Valid Before: Fri Aug 18 08:58:42 2017
# Not Valid After: Tue Aug 18 23:59:59 2037
# Fingerprint (SHA-256):
88:F4:38:DC:F8:FF:D1:FA:8F:42:91:15:FF:E5:F8:2A:E1:E0:6E:0C:70:C3:75:FA:AD:71:7B:34:A4:9E:72:65
# Fingerprint (SHA1): 8F:6B:F2:A9:27:4A:DA:14:A0:C4:F4:8E:61:27:F9:C0:1E:78:5D:D1
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "NAVER Global Root Certification Authority"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\151\061\013\060\011\006\003\125\004\006\023\002\113\122\061
\\ \\ 046\\ 060\\ 044\\ 006\\ 003\\ 125\\ 004\\ 012\\ 014\\ 035\\ 116\\ 101\\ 126\\ 105\\ 122\\ 040
\102\125\123\111\116\105\123\123\040\120\114\101\124\106\117\122
\115\040\103\157\162\160\056\061\062\060\060\006\003\125\004\003
\\ \\014\\\\051\\\\116\\\\101\\\\126\\\\105\\\\122\\\\040\\\\107\\\\154\\\\157\\\\142\\\\141\\\\154\\\\040\\\\122
\157\157\164\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\151\061\013\060\011\006\003\125\004\006\023\002\113\122\061
```

**END** 

## CKA SERIAL NUMBER MULTILINE OCTAL

\002\024\001\224\060\036\242\013\335\365\305\063\052\261\103\104 \161\370\326\120\115\015

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\242\060\202\003\212\240\003\002\001\002\002\002\001 \120\115\015\060\015\006\011\052\206\110\206\367\015\001\001\014 \005\000\060\151\061\013\060\011\006\003\125\004\006\023\002\113 \122\040\102\125\123\111\116\105\123\123\040\120\114\101\124\106 \117\122\115\040\103\157\162\160\056\061\062\060\060\006\003\125  $\\ \\004\\ \\003\\ \\014\\ \\051\\ \\116\\ \\101\\ \\126\\ \\105\\ \\122\\ \\040\\ \\107\\ \\154\\ \\157\\ \\142\\ \\141\\ \\154$ \040\122\157\157\164\040\103\145\162\164\151\146\151\143\141\164 \151\157\156\040\101\165\164\150\157\162\151\164\171\060\036\027  $\label{eq:condition} $$ \0.05 \0.061 \0.070 \0.061 \0.070 \0.065 \0.070 \0.064 \0.062 \0.027 \0.05 \0.066$ \063\067\060\070\061\070\062\063\065\071\065\071\132\060\151\061 \013\060\011\006\003\125\004\006\023\002\113\122\061\046\060\044 \111\116\105\123\123\040\120\114\101\124\106\117\122\115\040\103  $\label{eq:condition} $$ \frac{157}{162}\frac{000056}{061}\frac{062}{060}\frac{000006}{003}\frac{125}{004}\frac{003}{014}\frac{116}{051}$$ \101\126\105\122\040\107\154\157\142\141\154\040\122\157\157\164 \040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101 \052\206\110\206\367\015\001\001\001\005\000\003\202\002\017\000 \060\202\002\012\002\202\002\001\000\266\324\361\223\134\265\100 \211\012\253\015\220\133\120\143\256\220\224\164\027\105\162\326 \173\145\132\051\113\247\126\240\113\270\057\102\165\351\331\173 \044\132\061\145\253\027\027\321\063\072\331\021\334\100\066\207 \337\307\152\351\046\136\131\212\167\343\350\110\234\061\026\372  $\label{eq:condition} $$ \076\221\261\312\311\243\342\237\316\041\123\243\002\066\060\313$ \122\002\345\332\062\135\303\305\346\371\356\021\307\213\311\104 \036\204\223\030\112\264\237\345\022\144\151\320\046\205\142\001 \266\311\002\035\276\203\121\273\134\332\370\255\025\152\231\367 \222\124\367\064\133\351\277\352\051\201\022\324\123\221\226\263 \221\132\335\376\220\163\050\373\060\106\265\312\010\007\307\161 \162\311\146\323\064\227\366\214\364\030\112\341\320\075\132\105 \266\151\247\051\373\043\316\210\330\022\234\000\110\250\246\017 \263\073\222\215\161\016\164\305\213\310\114\371\364\233\216\270 \074\151\355\157\073\120\057\130\355\304\260\320\034\033\152\014 \342\274\104\252\330\315\024\135\224\170\141\277\016\156\332\052

\274\057\014\013\161\246\263\026\077\234\346\371\314\237\123\065 \342\003\240\240\030\277\273\361\276\364\326\214\207\015\102\367 \006\271\361\155\355\004\224\250\376\266\323\006\306\100\141\337 \235\235\363\124\166\316\123\072\001\246\222\101\354\004\243\217 \015\242\325\011\312\326\313\232\361\357\103\135\300\253\245\101 \317\134\123\160\160\311\210\246\055\324\153\141\163\120\046\206 \141\016\137\033\302\053\342\214\325\273\235\301\003\102\272\224 \332\137\251\260\312\314\115\012\357\107\151\003\057\042\373\361  $\label{eq:condition} $$ \050\316\277\135\120\145\250\220\155\263\164\260\010\307\254\250 $$$ \321\353\076\234\374\135\032\203\056\053\313\265\363\104\235\072 \247\027\141\226\242\161\323\160\226\025\115\267\114\163\356\031 \134\305\133\076\101\376\254\165\140\073\033\143\316\000\335\332 \010\220\142\264\345\055\356\110\247\153\027\231\124\276\207\112 \343\251\136\004\114\353\020\155\124\326\357\361\350\362\142\026  $\label{eq:condition} $$ \frac{313}{200}153\\355\\075\\355\\365\\037\\060\\245\\256\\113\\311\\023\\355\\212$ \001\001\311\270\121\130\300\146\072\261\146\113\304\325\061\002 \142\351\164\204\014\333\115\106\055\002\003\001\000\001\243\102 \060\100\060\035\006\003\125\035\016\004\026\004\024\322\237\210 \337\241\315\054\275\354\365\073\001\001\223\063\047\262\353\140 \113\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001 \006\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001 \001\377\060\015\006\011\052\206\110\206\367\015\001\001\014\005  $\label{eq:condition} $$ \000\003\202\000\000\0062\312\200\263\235\075\124\006\335\322 $$$ \322\056\360\244\001\041\013\147\110\312\155\216\340\310\252\015 \252\215\041\127\217\306\076\172\312\333\121\324\122\263\324\226 \204\245\130\140\177\345\013\216\037\365\334\012\025\201\345\073 \266\267\042\057\011\234\023\026\261\154\014\065\010\155\253\143  $\label{eq:condition} $$ 162\355\334\276\354\307\127\346\060\040\161\326\327\020\301\023$ \125\001\214\052\103\344\101\361\317\072\172\123\222\316\242\003 \005\015\070\337\002\273\020\056\331\073\322\233\172\300\241\246  $\label{eq:condition} $$ 370 265 061 346 364 165 311 271 123 231 165 107 042 132 024 025$ \307\170\033\266\235\351\014\370\033\166\361\205\204\336\241\332 \022\357\244\342\020\227\172\170\336\014\121\227\250\041\100\213 \206\275\015\360\136\116\113\066\273\073\040\037\212\102\126\341 \013\032\277\173\320\042\103\054\104\214\373\345\052\264\154\034 \034\272\224\340\023\176\041\346\232\302\313\305\102\144\264\036 \224\173\010\045\310\161\314\207\105\127\205\323\237\051\142\042  $\label{eq:condition} $$ \203\121\227\000\030\227\167\152\230\222\311\174\140\154\337\154$$ \175\112\344\160\114\302\236\270\035\367\320\064\307\017\314\373 \247\377\003\276\255\160\220\332\013\335\310\155\227\137\232\177 \011\062\101\375\315\242\314\132\155\114\362\252\111\376\146\370 \351\330\065\353\016\050\036\356\110\057\072\320\171\011\070\174 \246\042\202\223\225\320\003\276\276\002\240\005\335\040\042\343 \157\035\210\064\140\306\346\012\271\011\165\013\360\007\350\151  $\label{eq:condition} $$ \226\065\307\373\043\201\216\070\071\270\105\053\103\170\242\321 $$$ \054\024\377\015\050\162\162\225\233\136\011\333\211\104\230\252 \241\111\273\161\122\362\277\366\377\047\241\066\257\270\266\167 \210\335\072\244\155\233\064\220\334\024\135\060\277\267\353\027

 $\label{eq:condition} $$ \frac{344\207\267\161\320\241\327\167\025\324\102\327\362\363\061\231\135\233\35\026\155\077\352\006\043\370\106\242\042\355\223\366\335\232\346\052\207\261\230\124\361\042\367\153\105\343\342\216\166\035\232\215\304\006\215\066\267\024\363\235\124\151\267\216\074\325\244\155\223\201\267\255\366\275\144\173\302\311\150\071\240\222\234\315\064\206\221\220\372\144\121\235\376\376\353\245\365\165\336\211\367\162$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "NAVER Global Root Certification Authority"
- # Issuer: CN=NAVER Global Root Certification Authority,O=NAVER BUSINESS PLATFORM Corp.,C=KR
- # Serial Number:01:94:30:1e:a2:0b:dd:f5:c5:33:2a:b1:43:44:71:f8:d6:50:4d:0d
- # Subject: CN=NAVER Global Root Certification Authority,O=NAVER BUSINESS PLATFORM Corp.,C=KR
- # Not Valid Before: Fri Aug 18 08:58:42 2017
- # Not Valid After: Tue Aug 18 23:59:59 2037
- # Fingerprint (SHA-256):
- 88:F4:38:DC:F8:FF:D1:FA:8F:42:91:15:FF:E5:F8:2A:E1:E0:6E:0C:70:C3:75:FA:AD:71:7B:34:A4:9E:72:65
- # Fingerprint (SHA1): 8F:6B:F2:A9:27:4A:DA:14:A0:C4:F4:8E:61:27:F9:C0:1E:78:5D:D1
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA PRIVATE CK BBOOL CK FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA LABEL UTF8 "NAVER Global Root Certification Authority"
- CKA CERT SHA1 HASH MULTILINE OCTAL
- \217\153\362\251\047\112\332\024\240\304\364\216\141\047\371\300

\036\170\135\321

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\310\176\101\366\045\073\365\011\263\027\350\106\075\277\320\233

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\151\061\013\060\011\006\003\125\004\006\023\002\113\122\061

\046\060\044\006\003\125\004\012\014\035\116\101\126\105\122\040

 $\label{eq:condition} $$ \frac{115\,040\,103\,157\,162\,160\,056\,061\,062\,060\,060\,006\,003\,125\,004\,003}{125\,004\,003\,125\,004\,003} $$$ 

 $\label{eq:condition} $$ \014\051\116\101\126\105\122\040\107\154\157\142\141\154\040\122$ 

\156\040\101\165\164\150\157\162\151\164\171

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\024\001\224\060\036\242\013\335\365\305\063\052\261\103\104$ 

 $\label{eq:condition} $$ 161\370\326\120\115\015$$ 

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

# CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

# Certificate "AC RAIZ FNMT-RCM SERVIDORES SEGUROS" # Issuer: CN=AC RAIZ FNMT-RCM SERVIDORES SEGUROS,OID.2.5.4.97=VATES-Q2826004J,OU=Ceres,O=FNMT-RCM,C=ES # Serial Number:62:f6:32:6c:e5:c4:e3:68:5c:1b:62:dd:9c:2e:9d:95 # Subject: CN=AC RAIZ FNMT-RCM SERVIDORES SEGUROS,OID.2.5.4.97=VATES-Q2826004J,OU=Ceres,O=FNMT-RCM,C=ES # Not Valid Before: Thu Dec 20 09:37:33 2018 # Not Valid After: Sun Dec 20 09:37:33 2043 # Fingerprint (SHA-256): 55:41:53:B1:3D:2C:F9:DD:B7:53:BF:BE:1A:4E:0A:E0:8D:0A:A4:18:70:58:FE:60:A2:B8:62:B2:E4:B8:7B:CB # Fingerprint (SHA1): 62:FF:D9:9E:C0:65:0D:03:CE:75:93:D2:ED:3F:2D:32:C9:E3:E5:4A CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE CKA TOKEN CK BBOOL CK TRUE CKA PRIVATE CK BBOOL CK FALSE CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE CKA LABEL UTF8 "AC RAIZ FNMT-RCM SERVIDORES SEGUROS" CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA\_SUBJECT MULTILINE\_OCTAL \060\170\061\013\060\011\006\003\125\004\006\023\002\105\123\061 \103\115\061\016\060\014\006\003\125\004\013\014\005\103\145\162 \145\163\061\030\060\026\006\003\125\004\141\014\017\126\101\124  $\label{eq:condition} $$ 105\123\055\121\062\070\062\066\060\060\064\112\061\054\060\052$$ \006\003\125\004\003\014\043\101\103\040\122\101\111\132\040\106 \116\115\124\055\122\103\115\040\123\105\122\126\111\104\117\122 \105\123\040\123\105\107\125\122\117\123 **END** CKA ID UTF8 "0" CKA ISSUER MULTILINE OCTAL \060\170\061\013\060\011\006\003\125\004\006\023\002\105\123\061 \021\060\017\006\003\125\004\012\014\010\106\116\115\124\055\122 \103\115\061\016\060\014\006\003\125\004\013\014\005\103\145\162 \145\163\061\030\060\026\006\003\125\004\141\014\017\126\101\124  $\label{eq:condition} $$ 105\123\055\121\062\070\062\066\060\060\064\112\061\054\060\052$$ \006\003\125\004\003\014\043\101\103\040\122\101\111\132\040\106 \116\115\124\055\122\103\115\040\123\105\122\126\111\104\117\122 \105\123\040\123\105\107\125\122\117\123 **END** CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL \002\020\142\366\062\154\345\304\343\150\134\033\142\335\234\056 \235\225

CKA\_VALUE MULTILINE\_OCTAL

**END** 

\060\202\002\156\060\202\001\363\240\003\002\001\002\002\002\142 \366\062\154\345\304\343\150\134\033\142\335\234\056\235\225\060 \012\006\010\052\206\110\316\075\004\003\003\060\170\061\013\060 \011\006\003\125\004\006\023\002\105\123\061\021\060\017\006\003 \125\004\012\014\010\106\116\115\124\055\122\103\115\061\016\060 \026\006\003\125\004\141\014\017\126\101\124\105\123\055\121\062 \070\062\066\060\060\064\112\061\054\060\052\006\003\125\004\003 \103\115\040\123\105\122\126\111\104\117\122\105\123\040\123\105 \107\125\122\117\123\060\036\027\015\061\070\061\062\062\060\060 \071\063\067\063\063\132\027\015\064\063\061\062\062\060\060\071 \063\067\063\063\132\060\170\061\013\060\011\006\003\125\004\006  $\label{eq:condition} $$ \023\02\105\123\061\021\060\017\006\003\125\004\012\014\010\106$ \116\115\124\055\122\103\115\061\016\060\014\006\003\125\004\013 \014\005\103\145\162\145\163\061\030\060\026\006\003\125\004\141 \112\061\054\060\052\006\003\125\004\003\014\043\101\103\040\122 \101\111\132\040\106\116\115\124\055\122\103\115\040\123\105\122 \166\060\020\006\007\052\206\110\316\075\002\001\006\005\053\201 \004\000\042\003\142\000\004\366\272\127\123\310\312\253\337\066  $\label{eq:local_substitution} $$ \frac{112\\122\\041\\344\\227\\322\\203\\147\\236\\360\\145\\121\\320\\136\\207\\307$ \107\261\131\362\127\107\233\000\002\223\104\027\151\333\102\307 \261\262\072\030\016\264\135\214\263\146\135\241\064\371\066\054 \111\333\363\106\374\263\104\151\104\023\146\375\327\305\375\257 \066\115\316\003\115\007\161\317\257\152\005\322\242\103\132\012  $\label{eq:local_$ \035\023\001\001\377\004\005\060\003\001\001\377\060\016\006\003 \125\035\017\001\001\377\004\004\003\002\001\006\060\035\006\003  $\label{eq:condition} $$ 125\035\016\004\026\004\024\001\271\057\357\277\021\206\140\362 $$$ \117\320\101\156\253\163\037\347\322\156\111\060\012\006\010\052 \206\110\316\075\004\003\003\003\151\000\060\146\002\061\000\256 \112\343\053\100\303\164\021\362\225\255\026\043\336\116\014\032 \346\135\245\044\136\153\104\173\374\070\342\117\313\234\105\027 \021\114\024\047\046\125\071\165\112\003\314\023\220\237\222\002 \061\000\372\112\154\140\210\163\363\356\270\230\142\251\316\053 \302\331\212\246\160\061\035\257\260\224\114\353\117\306\343\321  $\label{eq:condition} $$ 363\142\247\074\377\223\056\007\134\111\001\147\151\022\002\162$ \277\347

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "AC RAIZ FNMT-RCM SERVIDORES SEGUROS"

# Issuer: CN=AC RAIZ FNMT-RCM SERVIDORES SEGUROS,OID.2.5.4.97=VATES-O2826004J.OU=Ceres,O=FNMT-RCM,C=ES

```
# Subject: CN=AC RAIZ FNMT-RCM SERVIDORES SEGUROS,OID.2.5.4.97=VATES-
Q2826004J,OU=Ceres,O=FNMT-RCM,C=ES
# Not Valid Before: Thu Dec 20 09:37:33 2018
# Not Valid After: Sun Dec 20 09:37:33 2043
# Fingerprint (SHA-256):
55:41:53:B1:3D:2C:F9:DD:B7:53:BF:BE:1A:4E:0A:E0:8D:0A:A4:18:70:58:FE:60:A2:B8:62:B2:E4:B8:7B:CB
# Fingerprint (SHA1): 62:FF:D9:9E:C0:65:0D:03:CE:75:93:D2:ED:3F:2D:32:C9:E3:E5:4A
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "AC RAIZ FNMT-RCM SERVIDORES SEGUROS"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\142\377\331\236\300\145\015\003\316\165\223\322\355\077\055\062
\311\343\345\112
END
CKA CERT MD5 HASH MULTILINE OCTAL
\031\066\234\122\003\057\322\321\273\043\314\335\036\022\125\273
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\170\061\013\060\011\006\003\125\004\006\023\002\105\123\061 $$
\label{eq:condition} $$ \021\060\017\006\003\125\004\012\014\010\106\116\115\124\055\122 $$
\103\115\061\016\060\014\006\003\125\004\013\014\005\103\145\162
\145\163\061\030\060\026\006\003\125\004\141\014\017\126\101\124
\105\123\055\121\062\070\062\066\060\060\064\112\061\054\060\052
\006\003\125\004\003\014\043\101\103\040\122\101\111\132\040\106
\105\123\040\123\105\107\125\122\117\123
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\142\366\062\154\345\304\343\150\134\033\142\335\234\056
\235\225
END
{\tt CKA\_TRUST\_SERVER\_AUTH\ CK\_TRUST\ CKT\_NSS\_TRUSTED\_DELEGATOR}
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
#
# Certificate "GlobalSign Secure Mail Root R45"
# Issuer: CN=GlobalSign Secure Mail Root R45,O=GlobalSign nv-sa,C=BE
# Serial Number:76:53:fe:a8:4c:50:ab:9f:8d:32:b5:1d:03:8f:57:dc
# Subject: CN=GlobalSign Secure Mail Root R45,O=GlobalSign nv-sa,C=BE
# Not Valid Before: Wed Mar 18 00:00:00 2020
# Not Valid After: Sat Mar 18 00:00:00 2045
# Fingerprint (SHA-256):
```

# Serial Number:62:f6:32:6c:e5:c4:e3:68:5c:1b:62:dd:9c:2e:9d:95

31:9A:F0:A7:72:9E:6F:89:26:9C:13:1E:A6:A3:A1:6F:CD:86:38:9F:DC:AB:3C:47:A4:A6:75:C1:61:A3:F9:74

# Fingerprint (SHA1): 76:18:D1:F3:80:24:3D:52:40:C6:11:6A:AD:57:77:09:7D:81:30:A0

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA LABEL UTF8 "GlobalSign Secure Mail Root R45"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

**END** 

CKA ID UTF8 "0"

## CKA\_ISSUER MULTILINE\_OCTAL

**END** 

## CKA SERIAL NUMBER MULTILINE OCTAL

\002\020\166\123\376\250\114\120\253\237\215\062\265\035\003\217 \127\334

**END** 

## CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \0.060\202\005\160\060\202\003\130\240\003\002\001\002\002\002\0166$$ \123\376\250\114\120\253\237\215\062\265\035\003\217\127\334\060 \015\006\011\052\206\110\206\367\015\001\001\014\005\000\060\122 \061\013\060\011\006\003\125\004\006\023\002\102\105\061\031\060 \027\006\003\125\004\012\023\020\107\154\157\142\141\154\123\151 \147\156\040\156\166\055\163\141\061\050\060\046\006\003\125\004 \003\023\037\107\154\157\142\141\154\123\151\147\156\040\123\145 \143\165\162\145\040\115\141\151\154\040\122\157\157\164\040\122 \060\060\132\027\015\064\065\060\063\061\070\060\060\060\060\060 \060\132\060\122\061\013\060\011\006\003\125\004\006\023\002\102 \141\154\123\151\147\156\040\156\166\055\163\141\061\050\060\046 \006\003\125\004\003\023\037\107\154\157\142\141\154\123\151\147 \156\040\123\145\143\165\162\145\040\115\141\151\154\040\122\157 \157\164\040\122\064\065\060\202\002\042\060\015\006\011\052\206 \110\206\367\015\001\001\001\005\000\003\202\002\017\000\060\202 \002\012\002\202\002\001\000\334\171\314\155\006\371\155\273\340

\126\004\154\177\340\165\314\055\005\111\350\113\334\124\354\133 \167\225\162\277\177\142\235\205\251\212\044\120\137\123\345\333 \164\157\244\051\133\023\052\011\255\232\305\057\302\367\166\073 \241\105\106\252\103\346\044\376\053\260\157\062\160\031\106\132 \171\046\057\374\075\175\137\144\313\127\314\141\141\250\331\225 \156\343\225\240\156\177\107\022\030\326\357\003\311\373\212\372 \232\275\202\025\251\125\167\113\021\117\131\340\153\303\161\363 \014\330\124\325\201\150\076\023\271\025\056\207\212\074\104\047  $\label{eq:condition} $$ \066\142\044\156\370\054\005\162\060\141\275\102\221\043\304\235 $$$ \045\247\331\124\232\024\243\061\255\200\171\014\247\143\154\230 \243\254\127\107\063\037\145\226\341\320\322\065\332\371\161\367 \241\246\045\265\101\135\337\076\140\330\321\366\237\245\362\270 \314\023\252\217\371\262\156\341\203\055\223\335\076\205\032\335 \350\261\134\046\001\313\111\205\374\374\322\324\177\205\142\206  $\label{eq:condition} $$ 164\371\313\354\065\042\242\014\060\217\073\253\171\353\126\362$ \372\102\363\355\371\037\105\211\100\051\255\352\222\164\352\122 \375\126\264\053\332\242\355\165\302\156\253\316\122\220\113\366 \336\360\111\217\232\110\324\210\031\155\105\346\314\214\271\335 \144\140\140\002\100\370\271\317\274\130\353\075\205\271\306\012  $\label{eq:condition} $$ 323\234\007\146\217\307\030\071\043\106\341\074\036\243\057\120 $$$ \141\222\013\075\053\154\361\243\107\070\127\221\253\015\217\306 \235\115\004\322\046\122\134\345\245\375\052\055\026\052\001\151  $\label{eq:condition} $$ 347\251\175\341\066\267\261\052\305\331\261\215\275\271\213\316$$ \314\213\241\076\013\110\315\120\225\064\304\330\010\131\330\153 \046\364\276\365\324\042\027\000\127\311\256\233\004\060\063\237 \013\373\337\126\242\311\156\124\166\332\261\227\142\047\131\017 \021\212\042\033\144\226\077\250\361\267\044\112\215\074\123\174 \155\203\166\075\262\046\110\163\365\104\026\001\055\011\052\216 \026\226\120\320\163\006\135\273\042\110\202\114\012\106\132\077 \200\377\134\362\362\232\254\054\010\340\326\352\360\022\070\201  $\label{eq:condition} $$ \frac{117}246\\020\\355\\106\\253\\314\\026\\234\\013\\317\\144\\246\\231\\002\\205$ \104\147\106\255\375\115\347\002\003\001\000\001\243\102\060\100 \060\016\006\003\125\035\017\001\001\377\004\004\003\002\001\206 \060\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001 \377\060\035\006\003\125\035\016\004\026\004\024\240\223\025\050 \156\356\217\010\262\065\306\236\142\171\164\247\261\016\053\173 \060\015\006\011\052\206\110\206\367\015\001\001\014\005\000\003 \202\002\001\000\105\012\370\321\134\254\142\201\320\004\327\266 \377\127\121\211\013\014\313\336\044\145\067\373\253\236\355\146 \364\352\014\031\151\211\270\031\261\060\126\264\331\366\367\276 \306\256\227\313\105\366\021\214\072\060\144\114\301\237\131\300  $\label{eq:condition} $$ 106\102\010\006\107\144\027\170\340\225\007\006\326\214\242\254$ \251\331\077\323\173\126\117\374\304\207\050\337\266\053\026\043 \300\237\037\133\343\326\104\136\042\117\043\004\214\065\026\265 \171\007\206\134\057\227\342\366\010\144\246\334\333\250\212\343 \244\173\167\015\321\051\223\050\040\264\123\243\113\116\137\336 \301\366\165\043\374\037\074\170\117\160\061\170\057\242\065\124 \161\004\254\310\304\155\303\366\221\261\376\315\356\104\156\201

\366\100\305\076\052\001\277\253\114\261\003\077\015\021\344\017 \322\044\343\042\210\233\237\137\107\075\121\111\340\011\067\176 \027\041\061\166\267\147\161\110\050\113\045\327\020\350\237\141  $\label{eq:condition} $$ 131\026\305\076\062\116\037\014\316\243\314\017\344\307\021\007$  $\label{eq:condition} $$ \042\057\070\010\335\133\227\353\102\154\131\232\232\356\172\320$ \235\337\305\333\011\103\056\012\252\031\075\153\350\152\060\172 \127\346\277\263\152\071\251\217\343\361\117\145\150\266\275\237  $\label{eq:condition} $$ \050\217\241\026\132\011\120\072\062\056\035\057\104\021\102\246 $$$ \000\346\061\230\377\055\241\017\346\244\140\126\317\171\327\262 \116\327\260\372\156\014\127\043\307\316\037\245\261\114\155\031  $\label{eq:condition} $$ \frac{111}236\\016\\177\\160\\217\\161\\077\\130\\050\\237\\165\\335\\141\\340\\072$  $\label{eq:condition} $$ \267\071\266\356\227\324\065\121\373\213\111\140\310\074\146\256$$ \227\356\215\046\131\127\273\170\360\172\120\060\011\260\140\252 \237\116\334\311\076\036\072\334\142\223\063\260\072\124\164\157  $\label{eq:condition} $$ \054\061\105\321\153\021\062\152\150\166\366\075\366\152\023\136$ \044\230\347\352\035\232\317\170\202\007\140\367\115\020\323\201 \232\105\215\236\257\233\334\200\307\103\262\225\150\244\303\016 \350\012\107\025\277\124\063\334\001\347\325\246\036\163\330\172 \262\277\057\255\343\125\060\236\337\016\101\274\340\021\365\241  $\label{eq:condition} $$ \014\250\042\341\343\000\243\116\160\174\222\343\004\321\172\102$ \212\165\220\131\343\233\321\114\242\144\275\163\171\233\157\362 \263\301\366\074

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "GlobalSign Secure Mail Root R45"
- # Issuer: CN=GlobalSign Secure Mail Root R45,O=GlobalSign nv-sa,C=BE
- # Serial Number:76:53:fe:a8:4c:50:ab:9f:8d:32:b5:1d:03:8f:57:dc
- # Subject: CN=GlobalSign Secure Mail Root R45,O=GlobalSign nv-sa,C=BE
- # Not Valid Before: Wed Mar 18 00:00:00 2020
- # Not Valid After : Sat Mar 18 00:00:00 2045
- # Fingerprint (SHA-256):
- 31:9A:F0:A7:72:9E:6F:89:26:9C:13:1E:A6:A3:A1:6F:CD:86:38:9F:DC:AB:3C:47:A4:A6:75:C1:61:A3:F9:74
- # Fingerprint (SHA1): 76:18:D1:F3:80:24:3D:52:40:C6:11:6A:AD:57:77:09:7D:81:30:A0

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "GlobalSign Secure Mail Root R45"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\166\030\321\363\200\044\075\122\100\306\021\152\255\127\167\011 \175\201\060\240

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\223\304\173\263\016\124\107\034\103\054\213\276\160\205\142\051

**END** 

```
CKA ISSUER MULTILINE OCTAL
\060\122\061\013\060\011\006\003\125\004\006\023\002\102\105\061
\031\060\027\006\003\125\004\012\023\020\107\154\157\142\141\154
\123\151\147\156\040\156\166\055\163\141\061\050\060\046\006\003
\125\004\003\023\037\107\154\157\142\141\154\123\151\147\156\040
\123\145\143\165\162\145\040\115\141\151\154\040\122\157\157\164
\040\122\064\065
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\166\123\376\250\114\120\253\237\215\062\265\035\003\217
\127\334
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
#
# Certificate "GlobalSign Secure Mail Root E45"
# Issuer: CN=GlobalSign Secure Mail Root E45,O=GlobalSign nv-sa,C=BE
# Serial Number:76:53:fe:aa:27:1d:95:46:5d:d6:f1:9e:e5:b8:90:0a
# Subject: CN=GlobalSign Secure Mail Root E45,O=GlobalSign nv-sa,C=BE
# Not Valid Before: Wed Mar 18 00:00:00 2020
# Not Valid After: Sat Mar 18 00:00:00 2045
# Fingerprint (SHA-256):
5C:BF:6F:B8:1F:D4:17:EA:41:28:CD:6F:81:72:A3:C9:40:20:94:F7:4A:B2:ED:3A:06:B4:40:5D:04:F3:0B:19
# Fingerprint (SHA1): 18:2E:1F:32:4F:89:DF:BE:FE:88:89:F0:93:C2:C4:A0:2B:67:75:21
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "GlobalSign Secure Mail Root E45"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA SUBJECT MULTILINE OCTAL
\060\122\061\013\060\011\006\003\125\004\006\023\002\102\105\061
\031\060\027\006\003\125\004\012\023\020\107\154\157\142\141\154
\123\151\147\156\040\156\166\055\163\141\061\050\060\046\006\003
\label{eq:condition} $$ 125\004\003\023\037\107\154\157\142\141\154\123\151\147\156\040 $$
\123\145\143\165\162\145\040\115\141\151\154\040\122\157\157\164
\040\105\064\065
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\122\061\013\060\011\006\003\125\004\006\023\002\102\105\061
\031\060\027\006\003\125\004\012\023\020\107\154\157\142\141\154
\123\151\147\156\040\156\166\055\163\141\061\050\060\046\006\003
```

\125\004\003\023\037\107\154\157\142\141\154\123\151\147\156\040

\123\145\143\165\162\145\040\115\141\151\154\040\122\157\157\164\040\105\064\065

**END** 

## CKA SERIAL NUMBER MULTILINE OCTAL

\002\020\166\123\376\252\047\035\225\106\135\326\361\236\345\270 \220\012

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

\060\202\002\041\060\202\001\247\240\003\002\001\002\002\020\166 \123\376\252\047\035\225\106\135\326\361\236\345\270\220\012\060 \012\006\010\052\206\110\316\075\004\003\003\060\122\061\013\060 \125\004\012\023\020\107\154\157\142\141\154\123\151\147\156\040 \156\166\055\163\141\061\050\060\046\006\003\125\004\003\023\037  $\label{eq:local_$ \145\040\115\141\151\154\040\122\157\157\164\040\105\064\065\060  $\label{eq:condition} $$ \0.036\0.027\0.015\0.060\0.0$ \027\015\064\065\060\063\061\070\060\060\060\060\060\060\060\132\060 \122\061\013\060\011\006\003\125\004\006\023\002\102\105\061\031 \151\147\156\040\156\166\055\163\141\061\050\060\046\006\003\125 \004\003\023\037\107\154\157\142\141\154\123\151\147\156\040\123 \145\143\165\162\145\040\115\141\151\154\040\122\157\157\164\040 \105\064\065\060\166\060\020\006\007\052\206\110\316\075\002\001 \006\005\053\201\004\000\042\003\142\000\004\371\171\213\201\107 \067\211\226\077\105\111\120\177\032\046\013\223\062\176\056\300 \300\247\010\232\303\156\217\233\076\013\042\354\067\123\267\157 \212\260\274\047\067\113\155\251\106\073\331\037\377\245\241\104 \273\055\163\277\236\101\007\134\123\233\121\010\072\132\273\157 \070\307\026\221\170\302\112\023\151\035\202\337\132\057\000\210  $\label{eq:condition} $$ \226\242\056\034\164\371\235\176\146\067\212\243\102\060\100\060$$ \016\006\003\125\035\017\001\001\377\004\004\003\002\001\206\060 \017\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377 \060\035\006\003\125\035\016\004\026\004\024\337\023\136\213\137 \302\100\002\375\126\267\224\114\266\036\325\246\261\024\226\060 \012\006\010\052\206\110\316\075\004\003\003\003\150\000\060\145 \002\060\023\260\276\327\161\040\076\344\253\234\316\066\022\175  $\label{eq:condition} $$137\114\037\052\265\151\105\063\137\323\055\132\262\344\210\307$  $\label{eq:condition} $$ \36\012\066\102\062\171\235\246\153\272\341\371\104\052\173\212 $$$ \303\022\002\061\000\240\146\034\116\207\235\207\311\355\231\114 \033\012\356\055\140\303\067\307\035\315\265\162\260\331\306\357 \274\362\377\077\360\122\335\010\347\252\144\171\303\344\151\127 \221\057\244\313\174

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Issuer: CN=GlobalSign Secure Mail Root E45,O=GlobalSign nv-sa,C=BE
# Serial Number:76:53:fe:aa:27:1d:95:46:5d:d6:f1:9e:e5:b8:90:0a
# Subject: CN=GlobalSign Secure Mail Root E45,O=GlobalSign nv-sa,C=BE
# Not Valid Before: Wed Mar 18 00:00:00 2020
# Not Valid After: Sat Mar 18 00:00:00 2045
# Fingerprint (SHA-256):
5C:BF:6F:B8:1F:D4:17:EA:41:28:CD:6F:81:72:A3:C9:40:20:94:F7:4A:B2:ED:3A:06:B4:40:5D:04:F3:0B:19
# Fingerprint (SHA1): 18:2E:1F:32:4F:89:DF:BE:FE:88:89:F0:93:C2:C4:A0:2B:67:75:21
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "GlobalSign Secure Mail Root E45"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\030\056\037\062\117\211\337\276\376\210\211\360\223\302\304\240
\053\147\165\041
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\305\374\306\056\237\364\122\055\052\250\244\272\373\147\062\377
END
CKA_ISSUER MULTILINE_OCTAL
\label{eq:condition} $$ \060\122\061\013\060\011\006\003\125\004\006\023\002\102\105\061 $$
\031\060\027\006\003\125\004\012\023\020\107\154\157\142\141\154
\123\151\147\156\040\156\166\055\163\141\061\050\060\046\006\003
\125\004\003\023\037\107\154\157\142\141\154\123\151\147\156\040
\123\145\143\165\162\145\040\115\141\151\154\040\122\157\157\164
\040\105\064\065
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \002\020\166\123\376\252\047\035\225\106\135\326\361\236\345\270 $$
\220\012
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "GlobalSign Root R46"
# Issuer: CN=GlobalSign Root R46,O=GlobalSign nv-sa,C=BE
# Serial Number:11:d2:bb:b9:d7:23:18:9e:40:5f:0a:9d:2d:d0:df:25:67:d1
# Subject: CN=GlobalSign Root R46,O=GlobalSign nv-sa,C=BE
# Not Valid Before: Wed Mar 20 00:00:00 2019
# Not Valid After: Tue Mar 20 00:00:00 2046
# Fingerprint (SHA-256):
4F:A3:12:6D:8D:3A:11:D1:C4:85:5A:4F:80:7C:BA:D6:CF:91:9D:3A:5A:88:B0:3B:EA:2C:63:72:D9:3C:40:C9
```

# Trust for "GlobalSign Secure Mail Root E45"

# Fingerprint (SHA1): 53:A2:B0:4B:CA:6B:D6:45:E6:39:8A:8E:C4:0D:D2:BF:77:C3:A2:90

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "GlobalSign Root R46"

CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509

CKA\_SUBJECT MULTILINE\_OCTAL

\060\106\061\013\060\011\006\003\125\004\006\023\002\102\105\061 \\031\060\027\006\003\125\004\012\023\020\107\154\157\142\141\154 \\123\151\147\156\040\156\166\055\163\141\061\034\060\032\006\003 \\125\004\003\023\023\107\154\157\142\141\154\123\151\147\156\040 \\122\157\157\164\040\122\064\066

**END** 

CKA ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

\060\106\061\013\060\011\006\003\125\004\006\023\002\102\105\061 \\031\060\027\006\003\125\004\012\023\020\107\154\157\142\141\154 \\123\151\147\156\040\156\166\055\163\141\061\034\060\032\006\003 \\125\004\003\023\023\107\154\157\142\141\154\123\151\147\156\040 \\122\157\157\164\040\122\064\066

**END** 

### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\021\322\273\271\327\043\030\236\100\137\012\235\055\320\337\045\147\321$ 

**END** 

#### CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \060\202\005\132\060\202\003\102\240\003\002\001\002\002\022\021$ \322\273\271\327\043\030\236\100\137\012\235\055\320\337\045\147 \321\060\015\006\011\052\206\110\206\367\015\001\001\014\005\000  $\label{eq:condition} $$ \060\106\061\013\060\011\006\003\125\004\006\023\002\102\105\061 $$$ \031\060\027\006\003\125\004\012\023\020\107\154\157\142\141\154 \123\151\147\156\040\156\166\055\163\141\061\034\060\032\006\003 \125\004\003\023\023\107\154\157\142\141\154\123\151\147\156\040 \122\157\157\164\040\122\064\066\060\036\027\015\061\071\060\063 \062\060\060\060\060\060\060\060\060\132\027\015\064\066\060\063\062  $\label{eq:condition} $$ \0.060\0.0$ \125\004\006\023\002\102\105\061\031\060\027\006\003\125\004\012  $\label{eq:condition} $$ \023\020\107\154\157\142\141\154\123\151\147\156\040\156\166\055$$ \163\141\061\034\060\032\006\003\125\004\003\023\023\107\154\157 \142\141\154\123\151\147\156\040\122\157\157\164\040\122\064\066  $\label{eq:condition} $$ \0.060\202\0.042\0.060\0.15\0.006\0.11\0.052\2.06\1.10\2.06\3.67\0.15\0.01\0.01 $$$ \001\005\000\003\202\002\017\000\060\202\002\012\002\202\002\001 \000\254\254\164\062\350\263\145\345\272\355\103\046\035\246\211 \015\105\272\051\210\262\244\035\143\335\323\301\054\011\127\211 \071\241\125\351\147\064\167\014\156\344\125\035\122\045\322\023 \153\136\341\035\251\267\175\211\062\137\015\236\237\054\172\143 \140\100\037\246\260\266\170\217\231\124\226\010\130\256\344\006

\274\142\005\002\026\277\257\250\043\003\266\224\017\274\156\154 \302\313\325\246\273\014\351\366\301\002\373\041\336\146\335\027 \253\164\102\357\360\164\057\045\364\352\153\125\133\220\333\235 \337\136\207\012\100\373\255\031\153\373\367\312\140\210\336\332 \301\217\326\256\325\177\324\074\203\356\327\026\114\203\105\063 \153\047\320\206\320\034\055\153\363\253\175\361\205\251\365\050 \322\255\357\363\204\113\034\207\374\023\243\072\162\242\132\021 \053\326\047\161\047\355\201\055\155\146\201\222\207\264\033\130 \172\314\077\012\372\106\117\115\170\134\370\053\110\343\004\204 \313\135\366\264\152\263\145\374\102\236\121\046\043\040\313\075  $\label{eq:condition} $$ \024\371\201\355\145\026\000\117\032\144\227\146\010\317\214\173$ \343\053\300\235\371\024\362\033\361\126\152\026\277\054\205\205 \315\170\070\232\353\102\152\002\064\030\203\027\116\224\126\370 \266\202\265\363\226\335\075\363\276\177\040\167\076\173\031\043 \153\054\324\162\163\103\127\175\340\370\327\151\117\027\066\004 \371\300\220\140\067\105\336\346\014\330\164\215\256\234\242\155 \164\135\102\276\006\365\331\144\156\002\020\254\211\260\114\073 \007\115\100\176\044\305\212\230\202\171\216\244\247\202\040\215 \043\372\047\161\311\337\306\101\164\240\115\366\221\026\334\106 \214\137\051\143\061\131\161\014\330\157\302\266\062\175\373\346 \135\123\246\176\025\374\273\165\174\135\354\370\366\027\034\354 \307\153\031\313\363\173\360\053\007\245\331\154\171\124\166\154 \235\034\246\156\016\351\171\014\250\043\152\243\337\033\060\061 \237\261\124\173\376\152\313\146\252\334\145\320\242\236\112\232 \007\041\153\201\217\333\304\131\372\336\042\300\004\234\343\252 \133\066\223\350\075\275\172\241\235\013\166\261\013\307\235\375 \317\230\250\006\302\370\052\243\241\203\240\267\045\162\245\002 \343\002\003\001\000\001\243\102\060\100\060\016\006\003\125\035 \017\001\001\377\004\004\003\002\001\206\060\017\006\003\125\035 \023\001\001\377\004\005\060\003\001\001\377\060\035\006\003\125  $\label{eq:condition} $$ \035\016\004\026\004\024\003\134\253\163\201\207\250\314\260\246 $$$ \325\224\342\066\226\111\377\005\231\054\060\015\006\011\052\206 \110\206\367\015\001\001\014\005\000\003\202\002\001\000\174\170 \354\366\002\054\273\133\176\222\053\135\071\334\276\330\035\242 \102\063\115\371\357\244\052\073\104\151\036\254\331\105\243\116 \074\247\330\044\121\262\124\034\223\116\304\357\173\223\205\140 \046\352\011\110\340\365\273\307\351\150\322\273\152\061\161\314 \171\256\021\250\360\231\375\345\037\274\057\250\314\127\353\166 \304\041\246\107\123\125\115\150\277\005\244\356\327\046\253\142 \332\103\067\113\342\306\265\345\262\203\031\072\307\323\333\115 \236\010\172\363\356\317\076\142\373\254\350\140\314\321\307\241 \134\203\105\304\105\314\363\027\153\024\311\004\002\076\322\044 \246\171\351\036\316\242\347\301\131\025\237\035\342\113\232\076 \237\166\010\055\153\330\272\127\024\332\203\352\376\214\125\351 \320\116\251\314\167\061\261\104\021\172\134\261\076\323\024\105 \025\030\142\044\023\322\313\115\316\134\203\301\066\362\020\265 \016\210\155\270\341\126\237\211\336\226\146\071\107\144\054\156 \115\256\142\173\277\140\164\031\270\126\254\222\254\026\062\355

\255\150\125\376\230\272\323\064\336\364\311\141\303\016\206\366 \113\204\140\356\015\173\265\062\130\171\221\125\054\201\103\263 \164\037\172\252\045\236\035\327\241\213\271\315\102\056\004\244 \146\203\115\211\065\266\154\250\066\112\171\041\170\042\320\102 \274\321\100\061\220\241\276\004\317\312\147\355\365\360\200\323 \140\311\203\052\042\005\320\007\073\122\277\014\236\252\053\371 \273\346\037\217\045\272\205\215\027\036\002\376\135\120\004\127 \317\376\055\274\357\134\300\032\253\266\237\044\306\337\163\150 \110\220\054\024\364\077\122\032\344\322\313\024\303\141\151\317 \342\371\030\305\272\063\237\024\243\004\135\271\161\367\265\224 \330\366\063\301\132\301\064\213\174\233\335\223\072\347\023\242 \160\141\237\257\217\353\330\305\165\370\063\146\324\164\147\072 \067\167\234\347\335\244\017\166\103\146\212\103\362\237\373\014  $\label{eq:condition} $$ 102\170\143\321\342\017\157\173\324\241\075\164\227\205\267\110 $$$  $\label{eq:condition} $$ \071\101\326\040\374\320\072\263\372\350\157\304\212\272\161\067 $$$ \276\213\227\261\170\061\117\263\347\266\003\023\316\124\235\256 \045\131\314\177\065\137\010\367\100\105\061\170\052\172

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "GlobalSign Root R46"
- # Issuer: CN=GlobalSign Root R46,O=GlobalSign nv-sa,C=BE
- # Serial Number:11:d2:bb:b9:d7:23:18:9e:40:5f:0a:9d:2d:d0:df:25:67:d1
- # Subject: CN=GlobalSign Root R46,O=GlobalSign nv-sa,C=BE
- # Not Valid Before: Wed Mar 20 00:00:00 2019
- # Not Valid After : Tue Mar 20 00:00:00 2046
- # Fingerprint (SHA-256):
- 4F:A3:12:6D:8D:3A:11:D1:C4:85:5A:4F:80:7C:BA:D6:CF:91:9D:3A:5A:88:B0:3B:EA:2C:63:72:D9:3C:40:C9
- # Fingerprint (SHA1): 53:A2:B0:4B:CA:6B:D6:45:E6:39:8A:8E:C4:0D:D2:BF:77:C3:A2:90

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "GlobalSign Root R46"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\123\242\260\113\312\153\326\105\346\071\212\216\304\015\322\277\167\303\242\220

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \304\024\060\344\372\146\103\224\052\152\033\044\137\031\320\357$ END$ 

CKA\_ISSUER MULTILINE\_OCTAL

```
\122\157\157\164\040\122\064\066
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \002\021\322\273\271\327\043\030\236\100\137\012\235\055\320 $$
\337\045\147\321
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
#
# Certificate "GlobalSign Root E46"
# Issuer: CN=GlobalSign Root E46,O=GlobalSign nv-sa,C=BE
# Serial Number:11:d2:bb:ba:33:6e:d4:bc:e6:24:68:c5:0d:84:1d:98:e8:43
# Subject: CN=GlobalSign Root E46,O=GlobalSign nv-sa,C=BE
# Not Valid Before: Wed Mar 20 00:00:00 2019
# Not Valid After: Tue Mar 20 00:00:00 2046
# Fingerprint (SHA-256):
CB:B9:C4:4D:84:B8:04:3E:10:50:EA:31:A6:9F:51:49:55:D7:BF:D2:E2:C6:B4:93:01:01:9A:D6:1D:9F:50:58
# Fingerprint (SHA1): 39:B4:6C:D5:FE:80:06:EB:E2:2F:4A:BB:08:33:A0:AF:DB:B9:DD:84
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "GlobalSign Root E46"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\106\061\013\060\011\006\003\125\004\006\023\002\102\105\061
\label{eq:condition} $$ \031\060\027\006\003\125\004\012\023\020\107\154\157\142\141\154
\123\151\147\156\040\156\166\055\163\141\061\034\060\032\006\003
\125\004\003\023\023\107\154\157\142\141\154\123\151\147\156\040
\122\157\157\164\040\105\064\066
END
CKA ID UTF8 "0"
CKA ISSUER MULTILINE OCTAL
\060\106\061\013\060\011\006\003\125\004\006\023\002\102\105\061
\label{eq:condition} $$ \031\060\027\006\003\125\004\012\023\020\107\154\157\142\141\154
\123\151\147\156\040\156\166\055\163\141\061\034\060\032\006\003
\125\004\003\023\023\107\154\157\142\141\154\123\151\147\156\040
\122\157\157\164\040\105\064\066
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\022\021\322\273\272\063\156\324\274\346\044\150\305\015\204
\035\230\350\103
END
CKA_VALUE MULTILINE_OCTAL
```

\060\202\002\013\060\202\001\221\240\003\002\001\002\002\022\021 \322\273\272\063\156\324\274\346\044\150\305\015\204\035\230\350 \103\060\012\006\010\052\206\110\316\075\004\003\003\060\106\061 \013\060\011\006\003\125\004\006\023\002\102\105\061\031\060\027 \006\003\125\004\012\023\020\107\154\157\142\141\154\123\151\147 \156\040\156\166\055\163\141\061\034\060\032\006\003\125\004\003 \023\023\107\154\157\142\141\154\123\151\147\156\040\122\157\157 \164\040\105\064\066\060\036\027\015\061\071\060\063\062\060\060 \060\060\060\060\132\060\106\061\013\060\011\006\003\125\004\006  $\label{eq:condition} $$ \023\02\102\105\061\031\060\027\006\003\125\004\012\023\020\107 $$$  $\label{eq:condition} $$ \frac{154\\157\\142\\141\\154\\123\\151\\147\\156\\040\\156\\166\\055\\163\\141\\061$ \034\060\032\006\003\125\004\003\023\023\107\154\157\142\141\154 \123\151\147\156\040\122\157\157\164\040\105\064\066\060\166\060  $\label{eq:condition} $$ \020\006\007\052\206\110\316\075\002\001\006\005\053\201\004\000 $$$ \042\003\142\000\004\234\016\261\317\267\350\236\122\167\165\064 \372\245\106\247\255\062\031\062\264\007\251\047\312\224\273\014 \322\012\020\307\332\211\260\227\014\160\023\011\001\216\330\352 \107\352\276\262\200\053\315\374\050\015\333\254\274\244\206\067 \355\160\010\000\165\352\223\013\173\056\122\234\043\150\043\006 \103\354\222\057\123\204\333\373\107\024\007\350\137\224\147\135 \311\172\201\074\040\243\102\060\100\060\016\006\003\125\035\017  $\label{eq:condition} $$ \001\001\377\004\004\003\002\001\206\060\017\006\003\125\035\023$ \001\001\377\004\005\060\003\001\001\377\060\035\006\003\125\035  $\label{eq:condition} $$ \0.004\0.26\0.04\0.24\0.61\0.12\2.20\2.17\2.66\3.06\2.35\3.22\1.04\1.13\2.00 $$$ \265\242\346\037\261\022\117\033\225\060\012\006\010\052\206\110 \316\075\004\003\003\003\150\000\060\145\002\061\000\337\124\220 \355\233\357\213\224\002\223\027\202\231\276\263\236\054\366\013 \221\214\237\112\024\261\366\144\274\273\150\121\023\014\003\367 \025\213\204\140\271\213\377\122\216\347\214\274\034\002\060\074 \371\021\324\214\116\300\301\141\302\025\114\252\253\035\013\061 \137\073\034\342\000\227\104\061\346\376\163\226\057\332\226\323 \376\010\007\263\064\211\274\005\237\367\036\206\356\213\160 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "GlobalSign Root E46"
```

 $<sup>\#\</sup> Issuer:\ CN=GlobalSign\ Root\ E46,O=GlobalSign\ nv-sa,C=BE$ 

<sup>#</sup> Serial Number:11:d2:bb:ba:33:6e:d4:bc:e6:24:68:c5:0d:84:1d:98:e8:43

<sup>#</sup> Subject: CN=GlobalSign Root E46,O=GlobalSign nv-sa,C=BE

<sup>#</sup> Not Valid Before: Wed Mar 20 00:00:00 2019

<sup>#</sup> Not Valid After: Tue Mar 20 00:00:00 2046

<sup>#</sup> Fingerprint (SHA-256):

CB:B9:C4:4D:84:B8:04:3E:10:50:EA:31:A6:9F:51:49:55:D7:BF:D2:E2:C6:B4:93:01:01:9A:D6:1D:9F:50:58

<sup>#</sup> Fingerprint (SHA1): 39:B4:6C:D5:FE:80:06:EB:E2:2F:4A:BB:08:33:A0:AF:DB:B9:DD:84

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

```
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GlobalSign Root E46"
CKA CERT SHA1 HASH MULTILINE OCTAL
\label{eq:condition} $$ \071\264\154\325\376\200\006\353\342\057\112\273\010\063\240\257\
\333\271\335\204
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\265\270\146\355\336\010\203\343\311\342\001\064\006\254\121\157
END
CKA_ISSUER MULTILINE_OCTAL
\060\106\061\013\060\011\006\003\125\004\006\023\002\102\105\061
\label{eq:condition} $$ \031\060\027\006\003\125\004\012\023\020\107\154\157\142\141\154
\123\151\147\156\040\156\166\055\163\141\061\034\060\032\006\003
\125\004\003\023\023\107\154\157\142\141\154\123\151\147\156\040
\122\157\157\164\040\105\064\066
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\label{eq:condition} $$ \002\021\322\273\272\063\156\324\274\346\044\150\305\015\204 $$
\035\230\350\103
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "GLOBALTRUST 2020"
# Issuer: CN=GLOBALTRUST 2020,O=e-commerce monitoring GmbH,C=AT
# Serial Number:5a:4b:bd:5a:fb:4f:8a:5b:fa:65:e5
# Subject: CN=GLOBALTRUST 2020,O=e-commerce monitoring GmbH,C=AT
# Not Valid Before: Mon Feb 10 00:00:00 2020
# Not Valid After: Sun Jun 10 00:00:00 2040
# Fingerprint (SHA-256):
9A:29:6A:51:82:D1:D4:51:A2:E3:7F:43:9B:74:DA:AF:A2:67:52:33:29:F9:0F:9A:0D:20:07:C3:34:E2:3C:9A
# Fingerprint (SHA1): D0:67:C1:13:51:01:0C:AA:D0:C7:6A:65:37:31:16:26:4F:53:71:A2
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GLOBALTRUST 2020"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\115\061\013\060\011\006\003\125\004\006\023\002\101\124\061
\043\060\041\006\003\125\004\012\023\032\145\055\143\157\155\155
\145\162\143\145\040\155\157\156\151\164\157\162\151\156\147\040
```

CKA TOKEN CK BBOOL CK TRUE

\107\155\142\110\061\031\060\027\006\003\125\004\003\023\020\107 \114\117\102\101\114\124\122\125\123\124\040\062\060\062\060 END

CKA ID UTF8 "0"

#### CKA\_ISSUER MULTILINE\_OCTAL

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\\ \\002\\ \\013\\ \\132\\ \\113\\ \\275\\ \\132\\ \\373\\ \\117\\ \\212\\ \\133\\ \\372\\ \\145\\ \\345$ 

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\202\060\202\003\152\240\003\002\001\002\002\013\132 \113\275\132\373\117\212\133\372\145\345\060\015\006\011\052\206 \110\206\367\015\001\001\013\005\000\060\115\061\013\060\011\006 \003\125\004\006\023\002\101\124\061\043\060\041\006\003\125\004  $\label{eq:condition} $$ \0.012\0.03\0.032\1.45\0.055\1.43\1.57\1.55\1.45\1.62\1.43\1.45\0.40\1.55\1.57$ \156\151\164\157\162\151\156\147\040\107\155\142\110\061\031\060 \027\006\003\125\004\003\023\020\107\114\117\102\101\114\124\122 \125\123\124\040\062\060\062\060\060\036\027\015\062\060\060\062 \061\060\060\060\060\060\060\060\060\132\027\015\064\060\060\066\061 \060\060\060\060\060\060\060\060\132\060\115\061\013\060\011\006\003 \125\004\006\023\002\101\124\061\043\060\041\006\003\125\004\012 \023\032\145\055\143\157\155\155\145\162\143\145\040\155\157\156 \151\164\157\162\151\156\147\040\107\155\142\110\061\031\060\027 \006\003\125\004\003\023\020\107\114\117\102\101\114\124\122\125 \123\124\040\062\060\062\060\060\202\002\042\060\015\006\011\052 \206\110\206\367\015\001\001\001\005\000\003\202\002\017\000\060 \202\002\012\002\202\002\001\000\256\056\126\255\033\034\357\366 \225\217\240\167\033\053\323\143\217\204\115\105\242\017\237\133 \105\253\131\173\121\064\371\354\213\212\170\305\335\153\257\275 \304\337\223\105\036\277\221\070\013\256\016\026\347\101\163\370 \333\273\321\270\121\340\313\203\073\163\070\156\167\212\017\131 \143\046\315\247\052\316\124\373\270\342\300\174\107\316\140\174 \077\262\163\362\300\031\266\212\222\207\065\015\220\050\242\344  $\label{eq:condition} $$ \025\04\143\076\272\257\356\174\136\314\246\213\120\262\070\367 $$$ \101\143\312\316\377\151\217\150\016\225\066\345\314\271\214\011 \312\113\335\061\220\226\310\314\037\375\126\226\064\333\216\034 \352\054\276\205\056\143\335\252\251\225\323\375\051\225\023\360 \310\230\223\331\055\026\107\220\021\203\242\072\042\242\050\127 \242\353\376\300\214\050\240\246\175\347\052\102\073\202\200\143 \245\143\037\031\314\174\262\146\250\302\323\155\067\157\342\176 \006\121\331\105\204\037\022\316\044\122\144\205\013\110\200\116 \207\261\042\042\060\252\353\256\276\340\002\340\100\350\260\102 \200\003\121\252\264\176\252\104\327\103\141\363\242\153\026\211

\111\244\243\244\053\212\002\304\170\364\150\212\301\344\172\066 \261\157\033\226\033\167\111\215\324\311\006\162\217\317\123\343 \334\027\205\040\112\334\230\047\323\221\046\053\107\036\151\007 \257\336\242\344\344\324\153\013\263\136\174\324\044\200\107\051 \151\073\156\350\254\375\100\353\330\355\161\161\053\362\350\130  $\label{eq:condition} $$ \035\35\101\227\042\305\037\324\071\320\047\217\207\343\030\364 $$$ \340\251\106\015\365\164\072\202\056\320\156\054\221\243\061\134 \073\106\352\173\004\020\126\136\200\035\365\245\145\350\202\374  $\label{eq:condition} $\342\007\214\142\105\365\040\336\106\160\206\241\274\223\323\036$$ \164\246\154\260\054\367\003\014\210\014\313\324\162\123\206\274 \140\106\363\230\152\302\361\277\103\371\160\040\167\312\067\101 \171\125\122\143\215\133\022\237\305\150\304\210\235\254\362\060 \253\267\243\061\227\147\255\217\027\017\154\307\163\355\044\224 \153\310\203\232\320\232\067\111\004\253\261\026\310\154\111\111  $\label{eq:condition} $$ \055\253\241\320\214\222\362\101\112\171\041\045\333\143\327\266$$ \234\247\176\102\151\373\072\143\002\003\001\000\001\243\143\060 \141\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001 \001\377\060\016\006\003\125\035\017\001\001\377\004\004\003\002 \001\006\060\035\006\003\125\035\016\004\026\004\024\334\056\037 \321\141\067\171\344\253\325\325\263\022\161\150\075\152\150\234 \042\060\037\006\003\125\035\043\004\030\060\026\200\024\334\056 \037\321\141\067\171\344\253\325\325\263\022\161\150\075\152\150 \234\042\060\015\006\011\052\206\110\206\367\015\001\001\013\005 \000\003\202\002\001\000\221\360\102\002\150\100\356\303\150\300 \124\057\337\354\142\303\303\236\212\240\061\050\252\203\216\244 \126\226\022\020\206\126\272\227\162\322\124\060\174\255\031\325 \035\150\157\373\024\102\330\215\016\363\265\321\245\343\002\102  $\label{eq:condition} $$ \frac{334}{350}106\\130\\007\\065\\002\\060\\340\\274\\164\\112\\301\\103\\052$ \377\333\032\320\260\257\154\303\375\313\263\365\177\155\003\056 \131\126\235\055\055\065\214\262\326\103\027\054\222\012\313\135  $\label{eq:condition} $$ 350 \times 14 \times 17 \times 160 \times 320 \times 320 \times 377 \times 314 \times 277 \times 44 \times 224 \times 300 \times 276 \times 314 \times 3$ \207\275\212\343\223\173\306\217\233\026\235\047\145\274\172\305 \102\202\154\134\007\320\251\301\210\140\104\351\230\205\026\137 \370\217\312\001\020\316\045\303\371\140\033\240\305\227\303\323 \054\210\061\242\275\060\354\320\320\300\022\361\301\071\343\345 \365\370\326\112\335\064\315\373\157\301\117\343\000\213\126\342 \222\367\050\262\102\167\162\043\147\307\077\021\025\262\304\003 \240\200\007\266\035\312\255\155\352\101\021\176\055\164\223\373 \302\274\276\121\104\305\357\150\045\047\200\343\310\240\324\022 \354\331\245\067\035\067\174\264\221\312\332\324\261\226\201\357 \150\134\166\020\111\257\176\245\067\200\261\034\122\275\063\201 \114\217\371\335\145\331\024\315\212\045\130\364\342\305\203\245 \011\220\324\154\024\143\265\100\337\353\300\374\304\130\176\015  $\label{eq:condition} $$ \024\026\207\124\047\156\126\344\160\204\270\154\062\022\176\202$ \061\103\276\327\335\174\241\255\256\326\253\040\022\357\012\303 \020\214\111\226\065\334\013\165\136\261\117\325\117\064\016\021  $\\ \\ 040\\ \\ 007\\ \\ 165\\ \\ 103\\ \\ 105\\ \\ 351\\ \\ 243\\ \\ 021\\ \\ 332\\ \\ 254\\ \\ 243\\ \\ 231\\ \\ 302\\ \\ 266\\ \\ 171\\ \\ 047$ 

 $\label{eq:control} $$ \frac{342}271\\357\\310\\342\\366\\065\\051\\172\\164\\372\\305\\177\\202\\0005\\142\\246\\012\\352\\150\\262\\171\\107\\006\\156\\362\\127\\250\\0025\\063\\306\\367\\170\\112\\075\\102\\173\\153\\176\\376\\367\\106\\352\\321\\353\\216\\357\\210\\150\\133\\350\\301\\331\\161\\176\\375\\144\\357\\377\\147\\107\\210\\130\\045\\057\\076\\206\\007\\275\\373\\250\\345\\202\\250\\254\\245\\323\\151\\103\\315\\061\\210\\111\\204\\123\\222\\300\\261\\071\\033\\071\\203\\001\\060\\304\\362\\251\\372\\320\\003\\275\\162\\067\\140\\126\\037\\066\\174\\275\\071\\221\\365\\155\\015\\277\\173\\327\\222$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "GLOBALTRUST 2020"
- # Issuer: CN=GLOBALTRUST 2020,O=e-commerce monitoring GmbH,C=AT
- # Serial Number:5a:4b:bd:5a:fb:4f:8a:5b:fa:65:e5
- # Subject: CN=GLOBALTRUST 2020,O=e-commerce monitoring GmbH,C=AT
- # Not Valid Before: Mon Feb 10 00:00:00 2020
- # Not Valid After: Sun Jun 10 00:00:00 2040
- # Fingerprint (SHA-256):
- 9A:29:6A:51:82:D1:D4:51:A2:E3:7F:43:9B:74:DA:AF:A2:67:52:33:29:F9:0F:9A:0D:20:07:C3:34:E2:3C:9A
- # Fingerprint (SHA1): D0:67:C1:13:51:01:0C:AA:D0:C7:6A:65:37:31:16:26:4F:53:71:A2
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- $CKA\_MODIFIABLE\ CK\_BBOOL\ CK\_FALSE$
- CKA LABEL UTF8 "GLOBALTRUST 2020"
- CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL
- \320\147\301\023\121\001\014\252\320\307\152\145\067\061\026\046 \117\123\161\242

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \frac{313}{155}\frac{343}{314}\frac{242}{361}\frac{372}{016}\frac{170}{327}\frac{350}{350} $$$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\115\061\013\060\011\006\003\125\004\006\023\002\101\124\061

 $\\ \\043\\060\\041\\006\\003\\125\\004\\012\\023\\032\\145\\055\\143\\157\\155\\155$ 

 $\label{eq:condition} $$ 145\backslash 162\backslash 143\backslash 145\backslash 040\backslash 155\backslash 157\backslash 156\backslash 151\backslash 164\backslash 157\backslash 162\backslash 151\backslash 156\backslash 147\backslash 040$$ 

 $\label{eq:condition} $$ 107\155\142\110\061\031\060\027\006\003\125\004\003\023\020\107 $$$ 

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\013\132\113\275\132\373\117\212\133\372\145\345$$ 

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

 ${\tt CKA\_TRUST\_CODE\_SIGNING\ CK\_TRUST\ CKT\_NSS\_MUST\_VERIFY\_TRUST}$ 

CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

```
#
# Certificate "ANF Secure Server Root CA"
# Issuer: CN=ANF Secure Server Root CA.OU=ANF CA Raiz.O=ANF Autoridad de
Certificacion, C=ES, serial Number=G63287510
# Serial Number:0d:d3:e3:bc:6c:f9:6b:b1
# Subject: CN=ANF Secure Server Root CA,OU=ANF CA Raiz,O=ANF Autoridad de
Certificacion, C=ES, serial Number=G63287510
# Not Valid Before: Wed Sep 04 10:00:38 2019
# Not Valid After: Tue Aug 30 10:00:38 2039
# Fingerprint (SHA-256):
FB:8F:EC:75:91:69:B9:10:6B:1E:51:16:44:C6:18:C5:13:04:37:3F:6C:06:43:08:8D:8B:EF:FD:1B:99:75:99
# Fingerprint (SHA1): 5B:6E:68:D0:CC:15:B6:A0:5F:1E:C1:5F:AE:02:FC:6B:2F:5D:6F:74
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "ANF Secure Server Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\201\204\061\022\060\020\006\003\125\004\005\023\011\107\066
\023\002\105\123\061\047\060\045\006\003\125\004\012\023\036\101
\116\106\040\101\165\164\157\162\151\144\141\144\040\144\145\040
\103\145\162\164\151\146\151\143\141\143\151\157\156\061\024\060
\022\006\003\125\004\013\023\013\101\116\106\040\103\101\040\122
\106\040\123\145\143\165\162\145\040\123\145\162\166\145\162\040
\122\157\157\164\040\103\101
END
CKA ID UTF8 "0"
CKA ISSUER MULTILINE OCTAL
\060\201\204\061\022\060\020\006\003\125\004\005\023\011\107\066
\063\062\070\067\065\061\060\061\013\060\011\006\003\125\004\006
\023\002\105\123\061\047\060\045\006\003\125\004\012\023\036\101
\116\106\040\101\165\164\157\162\151\144\141\144\040\144\145\040
\103\145\162\164\151\146\151\143\141\143\151\157\156\061\024\060
\label{eq:condition} $$ \022\006\003\125\004\013\023\013\101\116\106\040\103\101\040\122 $$
\141\151\172\061\042\060\040\006\003\125\004\003\023\031\101\116
\106\040\123\145\143\165\162\145\040\123\145\162\166\145\162\040
\122\157\157\164\040\103\101
```

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\010\015\323\343\274\154\371\153\261

**END** 

CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\357\060\202\003\327\240\003\002\001\002\002\010\015

\323\343\274\154\371\153\261\060\015\006\011\052\206\110\206\367 \015\001\001\013\005\000\060\201\204\061\022\060\020\006\003\125 \004\005\023\011\107\066\063\062\070\067\065\061\060\061\013\060 \011\006\003\125\004\006\023\002\105\123\061\047\060\045\006\003 \125\004\012\023\036\101\116\106\040\101\165\164\157\162\151\144 \141\144\040\144\145\040\103\145\162\164\151\146\151\143\141\143 \151\157\156\061\024\060\022\006\003\125\004\013\023\013\101\116 \106\040\103\101\040\122\141\151\172\061\042\060\040\006\003\125  $\\ \\004\\ \\003\\ \\023\\ \\031\\ \\101\\ \\116\\ \\106\\ \\040\\ \\123\\ \\145\\ \\143\\ \\165\\ \\162\\ \\145\\ \\040\\ \\123$ \145\162\166\145\162\040\122\157\157\164\040\103\101\060\036\027 \015\061\071\060\071\060\064\061\060\060\060\063\070\132\027\015 \063\071\060\070\063\060\061\060\060\060\063\070\132\060\201\204 \061\022\060\020\006\003\125\004\005\023\011\107\066\063\062\070 \101\165\164\157\162\151\144\141\144\040\144\145\040\103\145\162 \164\151\146\151\143\141\143\151\157\156\061\024\060\022\006\003 \125\004\013\023\013\101\116\106\040\103\101\040\122\141\151\172 \061\042\060\040\006\003\125\004\003\023\031\101\116\106\040\123 \164\040\103\101\060\202\002\042\060\015\006\011\052\206\110\206 \367\015\001\001\001\005\000\003\202\002\017\000\060\202\002\012  $\label{eq:condition} $$ \002\202\001\000\333\353\153\053\346\144\124\225\202\220\243 $$$ \162\244\031\001\235\234\013\201\137\163\111\272\247\254\363\004 \116\173\226\013\354\021\340\133\246\034\316\033\322\015\203\034 \053\270\236\035\176\105\062\140\017\007\351\167\130\176\237\152 \310\141\116\266\046\301\114\215\377\114\357\064\262\037\145\330 \271\170\365\255\251\161\271\357\117\130\035\245\336\164\040\227 \241\355\150\114\336\222\027\113\274\253\377\145\232\236\373\107 \331\127\162\363\011\241\256\166\104\023\156\234\055\104\071\274 \371\307\073\244\130\075\101\275\264\302\111\243\310\015\322\227 \057\007\145\122\000\247\156\310\257\150\354\364\024\226\266\127 \037\126\303\071\237\053\155\344\363\076\366\065\144\332\014\034 \241\204\113\057\113\113\342\054\044\235\155\223\100\353\265\043 \216\062\312\157\105\323\250\211\173\036\317\036\372\133\103\213 \315\315\250\017\152\312\014\136\271\236\107\217\360\331\266\012 \013\130\145\027\063\271\043\344\167\031\175\313\112\056\222\173  $\label{eq:condition} $$ \frac{117}057\\020\\167\\261\\215\\057\\150\\234\\142\\314\\340\\120\\370\\354\\221$ \247\124\114\127\011\325\166\143\305\350\145\036\356\155\152\317  $\label{eq:condition} $$ \125\372\174\117\255\140\010\375\126\231\017\025\054\173\251 $$$ \200\253\214\141\217\112\007\166\102\336\075\364\335\262\044\063 \133\270\265\243\104\311\254\177\167\074\035\043\354\202\251\246 \342\310\006\114\002\376\254\134\231\231\013\057\020\212\246\364 \177\325\207\164\015\131\111\105\366\360\161\134\071\051\326\277 \112\043\213\365\137\001\143\322\207\163\050\265\113\012\365\370 \253\202\054\176\163\045\062\035\013\143\012\027\201\000\377\266 \166\136\347\264\261\100\312\041\273\325\200\121\345\110\122\147 \054\322\141\211\007\015\017\316\102\167\300\104\163\234\104\120

\240\333\020\012\055\225\034\201\257\344\034\345\024\036\361\066 \101\001\002\057\175\163\247\336\102\314\114\351\211\015\126\367 \237\221\324\003\306\154\311\217\333\330\034\340\100\230\135\146 \231\230\200\156\055\377\001\305\316\313\106\037\254\002\306\103 \346\256\242\204\074\305\116\036\075\155\311\024\114\343\056\101 \273\312\071\277\066\074\052\031\252\101\207\116\245\316\113\062 \171\335\220\111\177\002\003\001\000\001\243\143\060\141\060\037 \006\003\125\035\043\004\030\060\026\200\024\234\137\320\154\143 \243\137\223\312\223\230\010\255\214\207\245\054\134\301\067\060 \035\006\003\125\035\016\004\026\004\024\234\137\320\154\143\243 \137\223\312\223\230\010\255\214\207\245\054\134\301\067\060\016  $\label{eq:condition} $$ \006\003\125\035\017\001\001\377\004\004\003\002\001\206\060\017 $$$ \006\003\125\035\023\001\001\377\004\005\060\003\001\001\377\060  $\label{eq:condition} $$ \0.015\0.06\0.01\0.05\0.00\0.003\0.001\0.01\0.01\0.005\0.000\0.003\0.000 $$$  $\label{eq:condition} $$ \002\001\000\116\036\271\212\306\240\230\077\156\303\151\300\152 $$$ \134\111\122\254\313\053\135\170\070\301\325\124\204\237\223\360  $\label{eq:condition} $$ \207\031\075\054\146\211\353\015\102\374\314\360\165\205\077\213$ \364\200\135\171\345\027\147\275\065\202\342\362\074\216\175\133 \066\313\132\200\000\051\362\316\053\054\361\217\252\155\005\223  $\label{eq:condition} $$ \frac{154}{162}\frac{307}{126}\frac{353}{337}\frac{120}{043}\frac{345}{105}\frac{020}{075}\frac{350}{147}\frac{243}{243} $$$ \257\016\125\017\220\011\142\357\113\131\242\366\123\361\300\065 \344\057\301\044\275\171\057\116\040\042\073\375\032\040\260\244  $\label{eq:condition} $$ \016\054\160\355\164\077\270\023\225\006\121\310\350\207\046\312 $$$ \244\133\152\026\041\222\335\163\140\236\020\030\336\074\201\352 \350\030\303\174\211\362\213\120\076\275\021\342\025\003\250\066 \175\063\001\154\110\025\327\210\220\231\004\305\314\346\007\364 \274\364\220\355\023\342\352\213\303\217\243\063\017\301\051\114  $\label{eq:condition} $$ \023\116\332\025\126\161\163\162\202\120\366\232\063\174\242\261 $$$ \250\032\064\164\145\134\316\321\353\253\123\340\032\200\330\352 \072\111\344\046\060\233\345\034\212\250\251\025\062\206\231\222  $\label{eq:condition} $$ \012\020\043\126\022\340\366\316\114\342\273\276\333\215\222\163$ \001\146\057\142\076\262\162\047\105\066\355\115\126\343\227\231 \377\072\065\076\245\124\112\122\131\113\140\333\356\376\170\021 \177\112\334\024\171\140\266\153\144\003\333\025\203\341\242\276 \366\043\227\120\360\011\063\066\247\161\226\045\363\271\102\175 \333\070\077\054\130\254\350\102\341\016\330\323\073\114\056\202 \351\203\056\153\061\331\335\107\206\117\155\227\221\056\117\342  $\label{eq:condition} $$ \050\161\065\026\321\362\163\376\045\053\007\107\044\143\047\310$$$ \370\366\331\153\374\022\061\126\010\300\123\102\257\234\320\063 \176\374\006\360\061\104\003\024\361\130\352\362\152\015\251\021 \262\203\276\305\032\277\007\352\131\334\243\210\065\357\234\166 \062\074\115\006\042\316\025\345\335\236\330\217\332\336\322\304  $\label{eq:condition} $$ \071\345\027\201\317\070\107\353\177\210\155\131\033\337\237\102$ \024\256\176\317\250\260\146\145\332\067\257\237\252\075\352\050 \266\336\325\061\130\026\202\133\352\273\031\165\002\163\032\312 \110\032\041\223\220\012\216\223\204\247\175\073\043\030\222\211 \240\215\254

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

# Trust for "ANF Secure Server Root CA"

# Issuer: CN=ANF Secure Server Root CA,OU=ANF CA Raiz,O=ANF Autoridad de

Certificacion, C=ES, serial Number=G63287510

# Serial Number:0d:d3:e3:bc:6c:f9:6b:b1

# Subject: CN=ANF Secure Server Root CA,OU=ANF CA Raiz,O=ANF Autoridad de

Certificacion.C=ES.serialNumber=G63287510

# Not Valid Before: Wed Sep 04 10:00:38 2019

# Not Valid After: Tue Aug 30 10:00:38 2039

# Fingerprint (SHA-256):

FB:8F:EC:75:91:69:B9:10:6B:1E:51:16:44:C6:18:C5:13:04:37:3F:6C:06:43:08:8D:8B:EF:FD:1B:99:75:99

# Fingerprint (SHA1): 5B:6E:68:D0:CC:15:B6:A0:5F:1E:C1:5F:AE:02:FC:6B:2F:5D:6F:74

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "ANF Secure Server Root CA"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\133\156\150\320\314\025\266\240\137\036\301\137\256\002\374\153

\057\135\157\164

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\\ \\ 046 \\ 246 \\ 104 \\ 132 \\ 331 \\ 257 \\ 116 \\ 057 \\ 262 \\ 035 \\ 266 \\ 145 \\ 260 \\ 116 \\ 350 \\ 226$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\201\204\061\022\060\020\006\003\125\004\005\023\011\107\066

\063\062\070\067\065\061\060\061\013\060\011\006\003\125\004\006

\023\002\105\123\061\047\060\045\006\003\125\004\012\023\036\101

\116\106\040\101\165\164\157\162\151\144\141\144\040\144\145\040

 $\label{eq:condition} $$ \022\006\003\125\004\013\023\013\101\116\106\040\103\101\040\122$$ 

 $\label{eq:condition} $$ 141\151\172\061\042\060\040\006\003\125\004\003\023\031\101\116$ 

\106\040\123\145\143\165\162\145\040\123\145\162\166\145\162\040

\122\157\157\164\040\103\101

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\010\015\323\343\274\154\371\153\261$$ 

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "Certum EC-384 CA"

- # Issuer: CN=Certum EC-384 CA,OU=Certum Certification Authority,O=Asseco Data Systems S.A.,C=PL
- # Serial Number:78:8f:27:5c:81:12:52:20:a5:04:d0:2d:dd:ba:73:f4
- # Subject: CN=Certum EC-384 CA,OU=Certum Certification Authority,O=Asseco Data Systems S.A.,C=PL
- # Not Valid Before: Mon Mar 26 07:24:54 2018
- # Not Valid After: Thu Mar 26 07:24:54 2043
- # Fingerprint (SHA-256):
- 6B:32:80:85:62:53:18:AA:50:D1:73:C9:8D:8B:DA:09:D5:7E:27:41:3D:11:4C:F7:87:A0:F5:D0:6C:03:0C:F6
- # Fingerprint (SHA1): F3:3E:78:3C:AC:DF:F4:A2:CC:AC:67:55:69:56:D7:E5:16:3C:E1:ED
- CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- CKA MODIFIABLE CK BBOOL CK FALSE
- CKA\_LABEL UTF8 "Certum EC-384 CA"
- CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509
- CKA\_SUBJECT MULTILINE\_OCTAL
- $\label{eq:condition} $$ \060\164\061\013\060\011\006\003\125\004\006\023\002\120\114\061 $$$
- \041\060\037\006\003\125\004\012\023\030\101\163\163\145\143\157
- \040\104\141\164\141\040\123\171\163\164\145\155\163\040\123\056
- $\label{eq:condition} $$ 101\056\061\047\060\045\006\003\125\004\013\023\036\103\145\162 $$$
- \164\165\155\040\103\145\162\164\151\146\151\143\141\164\151\157
- \156\040\101\165\164\150\157\162\151\164\171\061\031\060\027\006
- \063\070\064\040\103\101

**END** 

CKA\_ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000164\001\006\003\125\004\006\023\002\120\114\061\041\060\037\006\003\125\004\012\023\030\101\163\163\145\143\157\040\104\141\164\141\040\123\171\163\164\145\155\163\040\123\056\101\056\061\047\060\045\006\003\125\004\013\023\036\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\061\031\060\027\006\003\125\004\003\023\020\103\145\162\164\165\155\040\105\103\055\063\070\064\040\103\101$ 

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\170\217\047\134\201\022\122\040\245\004\320\055\335\272 \163\364

**END** 

#### CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\002\145\060\202\001\353\240\003\002\001\002\002\002\170 $$ \217\047\134\201\022\122\040\245\004\320\055\335\272\163\364\060 $$ \012\006\010\052\206\110\316\075\004\003\003\006\0164\061\013\060 $$ \011\006\003\125\004\006\023\002\120\114\061\041\060\037\006\003 $$ \125\004\012\023\030\101\163\145\143\157\040\104\141\164\141 $$ \040\123\171\163\164\145\155\163\040\123\056\101\056\061\047\060 $$ \045\006\003\125\004\013\023\036\103\145\162\164\165\155\040\103 $$$ 

\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164 \150\157\162\151\164\171\061\031\060\027\006\003\125\004\003\023 \020\103\145\162\164\165\155\040\105\103\055\063\070\064\040\103 \101\060\036\027\015\061\070\060\063\062\066\060\067\062\064\065 \064\132\027\015\064\063\060\063\062\066\060\067\062\064\065\064 \132\060\164\061\013\060\011\006\003\125\004\006\023\002\120\114 \061\041\060\037\006\003\125\004\012\023\030\101\163\163\145\143 \157\040\104\141\164\141\040\123\171\163\164\145\155\163\040\123 \056\101\056\061\047\060\045\006\003\125\004\013\023\036\103\145 \162\164\165\155\040\103\145\162\164\151\146\151\143\141\164\151  $\label{eq:condition} $$ \frac{157}{156}040\\101\\165\\164\\150\\157\\162\\151\\164\\171\\061\\031\\060\\027$  $\label{eq:condition} $$ \006\003\125\004\003\023\020\103\145\162\164\165\155\040\105\103$ \055\063\070\064\040\103\101\060\166\060\020\006\007\052\206\110 \316\075\002\001\006\005\053\201\004\000\042\003\142\000\004\304  $\label{eq:condition} $$ \050\216\253\030\133\152\276\156\144\067\143\344\315\354\253\072$ \367\314\241\270\016\202\111\327\206\051\237\241\224\362\343\140 \170\230\201\170\006\115\362\354\232\016\127\140\203\237\264\346 \027\057\032\263\135\002\133\211\043\074\302\021\005\052\247\210 \023\030\363\120\204\327\275\064\054\047\211\125\377\316\114\347 \337\246\037\050\304\360\124\303\271\174\267\123\255\353\302\243 \102\060\100\060\017\006\003\125\035\023\001\001\377\004\005\060 \003\001\001\377\060\035\006\003\125\035\016\004\026\004\024\215  $\label{eq:condition} $$ \006\146\164\044\166\072\363\211\367\274\326\275\107\175\057\274$$$ \020\137\113\060\016\006\003\125\035\017\001\001\377\004\004\003  $\label{eq:condition} $$ \002\001\006\006\012\006\010\052\206\110\316\075\004\003\003\003$ \150\000\060\145\002\060\003\125\055\246\346\030\304\174\357\311 \120\156\301\047\017\234\207\257\156\325\033\010\030\275\222\051  $\label{eq:condition} $$ 301\357\224\221\170\322\072\034\125\211\142\345\033\011\036\272$ \144\153\361\166\264\324\002\061\000\264\102\204\231\377\253\347 \236\373\221\227\047\135\334\260\133\060\161\316\136\070\032\152 \331\045\347\352\367\141\222\126\370\352\332\066\302\207\145\226 \056\162\045\057\177\337\303\023\311

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Certum EC-384 CA"
```

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

<sup>#</sup> Issuer: CN=Certum EC-384 CA,OU=Certum Certification Authority,O=Asseco Data Systems S.A.,C=PL

<sup>#</sup> Serial Number:78:8f:27:5c:81:12:52:20:a5:04:d0:2d:dd:ba:73:f4

<sup>#</sup> Subject: CN=Certum EC-384 CA,OU=Certum Certification Authority,O=Asseco Data Systems S.A.,C=PL

<sup>#</sup> Not Valid Before: Mon Mar 26 07:24:54 2018

<sup>#</sup> Not Valid After: Thu Mar 26 07:24:54 2043

<sup>#</sup> Fingerprint (SHA-256):

<sup>6</sup>B;32:80:85:62:53:18:AA:50:D1:73:C9:8D:8B:DA:09:D5:7E:27:41:3D:11:4C:F7:87:A0:F5:D0:6C:03:0C:F6

<sup>#</sup> Fingerprint (SHA1): F3:3E:78:3C:AC:DF:F4:A2:CC:AC:67:55:69:56:D7:E5:16:3C:E1:ED

```
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "Certum EC-384 CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\label{eq:condition} $$ \363\076\170\074\254\337\364\242\314\254\147\125\151\126\327\345$
\026\074\341\355
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\266\145\263\226\140\227\022\241\354\116\341\075\243\306\311\361
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\164\061\013\060\011\006\003\125\004\006\023\002\120\114\061 $$
\041\060\037\006\003\125\004\012\023\030\101\163\163\145\143\157
\\ \\ 040\\ \\ 104\\ \\ 141\\ \\ 164\\ \\ 141\\ \\ 040\\ \\ 123\\ \\ 171\\ \\ 163\\ \\ 164\\ \\ 145\\ \\ 155\\ \\ 163\\ \\ 040\\ \\ 123\\ \\ 056
\label{eq:condition} $$ 101\056\061\047\060\045\006\003\125\004\013\023\036\103\145\162 $$
\164\165\155\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\061\031\060\027\006
\003\125\004\003\023\020\103\145\162\164\165\155\040\105\103\055
\063\070\064\040\103\101
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\020\170\217\047\134\201\022\122\040\245\004\320\055\335\272
\163\364
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Certum Trusted Root CA"
# Issuer: CN=Certum Trusted Root CA,OU=Certum Certification Authority,O=Asseco Data Systems S.A.,C=PL
# Serial Number:1e:bf:59:50:b8:c9:80:37:4c:06:f7:eb:55:4f:b5:ed
# Subject: CN=Certum Trusted Root CA,OU=Certum Certification Authority,O=Asseco Data Systems S.A.,C=PL
# Not Valid Before: Fri Mar 16 12:10:13 2018
# Not Valid After: Mon Mar 16 12:10:13 2043
# Fingerprint (SHA-256):
FE:76:96:57:38:55:77:3E:37:A9:5E:7A:D4:D9:CC:96:C3:01:57:C1:5D:31:76:5B:A9:B1:57:04:E1:AE:78:FD
# Fingerprint (SHA1): C8:83:44:C0:18:AE:9F:CC:F1:87:B7:8F:22:D1:C5:D7:45:84:BA:E5
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Certum Trusted Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\label{eq:condition} $$ \060\172\061\013\060\011\006\003\125\004\006\023\002\120\114\061 $$
```

 $\label{eq:control_co$ 

CKA ID UTF8 "0"

**END** 

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000\172\061\013\060\011\006\003\125\004\006\023\002\120\114\061\041\060\037\006\003\125\004\012\023\030\101\163\163\145\143\157\040\104\141\164\141\040\123\171\163\164\145\155\163\040\123\056\101\056\061\047\060\045\006\003\125\004\013\023\036\103\145\162\164\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\061\037\060\035\006\003\125\004\003\023\026\103\145\162\164\165\155\040\124\162\165\163\164\145\144\040\122\157\157\164\040\103\101$ 

**END** 

#### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\020\036\277\131\120\270\311\200\067\114\006\367\353\125\117 \265\355$ 

**END** 

#### CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \0.060\202\005\300\060\202\003\250\240\003\002\001\002\002\002\003\6$ \277\131\120\270\311\200\067\114\006\367\353\125\117\265\355\060 \015\006\011\052\206\110\206\367\015\001\001\015\005\000\060\172  $\label{eq:condition} $$ \061\013\060\011\006\003\125\004\006\023\002\120\114\061\041\060 $$$ \037\006\003\125\004\012\023\030\101\163\163\145\143\157\040\104 \141\164\141\040\123\171\163\164\145\155\163\040\123\056\101\056  $\label{eq:condition} $$ \0061\047\060\045\006\003\125\004\013\023\036\103\145\162\164\165$$ \155\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040 \101\165\164\150\157\162\151\164\171\061\037\060\035\006\003\125 \004\003\023\026\103\145\162\164\165\155\040\124\162\165\163\164 \145\144\040\122\157\157\164\040\103\101\060\036\027\015\061\070 \060\063\061\066\061\062\061\060\061\063\132\027\015\064\063\060 \063\061\066\061\062\061\060\061\063\132\060\172\061\013\060\011  $\\ \\006\\003\\125\\004\\006\\023\\002\\120\\114\\061\\041\\060\\037\\006\\003\\125$  $\label{eq:condition} $$ 0.004 \times 0.12 \times 0.03 \times 0.101 \times 0.163 \times 0.145 \times 0.157 \times 0.104 \times 0.104$ \123\171\163\164\145\155\163\040\123\056\101\056\061\047\060\045 \006\003\125\004\013\023\036\103\145\162\164\165\155\040\103\145 \162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150 \157\162\151\164\171\061\037\060\035\006\003\125\004\003\023\026 \103\145\162\164\165\155\040\124\162\165\163\164\145\144\040\122 \157\157\164\040\103\101\060\202\002\042\060\015\006\011\052\206 \110\206\367\015\001\001\001\005\000\003\202\002\017\000\060\202 \002\012\002\202\002\001\000\321\055\216\273\267\066\352\155\067 \221\237\116\223\247\005\344\051\003\045\316\034\202\367\174\231

\237\101\006\315\355\243\272\300\333\011\054\301\174\337\051\176 \113\145\057\223\247\324\001\153\003\050\030\243\330\235\005\301 \052\330\105\361\221\336\337\073\320\200\002\214\317\070\017\352 \247\134\170\021\244\301\310\205\134\045\323\323\262\347\045\317 \021\124\227\253\065\300\036\166\034\357\000\123\237\071\334\024 \245\054\042\045\263\162\162\374\215\263\345\076\010\036\024\052 \067\013\210\074\312\260\364\310\302\241\256\274\301\276\051\147 \125\342\374\255\131\134\376\275\127\054\260\220\215\302\355\067  $\label{eq:condition} $$ \266\174\231\210\265\325\003\232\075\025\015\075\072\250\250\105$ \360\225\116\045\131\035\315\230\151\273\323\314\062\311\215\357 \201\376\255\175\211\273\272\140\023\312\145\225\147\240\363\031 \366\003\126\324\152\323\047\342\241\255\203\360\112\022\042\167 \034\005\163\342\031\161\102\300\354\165\106\232\220\130\340\152  $\label{eq:condition} $$ \216\053\245\106\060\004\216\031\262\027\343\276\251\272\177\126 $$$  $\label{eq:condition} $$ \361\044\003\327\262\041\050\166\016\066\060\114\171\325\101\232 $$$ \232\250\270\065\272\014\072\362\104\033\040\210\367\305\045\327  $\label{eq:condition} $$ \075\306\343\076\103\335\207\376\304\352\365\123\076\114\145\377 $$$ \073\112\313\170\132\153\027\137\015\307\303\117\116\232\052\242 \355\127\115\042\342\106\232\077\017\221\064\044\175\125\343\214 \225\067\323\032\360\011\053\054\322\311\215\264\015\000\253\147 \051\050\330\001\365\031\004\266\035\276\166\376\162\134\304\205 \312\322\200\101\337\005\250\243\325\204\220\117\013\363\340\077 \233\031\322\067\211\077\362\173\122\034\214\366\341\367\074\007 \227\214\016\242\131\201\014\262\220\075\323\343\131\106\355\017 \251\247\336\200\153\132\252\007\266\031\313\274\127\363\227\041 \172\014\261\053\164\076\353\332\247\147\055\114\304\230\236\066 \011\166\146\146\374\032\077\352\110\124\034\276\060\275\200\120 \277\174\265\316\000\366\014\141\331\347\044\003\340\343\001\201 \016\275\330\205\064\210\275\262\066\250\173\134\010\345\104\200 \214\157\370\057\325\041\312\035\034\320\373\304\265\207\321\072  $\label{eq:condition} $$ \frac{307}{166}265\\065\\110\\265\\002\\003\\001\\000\\001\\243\\102\\060\\100$ \060\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001 \377\060\035\006\003\125\035\016\004\026\004\024\214\373\034\165 \274\002\323\237\116\056\110\331\371\140\124\252\304\263\117\372 \060\016\006\003\125\035\017\001\001\377\004\004\003\002\001\006 \060\015\006\011\052\206\110\206\367\015\001\001\015\005\000\003 \202\002\001\000\110\242\325\000\013\056\320\077\274\034\325\265 \124\111\036\132\153\364\344\362\340\100\067\340\314\024\173\271  $\label{eq:condition} $$ \frac{311}{372} 065 \frac{265}{165} 027 \frac{223}{152} 005 \frac{151}{205} \frac{234}{315} \frac{117}{031} 170 $$ \133\031\201\363\143\076\303\316\133\217\365\057\136\001\166\023 \077\054\000\271\315\226\122\071\111\155\004\116\305\351\017\206 \015\341\372\263\137\202\022\361\072\316\146\006\044\064\053\350 \314\312\347\151\334\207\235\302\064\327\171\321\323\167\270\252 \131\130\376\235\046\372\070\206\076\235\212\207\144\127\345\027  $\label{eq:condition} $$ \072\342\371\215\271\343\063\170\301\220\330\270\335\267\203\121 $$$ \344\304\314\043\325\006\174\346\121\323\315\064\061\300\366\106 \273\013\255\374\075\020\005\052\073\112\221\045\356\214\324\204  $\label{eq:condition} $$ \207\200\052\274\011\214\252\072\023\137\350\064\171\120\301\020 $$$ 

\031\371\323\050\036\324\321\121\060\051\263\256\220\147\326\037 \012\143\261\305\251\306\102\061\143\027\224\357\151\313\057\372  $\label{eq:condition} $$ \frac{304\103\030\211\331\360\062\100\346\200\342\106\137}{100} $$$ \345\343\301\000\131\250\371\350\040\274\211\054\016\107\064\013 \352\127\302\123\066\374\247\324\257\061\315\376\002\345\165\372 \271\047\011\371\363\365\073\312\175\237\251\042\313\210\311\252 \321\107\075\066\167\250\131\144\153\047\317\357\047\301\343\044 \265\206\367\256\176\062\115\260\171\150\321\071\350\220\130\303  $\label{eq:condition} $$ \203\274\017\054\326\227\353\316\014\341\040\307\332\267\076\303$ \077\277\057\334\064\244\373\053\041\315\147\217\113\364\343\352  $\label{eq:condition} $\324\077\347\117\272\271\245\223\105\034\146\037\041\372\144\136$$ \157\340\166\224\062\313\165\365\156\345\366\217\307\270\244\314 \250\226\175\144\373\044\132\112\003\154\153\070\306\350\003\103 \232\367\127\271\263\051\151\223\070\364\003\362\273\373\202\153  $\label{eq:condition} $$ \007\040\321\122\037\232\144\002\173\230\146\333\134\115\132\017 $$$ \320\204\225\240\074\024\103\006\312\312\333\270\101\066\332\152  $\label{eq:condition} $$ 104\147\207\257\343\105\021\025\151\010\262\276\026\071\227$ \044\157\022\105\321\147\135\011\250\311\025\332\372\322\246\137  $\label{eq:condition} $$ \023\141\037\277\205\254\264\255\255\005\224\010\203\036\165\027 $$$ \323\161\073\223\120\043\131\240\355\074\221\124\235\166\000\305 \303\270\070\333

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Certum Trusted Root CA"
- # Issuer: CN=Certum Trusted Root CA,OU=Certum Certification Authority,O=Asseco Data Systems S.A.,C=PL
- # Serial Number:1e:bf:59:50:b8:c9:80:37:4c:06:f7:eb:55:4f:b5:ed
- # Subject: CN=Certum Trusted Root CA,OU=Certum Certification Authority,O=Asseco Data Systems S.A.,C=PL
- # Not Valid Before: Fri Mar 16 12:10:13 2018
- # Not Valid After: Mon Mar 16 12:10:13 2043
- # Fingerprint (SHA-256):

FE:76:96:57:38:55:77:3E:37:A9:5E:7A:D4:D9:CC:96:C3:01:57:C1:5D:31:76:5B:A9:B1:57:04:E1:AE:78:FD

# Fingerprint (SHA1): C8:83:44:C0:18:AE:9F:CC:F1:87:B7:8F:22:D1:C5:D7:45:84:BA:E5

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Certum Trusted Root CA"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\310\203\104\300\030\256\237\314\361\207\267\217\042\321\305\327 \105\204\272\345

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\\ 121\\341\\302\\347\\376\\114\\204\\257\\131\\016\\057\\364\\124\\157\\352\\051$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\172\061\013\060\011\006\003\125\004\006\023\002\120\114\061 \041\060\037\006\003\125\004\012\023\030\101\163\163\145\143\157 \040\104\141\164\141\040\123\171\163\164\145\155\163\040\123\056  $\label{eq:condition} $$ 101\056\061\047\060\045\006\003\125\004\013\023\036\103\145\162 $$$  $\\ 164 \\ 165 \\ 155 \\ 040 \\ 103 \\ 145 \\ 162 \\ 164 \\ 151 \\ 146 \\ 151 \\ 143 \\ 141 \\ 164 \\ 151 \\ 157 \\$ \156\040\101\165\164\150\157\162\151\164\171\061\037\060\035\006 \003\125\004\003\023\026\103\145\162\164\165\155\040\124\162\165 \163\164\145\144\040\122\157\157\164\040\103\101 **END** CKA SERIAL NUMBER MULTILINE OCTAL  $\label{eq:condition} $$ \002\020\036\277\131\120\270\311\200\067\114\006\367\353\125\117 $$$ \265\355 **END** CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE # Certificate "TunTrust Root CA" # Issuer: CN=TunTrust Root CA,O=Agence Nationale de Certification Electronique,C=TN # Serial Number:13:02:d5:e2:40:4c:92:46:86:16:67:5d:b4:bb:bb:b2:6b:3e:fc:13 # Subject: CN=TunTrust Root CA,O=Agence Nationale de Certification Electronique,C=TN # Not Valid Before: Fri Apr 26 08:57:56 2019 # Not Valid After: Tue Apr 26 08:57:56 2044 # Fingerprint (SHA-256): 2E:44:10:2A:B5:8C:B8:54:19:45:1C:8E:19:D9:AC:F3:66:2C:AF:BC:61:4B:6A:53:96:0A:30:F7:D0:E2:EB:41 # Fingerprint (SHA1): CF:E9:70:84:0F:E0:73:0F:9D:F6:0C:7F:2C:4B:EE:20:46:34:9C:BB CKA CLASS CK OBJECT CLASS CKO CERTIFICATE CKA\_TOKEN CK\_BBOOL CK\_TRUE CKA PRIVATE CK BBOOL CK FALSE CKA MODIFIABLE CK BBOOL CK FALSE CKA LABEL UTF8 "TunTrust Root CA" CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA SUBJECT MULTILINE OCTAL \060\141\061\013\060\011\006\003\125\004\006\023\002\124\116\061 \067\060\065\006\003\125\004\012\014\056\101\147\145\156\143\145  $\\ \\ 040\\ \\ 116\\ \\ 141\\ \\ 164\\ \\ 151\\ \\ 157\\ \\ 156\\ \\ 141\\ \\ 154\\ \\ 145\\ \\ 040\\ \\ 144\\ \\ 145\\ \\ 040\\ \\ 103\\ \\ 145$ \162\164\151\146\151\143\141\164\151\157\156\040\105\154\145\143 \164\162\157\156\151\161\165\145\061\031\060\027\006\003\125\004 \003\014\020\124\165\156\124\162\165\163\164\040\122\157\157\164 \040\103\101 **END** CKA\_ID UTF8 "0" CKA\_ISSUER MULTILINE\_OCTAL \060\141\061\013\060\011\006\003\125\004\006\023\002\124\116\061 \067\060\065\006\003\125\004\012\014\056\101\147\145\156\143\145

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

\002\024\023\002\325\342\100\114\222\106\206\026\147\135\264\273 \273\262\153\076\374\023

**END** 

#### CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\202\005\263\060\202\003\233\240\003\002\001\002\002\002\024\023$ \002\325\342\100\114\222\106\206\026\147\135\264\273\273\262\153  $\label{eq:condition} $$ \076\374\023\060\015\006\011\052\206\110\206\367\015\001\001\013$  $\label{eq:condition} $$ \005\000\060\141\061\013\060\011\006\003\125\004\006\023\002\124 $$$ \116\061\067\060\065\006\003\125\004\012\014\056\101\147\145\156  $\\ 143 \\ 145 \\ 040 \\ 116 \\ 141 \\ 164 \\ 151 \\ 157 \\ 156 \\ 141 \\ 154 \\ 145 \\ 040 \\ 144 \\ 145 \\ 040 \\$ \103\145\162\164\151\146\151\143\141\164\151\157\156\040\105\154 \145\143\164\162\157\156\151\161\165\145\061\031\060\027\006\003 \157\164\040\103\101\060\036\027\015\061\071\060\064\062\066\060 \070\065\067\065\066\132\027\015\064\064\060\064\062\066\060\070 \023\002\124\116\061\067\060\065\006\003\125\004\012\014\056\101 \147\145\156\143\145\040\116\141\164\151\157\156\141\154\145\040 \144\145\040\103\145\162\164\151\146\151\143\141\164\151\157\156 \040\105\154\145\143\164\162\157\156\151\161\165\145\061\031\060  $\label{eq:condition} $$ \003\03\125\004\003\014\020\124\165\156\124\162\165\163\164$$$ \040\122\157\157\164\040\103\101\060\202\002\042\060\015\006\011 \052\206\110\206\367\015\001\001\001\005\000\003\202\002\017\000 \335\014\040\072\325\210\056\005\113\101\365\203\202\176\367\131 \237\236\236\143\350\163\332\366\006\251\117\037\264\371\013\037 \071\214\232\040\320\176\006\324\354\064\331\206\274\165\133\207 \210\360\322\331\324\243\012\262\154\033\353\111\054\076\254\135 \330\224\003\240\354\064\345\060\304\065\175\373\046\115\033\156 \060\124\330\365\200\105\234\071\255\234\311\045\004\115\232\220 \076\116\100\156\212\153\315\051\147\306\314\055\340\164\350\005  $\label{eq:condition} $$ \frac{127}012\\110\\120\\372\\172\\103\\332\\176\\354\\133\\232\\016\\142\\166\\376$ \352\235\035\205\162\354\021\273\065\350\037\047\277\301\241\307 \273\110\026\335\126\327\314\116\240\341\271\254\333\325\203\031 \032\205\321\224\227\327\312\243\145\013\363\070\371\002\256\335 \366\147\317\311\077\365\212\054\107\032\231\157\005\015\375\320 \035\202\061\374\051\314\000\130\227\221\114\200\000\034\063\205 \331\167\107\030\222\224\140\134\307\231\003\074\376\367\225\247 \175\120\241\200\302\251\203\255\130\226\125\041\333\206\131\324 \257\306\274\335\201\156\007\333\140\142\376\354\020\156\332\150

\001\364\203\033\251\076\242\133\043\327\144\306\337\334\242\175 \330\113\272\202\322\121\370\146\277\006\106\344\171\052\046\066 \171\217\037\116\231\035\262\217\014\016\034\377\311\135\300\375 \220\020\246\261\067\363\315\072\044\156\264\205\220\277\200\271 \014\214\325\233\326\310\361\126\077\032\200\211\172\251\342\033  $\label{eq:condition} $$ \062\121\054\076\362\337\173\366\135\172\051\031\216\345\310\275$ \066\161\213\135\114\302\035\077\255\130\242\317\075\160\115\246 \120\230\045\334\043\371\270\130\101\010\161\277\117\270\204\240 \217\000\124\025\374\221\155\130\247\226\073\353\113\226\047\315 \153\242\241\206\254\015\174\124\346\146\114\146\137\220\276\041 \232\002\106\055\344\203\302\200\271\317\113\076\350\177\074\001 \354\217\136\315\177\322\050\102\001\225\212\342\227\075\020\041 \175\366\235\034\305\064\241\354\054\016\012\122\054\022\125\160  $\\ \langle 044 \rangle 075 \rangle 313 \rangle 302 \rangle 024 \rangle 065 \rangle 103 \rangle 135 \rangle 047 \rangle 116 \rangle 276 \rangle 300 \rangle 275 \rangle 252 \rangle 174 \rangle 226$  $\label{eq:condition} $\347\374\236\141\255\104\323\000\227\002\003\001\000\001\243\143$ \060\141\060\035\006\003\125\035\016\004\026\004\024\006\232\233  $\label{eq:condition} $$ \037\123\175\361\365\244\310\323\206\076\241\163\131\264\367\104$ \041\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001 \001\377\060\037\006\003\125\035\043\004\030\060\026\200\024\006 \232\233\037\123\175\361\365\244\310\323\206\076\241\163\131\264 \367\104\041\060\016\006\003\125\035\017\001\001\377\004\004\003 \002\001\006\060\015\006\011\052\206\110\206\367\015\001\001\013  $\label{eq:condition} $$ \005\000\003\202\002\001\000\252\005\156\266\335\025\311\277\263$ \306\040\366\006\107\260\206\223\045\323\215\271\310\000\077\227 \365\122\047\210\161\311\164\375\353\312\144\333\133\357\036\135 \272\277\321\353\356\134\151\272\026\310\363\271\217\323\066\056 \100\111\007\015\131\336\213\020\260\111\005\342\377\221\077\113 \267\335\002\216\370\201\050\134\314\334\155\257\137\024\234\175 \130\170\015\366\200\011\271\351\016\227\051\031\270\267\353\370 \026\313\125\022\344\306\175\273\304\354\370\265\034\116\076\147  $\label{eq:condition} $$ \277\305\137\033\155\155\107\050\252\004\130\141\326\166\277\042$$ \177\320\007\152\247\144\123\360\227\215\235\200\077\273\301\007 \333\145\257\346\233\062\232\303\124\223\304\034\010\303\104\373 \173\143\021\103\321\152\032\141\152\171\155\220\117\051\216\107 \005\301\022\151\151\326\306\066\061\341\374\372\200\272\134\117 \304\353\267\062\254\370\165\141\027\327\020\031\271\361\322\011 \357\172\102\235\133\132\013\324\306\225\116\052\316\377\007\327 \117\176\030\006\210\361\031\265\331\230\273\256\161\304\034\347 \164\131\130\357\014\211\317\213\037\165\223\032\004\024\222\110 \120\251\353\127\051\000\026\343\066\034\310\370\277\360\063\325 \101\017\304\314\074\335\351\063\103\001\221\020\053\036\321\271 \135\315\062\031\213\217\214\040\167\327\042\304\102\334\204\026 \233\045\155\350\264\125\161\177\260\174\263\323\161\111\271\317 \122\244\004\077\334\075\240\273\257\063\236\012\060\140\216\333 \235\135\224\250\275\140\347\142\200\166\201\203\014\214\314\060 \106\111\342\014\322\250\257\353\141\161\357\347\042\142\251\367 \134\144\154\237\026\214\147\066\047\105\365\011\173\277\366\020  $\label{eq:condition} $$ \012\361\260\215\124\103\214\004\272\243\077\357\342\065\307\371$ 

 $\label{eq:control_loss} $$ 164\340\157\064\101\320\277\163\145\127\040\371\233\147\172\146\150\044\116\200\145\275\020\231\006\131\362\145\257\270\306\107\273\375\220\170\213\101\163\056\257\125\037\334\073\222\162\156\204\323\320\141\114\015\314\166\127\342\055\205\042\025\066\015\353\001\235\353\330\353\304\204\231\373\300\014\314\062\350\343\167\332\203\104\213\236\125\050\300\213\130\323\220\076\116\033\000\361\025\255\203\053\232$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "TunTrust Root CA"
- # Issuer: CN=TunTrust Root CA,O=Agence Nationale de Certification Electronique,C=TN
- # Serial Number:13:02:d5:e2:40:4c:92:46:86:16:67:5d:b4:bb:bb:b2:6b:3e:fc:13
- # Subject: CN=TunTrust Root CA,O=Agence Nationale de Certification Electronique,C=TN
- # Not Valid Before: Fri Apr 26 08:57:56 2019
- # Not Valid After: Tue Apr 26 08:57:56 2044
- # Fingerprint (SHA-256):
- 2E:44:10:2A:B5:8C:B8:54:19:45:1C:8E:19:D9:AC:F3:66:2C:AF:BC:61:4B:6A:53:96:0A:30:F7:D0:E2:EB:41
- # Fingerprint (SHA1): CF:E9:70:84:0F:E0:73:0F:9D:F6:0C:7F:2C:4B:EE:20:46:34:9C:BB
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA\_LABEL UTF8 "TunTrust Root CA"
- CKA CERT SHA1 HASH MULTILINE OCTAL
- \317\351\160\204\017\340\163\017\235\366\014\177\054\113\356\040 \106\064\234\273

END

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\205\023\271\220\133\066\134\266\136\270\132\370\340\061\127\264

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\024\023\002\325\342\100\114\222\106\206\026\147\135\264\273 \273\262\153\076\374\023

END

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

# CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "HARICA TLS RSA Root CA 2021"

#

- # Issuer: CN=HARICA TLS RSA Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR
- # Serial Number:39:ca:93:1c:ef:43:f3:c6:8e:93:c7:f4:64:89:38:7e
- # Subject: CN=HARICA TLS RSA Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR
- # Not Valid Before: Fri Feb 19 10:55:38 2021
- # Not Valid After: Mon Feb 13 10:55:37 2045
- # Fingerprint (SHA-256):
- D9:5D:0E:8E:DA:79:52:5B:F9:BE:B1:1B:14:D2:10:0D:32:94:98:5F:0C:62:D9:FA:BD:9C:D9:99:EC:CB:7B:1D
- # Fingerprint (SHA1): 02:2D:05:82:FA:88:CE:14:0C:06:79:DE:7F:14:10:E9:45:D7:A5:6D
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- CKA MODIFIABLE CK BBOOL CK FALSE
- CKA LABEL UTF8 "HARICA TLS RSA Root CA 2021"
- CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509
- CKA SUBJECT MULTILINE OCTAL
- \060\154\061\013\060\011\006\003\125\004\006\023\002\107\122\061
- $\\ \begin{tabular}{l} $$ \begin{tabular}{l} $\langle 067 \rangle 060 \rangle 065 \rangle 006 \rangle 003 \rangle 125 \rangle 004 \rangle 012 \rangle 014 \rangle 056 \rangle 110 \rangle 145 \rangle 154 \rangle 156 \rangle 006 \rangle$
- \151\143\040\101\143\141\144\145\155\151\143\040\141\156\144\040
- \122\145\163\145\141\162\143\150\040\111\156\163\164\151\164\165
- \164\151\157\156\163\040\103\101\061\044\060\042\006\003\125\004
- \003\014\033\110\101\122\111\103\101\040\124\114\123\040\122\123
- $\label{eq:condition} $$ 101\040\122\157\157\164\040\103\101\040\062\060\062\061$$

END

CKA ID UTF8 "0"

#### CKA\_ISSUER MULTILINE\_OCTAL

\060\154\061\013\060\011\006\003\125\004\006\023\002\107\122\061 \067\060\065\006\003\125\004\012\014\056\110\145\154\154\145\156

\151\143\040\101\143\141\144\145\155\151\143\040\141\156\144\040

\164\151\157\156\163\040\103\101\061\044\060\042\006\003\125\004

 $\label{eq:condition} $$ \003\014\033\110\101\122\111\103\101\040\124\114\123\040\122\123$ 

\101\040\122\157\157\164\040\103\101\040\062\060\062\061

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\071\312\223\034\357\103\363\306\216\223\307\364\144\211 \070\176

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\244\060\202\003\214\240\003\002\001\002\002\020\071 \\312\223\034\357\103\363\306\216\223\307\364\144\211\070\176\060 \\015\006\011\052\206\110\206\367\015\001\001\013\005\000\060\154 \\061\013\060\011\006\003\125\004\006\023\002\107\122\061\067\060

\065\006\003\125\004\012\014\056\110\145\154\154\145\156\151\143 \040\101\143\141\144\145\155\151\143\040\141\156\144\040\122\145 \163\145\141\162\143\150\040\111\156\163\164\151\164\165\164\151 \157\156\163\040\103\101\061\044\060\042\006\003\125\004\003\014 \033\110\101\122\111\103\101\040\124\114\123\040\122\123\101\040 \122\157\157\164\040\103\101\040\062\060\062\061\060\036\027\015 \062\061\060\062\061\071\061\060\065\065\063\070\132\027\015\064 \065\060\062\061\063\061\060\065\065\063\067\132\060\154\061\013  $\label{eq:condition} $$ \000\01\000\023\002\107\122\061\067\060\065\006 $$$ \003\125\004\012\014\056\110\145\154\154\145\156\151\143\040\101 \143\141\144\145\155\151\143\040\141\156\144\040\122\145\163\145  $\\ 141\\162\\143\\150\\040\\111\\1156\\163\\164\\151\\164\\165\\164\\151\\157\\156$ \163\040\103\101\061\044\060\042\006\003\125\004\003\014\033\110 \157\164\040\103\101\040\062\060\062\061\060\202\002\002\042\060\015 \006\011\052\206\110\206\367\015\001\001\001\005\000\003\202\002  $\label{eq:condition} $$ \0.017\0.00\0.60\2.02\0.012\0.02\2.002\0.01\0.00\2.13\3.02\3.47\2.57\1.45 $$$ \233\005\147\226\311\015\044\271\320\016\144\374\316\342\044\030 \054\204\177\167\121\313\004\021\066\270\136\355\151\161\247\236 \344\045\011\227\147\301\107\302\317\221\026\066\142\075\070\004 \341\121\202\377\254\322\264\151\335\056\354\021\243\105\356\153 \153\073\114\277\214\215\244\036\235\021\271\351\070\371\172\016  $\\014\\230\\342\\043\\035\\321\\116\\143\\324\\347\\270\\101\\104\\373\\153\\257$ \153\332\037\323\305\221\210\133\244\211\222\321\201\346\214\071 \130\240\326\151\103\251\255\230\122\130\156\333\012\373\153\317 \150\372\343\244\136\072\105\163\230\007\352\137\002\162\336\014 \245\263\237\256\251\035\267\035\263\374\212\131\347\156\162\145 \255\365\060\224\043\007\363\202\026\113\065\230\234\123\273\057 \312\344\132\331\307\215\035\374\230\231\373\054\244\202\153\360 \052\037\216\013\137\161\134\134\256\102\173\051\211\201\313\003  $\label{eq:condition} $\243\231\312\210\236\013\100\011\101\063\333\346\130\172\375\256$$ \231\160\300\132\017\326\023\206\161\057\166\151\374\220\335\333 \055\156\321\362\233\365\032\153\236\157\025\214\172\360\113\050 \240\042\070\200\044\154\066\244\073\362\060\221\363\170\023\317 \301\077\065\253\361\035\021\043\265\103\042\236\001\222\267\030 \002\345\021\321\202\333\025\000\314\141\067\301\052\174\232\341 \320\272\263\120\106\356\202\254\235\061\370\373\043\342\003\000 \110\160\243\011\046\171\025\123\140\363\070\134\255\070\352\201  $\label{eq:condition} $$ \000\143\024\271\063\136\335\013\333\240\105\007\032\063\011\370 $$$ \115\264\247\002\246\151\364\302\131\005\210\145\205\126\256\113 \313\340\336\074\175\055\032\310\351\373\037\243\141\112\326\052 \023\255\167\114\032\030\233\221\017\130\330\006\124\305\227\370 \252\077\040\212\246\205\246\167\366\246\374\034\342\356\156\224 \063\052\203\120\204\012\345\117\206\370\120\105\170\000\201\353 \133\150\343\046\215\314\173\134\121\364\024\054\100\276\032\140 \035\172\162\141\035\037\143\055\210\252\316\242\105\220\010\374 \153\276\263\120\052\132\375\250\110\030\106\326\220\100\222\220 \012\204\136\150\061\370\353\355\015\323\035\306\175\231\030\125

\126\047\145\056\215\105\305\044\354\316\343\002\003\001\000\001 \243\102\060\100\060\017\006\003\125\035\023\001\001\377\004\005 \060\003\001\001\377\060\035\006\003\125\035\016\004\026\004\024  $\label{eq:condition} $$ \012\10\043\246\140\244\222\012\063\352\223\133\305\127\352\045 $$$ \115\275\022\356\060\016\006\003\125\035\017\001\001\377\004\004  $\label{eq:condition} $$ \003\002\001\206\060\015\006\011\052\206\110\206\367\015\001\001$ \013\005\000\003\202\002\001\000\076\220\110\252\156\142\025\045 \146\173\014\325\214\213\211\235\327\355\116\007\357\234\320\024 \137\136\120\275\150\226\220\244\024\021\252\150\155\011\065\071 \100\011\332\364\011\054\064\245\173\131\204\111\051\227\164\310  $\label{eq:condition} $$ \007\036\107\155\362\316\034\120\046\343\236\075\100\123\077\367 $$$ \177\226\166\020\305\106\245\320\040\113\120\364\065\073\030\364 \125\152\101\033\107\006\150\074\273\011\010\142\331\137\125\102 \252\254\123\205\254\225\126\066\126\253\344\005\214\305\250\332  $\label{eq:condition} $$ \037\243\151\275\123\017\304\377\334\312\343\176\362\114\210\206$ \107\106\032\363\000\365\200\221\242\334\103\102\224\233\040\360  $\label{eq:condition} $$ 321\315\262\353\054\123\302\123\170\112\117\004\224\101\232\217 $$ \047\062\301\345\111\031\277\361\362\302\213\250\012\071\061\050 \264\175\142\066\054\115\354\037\063\266\176\167\155\176\120\360 \237\016\327\021\217\317\030\305\343\047\376\046\357\005\235\317 \317\067\305\320\173\332\073\260\026\204\014\072\223\326\276\027  $\label{eq:condition} $$ 33\017\076\016\031\170\011\307\251\002\162\042\113\367\067\166$$ \272\165\304\205\003\132\143\325\261\165\005\302\271\275\224\255 \214\025\231\247\223\175\366\305\363\252\164\317\004\205\224\230  $\label{eq:condition} $$ \000\364\342\371\312\044\145\277\340\142\257\310\305\372\262\311 $$$ \236\126\110\332\171\375\226\166\025\276\243\216\126\304\263\064 \374\276\107\364\301\264\250\374\325\060\210\150\356\313\256\311 \143\304\166\276\254\070\030\341\136\134\317\256\072\042\121\353 \321\213\263\363\053\063\007\124\207\372\264\262\023\173\272\123 \004\142\001\235\361\300\117\356\341\072\324\213\040\020\372\002  $\label{eq:condition} $$ \frac{357}{301}013\frac{267}{220}106\frac{234}{031}051\frac{214}{334}157\frac{240}{112}$ \151\151\224\267\044\145\240\377\254\077\316\001\373\041\056\375 \150\370\233\362\245\317\061\070\134\025\252\346\227\000\301\337 \132\245\247\071\252\351\204\177\074\121\250\072\331\224\133\214 \277\117\010\161\345\333\250\134\324\322\246\376\000\243\306\026 \307\017\350\200\316\034\050\144\164\031\010\323\102\343\316\000 \135\177\261\334\023\260\341\005\313\321\040\252\206\164\236\071 \347\221\375\377\133\326\367\255\246\057\003\013\155\343\127\124 \353\166\123\030\215\021\230\272

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

<sup>#</sup> Trust for "HARICA TLS RSA Root CA 2021"

<sup>#</sup> Issuer: CN=HARICA TLS RSA Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR

<sup>#</sup> Serial Number:39:ca:93:1c:ef:43:f3:c6:8e:93:c7:f4:64:89:38:7e

<sup>#</sup> Subject: CN=HARICA TLS RSA Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR

```
# Not Valid Before: Fri Feb 19 10:55:38 2021
# Not Valid After: Mon Feb 13 10:55:37 2045
# Fingerprint (SHA-256):
D9:5D:0E:8E:DA:79:52:5B:F9:BE:B1:1B:14:D2:10:0D:32:94:98:5F:0C:62:D9:FA:BD:9C:D9:99:EC:CB:7B:1D
# Fingerprint (SHA1): 02:2D:05:82:FA:88:CE:14:0C:06:79:DE:7F:14:10:E9:45:D7:A5:6D
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "HARICA TLS RSA Root CA 2021"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\label{eq:condition} $$ \002\05\005\202\372\210\316\024\014\006\171\336\177\024\020\351 $$
\105\327\245\155
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\145\107\233\130\206\335\054\360\374\242\204\037\036\226\304\221
END
CKA ISSUER MULTILINE OCTAL
\060\154\061\013\060\011\006\003\125\004\006\023\002\107\122\061
\\ \\067\\ \\060\\ \\065\\ \\006\\ \\003\\ \\125\\ \\004\\ \\012\\ \\014\\ \\056\\ \\110\\ \\145\\ \\154\\ \\154\\ \\145\\ \\156
\151\143\040\101\143\141\144\145\155\151\143\040\141\156\144\040
\122\145\163\145\141\162\143\150\040\111\156\163\164\151\164\165
\164\151\157\156\163\040\103\101\061\044\060\042\006\003\125\004
\003\014\033\110\101\122\111\103\101\040\124\114\123\040\122\123
\101\040\122\157\157\164\040\103\101\040\062\060\062\061
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \002\020\071\312\223\034\357\103\363\306\216\223\307\364\144\211 $$
\070\176
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "HARICA TLS ECC Root CA 2021"
# Issuer: CN=HARICA TLS ECC Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR
# Serial Number:67:74:9d:8d:77:d8:3b:6a:db:22:f4:ff:59:e2:bf:ce
# Subject: CN=HARICA TLS ECC Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR
# Not Valid Before: Fri Feb 19 11:01:10 2021
# Not Valid After: Mon Feb 13 11:01:09 2045
# Fingerprint (SHA-256):
3F:99:CC:47:4A:CF:CE:4D:FE:D5:87:94:66:5E:47:8D:15:47:73:9F:2E:78:0F:1B:B4:CA:9B:13:30:97:D4:01
# Fingerprint (SHA1): BC:B0:C1:9D:E9:98:92:70:19:38:57:E9:8D:A7:B4:5D:6E:EE:01:48
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
```

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA LABEL UTF8 "HARICA TLS ECC Root CA 2021"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \000154\061\013\060\011\006\003\125\004\006\023\002\107\122\061 $$ \067\060\065\006\003\125\004\012\014\056\110\145\154\154\154\156\151\143\040\101\143\141\144\145\155\151\143\040\141\156\144\040\122\145\163\145\141\162\143\150\040\111\156\163\164\151\164\165\164\151\157\156\163\040\103\101\061\044\060\042\006\003\125\004\003\014\033\110\101\122\111\103\101\040\124\114\123\040\105\103\103\040\122\157\157\164\040\103\101\040\062\060\062\061\ END$ 

CKA ID UTF8 "0"

#### CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000154\061\013\060\011\006\003\125\004\006\023\002\107\122\061\067\060\065\006\003\125\004\012\014\056\110\145\154\154\154\155\151\143\040\141\156\144\040\122\145\163\145\141\162\143\150\040\111\156\163\164\151\164\165\164\151\157\156\163\040\103\101\061\044\060\042\006\003\125\004\003\014\033\110\101\122\111\103\101\040\124\114\123\040\105\103\103\040\122\157\157\164\040\103\101\040\062\060\062\061\ END$ 

CKA SERIAL NUMBER MULTILINE OCTAL

\002\020\147\164\235\215\167\330\073\152\333\042\364\377\131\342 \277\316

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\002\124\060\202\001\333\240\003\002\001\002\002\020\147 \164\235\215\167\330\073\152\333\042\364\377\131\342\277\316\060  $\label{eq:condition} $$ \012\006\010\052\206\110\316\075\004\003\003\060\154\061\013\060 $$$ \011\006\003\125\004\006\023\002\107\122\061\067\060\065\006\003 \125\004\012\014\056\110\145\154\154\145\156\151\143\040\101\143 \141\144\145\155\151\143\040\141\156\144\040\122\145\163\145\141 \162\143\150\040\111\156\163\164\151\164\165\164\151\157\156\163 \040\103\101\061\044\060\042\006\003\125\004\003\014\033\110\101 \122\111\103\101\040\124\114\123\040\105\103\103\040\122\157\157  $\label{eq:condition} $$ 164\040\103\101\040\062\060\062\061\060\036\027\015\062\061\060$ \003\125\004\006\023\002\107\122\061\067\060\065\006\003\125\004 \012\014\056\110\145\154\154\145\156\151\143\040\101\143\141\144 \145\155\151\143\040\141\156\144\040\122\145\163\145\141\162\143 \150\040\111\156\163\164\151\164\165\164\151\157\156\163\040\103 \101\061\044\060\042\006\003\125\004\003\014\033\110\101\122\111 \103\101\040\124\114\123\040\105\103\103\040\122\157\157\164\040 \103\101\040\062\060\062\061\060\166\060\020\006\007\052\206\110 \316\075\002\001\006\005\053\201\004\000\042\003\142\000\004\070

\010\376\261\240\226\322\172\254\257\111\072\320\300\340\303\073 \050\252\361\162\155\145\000\107\210\204\374\232\046\153\252\113  $\label{eq:condition} $$ \272\154\004\012\210\136\027\362\125\207\374\060\260\064\342\064$ \130\127\032\204\123\351\060\331\251\362\226\164\303\121\037\130  $\label{eq:condition} $$ \frac{111}061\frac{314}230\frac{116}140\frac{221}207\frac{65}323\frac{224}220\frac{117}233\frac{020}{224} $$$  $\label{eq:condition} $$ \052\250\170\055\276\220\101\130\220\025\162\247\241\267\243 $$$ \102\060\100\060\017\006\003\125\035\023\001\001\377\004\005\060 \003\001\001\377\060\035\006\003\125\035\016\004\026\004\024\311  $\label{eq:condition} $$ \031\23\201\022\376\004\325\026\321\252\274\232\157\267\240\225 $$$ \031\156\312\060\016\006\003\125\035\017\001\001\377\004\004\003 \002\001\206\060\012\006\010\052\206\110\316\075\004\003\003\003 \147\000\060\144\002\060\021\336\256\370\334\116\210\260\251\360 \042\255\302\121\100\357\140\161\055\356\217\002\304\135\003\160 \111\244\222\352\305\024\210\160\246\323\015\260\252\312\054\100 \234\373\351\202\156\232\002\060\053\107\232\007\306\321\302\201 \174\312\013\226\030\101\033\243\364\060\011\236\265\043\050\015 \237\024\266\074\123\242\114\006\151\175\372\154\221\306\052\111 \105\346\354\267\023\341\072\154

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "HARICA TLS ECC Root CA 2021"
- # Issuer: CN=HARICA TLS ECC Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR
- # Serial Number:67:74:9d:8d:77:d8:3b:6a:db:22:f4:ff:59:e2:bf:ce
- # Subject: CN=HARICA TLS ECC Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR
- # Not Valid Before: Fri Feb 19 11:01:10 2021
- # Not Valid After: Mon Feb 13 11:01:09 2045
- # Fingerprint (SHA-256):
- 3F:99:CC:47:4A:CF:CE:4D:FE:D5:87:94:66:5E:47:8D:15:47:73:9F:2E:78:0F:1B:B4:CA:9B:13:30:97:D4:01
- # Fingerprint (SHA1): BC:B0:C1:9D:E9:98:92:70:19:38:57:E9:8D:A7:B4:5D:6E:EE:01:48
- CKA CLASS CK OBJECT CLASS CKO NSS TRUST
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA\_LABEL UTF8 "HARICA TLS ECC Root CA 2021"
- ${\tt CKA\_CERT\_SHA1\_HASH\ MULTILINE\_OCTAL}$
- \274\260\301\235\351\230\222\160\031\070\127\351\215\247\264\135 \156\356\001\110

**END** 

CKA CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \256\367\114\345\146\065\321\267\233\214\042\223\164\323\113\260$$ 

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\154\061\013\060\011\006\003\125\004\006\023\002\107\122\061 \067\060\065\006\003\125\004\012\014\056\110\145\154\154\145\156 \151\143\040\101\143\141\144\145\155\151\143\040\141\156\144\040

```
\122\145\163\145\141\162\143\150\040\111\156\163\164\151\164\165
\164\151\157\156\163\040\103\101\061\044\060\042\006\003\125\004
\003\014\033\110\101\122\111\103\101\040\124\114\123\040\105\103
\103\040\122\157\157\164\040\103\101\040\062\060\062\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\147\164\235\215\167\330\073\152\333\042\364\377\131\342
\277\316
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
#
# Certificate "HARICA Client RSA Root CA 2021"
# Issuer: CN=HARICA Client RSA Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR
# Serial Number:55:52:f8:1e:db:1b:24:2c:9e:bb:96:18:cd:02:28:3e
# Subject: CN=HARICA Client RSA Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR
# Not Valid Before: Fri Feb 19 10:58:46 2021
# Not Valid After: Mon Feb 13 10:58:45 2045
# Fingerprint (SHA-256):
1B:E7:AB:E3:06:86:B1:63:48:AF:D1:C6:1B:68:66:A0:EA:7F:48:21:E6:7D:5E:8A:F9:37:CF:80:11:BC:75:0D
# Fingerprint (SHA1): 46:C6:90:0A:77:3A:B6:BC:F4:65:AD:AC:FC:E3:F7:07:00:6E:DE:6E
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "HARICA Client RSA Root CA 2021"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\157\061\013\060\011\006\003\125\004\006\023\002\107\122\061
\067\060\065\006\003\125\004\012\014\056\110\145\154\154\145\156
\151\143\040\101\143\141\144\145\155\151\143\040\141\156\144\040
\122\145\163\145\141\162\143\150\040\111\156\163\164\151\164\165
\164\151\157\156\163\040\103\101\061\047\060\045\006\003\125\004
\003\014\036\110\101\122\111\103\101\040\103\154\151\145\156\164
\label{eq:condition} $$ \040\122\123\101\040\122\157\157\164\040\103\101\040\062\060\062
\061
END
CKA ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\157\061\013\060\011\006\003\125\004\006\023\002\107\122\061
\067\060\065\006\003\125\004\012\014\056\110\145\154\154\145\156
\151\143\040\101\143\141\144\145\155\151\143\040\141\156\144\040
\122\145\163\145\141\162\143\150\040\111\156\163\164\151\164\165
\164\151\157\156\163\040\103\101\061\047\060\045\006\003\125\004
```

\003\014\036\110\101\122\111\103\101\040\103\154\151\145\156\164 \040\122\123\101\040\122\157\157\164\040\103\101\040\062\060\062 \061

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

\002\020\125\122\370\036\333\033\044\054\236\273\226\030\315\002 \050\076

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\252\060\202\003\222\240\003\002\001\002\002\020\125 \122\370\036\333\033\044\054\236\273\226\030\315\002\050\076\060  $\label{eq:condition} $$ \015\006\011\052\206\110\206\367\015\001\001\013\005\000\060\157 $$$ \061\013\060\011\006\003\125\004\006\023\002\107\122\061\067\060  $\\ \\ 040\\ \\ 101\\ \\ 143\\ \\ 141\\ \\ 144\\ \\ 145\\ \\ 155\\ \\ 151\\ \\ 143\\ \\ 040\\ \\ 141\\ \\ 156\\ \\ 144\\ \\ 040\\ \\ 122\\ \\ 145$ \163\145\141\162\143\150\040\111\156\163\164\151\164\165\164\151 \157\156\163\040\103\101\061\047\060\045\006\003\125\004\003\014 \036\110\101\122\111\103\101\040\103\154\151\145\156\164\040\122 \123\101\040\122\157\157\164\040\103\101\040\062\060\062\061\060  $\label{eq:condition} $$ \036\027\015\062\061\060\062\061\071\061\060\065\070\064\066\132 $$$ \027\015\064\065\060\062\061\063\061\060\065\070\064\065\132\060 \157\061\013\060\011\006\003\125\004\006\023\002\107\122\061\067 \143\040\101\143\141\144\145\155\151\143\040\141\156\144\040\122 \145\163\145\141\162\143\150\040\111\156\163\164\151\164\165\164 \151\157\156\163\040\103\101\061\047\060\045\006\003\125\004\003 \014\036\110\101\122\111\103\101\040\103\154\151\145\156\164\040 \122\123\101\040\122\157\157\164\040\103\101\040\062\060\062\061 \060\202\002\042\060\015\006\011\052\206\110\206\367\015\001\001 \001\005\000\003\202\002\017\000\060\202\002\012\002\202\002\001  $\label{eq:condition} $$ 000\201\333\127\102\220\054\164\065\364\370\270\164\031\115\253$ \011\132\167\105\201\163\142\260\065\237\370\320\267\063\000\207 \023\266\226\253\016\124\022\060\007\274\233\267\110\327\321\031 \203\256\216\330\251\361\251\000\204\260\214\136\236\350\014\217 \124\151\277\366\324\010\117\046\160\376\030\101\143\032\263\062 \213\100\370\007\253\127\061\360\306\026\166\147\232\264\335\057 \362\321\153\305\320\222\204\221\161\156\017\056\143\351\037\123 \244\335\122\023\314\011\203\051\201\014\305\123\165\104\261\016 \147\123\030\320\303\037\210\113\237\224\044\264\051\274\273\350 \116\375\157\322\025\035\111\334\215\160\362\021\032\040\121\125 \021\272\210\157\304\367\120\171\326\252\061\342\204\075\136\062 \310\167\052\120\161\345\013\057\351\266\352\357\253\012\063\071 \016\375\217\245\147\103\202\216\230\151\011\011\033\100\315\070 \147\107\352\311\354\227\161\022\336\044\365\162\074\321\367\103  $\label{eq:condition} $$ \frac{114 \cdot 046 \cdot 367 \cdot 220 \cdot 262 \cdot 211 \cdot 351 \cdot 105 \cdot 113 \cdot 125 \cdot 075 \cdot 061 \cdot 005 \cdot 172 \cdot 101 \cdot 342}{114 \cdot 046 \cdot 367 \cdot 220 \cdot 262 \cdot 211 \cdot 351 \cdot 105 \cdot 113 \cdot 125 \cdot 075 \cdot 061 \cdot 005 \cdot 172 \cdot 101 \cdot 342}$ \225\272\103\300\027\305\266\205\075\031\215\144\160\363\133\254 \315\237\323\051\165\207\113\225\147\152\246\370\321\335\274\220 \206\211\103\051\251\067\133\365\135\260\046\132\123\102\166\220

\053\317\236\126\154\053\124\317\134\232\145\337\133\213\110\140 \070\174\373\305\013\317\166\004\143\002\063\052\175\365\203\147 \347\372\306\103\375\053\017\324\046\057\167\244\062\301\044\352 \144\235\277\263\070\161\061\104\362\107\270\242\146\101\241\373 \233\173\274\307\106\152\165\277\132\242\214\350\152\104\301\270  $\verb| | 226| 265| 300| 062| 010| 055| 173| 164| 065| 163| 262| 312| 306| 376| 257| 021|$ \162\030\366\347\310\302\317\245\052\352\173\326\131\350\174\240 \262\152\100\011\151\016\245\226\333\321\000\271\361\210\156\066  $\label{eq:condition} $$ \360\210\262\235\361\122\362\303\174\277\060\211\074\012\151\371 $$$ \042\244\145\341\233\340\164\306\261\205\227\226\054\256\224\217  $\label{eq:condition} $$ \frac{120}{246}071\\022\\037\\276\\107\\362\\201\\170\\323\\165\\066\\236\\175\\132$  $\label{eq:condition} $$ \040\227\342\122\256\231\237\306\174\233\146\363\376\330\317\356$$ \275\227\006\035\055\205\334\076\066\123\226\173\040\272\350\310  $\label{eq:condition} $$ 341\255\226\142\076\021\174\263\000\204\236\247\114\161\253\112$$  $\label{eq:condition} $$ \000\001\000\001\243\102\060\100\060\017\006\003\125\035$$ \023\001\001\377\004\005\060\003\001\001\377\060\035\006\003\125  $\label{eq:condition} $$ \035\016\004\026\004\024\240\326\007\075\136\044\367\173\240\104$ \056\044\122\015\031\252\053\004\221\247\060\016\006\003\125\035 \017\001\001\377\004\004\003\002\001\206\060\015\006\011\052\206 \110\206\367\015\001\001\013\005\000\003\202\002\001\000\015\107 \371\011\146\061\122\354\171\356\302\250\362\150\076\355\226\105 \313\072\246\230\143\077\352\053\115\116\003\320\034\202\341\313  $\label{eq:condition} $$ 323\345\326\253\133\147\050\274\235\376\014\231\012\200\125\247 $$$ \316\033\043\141\015\260\127\360\376\340\312\276\346\220\333\203 \054\276\203\216\364\171\266\376\320\015\102\247\130\037\151\352 \201\365\005\245\376\106\150\353\154\170\311\340\352\347\346\336 \061\305\322\325\054\202\143\050\235\135\250\032\176\210\346\347 \053\361\054\325\320\005\236\334\055\275\067\146\324\004\242\247 \255\277\072\302\250\073\255\377\215\235\063\340\271\232\204\241 \207\037\166\364\202\164\327\016\371\060\110\076\133\210\076\252  $\label{eq:condition} $$134\153\326\057\014\350\216\163\302\030\221\203\071\266\146\132$$ \320\037\140\047\135\115\343\366\072\015\146\120\234\170\173\253 \363\023\020\256\017\057\253\350\144\263\030\040\235\106\065\144 \045\163\352\233\020\134\130\065\211\261\106\110\247\364\254\324 \035\236\133\314\251\245\032\023\117\044\120\252\331\033\155\261 \100\373\235\335\130\164\304\302\157\024\162\354\333\065\237\270 \124\165\105\303\246\310\032\050\065\072\256\145\362\251\230\316 \257\133\311\070\214\061\073\177\314\334\226\375\342\133\326\320 \131\364\166\272\013\313\117\203\020\307\100\320\035\140\351\052 \345\110\130\167\014\105\151\276\031\161\004\044\342\343\044\037 \112\310\301\076\231\365\226\230\070\110\045\241\025\260\033\327 \342\204\030\133\366\161\065\232\150\173\100\314\030\134\014\044 \235\324\225\365\231\252\106\352\256\254\277\364\024\031\044\350 \214\354\343\365\274\006\150\212\052\014\005\137\012\227\165\247  $\label{eq:condition} $$ 34\176\300\375\327\172\030\337\060\321\070\113\037\260\230\160$$ \277\314\174\163\360\156\304\061\245\244\227\035\254\277\316\154 \041\112\276\047\043\147\363\006\126\201\012\221\216\266\341\003  $\\ \\005\\ \\063\\ \\054\\ \\332\\ \\064\\ \\010\\ \\115\\ \\116\\ \\120\\ \\043\\ \\255\\ \\037\\ \\245\\ \\305\\ \\324\\ \\172$   $\label{eq:control_state} $$ 376\352\011\354\247\050\140\213\106\174\265\352\233\335\117\371 $$ 347\153\025\306\210\317\103\333\345\047\334\004\126\156\157\106 $$ 025\361\126\055\350\134\014\163\303\043\201\070\040\313\311\014 $$ 151\317\054\253\073\204\140\063\031\122\375\151\024\063 $$$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "HARICA Client RSA Root CA 2021"
- # Issuer: CN=HARICA Client RSA Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR
- # Serial Number:55:52:f8:1e:db:1b:24:2c:9e:bb:96:18:cd:02:28:3e
- # Subject: CN=HARICA Client RSA Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR
- # Not Valid Before: Fri Feb 19 10:58:46 2021
- # Not Valid After: Mon Feb 13 10:58:45 2045
- # Fingerprint (SHA-256):

1B:E7:AB:E3:06:86:B1:63:48:AF:D1:C6:1B:68:66:A0:EA:7F:48:21:E6:7D:5E:8A:F9:37:CF:80:11:BC:75:0D

# Fingerprint (SHA1): 46:C6:90:0A:77:3A:B6:BC:F4:65:AD:AC:FC:E3:F7:07:00:6E:DE:6E

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "HARICA Client RSA Root CA 2021"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\106\306\220\012\167\072\266\274\364\145\255\254\374\343\367\007

\000\156\336\156

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\157\355\134\327\210\314\070\251\334\351\335\331\135\333\330\355

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\157\061\013\060\011\006\003\125\004\006\023\002\107\122\061 $$$ 

\151\143\040\101\143\141\144\145\155\151\143\040\141\156\144\040

\164\151\157\156\163\040\103\101\061\047\060\045\006\003\125\004

\003\014\036\110\101\122\111\103\101\040\103\154\151\145\156\164

\040\122\123\101\040\122\157\157\164\040\103\101\040\062\060\062

\061

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\020\125\122\370\036\333\033\044\054\236\273\226\030\315\002$ 

\050\076

**END** 

 ${\tt CKA\_TRUST\_SERVER\_AUTH\ CK\_TRUST\ CKT\_NSS\_MUST\_VERIFY\_TRUST}$ 

CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST

CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

# Certificate "HARICA Client ECC Root CA 2021"

#

- # Issuer: CN=HARICA Client ECC Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR
- # Serial Number:31:68:d9:d8:e1:62:57:1e:d2:19:44:88:e6:10:7d:f0
- # Subject: CN=HARICA Client ECC Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR
- # Not Valid Before: Fri Feb 19 11:03:34 2021
- # Not Valid After: Mon Feb 13 11:03:33 2045
- # Fingerprint (SHA-256):
- 8D:D4:B5:37:3C:B0:DE:36:76:9C:12:33:92:80:D8:27:46:B3:AA:6C:D4:26:E7:97:A3:1B:AB:E4:27:9C:F0:0B
- # Fingerprint (SHA1): BE:64:D3:DA:14:4B:D2:6B:CD:AF:8F:DB:A6:A6:72:F8:DE:26:F9:00
- CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA\_LABEL UTF8 "HARICA Client ECC Root CA 2021"
- CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509
- CKA SUBJECT MULTILINE OCTAL
- $\label{eq:condition} $$ \060\157\061\013\060\011\006\003\125\004\006\023\002\107\122\061 $$$
- \067\060\065\006\003\125\004\012\014\056\110\145\154\154\145\156
- \151\143\040\101\143\141\144\145\155\151\143\040\141\156\144\040
- \164\151\157\156\163\040\103\101\061\047\060\045\006\003\125\004
- \003\014\036\110\101\122\111\103\101\040\103\154\151\145\156\164
- $\label{eq:condition} $$ \040\105\103\103\040\122\157\157\164\040\103\101\040\062\060\062$

\061 END

CKA ID UTF8 "0"

### CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000157\061\013\060\011\006\003\125\004\006\023\002\107\122\061 \\ \0067\060\065\006\003\125\004\012\014\056\110\145\154\154\154\155\156\151\143\040\101\1145\156\144\040 \\ \122\145\163\145\141\162\143\150\040\111\156\163\164\151\164\165\164\151\157\156\163\040\103\101\061\047\060\045\006\003\125\004\003\014\036\110\101\122\111\103\101\040\103\154\151\145\156\164\040\105\103\103\040\122\157\157\164\040\103\101\040\062\060\062\066\0061$ 

**END** 

#### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\061\150\331\330\341\142\127\036\322\031\104\210\346\020 \175\360

**END** 

### CKA\_VALUE MULTILINE\_OCTAL

\060\202\002\132\060\202\001\341\240\003\002\001\002\002\002\061 \150\331\330\341\142\127\036\322\031\104\210\346\020\175\360\060 \012\006\010\052\206\110\316\075\004\003\003\060\157\061\013\060 \011\006\003\125\004\006\023\002\107\122\061\067\060\065\006\003

\125\004\012\014\056\110\145\154\154\145\156\151\143\040\101\143 \141\144\145\155\151\143\040\141\156\144\040\122\145\163\145\141 \162\143\150\040\111\156\163\164\151\164\165\164\151\157\156\163 \040\103\101\061\047\060\045\006\003\125\004\003\014\036\110\101 \122\111\103\101\040\103\154\151\145\156\164\040\105\103\103\040 \122\157\157\164\040\103\101\040\062\060\062\061\060\036\027\015 \062\061\060\062\061\071\061\061\060\063\063\064\132\027\015\064  $\label{eq:condition} $$ \000\01\000\023\002\107\122\061\067\060\065\006 $$$ \003\125\004\012\014\056\110\145\154\154\145\156\151\143\040\101  $\\ 143 \\ 141 \\ 144 \\ 145 \\ 155 \\ 151 \\ 143 \\ 040 \\ 141 \\ 156 \\ 144 \\ 040 \\ 122 \\ 145 \\ 163 \\ 145 \\$  $\\ 141\\162\\143\\150\\040\\111\\1156\\163\\164\\151\\164\\165\\164\\151\\157\\156$ \163\040\103\101\061\047\060\045\006\003\125\004\003\014\036\110  $\label{eq:condition} $$ \040\122\157\157\164\040\103\101\040\062\060\062\061\060\166\060$$ \020\006\007\052\206\110\316\075\002\001\006\005\053\201\004\000  $\label{eq:condition} $$ \042\003\142\000\004\007\030\255\225\226\224\320\134\017\202\367 $$$ \052\100\372\002\311\311\075\066\246\243\004\152\301\155\225\001 \210\140\022\124\154\134\242\053\156\023\072\210\225\014\034\046  $\label{eq:condition} $$ \206\066\112\211\031\267\030\336\073\350\250\120\037\312\337\133 $$$ \277\111\200\025\333\343\060\341\035\132\307\052\212\001\007\376 \155\054\064\357\050\050\227\274\301\371\127\206\225\213\065\317  $\label{eq:condition} $$ \236\132\321\150\225\243\102\060\100\060\017\006\003\125\035\023$ \001\001\377\004\005\060\003\001\001\377\060\035\006\003\125\035  $\label{eq:condition} $$ \016\004\026\004\024\122\010\322\276\062\201\045\375\365\032\227 $$$ \354\116\137\032\273\123\315\220\255\060\016\006\003\125\035\017 \001\001\377\004\004\003\002\001\206\060\012\006\010\052\206\110  $\label{eq:condition} $$ 316\075\004\003\003\003\147\000\060\144\002\060\114\061\105\106$ \117\250\346\276\303\167\262\032\030\113\055\210\173\130\346\253 \224\153\104\003\260\027\377\337\202\163\104\121\054\375\223\035  $\label{eq:condition} $$ \006\173\024\322\211\354\100\014\357\041\001\056\002\060\057\311 $$$ \056\132\154\054\035\331\225\340\236\260\271\134\122\174\366\370 \070\312\056\361\324\035\362\242\111\242\225\370\301\130\136\117 \376\163\012\357\061\260\253\043\130\023\214\213\336\073 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

<sup>#</sup> Trust for "HARICA Client ECC Root CA 2021"

<sup>#</sup> Issuer: CN=HARICA Client ECC Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR

<sup>#</sup> Serial Number:31:68:d9:d8:e1:62:57:1e:d2:19:44:88:e6:10:7d:f0

<sup>#</sup> Subject: CN=HARICA Client ECC Root CA 2021,O=Hellenic Academic and Research Institutions CA,C=GR

<sup>#</sup> Not Valid Before: Fri Feb 19 11:03:34 2021

<sup>#</sup> Not Valid After: Mon Feb 13 11:03:33 2045

<sup>#</sup> Fingerprint (SHA-256):

<sup>8</sup>D:D4:B5:37:3C:B0:DE:36:76:9C:12:33:92:80:D8:27:46:B3:AA:6C:D4:26:E7:97:A3:1B:AB:E4:27:9C:F0:0B

<sup>#</sup> Fingerprint (SHA1): BE:64:D3:DA:14:4B:D2:6B:CD:AF:8F:DB:A6:A6:72:F8:DE:26:F9:00

```
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "HARICA Client ECC Root CA 2021"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\276\144\323\332\024\113\322\153\315\257\217\333\246\246\162\370
\336\046\371\000
END
CKA CERT MD5 HASH MULTILINE OCTAL
\255\270\120\246\251\202\172\154\075\032\252\244\322\143\244\104
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\157\061\013\060\011\006\003\125\004\006\023\002\107\122\061 $$
\\ \\067\\ \\060\\ \\065\\ \\006\\ \\003\\ \\125\\ \\004\\ \\012\\ \\014\\ \\056\\ \\110\\ \\145\\ \\154\\ \\154\\ \\145\\ \\156
\151\143\040\101\143\141\144\145\155\151\143\040\141\156\144\040
\122\145\163\145\141\162\143\150\040\111\156\163\164\151\164\165
\164\151\157\156\163\040\103\101\061\047\060\045\006\003\125\004
\003\014\036\110\101\122\111\103\101\040\103\154\151\145\156\164
\040\105\103\103\040\122\157\157\164\040\103\101\040\062\060\062
\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\061\150\331\330\341\142\127\036\322\031\104\210\346\020
\175\360
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
{\tt CKA\_TRUST\_STEP\_UP\_APPROVED\ CK\_BBOOL\ CK\_FALSE}
# Certificate "Autoridad de Certificación Firmaprofesional CIF A62634068"
# Issuer: CN=Autoridad de Certificacion Firmaprofesional CIF A62634068,C=ES
# Serial Number:1b:70:e9:d2:ff:ae:6c:71
# Subject: CN=Autoridad de Certificacion Firmaprofesional CIF A62634068,C=ES
# Not Valid Before: Tue Sep 23 15:22:07 2014
# Not Valid After: Mon May 05 15:22:07 2036
# Fingerprint (SHA-256):
57:DE:05:83:EF:D2:B2:6E:03:61:DA:99:DA:9D:F4:64:8D:EF:7E:E8:44:1C:3B:72:8A:FA:9B:CD:E0:F9:B2:6A
# Fingerprint (SHA1): 0B:BE:C2:27:22:49:CB:39:AA:DB:35:5C:53:E3:8C:AE:78:FF:B6:FE
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Autoridad de Certificacion Firmaprofesional CIF A62634068"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
```

### CKA SUBJECT MULTILINE OCTAL

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\010\033\160\351\322\377\256\154\161

**END** 

## CKA VALUE MULTILINE OCTAL

\060\202\006\024\060\202\003\374\240\003\002\001\002\002\010\033 \160\351\322\377\256\154\161\060\015\006\011\052\206\110\206\367 \015\001\001\013\005\000\060\121\061\013\060\011\006\003\125\004 \006\023\002\105\123\061\102\060\100\006\003\125\004\003\014\071 \101\165\164\157\162\151\144\141\144\040\144\145\040\103\145\162 \164\151\146\151\143\141\143\151\157\156\040\106\151\162\155\141  $\label{eq:local_$ \101\066\062\066\063\064\060\066\070\060\036\027\015\061\064\060 \071\062\063\061\065\062\062\060\067\132\027\015\063\066\060\065  $\label{eq:condition} $$ \060\065\061\065\062\062\060\067\132\060\121\061\013\060\011\006$ \003\125\004\006\023\002\105\123\061\102\060\100\006\003\125\004 \003\014\071\101\165\164\157\162\151\144\141\144\040\144\145\040 \103\145\162\164\151\146\151\143\141\143\151\157\156\040\106\151 \162\155\141\160\162\157\146\145\163\151\157\156\141\154\040\103 \111\106\040\101\066\062\066\063\064\060\066\070\060\202\002\042 \060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003  $\label{eq:condition} $$ \202\002\017\000\060\202\002\012\002\202\000\001\000\312\226\153$$ \216\352\370\373\361\242\065\340\177\114\332\340\303\122\327\175 \266\020\310\002\136\263\103\052\304\117\152\262\312\034\135\050 \232\170\021\032\151\131\127\257\265\040\102\344\213\017\346\337 \133\246\003\222\057\365\021\344\142\327\062\161\070\331\004\014 \161\253\075\121\176\017\007\337\143\005\134\351\277\224\157\301 \051\202\300\264\332\121\260\301\074\273\255\067\112\134\312\361  $\label{eq:condition} $$ \frac{0.046}{0.16} \frac{0.044}{2.53} \frac{2.07}{3.03} \frac{2.04}{1.67} \frac{3.75}{2.50} \frac{3.64}{2.61} \frac{3.47}{3.06}$ \057\322\055\131\215\172\012\116\226\151\122\002\252\066\230\354 \374\372\024\203\014\067\037\311\222\067\177\327\201\055\345\304 \271\340\076\064\376\147\364\076\146\321\323\364\100\317\136\142

\064\017\160\006\076\040\030\132\316\367\162\033\045\154\223\164 \024\223\243\163\261\016\252\207\020\043\131\137\040\005\031\107 \355\150\216\222\022\312\135\374\326\053\262\222\074\040\317\341 \137\257\040\276\240\166\177\166\345\354\032\206\141\063\076\347 \173\264\077\240\017\216\242\271\152\157\271\207\046\157\101\154 \210\246\120\375\152\143\013\365\223\026\033\031\217\262\355\233 \233\311\220\365\001\014\337\031\075\017\076\070\043\311\057\217 \014\321\002\376\033\125\326\116\320\215\074\257\117\244\363\376  $\verb|257|052|323|005|235|171|010|241|313|127|061|264|234|310|220|262|$ \147\364\030\026\223\072\374\107\330\321\170\226\061\037\272\053 \014\137\135\231\255\143\211\132\044\040\166\330\337\375\253\116 \246\042\252\235\136\346\047\212\175\150\051\243\347\212\270\332 \021\273\027\055\231\235\023\044\106\367\305\342\330\237\216\177 \307\217\164\155\132\262\350\162\365\254\356\044\020\255\057\024  $\label{eq:condition} $$ \32\377\055\232\106\161\107\276\102\337\273\001\333\364\177\323$ \050\217\061\131\133\323\311\002\246\264\122\312\156\227\373\103 \305\010\046\157\212\364\273\375\237\050\252\015\325\105\363\023 \072\035\330\300\170\217\101\147\074\036\224\144\256\173\013\305 \350\331\001\210\071\032\227\206\144\101\325\073\207\014\156\372  $\label{eq:continuous} $$ \017\306\275\110\024\277\071\115\324\236\101\266\217\226\035\143 $$$ \226\223\331\225\006\170\061\150\236\067\006\073\200\211\105\141 \071\043\307\033\104\243\025\345\034\370\222\060\273\002\003\001  $\label{eq:condition} $$ \000\001\243\201\357\060\201\354\060\035\006\003\125\035\016\004$ \026\004\024\145\315\353\253\065\036\000\076\176\325\164\300\034 \264\163\107\016\032\144\057\060\022\006\003\125\035\023\001\001 \377\004\010\060\006\001\001\377\002\001\001\060\201\246\006\003 \125\035\040\004\201\236\060\201\233\060\201\230\006\004\125\035  $\\ \langle 040 \rangle 000 \rangle 060 \rangle 201 \rangle 217 \rangle 060 \rangle 057 \rangle 006 \rangle 010 \rangle 053 \rangle 006 \rangle 001 \rangle 005 \rangle 007 \rangle 002$ \001\026\043\150\164\164\160\072\057\057\167\167\167\056\146\151 \162\155\141\160\162\157\146\145\163\151\157\156\141\154\056\143  $\label{eq:condition} $$ \frac{157}{155}057\\143\\160\\163\\060\\134\\006\\010\\053\\006\\001\\005\\0005\\0007$ \002\002\060\120\036\116\000\120\000\141\000\163\000\145\000\157 \000\040\000\144\000\145\000\040\000\154\000\141\000\040\000\102  $\label{eq:condition} $$ \000\157\000\156\000\141\000\156\000\157\000\166\000\141\000\040 $$$ \000\064\000\067\000\040\000\102\000\141\000\162\000\143\000\145 \000\154\000\157\000\156\000\141\000\040\000\060\000\070\000\060 \000\061\000\067\060\016\006\003\125\035\017\001\001\377\004\004  $\label{eq:condition} $$ \003\002\001\006\060\015\006\011\052\206\110\206\367\015\001\001$ \211\144\355\217\164\056\106\034\273\250\370\370\013\035\203\266 \072\247\350\105\212\007\267\340\076\040\313\341\010\333\023\010 \370\050\241\065\262\200\263\013\121\300\323\126\232\215\063\105 \111\257\111\360\340\075\007\172\105\023\132\377\310\227\330\323 \030\054\175\226\370\335\242\145\103\160\223\220\025\272\220\337 \350\031\260\333\054\212\140\017\267\157\224\007\036\035\246\311 \205\366\275\064\370\100\170\142\020\160\072\276\175\113\071\201 \251\020\324\226\101\273\370\137\034\013\035\010\362\261\260\211 \172\362\367\240\340\304\217\213\170\265\073\130\245\043\216\117

\125\376\066\073\340\014\267\312\052\060\101\040\264\200\315\256 \374\166\146\163\250\256\156\341\174\332\003\350\224\040\346\042 \243\320\037\220\135\040\123\024\046\127\332\124\227\337\026\104  $\label{eq:condition} $$ \020\001\036\210\146\217\162\070\223\335\040\267\064\276\327\361 $$$ \356\143\216\107\171\050\006\374\363\131\105\045\140\042\063\033 \243\137\250\272\052\332\032\075\315\100\352\214\356\005\025\225 \325\245\054\040\057\247\230\050\356\105\374\361\270\210\000\054 \217\102\332\121\325\234\345\023\150\161\105\103\213\236\013\041 \074\113\134\005\334\032\237\230\216\332\275\042\236\162\315\255 \012\313\314\243\147\233\050\164\304\233\327\032\074\004\130\246 \202\235\255\307\173\157\377\200\226\351\370\215\152\275\030\220  $\label{eq:condition} $$ \035\377\111\032\220\122\067\223\057\074\002\135\202\166\013\121 $$$ \347\026\307\127\370\070\371\247\315\233\042\124\357\143\260\025  $\label{eq:condition} $$ \frac{155}123\frac{45}003\frac{112}136\frac{12240}262\frac{247}216\frac{111}000\frac{131}070\frac{325}{123} $$$  $\label{eq:condition} $$ 307\364\200\144\365\156\225\120\270\021\176\025\160\070\112\260 $$$ \177\320\304\062\160\300\031\377\311\070\055\024\054\146\364\102  $\label{eq:condition} $$ 104\346\125\166\033\200\025\127\377\300\247\247\252\071\252\330 $$$ \323\160\320\056\272\353\224\152\372\137\064\206\347\142\265\375 \212\360\060\205\224\311\257\044\002\057\157\326\335\147\376\343 \260\125\117\004\230\117\244\101\126\342\223\320\152\350\326\363 \373\145\340\316\165\304\061\131\014\356\202\310\014\140\063\112  $\label{eq:condition} $$ \031\272\204\147\047\017\274\102\135\275\044\124\015\354\035\160$$$ \006\137\244\274\372\040\174\125

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Autoridad de Certificacion Firmaprofesional CIF A62634068"
- # Issuer: CN=Autoridad de Certificacion Firmaprofesional CIF A62634068,C=ES
- # Serial Number:1b:70:e9:d2:ff:ae:6c:71
- # Subject: CN=Autoridad de Certificacion Firmaprofesional CIF A62634068,C=ES
- # Not Valid Before: Tue Sep 23 15:22:07 2014
- # Not Valid After: Mon May 05 15:22:07 2036
- # Fingerprint (SHA-256):
- 57:DE:05:83:EF:D2:B2:6E:03:61:DA:99:DA:9D:F4:64:8D:EF:7E:E8:44:1C:3B:72:8A:FA:9B:CD:E0:F9:B2:6A
- # Fingerprint (SHA1): 0B:BE:C2:27:22:49:CB:39:AA:DB:35:5C:53:E3:8C:AE:78:FF:B6:FE

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Autoridad de Certificacion Firmaprofesional CIF A62634068"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\013\276\302\047\042\111\313\071\252\333\065\134\123\343\214\256 \170\377\266\376

END

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\116\156\233\124\114\312\267\372\110\344\220\261\025\113\034\243

```
END
```

## CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000\121\061\013\060\011\006\003\125\004\006\023\002\105\123\061 $$ \102\060\100\006\003\125\004\003\014\071\101\165\164\157\162\151 $$ \144\141\144\040\144\145\040\103\145\162\164\151\146\151\146\151\143\141 $$ \143\151\157\156\040\106\151\162\155\141\160\162\157\146\145\163 $$ \151\157\156\141\154\040\103\111\106\040\101\066\062\066\063\064 $$ \060\066\070$$ 

**END** 

CKA SERIAL NUMBER MULTILINE OCTAL

\002\010\033\160\351\322\377\256\154\161

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "vTrus ECC Root CA"

#

# Issuer: CN=vTrus ECC Root CA,O="iTrusChina Co.,Ltd.",C=CN

# Serial Number:6e:6a:bc:59:aa:53:be:98:39:67:a2:d2:6b:a4:3b:e6:6d:1c:d6:da

# Subject: CN=vTrus ECC Root CA,O="iTrusChina Co.,Ltd.",C=CN

# Not Valid Before: Tue Jul 31 07:26:44 2018

# Not Valid After: Fri Jul 31 07:26:44 2043

# Fingerprint (SHA-256):

30:FB:BA:2C:32:23:8E:2A:98:54:7A:F9:79:31:E5:50:42:8B:9B:3F:1C:8E:EB:66:33:DC:FA:86:C5:B2:7D:D3

# Fingerprint (SHA1): F6:9C:DB:B0:FC:F6:02:13:B6:52:32:A6:A3:91:3F:16:70:DA:C3:E1

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "vTrus ECC Root CA"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

\060\107\061\013\060\011\006\003\125\004\006\023\002\103\116\061

 $\label{eq:condition} $$ \034\060\032\006\003\125\004\012\023\023\151\124\162\165\163\103$ 

\150\151\156\141\040\103\157\056\054\114\164\144\056\061\032\060

 $\label{eq:condition} $$ \030\006\003\125\004\003\023\021\166\124\162\165\163\040\105\103$ 

\103\040\122\157\157\164\040\103\101

**END** 

CKA\_ID UTF8 "0"

## CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000107\061\013\060\011\006\003\125\004\006\023\002\103\116\061\034\060\032\006\003\125\004\012\023\023\151\124\162\165\163\103\150\151\156\141\040\103\157\056\054\114\164\144\056\061\032\060\030\006\003\125\004\003\023\021\166\124\162\165\163\040\105\103\103\040\122\157\157\164\040\103\101$ 

**END** 

## CKA SERIAL NUMBER MULTILINE OCTAL

\002\024\156\152\274\131\252\123\276\230\071\147\242\322\153\244 \073\346\155\034\326\332

**END** 

## CKA VALUE MULTILINE OCTAL

\060\202\002\017\060\202\001\225\240\003\002\001\002\002\024\156 \152\274\131\252\123\276\230\071\147\242\322\153\244\073\346\155 \034\326\332\060\012\006\010\052\206\110\316\075\004\003\003\060 \107\061\013\060\011\006\003\125\004\006\023\002\103\116\061\034  $\label{eq:condition} $$ \004\003\125\004\012\023\023\151\124\162\165\163\103\150 $$$ \151\156\141\040\103\157\056\054\114\164\144\056\061\032\060\030 \006\003\125\004\003\023\021\166\124\162\165\163\040\105\103\103  $\label{eq:condition} $$ \040\122\157\157\164\040\103\101\060\036\027\015\061\070\060\067 $$$ \063\061\060\067\062\066\064\064\132\027\015\064\063\060\067\063 \061\060\067\062\066\064\064\132\060\107\061\013\060\011\006\003 \125\004\006\023\002\103\116\061\034\060\032\006\003\125\004\012 \023\023\151\124\162\165\163\103\150\151\156\141\040\103\157\056 \054\114\164\144\056\061\032\060\030\006\003\125\004\003\023\021  $\label{eq:condition} $$ 166\124\162\165\163\040\105\103\103\040\122\157\157\164\040\103$ \101\060\166\060\020\006\007\052\206\110\316\075\002\001\006\005 \053\201\004\000\042\003\142\000\004\145\120\112\256\214\171\226 \102\273\035\315\010\333\163\262\133\165\363\317\234\116\202\364 \277\370\141\046\205\154\326\205\133\162\160\322\375\333\142\264 \337\123\213\275\261\104\130\142\102\011\307\372\177\133\020\347 \376\100\375\300\330\303\053\062\347\160\246\267\246\040\125\035 \173\200\135\113\217\147\114\361\020\243\102\060\100\060\035\006 \003\125\035\016\004\026\004\024\230\071\315\276\330\262\214\367 \262\253\341\255\044\257\173\174\241\333\037\317\060\017\006\003 \125\035\023\001\001\377\004\005\060\003\001\001\377\060\016\006 \003\125\035\017\001\001\377\004\004\003\002\001\006\060\012\006 \010\052\206\110\316\075\004\003\003\003\150\000\060\145\002\060 \127\235\335\126\361\307\343\351\270\111\120\153\233\151\303\157 \354\303\175\045\344\127\225\023\100\233\122\323\073\363\100\031 \274\046\307\055\006\236\265\173\066\237\365\045\324\143\153\000 \002\061\000\351\323\306\236\126\232\052\314\241\332\077\310\146 \053\323\130\234\040\205\372\253\221\212\160\160\021\070\140\144 \013\142\011\221\130\000\371\115\373\064\150\332\011\255\041\006 \030\224\316

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

<sup>#</sup> Trust for "vTrus ECC Root CA"

<sup>#</sup> Issuer: CN=vTrus ECC Root CA,O="iTrusChina Co.,Ltd.",C=CN

<sup>#</sup> Serial Number:6e:6a:bc:59:aa:53:be:98:39:67:a2:d2:6b:a4:3b:e6:6d:1c:d6:da

```
# Subject: CN=vTrus ECC Root CA,O="iTrusChina Co.,Ltd.",C=CN
# Not Valid Before: Tue Jul 31 07:26:44 2018
# Not Valid After: Fri Jul 31 07:26:44 2043
# Fingerprint (SHA-256):
30:FB:BA:2C:32:23:8E:2A:98:54:7A:F9:79:31:E5:50:42:8B:9B:3F:1C:8E:EB:66:33:DC:FA:86:C5:B2:7D:D3
# Fingerprint (SHA1): F6:9C:DB:B0:FC:F6:02:13:B6:52:32:A6:A3:91:3F:16:70:DA:C3:E1
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "vTrus ECC Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\366\234\333\260\374\366\002\023\266\122\062\246\243\221\077\026
\160\332\303\341
END
CKA CERT MD5 HASH MULTILINE OCTAL
\336\113\301\365\122\214\233\103\341\076\217\125\124\027\215\205
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\107\061\013\060\011\006\003\125\004\006\023\002\103\116\061 $$
\034\060\032\006\003\125\004\012\023\023\151\124\162\165\163\103
\150\151\156\141\040\103\157\056\054\114\164\144\056\061\032\060
\030\006\003\125\004\003\023\021\166\124\162\165\163\040\105\103
\103\040\122\157\157\164\040\103\101
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\024\156\152\274\131\252\123\276\230\071\147\242\322\153\244
\073\346\155\034\326\332
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "vTrus Root CA"
# Issuer: CN=vTrus Root CA,O="iTrusChina Co.,Ltd.",C=CN
# Serial Number:43:e3:71:13:d8:b3:59:14:5d:b7:ce:8c:fd:35:fd:6f:bc:05:8d:45
# Subject: CN=vTrus Root CA,O="iTrusChina Co.,Ltd.",C=CN
# Not Valid Before: Tue Jul 31 07:24:05 2018
# Not Valid After: Fri Jul 31 07:24:05 2043
# Fingerprint (SHA-256):
8A:71:DE:65:59:33:6F:42:6C:26:E5:38:80:D0:0D:88:A1:8D:A4:C6:A9:1F:0D:CB:61:94:E2:06:C5:C9:63:87
# Fingerprint (SHA1): 84:1A:69:FB:F5:CD:1A:25:34:13:3D:E3:F8:FC:B8:99:D0:C9:14:B7
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
```

CKA MODIFIABLE CK BBOOL CK FALSE

CKA LABEL UTF8 "vTrus Root CA"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \00103\061\013\060\011\006\003\125\004\006\023\002\103\116\061\034\060\032\006\003\125\004\012\023\023\151\124\162\165\163\103\150\151\156\141\040\103\157\056\054\114\164\144\056\061\022\157\157\164\040\103\101$$ 

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \00103\061\013\060\011\006\003\125\004\006\023\002\103\116\061\034\060\032\006\003\125\004\012\023\023\151\124\162\165\163\103\150\151\156\141\040\103\157\056\054\114\164\144\056\061\026\060\024\006\003\125\004\003\023\015\166\124\162\165\163\040\122\157\157\164\040\103\101$ 

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

 $\label{eq:condition} $$ \002\024\103\343\161\023\330\263\131\024\135\267\316\214\375\065\375\157\274\005\215\105$ 

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\126\060\202\003\076\240\003\002\001\002\002\024\103 \343\161\023\330\263\131\024\135\267\316\214\375\065\375\157\274 \005\215\105\060\015\006\011\052\206\110\206\367\015\001\001\013 \005\000\060\103\061\013\060\011\006\003\125\004\006\023\002\103 \163\103\150\151\156\141\040\103\157\056\054\114\164\144\056\061 \026\060\024\006\003\125\004\003\023\015\166\124\162\165\163\040 \122\157\157\164\040\103\101\060\036\027\015\061\070\060\067\063 \061\060\067\062\064\060\065\132\027\015\064\063\060\067\063\061 \060\067\062\064\060\065\132\060\103\061\013\060\011\006\003\125 \004\006\023\002\103\116\061\034\060\032\006\003\125\004\012\023 \023\151\124\162\165\163\103\150\151\156\141\040\103\157\056\054 \114\164\144\056\061\026\060\024\006\003\125\004\003\023\015\166 \124\162\165\163\040\122\157\157\164\040\103\101\060\202\002\042 \060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003  $\label{eq:condition} $$ \202\002\017\000\060\202\002\012\002\202\002\001\000\275\125\174$$ \141\323\270\035\004\142\005\240\256\154\267\160\264\101\352\113 \003\136\020\077\220\132\034\213\073\260\146\213\154\110\246\034 \042\272\325\100\222\356\063\262\043\131\311\216\274\130\332\213 \236\320\031\362\057\131\306\214\143\132\272\237\243\013\260\263 \232\134\272\021\270\022\351\014\273\317\156\154\200\207\051\024 \003\054\215\044\232\310\144\203\265\152\254\023\054\063\361\237 \334\054\141\074\032\077\160\125\233\255\000\122\177\317\004\271 \376\066\372\234\300\026\256\142\376\226\114\103\176\125\024\276 \032\263\322\155\302\257\166\146\225\153\052\260\224\167\205\136

\004\017\142\035\143\165\367\153\347\313\133\232\160\354\076\147 \005\360\376\007\010\200\317\050\333\005\306\024\047\057\206\175 \360\047\336\377\346\176\063\110\347\013\036\130\321\047\053\123 \016\127\112\145\327\373\242\200\140\374\114\274\065\123\001\152 \227\162\202\257\361\035\160\350\234\365\357\136\302\154\307\107 \176\132\224\205\046\115\073\272\353\114\350\260\011\302\145\302 \235\235\011\233\116\265\227\005\254\365\006\240\367\066\005\176 \364\220\262\153\304\264\371\144\352\351\032\012\310\015\250\355  $\\ \\ 047\\311\\324\\347\\263\\271\\253\\202\\042\\220\\047\\075\\052\\350\\174\\220$ \357\274\117\375\342\012\044\247\336\145\044\244\135\352\300\166 \060\323\167\120\370\015\004\233\224\066\001\163\312\006\130\246  $\label{eq:condition} $$ 323\073\334\372\004\106\023\125\212\311\104\107\270\121\071\032$ \056\350\064\342\171\313\131\112\012\177\274\246\357\037\003\147  $\label{eq:condition} $$ \frac{152}131\\053\\045\\142\\223\\331\\123\\031\\146\\074\\047\\142\\051\\206\\115$ \244\153\356\377\324\116\272\325\264\342\216\110\132\000\031\011 \361\005\331\316\221\261\367\353\351\071\117\366\157\004\103\232 \125\365\076\005\024\275\277\263\131\264\330\216\063\204\243\220 \122\252\263\002\225\140\371\014\114\150\371\356\325\027\015\370 \161\127\265\045\344\051\356\145\135\257\321\356\074\027\013\132 \103\305\245\206\352\044\236\342\005\007\334\064\102\022\221\326 \071\164\256\114\101\202\333\362\246\110\321\263\233\363\063\252 \363\246\300\305\116\365\364\235\166\143\346\002\306\042\113\301  $\label{eq:condition} $$ \225\077\120\144\054\124\345\266\360\074\051\317\127\002\003\001 $$$ \000\001\243\102\060\100\060\035\006\003\125\035\016\004\026\004 \024\124\142\160\143\361\165\204\103\130\216\321\026\040\261\306 \254\032\274\366\211\060\017\006\003\125\035\023\001\001\377\004 \005\060\003\001\001\377\060\016\006\003\125\035\017\001\001\377 \001\001\013\005\000\003\202\002\001\000\051\272\222\111\247\255 \360\361\160\303\344\227\360\237\251\045\325\153\236\064\376\346  $\label{eq:condition} $$ \032\144\366\072\153\122\262\020\170\032\237\114\332\212\332\354$$ \034\067\122\340\102\113\373\154\166\312\044\013\071\022\025\235 \237\021\055\374\171\144\334\340\340\365\335\340\127\311\245\262 \166\160\120\244\376\267\012\160\325\240\064\361\165\327\115\111 \272\021\321\263\330\354\202\377\353\016\304\277\144\055\175\143 \156\027\170\354\135\174\210\310\353\216\127\166\331\131\004\372 \274\122\037\105\254\360\172\200\354\354\157\166\256\221\333\020 \216\004\334\222\337\240\366\346\256\111\323\301\154\022\033\314 \051\252\371\010\245\342\067\024\312\261\270\146\357\032\202\344 \360\370\361\247\026\151\267\333\251\141\074\237\365\061\313\344 \000\106\302\057\164\261\261\327\201\356\250\046\225\274\210\257 \114\065\007\052\002\312\170\024\155\107\053\100\126\351\313\052 \140\241\147\003\240\316\214\274\260\162\147\304\061\316\333\064 \345\045\003\140\045\173\161\230\344\300\033\053\137\164\102\322 \113\305\131\010\007\207\276\305\303\177\347\226\331\341\334\050 \227\326\217\005\343\365\233\116\312\035\120\107\005\123\260\312  $\label{eq:condition} $$ \071\347\205\240\211\301\005\073\001\067\323\077\111\342\167\353$ \043\310\210\146\073\075\071\166\041\106\361\354\137\043\270\353

 $\label{eq:control} $$ \242\146\165\164\301\100\367\330\150\232\223\342\055\251\056\275\034\243\036\310\164\306\244\055\172\040\253\073\270\260\106\375\157\335\137\122\125\165\142\360\227\240\174\327\070\375\045\337\315\240\233\020\317\213\270\070\136\136\305\264\246\002\066\241\036\137\034\317\342\226\235\051\252\375\230\256\122\341\363\101\122\373\251\056\162\226\237\047\343\252\163\175\370\032\043\146\173\073\253\145\260\062\001\113\025\076\075\242\117\014\053\065\242\306\331\147\022\065\060\315\166\056\026\263\231\236\115\117\116\055\073\064\103\341\232\016\015\244\146\227\272\322\034\112\114\054\052\213\213\201\117\161\032\251\335\134\173\173\010\305\000\015\067\100\343\174\173\124\137\057\205\137\166\366\367\247\260\034\127\126\301\162\350\255\242\257\215\063\111\272\037\212\334\346\164\174\140\206\157\207\227\173$ 

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "vTrus Root CA"
- # Issuer: CN=vTrus Root CA,O="iTrusChina Co.,Ltd.",C=CN
- # Serial Number:43:e3:71:13:d8:b3:59:14:5d:b7:ce:8c:fd:35:fd:6f:bc:05:8d:45
- # Subject: CN=vTrus Root CA,O="iTrusChina Co.,Ltd.",C=CN
- # Not Valid Before: Tue Jul 31 07:24:05 2018
- # Not Valid After: Fri Jul 31 07:24:05 2043
- # Fingerprint (SHA-256):
- 8A:71:DE:65:59:33:6F:42:6C:26:E5:38:80:D0:0D:88:A1:8D:A4:C6:A9:1F:0D:CB:61:94:E2:06:C5:C9:63:87
- # Fingerprint (SHA1): 84:1A:69:FB:F5:CD:1A:25:34:13:3D:E3:F8:FC:B8:99:D0:C9:14:B7
- CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST
- CKA TOKEN CK BBOOL CK TRUE
- CKA PRIVATE CK BBOOL CK FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA\_LABEL UTF8 "vTrus Root CA"
- CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL
- \204\032\151\373\365\315\032\045\064\023\075\343\370\374\270\231 \320\311\024\267

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\270\311\067\337\372\153\061\204\144\305\352\021\152\033\165\374

**END** 

CKA\_ISSUER MULTILINE\_OCTAL

\060\103\061\013\060\011\006\003\125\004\006\023\002\103\116\061 \034\060\032\006\003\125\004\012\023\023\151\124\162\165\163\103 \150\151\156\141\040\103\157\056\054\114\164\144\056\061\026\060 \024\006\003\125\004\003\023\015\166\124\162\165\163\040\122\157 \157\164\040\103\101

**END** 

 ${\sf CKA\_SERIAL\_NUMBER\ MULTILINE\_OCTAL}$ 

\002\024\103\343\161\023\330\263\131\024\135\267\316\214\375\065

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "ISRG Root X2"

#

- # Issuer: CN=ISRG Root X2,O=Internet Security Research Group,C=US
- # Serial Number:41:d2:9d:d1:72:ea:ee:a7:80:c1:2c:6c:e9:2f:87:52
- # Subject: CN=ISRG Root X2,O=Internet Security Research Group,C=US
- # Not Valid Before: Fri Sep 04 00:00:00 2020
- # Not Valid After: Mon Sep 17 16:00:00 2040
- # Fingerprint (SHA-256):
- 69:72:9B:8E:15:A8:6E:FC:17:7A:57:AF:B7:17:1D:FC:64:AD:D2:8C:2F:CA:8C:F1:50:7E:34:45:3C:CB:14:70
- # Fingerprint (SHA1): BD:B1:B9:3C:D5:97:8D:45:C6:26:14:55:F8:DB:95:C7:5A:D1:53:AF

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "ISRG Root X2"

CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\11\006\003\125\004\006\023\002\125\123\061 $$$ 

\051\060\047\006\003\125\004\012\023\040\111\156\164\145\162\156

 $\\ 145 \\ 164 \\ 040 \\ 123 \\ 145 \\ 143 \\ 165 \\ 162 \\ 151 \\ 164 \\ 171 \\ 040 \\ 122 \\ 145 \\ 163 \\ 145 \\$ 

 $\label{eq:condition} $$ 141\162\143\150\040\107\162\157\165\160\061\025\060\023\006\003$ 

\125\004\003\023\014\111\123\122\107\040\122\157\157\164\040\130

\062

**END** 

CKA ID UTF8 "0"

CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000117\061\013\060\011\006\003\125\004\006\023\002\125\123\061\051\060\047\006\003\125\004\012\023\040\111\156\164\145\162\156\145\164\040\122\145\163\145\143\165\162\151\164\171\040\122\145\163\145\141\162\143\150\040\107\162\157\165\160\061\025\060\023\006\003$ 

\062

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\101\322\235\321\162\352\356\247\200\301\054\154\351\057\207\122

**END** 

CKA\_VALUE MULTILINE\_OCTAL

\060\202\002\033\060\202\001\241\240\003\002\001\002\002\020\101 \322\235\321\162\352\356\247\200\301\054\154\351\057\207\122\060

\012\006\010\052\206\110\316\075\004\003\003\060\117\061\013\060 \011\006\003\125\004\006\023\002\125\123\061\051\060\047\006\003 \143\165\162\151\164\171\040\122\145\163\145\141\162\143\150\040 \107\162\157\165\160\061\025\060\023\006\003\125\004\003\023\014  $\label{eq:local_$ \062\060\060\071\060\064\060\060\060\060\060\060\132\027\015\064 \060\060\071\061\067\061\066\060\060\060\060\132\060\117\061\013  $\label{eq:condition} $$ \000\01\000\023\002\125\123\061\051\060\047\006 $$$ \003\125\004\012\023\040\111\156\164\145\162\156\145\164\040\123  $\\ 145 \\ 143 \\ 165 \\ 162 \\ 151 \\ 164 \\ 171 \\ 040 \\ 122 \\ 145 \\ 163 \\ 145 \\ 141 \\ 162 \\ 143 \\ 150 \\$  $\label{eq:condition} $$ \040\107\162\157\165\160\061\025\060\023\006\003\125\004\003\023$ \014\111\123\122\107\040\122\157\157\164\040\130\062\060\166\060  $\label{eq:condition} $$ \020\006\007\052\206\110\316\075\002\001\006\005\053\201\004\000 $$$  $\label{eq:condition} $$ \042\003\142\000\004\315\233\325\237\200\203\012\354\011\112\363$ \026\112\076\134\317\167\254\336\147\005\015\035\007\266\334\026  $\label{eq:condition} $$ \373\132\213\024\333\342\161\140\304\272\105\225\021\211\216\352$ \006\337\367\052\026\034\244\271\305\305\062\340\003\340\036\202 \030\070\213\327\105\330\012\152\156\346\000\167\373\002\121\175  $\\ \langle 042 \rangle 330 \rangle 012 \rangle 156 \rangle 232 \rangle 133 \rangle 167 \rangle 337 \rangle 360 \rangle 372 \rangle 101 \rangle 354 \rangle 071 \rangle 334 \rangle 165 \rangle 312 \rangle 167 \rangle 372 \rangle 167 \rangle$ \150\007\014\037\352\243\102\060\100\060\016\006\003\125\035\017 \001\001\377\004\004\003\002\001\006\060\017\006\003\125\035\023  $\\ \\001\\\\001\\\\377\\\\004\\\\005\\\\006\\\\0005\\\\000\\\\0001\\\\001\\\\001\\\\377\\\\060\\\\003\\\\006\\\\003\\\\125\\\\035$ \016\004\026\004\024\174\102\226\256\336\113\110\073\372\222\370 \236\214\317\155\213\251\162\067\225\060\012\006\010\052\206\110 \316\075\004\003\003\003\150\000\060\145\002\060\173\171\116\106 \120\204\302\104\207\106\033\105\160\377\130\231\336\364\375\244  $\label{eq:condition} $$ \frac{322}125 246 040 055 164 326 064 274 101 243 120 137 001 047 126 }{243} $$$ \264\276\047\165\006\257\022\056\165\230\215\374\002\061\000\213 \365\167\154\324\310\145\252\340\013\054\356\024\235\047\067\244 \371\123\245\121\344\051\203\327\370\220\061\133\102\237\012\365 \376\256\000\150\347\214\111\017\266\157\133\133\025\362\347 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "ISRG Root X2"
```

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

<sup>#</sup> Issuer: CN=ISRG Root X2,O=Internet Security Research Group,C=US

<sup>#</sup> Serial Number:41:d2:9d:d1:72:ea:ee:a7:80:c1:2c:6c:e9:2f:87:52

<sup>#</sup> Subject: CN=ISRG Root X2,O=Internet Security Research Group,C=US

<sup>#</sup> Not Valid Before: Fri Sep 04 00:00:00 2020

<sup>#</sup> Not Valid After: Mon Sep 17 16:00:00 2040

<sup>#</sup> Fingerprint (SHA-256):

<sup>69:72:9</sup>B:8E:15:A8:6E:FC:17:7A:57:AF:B7:17:1D:FC:64:AD:D2:8C:2F:CA:8C:F1:50:7E:34:45:3C:CB:14:70

<sup>#</sup> Fingerprint (SHA1): BD:B1:B9:3C:D5:97:8D:45:C6:26:14:55:F8:DB:95:C7:5A:D1:53:AF

```
CKA_LABEL UTF8 "ISRG Root X2"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\275\261\271\074\325\227\215\105\306\046\024\125\370\333\225\307
\132\321\123\257
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\323\236\304\036\043\074\246\337\317\243\176\155\340\024\346\345
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\11\006\003\125\004\006\023\002\125\123\061 $$
\051\060\047\006\003\125\004\012\023\040\111\156\164\145\162\156
\145\164\040\123\145\143\165\162\151\164\171\040\122\145\163\145
\141\162\143\150\040\107\162\157\165\160\061\025\060\023\006\003
\125\004\003\023\014\111\123\122\107\040\122\157\157\164\040\130
\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\101\322\235\321\162\352\356\247\200\301\054\154\351\057
\207\122
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "HiPKI Root CA - G1"
# Issuer: CN=HiPKI Root CA - G1,O="Chunghwa Telecom Co., Ltd.",C=TW
# Serial Number:2d:dd:ac:ce:62:97:94:a1:43:e8:b0:cd:76:6a:5e:60
# Subject: CN=HiPKI Root CA - G1,O="Chunghwa Telecom Co., Ltd.",C=TW
# Not Valid Before: Fri Feb 22 09:46:04 2019
# Not Valid After: Thu Dec 31 15:59:59 2037
# Fingerprint (SHA-256):
F0:15:CE:3C:C2:39:BF:EF:06:4B:E9:F1:D2:C4:17:E1:A0:26:4A:0A:94:BE:1F:0C:8D:12:18:64:EB:69:49:CC
# Fingerprint (SHA1): 6A:92:E4:A8:EE:1B:EC:96:45:37:E3:29:57:49:CD:96:E3:E5:D2:60
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "HiPKI Root CA - G1"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\117\061\013\060\011\006\003\125\004\006\023\002\124\127\061
\043\060\041\006\003\125\004\012\014\032\103\150\165\156\147\150
\167\141\040\124\145\154\145\143\157\155\040\103\157\056\054\040
```

CKA\_PRIVATE CK\_BBOOL CK\_FALSE
CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

\114\164\144\056\061\033\060\031\006\003\125\004\003\014\022\110 \151\120\113\111\040\122\157\157\164\040\103\101\040\055\040\107 \061

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\11\006\003\125\004\006\023\002\124\127\061 $$ \043\060\041\006\003\125\004\012\014\032\103\150\165\156\147\150 $$ \167\141\040\124\145\154\145\143\157\155\040\103\157\056\054\040 $$ \114\164\144\056\061\033\060\031\006\003\125\004\003\014\022\110 $$ \151\120\113\111\040\122\157\157\164\040\103\101\040\055\040\107 $$ \061$$ 

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\055\335\254\316\142\227\224\241\103\350\260\315\166\152 \136\140

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\152\060\202\003\122\240\003\002\001\002\002\020\055 \335\254\316\142\227\224\241\103\350\260\315\166\152\136\140\060 \015\006\011\052\206\110\206\367\015\001\001\013\005\000\060\117 \061\013\060\011\006\003\125\004\006\023\002\124\127\061\043\060  $\label{eq:condition} $$ \004\003\125\004\012\014\032\103\150\165\156\147\150\167\141 = 1000\165\156\147\150\167\141 = 1000\165\156\147\150\167\141 = 1000\165\156\147\150\167\141 = 1000\165\156\147\150\167\141 = 100$ \040\124\145\154\145\143\157\155\040\103\157\056\054\040\114\164 \144\056\061\033\060\031\006\003\125\004\003\014\022\110\151\120 \113\111\040\122\157\157\164\040\103\101\040\055\040\107\061\060 \036\027\015\061\071\060\062\062\062\060\071\064\066\060\064\132 \027\015\063\067\061\062\063\061\061\065\065\071\065\071\132\060 \117\061\013\060\011\006\003\125\004\006\023\002\124\127\061\043 \060\041\006\003\125\004\012\014\032\103\150\165\156\147\150\167  $\\ 141 \\ 040 \\ 124 \\ 145 \\ 154 \\ 145 \\ 143 \\ 157 \\ 155 \\ 040 \\ 103 \\ 157 \\ 056 \\ 054 \\ 040 \\ 114$ \164\144\056\061\033\060\031\006\003\125\004\003\014\022\110\151 \120\113\111\040\122\157\157\164\040\103\101\040\055\040\107\061 \060\202\002\042\060\015\006\011\052\206\110\206\367\015\001\001 \001\005\000\003\202\002\017\000\060\202\002\012\002\202\002\001 \000\364\036\177\122\163\062\014\163\344\275\023\164\243\324\060 \250\320\256\113\330\266\337\165\107\146\364\174\347\071\004\036 \152\160\040\322\132\107\162\147\125\364\245\350\235\325\036\041 \241\360\147\272\314\041\150\276\104\123\277\215\371\342\334\057 \125\310\067\077\037\244\300\234\263\344\167\134\240\106\376\167 \372\032\240\070\352\355\232\162\336\053\275\224\127\072\272\354 \171\347\137\175\102\144\071\172\046\066\367\044\360\325\057\272 \225\230\021\146\255\227\065\326\165\001\200\340\257\364\204\141 \214\015\036\137\174\207\226\136\101\257\353\207\352\370\135\361 \056\210\005\076\114\042\273\332\037\052\335\122\106\144\071\363 \102\316\331\236\014\263\260\167\227\144\234\300\364\243\056\037 \225\007\260\027\337\060\333\000\030\226\114\241\201\113\335\004 \155\123\243\075\374\007\254\324\305\067\202\353\344\225\010\031

\050\202\322\102\072\243\330\123\354\171\211\140\110\140\310\162 \222\120\334\003\217\203\077\262\102\127\132\333\152\351\021\227 \335\205\050\274\060\114\253\343\302\261\105\104\107\037\340\212 \026\007\226\322\041\017\123\300\355\251\176\324\116\354\233\011 \354\257\102\254\060\326\277\321\020\105\340\246\026\262\245\305 \323\117\163\224\063\161\002\241\152\243\326\063\227\117\041\143 \036\133\217\331\301\136\105\161\167\017\201\135\137\041\232\255 \203\314\372\136\326\215\043\137\033\075\101\257\040\165\146\132 \112\366\237\373\253\030\367\161\300\266\035\061\354\073\040\353 \313\342\270\365\256\222\262\367\341\204\113\362\242\362\223\232  $\\ \langle 042 \rangle 236 \rangle 323 \rangle 024 \rangle 157 \rangle 066 \rangle 124 \rangle 275 \rangle 037 \rangle 136 \rangle 131 \rangle 025 \rangle 271 \rangle 163 \rangle 250 \rangle 301 \rangle 164 \rangle$  $\label{eq:condition} $$ \frac{174\\157\\173\\142\\351\\026\\154\\107\\132\\145\\363\\016\\021\\233\\106\\331$ \375\155\334\326\234\300\264\175\245\260\335\077\126\157\241\371 \366\344\022\110\375\006\177\022\127\266\251\043\117\133\003\303 \340\161\052\043\267\367\260\261\073\274\230\275\326\230\250\014 \153\366\216\022\147\246\362\262\130\344\002\011\023\074\251\273  $\label{eq:condition} $$ \020\264\322\060\105\361\354\367\000\021\337\145\370\334\053\103$ \125\277\026\227\304\017\325\054\141\204\252\162\206\376\346\072 \176\302\077\175\356\374\057\024\076\346\205\335\120\157\267\111 \355\002\003\001\000\001\243\102\060\100\060\017\006\003\125\035 \023\001\001\377\004\005\060\003\001\001\377\060\035\006\003\125 \035\016\004\026\004\024\362\167\027\372\136\250\376\366\075\161 \325\150\272\311\106\014\070\330\257\260\060\016\006\003\125\035 \017\001\001\377\004\004\003\002\001\206\060\015\006\011\052\206 \110\206\367\015\001\001\013\005\000\003\202\002\001\000\120\121 \360\165\334\160\004\343\377\252\165\324\161\242\313\236\217\250 \251\323\257\165\307\124\317\072\034\004\231\042\254\304\021\342 \357\063\112\246\043\035\016\015\107\330\067\307\157\257\064\177 \117\201\153\065\117\351\162\245\061\342\170\347\367\116\224\030 \133\100\175\317\153\041\124\206\346\225\172\373\306\312\352\234  $\label{eq:linear_condition} $$ \frac{110}{16}\frac{127}{011}\frac{135}{057}\frac{254}{364}\frac{245}{264}\frac{227}{063}\frac{30}{325}\frac{254}{171} $$$ \251\314\137\371\205\372\122\305\215\370\221\024\353\072\015\027 \320\122\302\173\343\302\163\216\106\170\006\070\054\350\134\332 \146\304\364\244\360\126\031\063\051\132\145\222\005\107\106\112 \253\204\303\036\047\241\037\021\222\231\047\165\223\017\274\066 \073\227\127\217\046\133\014\273\234\017\324\156\060\007\324\334 \137\066\150\146\071\203\226\047\046\212\310\304\071\376\232\041 \157\325\162\206\351\177\142\345\227\116\320\044\320\100\260\320  $\label{eq:condition} $$ 165\010\216\275\150\356\010\327\156\174\020\160\106\033\174\340 $$$ \210\262\236\162\206\231\001\343\277\237\111\031\264\045\276\126 \145\256\027\143\345\036\337\350\377\107\245\277\341\046\005\204 \344\260\300\257\347\010\231\250\014\136\046\200\105\324\370\150  $\label{eq:condition} $$ \057\226\217\256\342\112\034\234\026\014\023\157\070\207\366\273$ \310\064\137\222\003\121\171\160\246\337\313\365\231\115\171\315 \116\274\127\237\103\116\153\056\053\030\370\152\163\214\272\305 \065\357\071\152\101\036\317\161\250\242\262\206\007\133\072\311 \341\357\077\145\004\200\107\062\104\160\225\116\061\147\152\164 \133\020\105\165\352\260\237\320\346\065\376\116\237\213\314\053

 $\label{eq:control_co$ 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "HiPKI Root CA G1"
- # Issuer: CN=HiPKI Root CA G1,O="Chunghwa Telecom Co., Ltd.",C=TW
- # Serial Number:2d:dd:ac:ce:62:97:94:a1:43:e8:b0:cd:76:6a:5e:60
- # Subject: CN=HiPKI Root CA G1,O="Chunghwa Telecom Co., Ltd.",C=TW
- # Not Valid Before: Fri Feb 22 09:46:04 2019
- # Not Valid After: Thu Dec 31 15:59:59 2037
- # Fingerprint (SHA-256):

F0:15:CE:3C:C2:39:BF:EF:06:4B:E9:F1:D2:C4:17:E1:A0:26:4A:0A:94:BE:1F:0C:8D:12:18:64:EB:69:49:CC

# Fingerprint (SHA1): 6A:92:E4:A8:EE:1B:EC:96:45:37:E3:29:57:49:CD:96:E3:E5:D2:60

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "HiPKI Root CA - G1"

CKA CERT SHA1 HASH MULTILINE OCTAL

 $\label{eq:condition} $$ \frac{354}222\frac{344}250\frac{356}033\frac{354}226\frac{105}067\frac{343}051\frac{127}{111}\frac{315}226$ 

\343\345\322\140

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\151\105\337\026\145\113\350\150\232\217\166\137\377\200\236\323

**END** 

CKA ISSUER MULTILINE OCTAL

 $\label{eq:condition} $$ \000117\061\013\060\011\006\003\125\004\006\023\002\124\127\061 $$ \043\060\041\006\003\125\004\012\014\032\103\150\165\156\147\150 $$ \167\141\040\124\145\154\145\143\157\155\040\103\157\056\054\0400 $$ \114\164\144\056\061\033\060\031\006\003\125\004\003\014\022\110 $$ \151\120\113\111\040\122\157\157\164\040\103\101\040\055\040\107$$ 

\061

**END** 

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \020\055\335\254\316\142\227\224\241\103\350\260\315\166\152$$ 

\136\140

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR

CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

#

# Certificate "GlobalSign ECC Root CA - R4"

#

- # Issuer: CN=GlobalSign,O=GlobalSign,OU=GlobalSign ECC Root CA R4
- # Serial Number:02:03:e5:7e:f5:3f:93:fd:a5:09:21:b2:a6
- # Subject: CN=GlobalSign,O=GlobalSign,OU=GlobalSign ECC Root CA R4
- # Not Valid Before: Tue Nov 13 00:00:00 2012
- # Not Valid After: Tue Jan 19 03:14:07 2038
- # Fingerprint (SHA-256):

B0:85:D7:0B:96:4F:19:1A:73:E4:AF:0D:54:AE:7A:0E:07:AA:FD:AF:9B:71:DD:08:62:13:8A:B7:32:5A:24:A2

# Fingerprint (SHA1): 6B:A0:B0:98:E1:71:EF:5A:AD:FE:48:15:80:77:10:F4:BD:6F:0B:28

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "GlobalSign ECC Root CA - R4"

CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509

CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000\120\061\044\060\042\006\003\125\004\013\023\033\107\154\157 $$$ 

\142\141\154\123\151\147\156\040\105\103\103\040\122\157\157\164

\012\023\012\107\154\157\142\141\154\123\151\147\156\061\023\060

\021\006\003\125\004\003\023\012\107\154\157\142\141\154\123\151

\147\156

**END** 

CKA\_ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

**END** 

# CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\015\002\03\345\176\365\077\223\375\245\011\041\262\246$ END$ 

## CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \002\001\334\060\202\001\203\240\003\002\001\002\002\015\002\003\345\176\365\077\223\375\245\011\041\262\246\060\012\006\010\0010\005\2206\110\316\075\004\003\002\060\120\061\044\060\042\006\003\125\004\013\023\033\107\154\157\142\141\154\123\151\147\156\040\105\103\103\040\122\157\157\164\040\103\101\040\055\040\122\064\061\023\060\021\006\003\125\004\012\023\012\107\154\157\142\141$ 

\154\123\151\147\156\061\023\060\021\006\003\125\004\003\023\012 \107\154\157\142\141\154\123\151\147\156\060\036\027\015\061\062 \061\061\061\063\060\060\060\060\060\060\132\027\015\063\070\060  $\label{eq:condition} $$ \061\061\063\063\061\064\060\067\132\060\120\061\044\060\042 $$$ \006\003\125\004\013\023\033\107\154\157\142\141\154\123\151\147  $\label{eq:condition} $$ \frac{156}040\\105\\103\\103\\040\\122\\157\\157\\164\\040\\103\\101\\040\\055\\040$ \122\064\061\023\060\021\006\003\125\004\012\023\012\107\154\157 \142\141\154\123\151\147\156\061\023\060\021\006\003\125\004\003 \023\012\107\154\157\142\141\154\123\151\147\156\060\131\060\023 \006\007\052\206\110\316\075\002\001\006\010\052\206\110\316\075  $\label{eq:condition} $$ \003\001\007\003\102\000\004\270\306\171\323\217\154\045\016\237$  $\label{eq:condition} $$ \056\071\031\034\003\244\256\232\345\071\007\011\026\312\143\261 $$$ \271\206\370\212\127\301\127\316\102\372\163\241\367\145\102\377  $\label{eq:condition} $$ \036\301\000\262\156\163\016\377\307\041\345\030\244\252\331\161 $$$  $\label{eq:condition} $$ \077\250\324\271\316\214\035\243\102\060\100\060\016\006\003\125$ \035\017\001\001\377\004\004\003\002\001\206\060\017\006\003\125  $\label{eq:condition} $$ \035\023\001\001\377\004\005\060\003\001\001\377\060\035\006\003$ \125\035\016\004\026\004\024\124\260\173\255\105\270\342\100\177 \373\012\156\373\276\063\311\074\243\204\325\060\012\006\010\052 \206\110\316\075\004\003\002\003\107\000\060\104\002\040\042\117 \164\162\271\140\257\361\346\234\240\026\005\120\137\303\136\073 \156\141\164\357\276\001\304\276\030\110\131\141\202\062\002\040 \046\235\124\143\100\336\067\140\120\317\310\330\355\235\202\256 \067\230\274\243\217\114\114\251\064\053\154\357\373\225\233\046 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "GlobalSign ECC Root CA - R4"
```

B0:85:D7:0B:96:4F:19:1A:73:E4:AF:0D:54:AE:7A:0E:07:AA:FD:AF:9B:71:DD:08:62:13:8A:B7:32:5A:24:A2

# Fingerprint (SHA1): 6B:A0:B0:98:E1:71:EF:5A:AD:FE:48:15:80:77:10:F4:BD:6F:0B:28

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "GlobalSign ECC Root CA - R4"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ 153\240\260\230\341\161\357\132\255\376\110\025\200\167\020\364$$ 

\275\157\013\050

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

<sup>#</sup> Issuer: CN=GlobalSign,O=GlobalSign,OU=GlobalSign ECC Root CA - R4

<sup>#</sup> Serial Number:02:03:e5:7e:f5:3f:93:fd:a5:09:21:b2:a6

<sup>#</sup> Subject: CN=GlobalSign,O=GlobalSign,OU=GlobalSign ECC Root CA - R4

<sup>#</sup> Not Valid Before: Tue Nov 13 00:00:00 2012

<sup>#</sup> Not Valid After: Tue Jan 19 03:14:07 2038

<sup>#</sup> Fingerprint (SHA-256):

```
\046\051\370\155\341\210\277\242\145\177\252\304\315\017\177\374
END
CKA ISSUER MULTILINE OCTAL
\060\120\061\044\060\042\006\003\125\004\013\023\033\107\154\157
\142\141\154\123\151\147\156\040\105\103\103\040\122\157\157\164
\040\103\101\040\055\040\122\064\061\023\060\021\006\003\125\004
\012\023\012\107\154\157\142\141\154\123\151\147\156\061\023\060
\021\006\003\125\004\003\023\012\107\154\157\142\141\154\123\151
\147\156
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\label{eq:condition} $$ \002\015\002\03\345\176\365\077\223\375\245\011\041\262\246$
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "GTS Root R1"
# Issuer: CN=GTS Root R1,O=Google Trust Services LLC,C=US
# Serial Number:02:03:e5:93:6f:31:b0:13:49:88:6b:a2:17
# Subject: CN=GTS Root R1,O=Google Trust Services LLC,C=US
# Not Valid Before: Wed Jun 22 00:00:00 2016
# Not Valid After: Sun Jun 22 00:00:00 2036
# Fingerprint (SHA-256):
D9:47:43:2A:BD:E7:B7:FA:90:FC:2E:6B:59:10:1B:12:80:E0:E1:C7:E4:E4:0F:A3:C6:88:7F:FF:57:A7:F4:CF
# Fingerprint (SHA1): E5:8C:1C:C4:91:3B:38:63:4B:E9:10:6E:E3:AD:8E:6B:9D:D9:81:4A
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "GTS Root R1"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\107\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\042\060\040\006\003\125\004\012\023\031\107\157\157\147\154\145
\label{eq:condition} $$ \040\124\162\165\163\164\040\123\145\162\166\151\143\145\163\040$$
\114\114\103\061\024\060\022\006\003\125\004\003\023\013\107\124
\123\040\122\157\157\164\040\122\061
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\107\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\042\060\040\006\003\125\004\012\023\031\107\157\157\147\154\145
\040\124\162\165\163\164\040\123\145\162\166\151\143\145\163\040
\114\114\103\061\024\060\022\006\003\125\004\003\023\013\107\124
```

\123\040\122\157\157\164\040\122\061

**END** 

CKA SERIAL NUMBER MULTILINE OCTAL

\002\015\002\003\345\223\157\061\260\023\111\210\153\242\027

**END** 

# CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\127\060\202\003\077\240\003\002\001\002\002\015\002 \003\345\223\157\061\260\023\111\210\153\242\027\060\015\006\011  $\label{eq:condition} $$ \052\206\110\206\367\015\001\001\014\005\000\060\107\061\013\060 $$$ \011\006\003\125\004\006\023\002\125\123\061\042\060\040\006\003 \125\004\012\023\031\107\157\157\147\154\145\040\124\162\165\163 \164\040\123\145\162\166\151\143\145\163\040\114\114\103\061\024 \060\022\006\003\125\004\003\023\013\107\124\123\040\122\157\157 \164\040\122\061\060\036\027\015\061\066\060\066\062\062\060\060  $\label{eq:condition} $$ \060\060\060\060\132\027\015\063\066\060\066\062\062\060\060\060$ \060\060\060\132\060\107\061\013\060\011\006\003\125\004\006\023  $\label{eq:condition} $$ \002\125\123\061\042\060\040\006\003\125\004\012\023\031\107\157 $$$ \157\147\154\145\040\124\162\165\163\164\040\123\145\162\166\151 \143\145\163\040\114\114\103\061\024\060\022\006\003\125\004\003  $\label{eq:condition} $$ \023\013\107\124\123\040\122\157\157\164\040\122\061\060\202\002$ \042\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000 \003\202\002\017\000\060\202\002\012\002\202\002\001\000\266\021  $\label{eq:condition} $$ \002\213\036\343\241\167\233\073\334\277\224\076\267\225\247\100 $$$ \074\241\375\202\371\175\062\006\202\161\366\366\214\177\373\350 \333\274\152\056\227\227\243\214\113\371\053\366\261\371\316\204 \035\261\371\305\227\336\357\271\362\243\351\274\022\211\136\247 \252\122\253\370\043\047\313\244\261\234\143\333\327\231\176\360  $\label{eq:condition} $$ \012\136\353\150\246\364\306\132\107\015\115\020\063\343\116\261 $$$ \023\243\310\030\154\113\354\374\011\220\337\235\144\051\045\043 \007\241\264\322\075\056\140\340\317\322\011\207\273\315\110\360  $\label{eq:condition} $$ \frac{302}{302}172\frac{210}{212}273\frac{272}{317}131\frac{326}{257}217\frac{260}{007}$ \260\236\061\361\202\301\300\337\056\246\155\154\031\016\265\330 \176\046\032\105\003\075\260\171\244\224\050\255\017\177\046\345 \250\010\376\226\350\074\150\224\123\356\203\072\210\053\025\226 \011\262\340\172\214\056\165\326\234\353\247\126\144\217\226\117 \150\256\075\227\302\204\217\300\274\100\300\013\134\275\366\207 \263\065\154\254\030\120\177\204\340\114\315\222\323\040\351\063  $\label{eq:condition} $$ \274\122\231\257\062\265\051\263\045\052\264\110\371\162\341\312$  $\label{eq:condition} $$ 144\367\346\202\020\215\350\235\302\212\210\372\070\146\212\374 $$$ \143\371\001\371\170\375\173\134\167\372\166\207\372\354\337\261 \016\171\225\127\264\275\046\357\326\001\321\353\026\012\273\216 \013\265\305\305\212\125\253\323\254\352\221\113\051\314\031\244 \062\045\116\052\361\145\104\320\002\316\252\316\111\264\352\237 \174\203\260\100\173\347\103\253\247\154\243\217\175\211\201\372 \114\245\377\325\216\303\316\113\340\265\330\263\216\105\317\166 \300\355\100\053\375\123\017\260\247\325\073\015\261\212\242\003 \336\061\255\314\167\352\157\173\076\326\337\221\042\022\346\276 \372\330\062\374\020\143\024\121\162\336\135\326\026\223\275\051

\150\063\357\072\146\354\007\212\046\337\023\327\127\145\170\047 \336\136\111\024\000\242\000\177\232\250\041\266\251\261\225\260 \245\271\015\026\021\332\307\154\110\074\100\340\176\015\132\315 \126\074\321\227\005\271\313\113\355\071\113\234\304\077\322\125 \023\156\044\260\326\161\372\364\301\272\314\355\033\365\376\201 \101\330\000\230\075\072\310\256\172\230\067\030\005\225\002\003 \001\000\001\243\102\060\100\060\016\006\003\125\035\017\001\001 \377\004\004\003\002\001\206\060\017\006\003\125\035\023\001\001 \377\004\005\060\003\001\001\377\060\035\006\003\125\035\016\004 \026\004\024\344\257\053\046\161\032\053\110\047\205\057\122\146 \054\357\360\211\023\161\076\060\015\006\011\052\206\110\206\367 \013\233\276\377\036\226\222\056\076\242\145\112\152\230\272\042 \313\175\301\072\330\202\012\006\306\366\245\336\300\116\207\146 \171\241\371\246\130\234\252\371\265\346\140\347\340\350\261\036 \102\101\063\013\067\075\316\211\160\025\312\265\044\250\317\153 \265\322\100\041\230\317\042\064\317\073\305\042\204\340\305\016 \212\174\135\210\344\065\044\316\233\076\032\124\036\156\333\262 \207\247\374\363\372\201\125\024\142\012\131\251\042\005\061\076 \202\326\356\333\127\064\274\063\225\323\027\033\350\047\242\213 \173\116\046\032\172\132\144\266\321\254\067\361\375\240\363\070 \354\162\360\021\165\235\313\064\122\215\346\166\153\027\306\337  $\label{eq:condition} $$ \206\253\047\216\111\053\165\146\201\020\041\246\352\076\364\256$$ \045\377\174\025\336\316\214\045\077\312\142\160\012\367\057\011 \146\007\310\077\034\374\360\333\105\060\337\142\210\301\265\017 \235\303\237\112\336\131\131\107\305\207\042\066\346\202\247\355 \012\271\342\007\240\215\173\172\112\074\161\322\342\003\241\037 \051\170\275\371\125\313\143\305\074\114\364\266\377\333\152\137 \061\153\231\236\054\301\153\120\244\327\346\030\024\275\205\077  $\\ 147 \\ 253 \\ 106 \\ 237 \\ 240 \\ 377 \\ 102 \\ 247 \\ 072 \\ 177 \\ 134 \\ 313 \\ 135 \\ 260 \\ 160 \\ 035$ \053\064\365\324\166\011\014\353\170\114\131\005\363\063\102\303 \141\025\020\033\167\115\316\042\214\324\205\362\105\175\267\123 \352\357\100\132\224\012\134\040\137\116\100\135\142\042\166\337 \377\316\141\275\214\043\170\322\067\002\340\216\336\321\021\067 \211\366\277\355\111\007\142\256\222\354\100\032\257\024\011\331 \320\116\262\242\367\276\356\356\330\377\334\032\055\336\270\066  $\label{eq:condition} $$ 161\342\374\171\267\224\045\321\110\163\133\241\065\347\263\231$ \147\165\301\031\072\053\107\116\323\102\216\375\061\310\026\146 \332\322\014\074\333\263\216\311\241\015\200\017\173\026\167\024 \277\377\333\011\224\262\223\274\040\130\025\351\333\161\103\363 \336\020\303\000\334\250\052\225\266\302\326\077\220\153\166\333 \154\376\214\274\362\160\065\014\334\231\031\065\334\327\310\106 \143\325\066\161\256\127\373\267\202\155\334

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Issuer: CN=GTS Root R1,O=Google Trust Services LLC,C=US
# Serial Number:02:03:e5:93:6f:31:b0:13:49:88:6b:a2:17
# Subject: CN=GTS Root R1,O=Google Trust Services LLC,C=US
# Not Valid Before: Wed Jun 22 00:00:00 2016
# Not Valid After: Sun Jun 22 00:00:00 2036
# Fingerprint (SHA-256):
D9:47:43:2A:BD:E7:B7:FA:90:FC:2E:6B:59:10:1B:12:80:E0:E1:C7:E4:E4:0F:A3:C6:88:7F:FF:57:A7:F4:CF
# Fingerprint (SHA1): E5:8C:1C:C4:91:3B:38:63:4B:E9:10:6E:E3:AD:8E:6B:9D:D9:81:4A
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GTS Root R1"
CKA CERT SHA1 HASH MULTILINE OCTAL
\label{eq:condition} $$ 345 \times 14 \times 304 \times 221 \times 73 \times 70 \times 143 \times 13351 \times 20 \times 156 \times 343 \times 255 \times 216 \times 153 \times 156 \times 
\235\331\201\112
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\005\376\320\277\161\250\243\166\143\332\001\340\330\122\334\100
END
CKA_ISSUER MULTILINE_OCTAL
\060\107\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\042\060\040\006\003\125\004\012\023\031\107\157\157\147\154\145
\040\124\162\165\163\164\040\123\145\162\166\151\143\145\163\040
\114\114\103\061\024\060\022\006\003\125\004\003\023\013\107\124
\123\040\122\157\157\164\040\122\061
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\015\002\003\345\223\157\061\260\023\111\210\153\242\027
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "GTS Root R2"
# Issuer: CN=GTS Root R2,O=Google Trust Services LLC,C=US
# Serial Number:02:03:e5:ae:c5:8d:04:25:1a:ab:11:25:aa
# Subject: CN=GTS Root R2,O=Google Trust Services LLC,C=US
# Not Valid Before: Wed Jun 22 00:00:00 2016
# Not Valid After: Sun Jun 22 00:00:00 2036
# Fingerprint (SHA-256):
8D:25:CD:97:22:9D:BF:70:35:6B:DA:4E:B3:CC:73:40:31:E2:4C:F0:0F:AF:CF:D3:2D:C7:6E:B5:84:1C:7E:A8
# Fingerprint (SHA1): 9A:44:49:76:32:DB:DE:FA:D0:BC:FB:5A:7B:17:BD:9E:56:09:24:94
```

# Trust for "GTS Root R1"

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA LABEL UTF8 "GTS Root R2"

 ${\tt CKA\_CERTIFICATE\_TYPE\ CK\_CERTIFICATE\_TYPE\ CKC\_X\_509}$ 

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \00107\061\013\060\011\006\003\125\004\006\023\002\125\123\061\042\060\040\006\003\125\004\012\023\031\107\157\157\147\154\145\040\124\162\165\163\164\040\123\145\162\166\151\143\145\163\040\114\114\103\061\024\060\022\006\003\125\004\003\023\013\107\124\123\040\122\157\157\164\040\122\062$ 

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \00107\061\013\060\011\006\003\125\004\006\023\002\125\123\061\042\060\040\006\003\125\004\012\023\031\107\157\157\147\154\145\040\124\162\165\163\164\040\123\145\162\166\151\143\145\163\040\114\114\103\061\024\060\022\006\003\125\004\003\023\013\107\124\123\040\122\157\157\164\040\122\062$ 

**END** 

### CKA SERIAL NUMBER MULTILINE OCTAL

 $\label{eq:condition} $$ \002\015\002\03\345\256\305\215\004\045\032\253\021\045\252$ 

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\127\060\202\003\077\240\003\002\001\002\002\015\002 \003\345\256\305\215\004\045\032\253\021\045\252\060\015\006\011 \052\206\110\206\367\015\001\001\014\005\000\060\107\061\013\060 \011\006\003\125\004\006\023\002\125\123\061\042\060\040\006\003 \125\004\012\023\031\107\157\157\147\154\145\040\124\162\165\163  $\label{eq:condition} $$ 164\040\123\145\162\166\151\143\145\163\040\114\114\103\061\024$$ \060\022\006\003\125\004\003\023\013\107\124\123\040\122\157\157 \164\040\122\062\060\036\027\015\061\066\060\066\062\062\060\060 \060\060\060\060\132\027\015\063\066\060\066\062\062\062\060\060 \060\060\060\132\060\107\061\013\060\011\006\003\125\004\006\023 \002\125\123\061\042\060\040\006\003\125\004\012\023\031\107\157 \157\147\154\145\040\124\162\165\163\164\040\123\145\162\166\151 \143\145\163\040\114\114\103\061\024\060\022\006\003\125\004\003 \023\013\107\124\123\040\122\157\157\164\040\122\062\060\202\002  $\\ \langle 042 \rangle 060 \rangle 015 \rangle 006 \rangle 011 \rangle 052 \rangle 206 \rangle 110 \rangle 206 \rangle 367 \rangle 015 \rangle 001 \rangle 001 \rangle 005 \rangle 000$ \003\202\002\017\000\060\202\002\012\002\202\002\001\000\316\336 \375\246\373\354\354\024\064\074\007\006\132\154\131\367\031\065 \335\367\301\235\125\252\323\315\073\244\223\162\357\012\372\155 \235\366\360\205\200\133\241\110\122\237\071\305\267\356\050\254 \357\313\166\150\024\271\337\255\001\154\231\037\304\042\035\237 \376\162\167\340\054\133\257\344\004\277\117\162\240\032\064\230 \350\071\150\354\225\045\173\166\241\346\151\271\205\031\275\211 \214\376\255\355\066\352\163\274\377\203\342\313\175\301\322\316

\112\263\215\005\236\213\111\223\337\301\133\320\156\136\360\056 \060\056\202\374\372\274\264\027\012\110\345\210\233\305\233\153 \336\260\312\264\003\360\332\364\220\270\145\144\367\134\114\255 \350\176\146\136\231\327\270\302\076\310\320\023\235\255\356\344 \105\173\211\125\367\212\037\142\122\204\022\263\302\100\227\343 \212\037\107\221\246\164\132\322\370\261\143\050\020\270\263\011 \270\126\167\100\242\046\230\171\306\376\337\045\356\076\345\240  $\label{eq:condition} $$ \frac{177}324\\141\\017\\121\\113\\074\\077\\214\\332\\341\\160\\164\\330\\302\\150$ \241\371\301\014\351\241\342\177\273\125\074\166\006\356\152\116 \314\222\210\060\115\232\275\117\013\110\232\204\265\230\243\325 \373\163\301\127\141\335\050\126\165\023\256\207\216\347\014\121  $\label{eq:condition} $$ \011\020\165\210\114\274\215\371\173\074\324\042\110\037\052\334$ \353\153\273\104\261\313\063\161\062\106\257\255\112\361\214\350 \164\072\254\347\032\042\163\200\322\060\367\045\102\307\042\073  $\label{eq:condition} $$ \073\022\255\226\056\306\303\166\007\252\040\267\065\111\127\351 $$$ \222\111\350\166\026\162\061\147\053\226\176\212\243\307\224\126  $\\ \langle 042 \rangle 277 \rangle 152 \rangle 113 \rangle 176 \rangle 001 \rangle 041 \rangle 262 \rangle 043 \rangle 062 \rangle 337 \rangle 344 \rangle 232 \rangle 104 \rangle 155 \rangle 131 \rangle 156 \rangle 157 \rangle$ \133\135\365\000\240\034\233\306\170\227\215\220\377\233\310\252 \264\257\021\121\071\136\331\373\147\255\325\133\021\235\062\232  $\label{eq:condition} $$ \033\275\325\272\133\245\311\313\045\151\123\125\047\134\340\312$ \066\313\210\141\373\036\267\320\313\356\026\373\323\246\114\336 \222\245\324\342\337\365\006\124\336\056\235\113\264\223\060\252 \201\316\335\032\334\121\163\015\117\160\351\345\266\026\041\031 \171\262\346\211\013\165\144\312\325\253\274\011\301\030\241\377 \324\124\241\205\074\375\024\044\003\262\207\323\244\267\002\003 \001\000\001\243\102\060\100\060\016\006\003\125\035\017\001\001 \377\004\004\003\002\001\206\060\017\006\003\125\035\023\001\001 \377\004\005\060\003\001\001\377\060\035\006\003\125\035\016\004 \026\004\024\273\377\312\216\043\237\117\231\312\333\342\150\246 \245\025\047\027\036\331\016\060\015\006\011\052\206\110\206\367 \276\241\237\331\047\114\013\334\027\230\021\152\210\336\075\346 \161\126\162\262\236\032\116\234\325\053\230\044\135\233\153\173 \260\063\202\011\275\337\045\106\352\230\236\266\033\376\203\074 \322\142\141\301\004\355\316\340\305\311\310\023\023\125\347\250 \143\255\214\173\001\376\167\060\341\316\150\233\005\370\022\356 \171\061\240\101\105\065\050\012\161\244\044\117\214\334\074\202  $\label{eq:condition} $$ \007\137\146\334\175\020\376\014\141\263\005\225\356\341\256\201 $$$  $\label{eq:condition} $$ \017\250\370\307\217\115\250\043\002\046\153\035\203\122\125\316$$ \265\057\000\312\200\100\340\341\164\254\140\365\207\200\235\256 \066\144\221\135\260\150\030\352\212\141\311\167\250\227\304\311 \307\245\374\125\113\363\360\177\271\145\075\047\150\320\314\153 \372\123\235\341\221\032\311\135\032\226\155\062\207\355\003\040 \310\002\316\132\276\331\352\375\262\115\304\057\033\337\137\172  $\label{eq:condition} $$ 365\370\213\306\356\061\072\045\121\125\147\215\144\062\173\351 $$$ \236\303\202\272\052\055\351\036\264\340\110\006\242\374\147\257  $\label{eq:condition} $$ \037\042\002\163\373\040\012\257\235\124\113\241\315\377\140\107$ \260\077\135\357\033\126\275\227\041\226\055\012\321\136\235\070

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "GTS Root R2"
- # Issuer: CN=GTS Root R2,O=Google Trust Services LLC,C=US
- # Serial Number:02:03:e5:ae:c5:8d:04:25:1a:ab:11:25:aa
- # Subject: CN=GTS Root R2,O=Google Trust Services LLC,C=US
- # Not Valid Before: Wed Jun 22 00:00:00 2016
- # Not Valid After: Sun Jun 22 00:00:00 2036
- # Fingerprint (SHA-256):
- 8D:25:CD:97:22:9D:BF:70:35:6B:DA:4E:B3:CC:73:40:31:E2:4C:F0:0F:AF:CF:D3:2D:C7:6E:B5:84:1C:7E:A8
- # Fingerprint (SHA1): 9A:44:49:76:32:DB:DE:FA:D0:BC:FB:5A:7B:17:BD:9E:56:09:24:94

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "GTS Root R2"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\232\104\111\166\062\333\336\372\320\274\373\132\173\027\275\236 \126\011\044\224

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \036\071\300\123\346\036\051\202\013\312\122\125\066\135\127\334 END$ 

CKA\_ISSUER MULTILINE\_OCTAL

**END** 

```
CKA SERIAL NUMBER MULTILINE OCTAL
\002\015\002\003\345\256\305\215\004\045\032\253\021\045\252
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "GTS Root R3"
# Issuer: CN=GTS Root R3,O=Google Trust Services LLC,C=US
# Serial Number:02:03:e5:b8:82:eb:20:f8:25:27:6d:3d:66
# Subject: CN=GTS Root R3,O=Google Trust Services LLC,C=US
# Not Valid Before: Wed Jun 22 00:00:00 2016
# Not Valid After: Sun Jun 22 00:00:00 2036
# Fingerprint (SHA-256):
 34:D8:A7:3E:E2:08:D9:BC:DB:0D:95:65:20:93:4B:4E:40:E6:94:82:59:6E:8B:6F:73:C8:42:6B:01:0A:6F:48
# Fingerprint (SHA1): ED:E5:71:80:2B:C8:92:B9:5B:83:3C:D2:32:68:3F:09:CD:A0:1E:46
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "GTS Root R3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\107\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\\ \\ \langle 042 \rangle 060 \rangle 040 \rangle 006 \rangle 003 \rangle 125 \rangle 004 \rangle 012 \rangle 023 \rangle 031 \rangle 107 \rangle 157 \rangle 147 \rangle 154 \rangle 145 
\040\124\162\165\163\164\040\123\145\162\166\151\143\145\163\040
\114\114\103\061\024\060\022\006\003\125\004\003\023\013\107\124
\123\040\122\157\157\164\040\122\063
END
CKA ID UTF8 "0"
CKA ISSUER MULTILINE OCTAL
\060\107\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\042\060\040\006\003\125\004\012\023\031\107\157\157\147\154\145
\label{eq:condition} $$ \040\124\162\165\163\164\040\123\145\162\166\151\143\145\163\040$$
\123\040\122\157\157\164\040\122\063
END
```

CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\\002\\015\\002\\003\\345\\270\\202\\353\\040\\370\\045\\047\\155\\075\\146$ 

END

CKA\_VALUE MULTILINE\_OCTAL

\060\202\002\011\060\202\001\216\240\003\002\001\002\002\015\002 \003\345\270\202\353\040\370\045\047\155\075\146\060\012\006\010 \052\206\110\316\075\004\003\003\060\107\061\013\060\011\006\003 \125\004\006\023\002\125\123\061\042\060\040\006\003\125\004\012

\023\031\107\157\157\147\154\145\040\124\162\165\163\164\040\123 \145\162\166\151\143\145\163\040\114\114\103\061\024\060\022\006 \003\125\004\003\023\013\107\124\123\040\122\157\157\164\040\122  $\label{eq:condition} $$ \frac{132\\060\\107\\061\\013\\060\\011\\006\\003\\125\\004\\006\\023\\002\\125\\123$ \061\042\060\040\006\003\125\004\012\023\031\107\157\157\147\154 \145\040\124\162\165\163\164\040\123\145\162\166\151\143\145\163 \040\114\114\103\061\024\060\022\006\003\125\004\003\023\013\107 \124\123\040\122\157\157\164\040\122\063\060\166\060\020\006\007  $\label{eq:condition} $$ \052\206\110\316\075\002\001\006\005\053\201\004\000\042\003\142 $$$  $\label{eq:condition} $$ \000\004\037\117\063\207\063\051\212\241\204\336\313\307\041\130 $$$ \101\211\352\126\235\053\113\205\306\035\114\047\274\177\046\121 \162\157\342\237\326\243\312\314\105\024\106\213\255\357\176\206  $\label{eq:condition} $$ \frac{354}{261}176\\057\\377\\251\\161\\235\\030\\204\\105\\004\\101\\125\\156$ \053\352\046\177\273\220\001\343\113\031\272\344\124\226\105\011 \261\325\154\221\104\255\204\023\216\232\214\015\200\014\062\366 \340\047\243\102\060\100\060\016\006\003\125\035\017\001\001\377 \004\004\003\002\001\206\060\017\006\003\125\035\023\001\001\377  $\\ \\004\\ \\005\\ \\060\\ \\003\\ \\001\\ \\001\\ \\001\\ \\377\\ \\060\\ \\035\\ \\006\\ \\003\\ \\125\\ \\035\\ \\016\\ \\004\\ \\026$ \004\024\301\361\046\272\240\055\256\205\201\317\323\361\052\022  $\label{eq:condition} $$ \275\270\012\147\375\274\060\012\006\010\052\206\110\316\075\004$$$  $\label{eq:condition} $$ \003\003\151\000\060\146\002\061\000\366\341\040\225\024\173 $$$ \124\243\220\026\021\277\204\310\352\157\153\027\236\036\106\230 \040\233\237\323\015\331\254\323\057\315\174\370\133\056\125\273 \277\335\222\367\244\014\334\061\341\242\002\061\000\374\227\146 \146\345\103\026\023\203\335\307\337\057\276\024\070\355\001\316 \261\027\032\021\165\351\275\003\217\046\176\204\345\311\140\246 \225\327\124\131\267\347\021\054\211\324\271\356\027 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "GTS Root R3"
```

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "GTS Root R3"

<sup>#</sup> Issuer: CN=GTS Root R3,O=Google Trust Services LLC,C=US

<sup>#</sup> Serial Number:02:03:e5:b8:82:eb:20:f8:25:27:6d:3d:66

<sup>#</sup> Subject: CN=GTS Root R3,O=Google Trust Services LLC,C=US

<sup>#</sup> Not Valid Before: Wed Jun 22 00:00:00 2016

<sup>#</sup> Not Valid After: Sun Jun 22 00:00:00 2036

<sup>#</sup> Fingerprint (SHA-256):

<sup>34:</sup>D8:A7:3E:E2:08:D9:BC:DB:0D:95:65:20:93:4B:4E:40:E6:94:82:59:6E:8B:6F:73:C8:42:6B:01:0A:6F:48

<sup>#</sup> Fingerprint (SHA1): ED:E5:71:80:2B:C8:92:B9:5B:83:3C:D2:32:68:3F:09:CD:A0:1E:46

```
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\315\240\036\106
END
CKA CERT MD5 HASH MULTILINE OCTAL
\076\347\235\130\002\224\106\121\224\345\340\042\112\213\347\163
END
CKA ISSUER MULTILINE OCTAL
\060\107\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\042\060\040\006\003\125\004\012\023\031\107\157\157\147\154\145
\label{eq:condition} $$ \040\124\162\165\163\164\040\123\145\162\166\151\143\145\163\040$$
\123\040\122\157\157\164\040\122\063
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\015\002\003\345\270\202\353\040\370\045\047\155\075\146
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "GTS Root R4"
# Issuer: CN=GTS Root R4,O=Google Trust Services LLC,C=US
# Serial Number:02:03:e5:c0:68:ef:63:1a:9c:72:90:50:52
# Subject: CN=GTS Root R4,O=Google Trust Services LLC,C=US
# Not Valid Before: Wed Jun 22 00:00:00 2016
# Not Valid After: Sun Jun 22 00:00:00 2036
# Fingerprint (SHA-256):
34:9D:FA:40:58:C5:E2:63:12:3B:39:8A:E7:95:57:3C:4E:13:13:C8:3F:E6:8F:93:55:6C:D5:E8:03:1B:3C:7D
# Fingerprint (SHA1): 77:D3:03:67:B5:E0:0C:15:F6:0C:38:61:DF:7C:E1:3B:92:46:4D:47
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GTS Root R4"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\107\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\\ \\ \langle 042 \rangle 060 \rangle 040 \rangle 006 \rangle 003 \rangle 125 \rangle 004 \rangle 012 \rangle 023 \rangle 031 \rangle 107 \rangle 157 \rangle 147 \rangle 154 \rangle 145 \rangle 145 \rangle 147 
\040\124\162\165\163\164\040\123\145\162\166\151\143\145\163\040
\114\114\103\061\024\060\022\006\003\125\004\003\023\013\107\124
\123\040\122\157\157\164\040\122\064
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
```

**END** 

CKA SERIAL NUMBER MULTILINE OCTAL

 $\label{eq:condition} $$ \002\015\002\03\345\300\150\357\143\032\234\162\220\120\122 $$$ 

**END** 

### CKA VALUE MULTILINE OCTAL

\060\202\002\011\060\202\001\216\240\003\002\001\002\002\015\002  $\label{eq:condition} $$ \003\345\300\150\357\143\032\234\162\220\120\122\060\012\006\010 $$$ \052\206\110\316\075\004\003\003\060\107\061\013\060\011\006\003 \125\004\006\023\002\125\123\061\042\060\040\006\003\125\004\012  $\label{eq:condition} $$ \023\031\107\157\157\147\154\145\040\124\162\165\163\164\040\123$ \145\162\166\151\143\145\163\040\114\114\103\061\024\060\022\006  $\label{eq:condition} $$ \003\125\004\003\023\013\107\124\123\040\122\157\157\164\040\122$  $\label{eq:condition} $$ \frac{132\\060\\107\\061\\013\\060\\011\\006\\003\\125\\004\\006\\023\\002\\125\\123$ \061\042\060\040\006\003\125\004\012\023\031\107\157\157\147\154 \145\040\124\162\165\163\164\040\123\145\162\166\151\143\145\163  $\\ \\ \langle 040 \rangle 114 \rangle 103 \rangle 061 \rangle 024 \rangle 060 \rangle 022 \rangle 006 \rangle 003 \rangle 125 \rangle 004 \rangle 003 \rangle 023 \rangle 013 \rangle 107 \rangle 006 \rangle 007 \rangle 007$ \124\123\040\122\157\157\164\040\122\064\060\166\060\020\006\007 \052\206\110\316\075\002\001\006\005\053\201\004\000\042\003\142 \000\004\363\164\163\247\150\213\140\256\103\270\065\305\201\060 \173\113\111\235\373\301\141\316\346\336\106\275\153\325\141\030  $\label{eq:condition} $$ \065\256\100\335\163\367\211\221\060\132\353\074\356\205\174\242 $$$ \100\166\073\251\306\270\107\330\052\347\222\221\152\163\351\261 \162\071\237\051\237\242\230\323\137\136\130\206\145\017\241\204 \145\006\321\334\213\311\307\163\310\214\152\057\345\304\253\321 \035\212\243\102\060\100\060\016\006\003\125\035\017\001\001\377 \004\004\003\002\001\206\060\017\006\003\125\035\023\001\001\377 \004\005\060\003\001\001\377\060\035\006\003\125\035\016\004\026 \004\024\200\114\326\353\164\377\111\066\243\325\330\374\265\076 \305\152\360\224\035\214\060\012\006\010\052\206\110\316\075\004 \003\003\003\151\000\060\146\002\061\000\350\100\377\203\336\003 \364\237\256\035\172\247\056\271\257\117\366\203\035\016\055\205  $\label{eq:condition} $$ \001\035\321\331\152\354\017\302\257\307\136\126\136\134\325\034$ \130\042\050\013\367\060\266\057\261\174\002\061\000\360\141\074 \247\364\240\202\343\041\325\204\035\163\206\234\055\257\312\064 \233\361\237\271\043\066\342\274\140\003\235\200\263\232\126\310 \341\342\273\024\171\312\315\041\324\224\265\111\103

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Issuer: CN=GTS Root R4,O=Google Trust Services LLC,C=US
# Serial Number:02:03:e5:c0:68:ef:63:1a:9c:72:90:50:52
# Subject: CN=GTS Root R4,O=Google Trust Services LLC,C=US
# Not Valid Before: Wed Jun 22 00:00:00 2016
# Not Valid After: Sun Jun 22 00:00:00 2036
# Fingerprint (SHA-256):
34:9D:FA:40:58:C5:E2:63:12:3B:39:8A:E7:95:57:3C:4E:13:13:C8:3F:E6:8F:93:55:6C:D5:E8:03:1B:3C:7D
# Fingerprint (SHA1): 77:D3:03:67:B5:E0:0C:15:F6:0C:38:61:DF:7C:E1:3B:92:46:4D:47
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "GTS Root R4"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\167\323\003\147\265\340\014\025\366\014\070\141\337\174\341\073
\222\106\115\107
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\103\226\203\167\031\115\166\263\235\145\122\344\035\042\245\350
END
CKA_ISSUER MULTILINE_OCTAL
\label{eq:condition} $$ \060\107\061\013\060\011\006\003\125\004\006\023\002\125\123\061\
\042\060\040\006\003\125\004\012\023\031\107\157\157\147\154\145
\040\124\162\165\163\164\040\123\145\162\166\151\143\145\163\040
\114\114\103\061\024\060\022\006\003\125\004\003\023\013\107\124
\123\040\122\157\157\164\040\122\064
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\015\002\003\345\300\150\357\143\032\234\162\220\120\122
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Telia Root CA v2"
# Issuer: CN=Telia Root CA v2,O=Telia Finland Oyj,C=FI
# Serial Number:01:67:5f:27:d6:fe:7a:e3:e4:ac:be:09:5b:05:9e
# Subject: CN=Telia Root CA v2,O=Telia Finland Oyj,C=FI
# Not Valid Before: Thu Nov 29 11:55:54 2018
# Not Valid After: Sun Nov 29 11:55:54 2043
# Fingerprint (SHA-256):
24:2B:69:74:2F:CB:1E:5B:2A:BF:98:89:8B:94:57:21:87:54:4E:5B:4D:99:11:78:65:73:62:1F:6A:74:B8:2C
# Fingerprint (SHA1): B9:99:CD:D1:73:50:8A:C4:47:05:08:9C:8C:88:FB:BE:A0:2B:40:CD
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
```

# Trust for "GTS Root R4"

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA LABEL UTF8 "Telia Root CA v2"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \00104\061\013\060\011\006\003\125\004\006\023\002\106\111\061 $$ \032\060\030\006\003\125\004\012\014\021\124\145\154\151\141\040 $$ \003\125\004\003\124\145\154\151\141\040\122\157\157\164 $$ \040\103\101\040\166\062$ 

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \00104\061\013\060\011\006\003\125\004\006\023\002\106\111\061 $$ \032\060\030\006\003\125\004\012\014\021\124\145\154\151\141\040 $$ \003\125\004\003\014\020\124\145\154\151\141\040\122\157\157\164 $$ \040\103\101\040\166\062$ 

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

\002\017\001\147\137\047\326\376\172\343\344\254\276\011\133\005\236

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\164\060\202\003\134\240\003\002\001\002\002\017\001 \147\137\047\326\376\172\343\344\254\276\011\133\005\236\060\015  $\label{eq:condition} $$ \006\011\052\206\110\206\367\015\001\001\013\005\000\060\104\061 $$$ \013\060\011\006\003\125\004\006\023\002\106\111\061\032\060\030 \006\003\125\004\012\014\021\124\145\154\151\141\040\106\151\156 \154\141\156\144\040\117\171\152\061\031\060\027\006\003\125\004 \003\014\020\124\145\154\151\141\040\122\157\157\164\040\103\101 \040\166\062\060\036\027\015\061\070\061\061\062\071\061\065 \065\065\064\132\027\015\064\063\061\061\062\071\061\065\065 \065\064\132\060\104\061\013\060\011\006\003\125\004\006\023\002 \106\111\061\032\060\030\006\003\125\004\012\014\021\124\145\154 \151\141\040\106\151\156\154\141\156\144\040\117\171\152\061\031 \060\027\006\003\125\004\003\014\020\124\145\154\151\141\040\122  $\label{eq:condition} $$ \frac{157}{157}\frac{64}{040}\frac{103}{101}\frac{040}{166}\frac{062}{060}\frac{202}{002}\frac{042}{060}\frac{15}{006} $$$ \011\052\206\110\206\367\015\001\001\001\005\000\003\202\002\017 \000\060\202\002\012\002\202\002\001\000\262\320\077\007\274\342  $\label{eq:condition} $$173\320\153\231\370\342\167\151\347\316\235\244\003\274\202\155$$ \241\376\201\145\037\114\047\254\216\000\272\026\173\353\060\152 \000\300\263\164\150\176\262\257\307\325\142\263\172\077\120\312 \214\066\104\044\143\322\066\351\014\205\366\103\166\325\114\241 \140\162\147\342\050\063\245\313\061\270\072\042\043\064\270\175 \275\126\042\100\235\352\364\173\003\255\150\374\262\201\117\230 \320\164\352\215\345\175\315\143\303\243\366\336\222\302\130\031

\340\226\273\305\304\251\075\245\164\226\376\257\371\211\252\275 \225\027\124\330\170\104\361\014\167\025\222\340\230\102\247\244 \326\252\040\222\315\301\240\263\226\262\072\204\102\215\175\325 \225\344\326\333\351\142\304\130\263\171\305\214\323\065\063\203 \237\165\241\122\047\141\070\361\131\075\216\120\340\275\171\074 \347\154\226\376\136\331\002\145\264\216\134\320\021\064\337\135 \277\122\247\201\000\303\177\231\105\231\025\325\027\310\012\123 \354\143\363\231\175\314\151\022\206\302\027\360\001\236\277\204 \274\321\122\313\033\222\146\316\244\123\345\241\277\304\333\011 \326\346\211\126\053\310\343\174\336\343\377\211\345\065\156\050 \350\154\013\043\121\251\045\005\353\110\370\335\261\312\372\154  $\label{eq:condition} $$ \010\121\357\267\030\154\104\312\046\341\163\306\211\006\201\345 $$$ \212\254\260\342\051\306\271\044\263\153\104\021\364\245\103\302 \114\103\345\160\066\214\266\063\127\172\225\056\202\240\364\134  $\label{eq:condition} $$ \020\263\141\203\366\002\005\206\056\174\055\154\334\003\106\156$$ \065\223\325\172\225\057\336\040\330\133\176\224\220\004\152\272 \131\075\004\005\165\235\067\242\016\056\075\353\301\244\122\203 \376\320\153\324\146\216\334\306\351\022\116\035\052\127\252\020 \274\174\136\202\175\246\246\311\362\055\271\365\027\047\255\321  $\label{eq:condition} $$ \016\211\124\053\225\372\300\255\035\230\024\170\063\102\206\012 $$$ \251\163\265\373\164\015\267\033\060\031\304\132\016\034\047\267 \332\030\320\377\212\310\005\272\361\252\034\242\067\267\346\110  $\label{eq:condition} $$ 244\106\054\224\352\250\166\142\107\213\020\123\007\110\127\154$$ \342\222\115\266\256\005\313\334\301\112\136\217\254\075\031\116 \302\355\140\165\053\333\301\312\102\325\002\003\001\000\001\243 \143\060\141\060\037\006\003\125\035\043\004\030\060\026\200\024 \162\254\344\063\171\252\105\207\366\375\254\035\236\326\307\057  $\label{eq:condition} $$ \206\330\044\071\060\035\006\003\125\035\016\004\026\004\024\162$ \254\344\063\171\252\105\207\366\375\254\035\236\326\307\057\206 \330\044\071\060\016\006\003\125\035\017\001\001\377\004\004\003  $\label{eq:condition} $$ \002\001\006\000\17\006\003\125\023\001\001\377\004\005\060$$$ \003\001\001\377\060\015\006\011\052\206\110\206\367\015\001\001 \013\005\000\003\202\002\001\000\240\073\131\247\011\224\076\066 \204\322\176\057\071\245\226\227\372\021\255\374\147\363\161\011 \362\262\211\204\147\104\257\271\357\355\226\354\234\144\333\062 \060\157\147\232\254\176\137\262\253\001\066\176\201\372\344\204 \136\322\254\066\340\153\142\305\175\113\016\202\155\322\166\142  $\label{eq:condition} $$ \frac{321}{376}\frac{227}{370}\frac{237}{060}\frac{174}{030}\frac{371}{264}\frac{122}{167}\frac{202}{035}\frac{166}{333}$ \323\035\251\360\301\232\000\275\155\165\330\175\347\372\307\070 \243\234\160\350\106\171\003\257\056\164\333\165\370\156\123\014 \003\310\231\032\211\065\031\074\323\311\124\174\250\360\054\346 \156\007\171\157\152\341\346\352\221\202\151\012\035\303\176\131 \242\236\153\106\025\230\133\323\257\106\035\142\310\316\200\122 \111\021\077\311\004\022\303\023\174\077\073\212\226\333\074\240  $\label{eq:condition} $$ \036\012\264\213\124\262\044\147\015\357\202\313\276\074\175\321 $$$ \342\177\256\026\326\126\130\271\332\040\261\203\025\241\357\212 \115\062\157\101\057\023\122\202\224\327\032\301\170\242\121\335 \053\160\155\267\032\371\367\260\340\147\227\126\333\174\141\123

\011\003\050\002\100\307\263\330\375\234\160\152\306\050\303\205 \351\342\355\032\223\240\336\113\230\242\204\076\005\167\001\226 \075\373\264\040\017\234\162\002\172\022\057\325\243\272\121\170  $\label{eq:condition} $$ \257\052\053\104\145\116\265\375\012\350\301\315\171\207\141\053$  $\label{eq:condition} $$ 336 \200 \127 \105 \277 \147 \361 \233 \221 \136 \245 \244 \354 \131 \110 \020$ \015\070\307\260\372\303\104\155\004\365\170\120\034\222\226\133 \332\365\270\056\272\133\317\345\360\152\235\113\057\130\163\055  $\label{eq:condition} $$ \frac{364}{364} \frac{364}{263} \frac{377}{253} \frac{325}{016} \frac{31}{101} \frac{212}{244}$ \301\127\022\146\161\114\372\123\343\127\353\142\225\011\236\124 \335\321\302\074\127\074\275\070\255\230\144\267\270\003\232\123 \126\140\135\263\330\102\033\134\113\022\212\034\353\353\175\306  $\label{eq:condition} $$ \frac{172\151\307\047\177\244\370\213\362\344\224\146\207\113\351\224}{146\207\113\351\224} $$$ \007\011\022\171\212\262\353\164\004\334\316\364\104\131\340\026 \312\305\054\130\327\074\173\317\142\206\152\120\175\065\066\146 \247\373\067\347\050\307\330\320\255\245\151\224\217\350\301\337 \044\370\033\007\061\207\201\330\135\366\350\050\330\112\122\200 \254\023\356\120\024\036\230\307

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "Telia Root CA v2"
- # Issuer: CN=Telia Root CA v2,O=Telia Finland Oyj,C=FI
- # Serial Number:01:67:5f:27:d6:fe:7a:e3:e4:ac:be:09:5b:05:9e
- # Subject: CN=Telia Root CA v2,O=Telia Finland Oyj,C=FI
- # Not Valid Before: Thu Nov 29 11:55:54 2018
- # Not Valid After: Sun Nov 29 11:55:54 2043
- # Fingerprint (SHA-256):
- 24:2B:69:74:2F:CB:1E:5B:2A:BF:98:89:8B:94:57:21:87:54:4E:5B:4D:99:11:78:65:73:62:1F:6A:74:B8:2C
- # Fingerprint (SHA1): B9:99:CD:D1:73:50:8A:C4:47:05:08:9C:8C:88:FB:BE:A0:2B:40:CD

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "Telia Root CA v2"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\271\231\315\321\163\120\212\304\107\005\010\234\214\210\373\276\240\053\100\315

**END** 

CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

 $\label{eq:condition} $$ \016\217\254\252\202\337\205\261\364\334\020\034\374\231\331\110 $$$  END

CKA\_ISSUER MULTILINE\_OCTAL

```
\040\103\101\040\166\062
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \002\017\001\147\137\047\326\376\172\343\344\254\276\011\133\005
\236
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
#
# Certificate "D-TRUST BR Root CA 1 2020"
# Issuer: CN=D-TRUST BR Root CA 1 2020,O=D-Trust GmbH,C=DE
# Serial Number:7c:c9:8f:2b:84:d7:df:ea:0f:c9:65:9a:d3:4b:4d:96
# Subject: CN=D-TRUST BR Root CA 1 2020,O=D-Trust GmbH,C=DE
# Not Valid Before: Tue Feb 11 09:45:00 2020
# Not Valid After: Sun Feb 11 09:44:59 2035
# Fingerprint (SHA-256):
E5:9A:AA:81:60:09:C2:2B:FF:5B:25:BA:D3:7D:F3:06:F0:49:79:7C:1F:81:D8:5A:B0:89:E6:57:BD:8F:00:44
# Fingerprint (SHA1): 1F:5B:98:F0:E3:B5:F7:74:3C:ED:E6:B0:36:7D:32:CD:F4:09:41:67
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "D-TRUST BR Root CA 1 2020"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA SUBJECT MULTILINE OCTAL
\060\110\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\label{eq:condition} $$ \025\060\023\006\003\125\004\012\023\014\104\055\124\162\165\163
\164\040\107\155\142\110\061\042\060\040\006\003\125\004\003\023
\031\104\055\124\122\125\123\124\040\102\122\040\122\157\157\164
\040\103\101\040\061\040\062\060\062\060
END
CKA ID UTF8 "0"
CKA ISSUER MULTILINE OCTAL
\060\110\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\label{eq:condition} $$ \025\060\023\006\003\125\004\012\023\014\104\055\124\162\165\163
\164\040\107\155\142\110\061\042\060\040\006\003\125\004\003\023
\031\104\055\124\122\125\123\124\040\102\122\040\122\157\157\164
\040\103\101\040\061\040\062\060\062\060
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\174\311\217\053\204\327\337\352\017\311\145\232\323\113
\115\226
END
CKA_VALUE MULTILINE_OCTAL
```

\060\202\002\333\060\202\002\140\240\003\002\001\002\002\020\174 \311\217\053\204\327\337\352\017\311\145\232\323\113\115\226\060 \012\006\010\052\206\110\316\075\004\003\003\060\110\061\013\060 \011\006\003\125\004\006\023\002\104\105\061\025\060\023\006\003 \125\004\012\023\014\104\055\124\162\165\163\164\040\107\155\142  $\label{eq:condition} $$ \frac{110\,061\,042\,060\,040\,006\,003\,125\,004\,003\,023\,031\,104\,055\,124\,122}{120\,061\,042\,060\,040\,006\,003\,125\,004\,003\,023\,031\,104\,055\,124\,122}$ \125\123\124\040\102\122\040\122\157\157\164\040\103\101\040\061 \040\062\060\062\060\060\036\027\015\062\060\060\062\061\061\060  $\label{eq:condition} $$ \064\065\060\060\132\027\015\063\065\060\062\061\061\060\071 $$$ \064\064\065\071\132\060\110\061\013\060\011\006\003\125\004\006 \023\002\104\105\061\025\060\023\006\003\125\004\012\023\014\104  $\label{eq:condition} $$ \05124\162\165\163\164\040\107\155\142\110\061\042\060\040\006$ \003\125\004\003\023\031\104\055\124\122\125\123\124\040\102\122  $\label{eq:condition} $$ \040\122\157\157\164\040\103\101\040\061\040\062\060\062\060\060$ \004\000\042\003\142\000\004\306\313\307\050\321\373\204\365\232 \357\102\024\040\341\103\153\156\165\255\374\053\003\204\324\166 \223\045\327\131\073\101\145\153\036\346\064\052\273\164\366\022 \316\350\155\347\253\344\074\116\077\104\010\213\315\026\161\313 \277\222\231\364\244\327\074\120\124\122\220\205\203\170\224\147 \147\243\034\011\031\075\165\064\205\336\355\140\175\307\014\264 \101\122\271\156\345\356\102\243\202\001\015\060\202\001\011\060  $\label{eq:condition} $$ \0.017\0.06\0.03\1.25\0.035\0.023\0.01\0.01\3.77\0.04\0.05\0.003\0.001\0.01\3.77$ \060\035\006\003\125\035\016\004\026\004\024\163\221\020\253\377 \125\263\132\174\011\045\325\262\272\010\240\153\253\037\155\060 \016\006\003\125\035\017\001\001\377\004\004\003\002\001\006\060 \201\306\006\003\125\035\037\004\201\276\060\201\273\060\076\240  $\\ \\ \langle 074 \rangle 240 \rangle 072 \rangle 206 \rangle 070 \rangle 150 \rangle 164 \rangle 164 \rangle 160 \rangle 072 \rangle 057 \rangle 057 \rangle 143 \rangle 162 \rangle 154 \rangle 056$ \144\055\164\162\165\163\164\056\156\145\164\057\143\162\154\057 \144\055\164\162\165\163\164\137\142\162\137\162\157\157\164\137  $\label{eq:condition} $$ 143\backslash 141\backslash 137\backslash 061\backslash 137\backslash 062\backslash 060\backslash 062\backslash 060\backslash 056\backslash 143\backslash 162\backslash 154\backslash 060\backslash 171\backslash 240$$ \167\240\165\206\163\154\144\141\160\072\057\057\144\151\162\145 \143\164\157\162\171\056\144\055\164\162\165\163\164\056\156\145 \164\057\103\116\075\104\055\124\122\125\123\124\045\062\060\102 \122\045\062\060\122\157\157\164\045\062\060\103\101\045\062\060 \061\045\062\060\062\060\062\060\054\117\075\104\055\124\162\165 \163\164\045\062\060\107\155\142\110\054\103\075\104\105\077\143  $\\ 145 \\ 162 \\ 164 \\ 151 \\ 146 \\ 151 \\ 143 \\ 141 \\ 164 \\ 145 \\ 162 \\ 145 \\ 166 \\ 157 \\ 143 \\ 141 \\ 141 \\ 145 \\ 162 \\ 145 \\ 166 \\ 157 \\ 143 \\ 141 \\ 1$ \372\341\143\370\141\143\350\255\205\170\124\221\234\270\223\070 \076\032\101\332\100\026\123\102\010\312\057\216\361\076\201\126 \300\252\330\355\030\304\260\256\364\076\372\046\002\061\000\363 \050\342\306\333\053\231\373\267\121\270\044\243\244\224\172\032 \077\346\066\342\003\127\063\212\060\313\202\307\326\024\021\325 \165\143\133\024\225\234\037\001\317\330\325\162\247\017\073 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE

# CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "D-TRUST BR Root CA 1 2020"
# Issuer: CN=D-TRUST BR Root CA 1 2020.O=D-Trust GmbH.C=DE
# Serial Number:7c:c9:8f:2b:84:d7:df:ea:0f:c9:65:9a:d3:4b:4d:96
# Subject: CN=D-TRUST BR Root CA 1 2020,O=D-Trust GmbH,C=DE
# Not Valid Before: Tue Feb 11 09:45:00 2020
# Not Valid After: Sun Feb 11 09:44:59 2035
# Fingerprint (SHA-256):
E5:9A:AA:81:60:09:C2:2B:FF:5B:25:BA:D3:7D:F3:06:F0:49:79:7C:1F:81:D8:5A:B0:89:E6:57:BD:8F:00:44
# Fingerprint (SHA1): 1F:5B:98:F0:E3:B5:F7:74:3C:ED:E6:B0:36:7D:32:CD:F4:09:41:67
CKA CLASS CK OBJECT CLASS CKO NSS TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "D-TRUST BR Root CA 1 2020"
CKA CERT SHA1 HASH MULTILINE OCTAL
\037\133\230\360\343\265\367\164\074\355\346\260\066\175\062\315
\364\011\101\147
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\265\252\113\325\355\367\343\125\056\217\162\012\363\165\270\355
END
CKA_ISSUER MULTILINE_OCTAL
\060\110\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\025\060\023\006\003\125\004\012\023\014\104\055\124\162\165\163
\164\040\107\155\142\110\061\042\060\040\006\003\125\004\003\023
\031\104\055\124\122\125\123\124\040\102\122\040\122\157\157\164
\040\103\101\040\061\040\062\060\062\060
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\020\174\311\217\053\204\327\337\352\017\311\145\232\323\113
\115\226
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "D-TRUST EV Root CA 1 2020"
# Issuer: CN=D-TRUST EV Root CA 1 2020,O=D-Trust GmbH,C=DE
# Serial Number:5f:02:41:d7:7a:87:7c:4c:03:a3:ac:96:8d:fb:ff:d0
# Subject: CN=D-TRUST EV Root CA 1 2020,O=D-Trust GmbH,C=DE
# Not Valid Before: Tue Feb 11 10:00:00 2020
# Not Valid After: Sun Feb 11 09:59:59 2035
```

# Fingerprint (SHA-256):

08:17:0D:1A:A3:64:53:90:1A:2F:95:92:45:E3:47:DB:0C:8D:37:AB:AA:BC:56:B8:1A:A1:00:DC:95:89:70:DB

# Fingerprint (SHA1): 61:DB:8C:21:59:69:03:90:D8:7C:9C:12:86:54:CF:9D:3D:F4:DD:07

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA LABEL UTF8 "D-TRUST EV Root CA 1 2020"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \000110061013060011006003125\\00400023\\002104\\105\\061\\025\\060\\023\\006\\003\\125\\004\\012\\023\\014\\104\\055\\124\\162\\165\\163\\164\\040\\107\\155\\142\\110\\061\\042\\060\\040\\006\\040\\006\\003\\125\\004\\003\\023\\031\\104\\055\\124\\122\\125\\123\\124\\040\\105\\126\\040\\122\\157\\157\\164\\040\\103\\101\\040\\061\\040\\062\\060\\062\\060\\0$ 

**END** 

CKA ID UTF8 "0"

# CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \000110061013060011006003125\\00400023\\002104\\105\\061\\025\\060\\023\\006\\003\\125\\004\\012\\023\\014\\104\\055\\124\\162\\165\\163\\164\\040\\107\\155\\142\\110\\061\\042\\060\\040\\006\\040\\006\\003\\125\\004\\003\\023\\031\\104\\055\\124\\122\\125\\123\\124\\040\\105\\126\\040\\122\\157\\157\\164\\040\\103\\101\\040\\061\\040\\062\\060\\062\\060\\0$ 

**END** 

## CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\020\137\002\101\327\172\207\174\114\003\243\254\226\215\373\377\320$ 

**END** 

## CKA VALUE MULTILINE OCTAL

\060\202\002\333\060\202\002\140\240\003\002\001\002\002\020\137  $\label{eq:condition} $$ \002\101\327\172\207\174\114\003\243\254\226\215\373\377\320\060$$ \012\006\010\052\206\110\316\075\004\003\003\060\110\061\013\060 \011\006\003\125\004\006\023\002\104\105\061\025\060\023\006\003 \125\004\012\023\014\104\055\124\162\165\163\164\040\107\155\142 \110\061\042\060\040\006\003\125\004\003\023\031\104\055\124\122 \125\123\124\040\105\126\040\122\157\157\164\040\103\101\040\061 \040\062\060\062\060\060\036\027\015\062\060\060\062\061\061\061 \060\060\060\060\060\060\132\027\015\063\065\060\062\061\061\060\071 \055\124\162\165\163\164\040\107\155\142\110\061\042\060\040\006  $\label{eq:condition} $$ \003\125\004\003\023\031\104\055\124\122\125\123\124\040\105\126$ \040\122\157\157\164\040\103\101\040\061\040\062\060\062\060\060 \166\060\020\006\007\052\206\110\316\075\002\001\006\005\053\201 \004\000\042\003\142\000\004\361\013\335\206\103\040\031\337\227 \205\350\042\112\233\317\235\230\277\264\005\046\311\313\343\246 \322\217\305\236\170\173\061\211\251\211\255\047\074\145\020\202 \374\337\303\235\116\360\063\043\304\322\062\365\034\260\337\063

\027\135\305\360\261\212\371\357\271\267\024\312\051\112\302\017 \251\177\165\145\111\052\060\147\364\144\367\326\032\167\332\303  $\label{eq:condition} $$ 302\227\141\102\173\111\255\243\202\001\015\060\202\001\011\060$$ \060\035\006\003\125\035\016\004\026\004\024\177\020\001\026\067  $\\072\\244\\050\\344\\120\\370\\244\\367\\354\\153\\062\\266\\376\\351\\213\\060$ \016\006\003\125\035\017\001\001\377\004\004\003\002\001\006\060  $\label{eq:condition} $$ \201\306\006\003\125\035\037\004\201\276\060\201\273\060\076\240 $$$ \074\240\072\206\070\150\164\164\160\072\057\057\143\162\154\056 \144\055\164\162\165\163\164\056\156\145\164\057\143\162\154\057 \144\055\164\162\165\163\164\137\145\166\137\162\157\157\164\137  $\label{eq:condition} $$ 143\\141\\137\\061\\137\\062\\060\\062\\060\\062\\060\\056\\143\\162\\154\\060\\171\\240$ \167\240\165\206\163\154\144\141\160\072\057\057\144\151\162\145  $\\ 143 \\ 164 \\ 157 \\ 162 \\ 171 \\ 056 \\ 144 \\ 055 \\ 164 \\ 162 \\ 165 \\ 163 \\ 164 \\ 056 \\ 156 \\ 145 \\$ \164\057\103\116\075\104\055\124\122\125\123\124\045\062\060\105 \126\045\062\060\122\157\157\164\045\062\060\103\101\045\062\060  $\label{eq:condition} $$ \061\045\062\060\062\060\054\117\075\104\055\124\162\165$$ \163\164\045\062\060\107\155\142\110\054\103\075\104\105\077\143 \145\162\164\151\146\151\143\141\164\145\162\145\166\157\143\141 \075\004\003\003\003\151\000\060\146\002\061\000\312\074\306\052 \165\302\136\165\142\071\066\000\140\132\213\301\223\231\314\331 \333\101\073\073\207\231\027\073\325\314\117\312\042\367\240\200 \313\371\264\261\033\126\365\162\322\374\031\321\002\061\000\221 \367\060\223\077\020\106\053\161\244\320\073\104\233\300\051\002 \005\262\101\167\121\363\171\132\236\216\024\240\116\102\322\133 \201\363\064\152\003\347\042\070\120\133\355\031\117\103\026 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "D-TRUST EV Root CA 1 2020"
```

08:17:0D:1A:A3:64:53:90:1A:2F:95:92:45:E3:47:DB:0C:8D:37:AB:AA:BC:56:B8:1A:A1:00:DC:95:89:70:DB

# Fingerprint (SHA1): 61:DB:8C:21:59:69:03:90:D8:7C:9C:12:86:54:CF:9D:3D:F4:DD:07

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "D-TRUST EV Root CA 1 2020"

CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

\141\333\214\041\131\151\003\220\330\174\234\022\206\124\317\235

<sup>#</sup> Issuer: CN=D-TRUST EV Root CA 1 2020,O=D-Trust GmbH,C=DE

<sup>#</sup> Serial Number:5f:02:41:d7:7a:87:7c:4c:03:a3:ac:96:8d:fb:ff:d0

<sup>#</sup> Subject: CN=D-TRUST EV Root CA 1 2020,O=D-Trust GmbH,C=DE

<sup>#</sup> Not Valid Before: Tue Feb 11 10:00:00 2020

<sup>#</sup> Not Valid After: Sun Feb 11 09:59:59 2035

<sup>#</sup> Fingerprint (SHA-256):

```
\075\364\335\007
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\214\055\235\160\237\110\231\021\006\021\373\351\313\060\300\156
END
CKA ISSUER MULTILINE OCTAL
\060\110\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\025\060\023\006\003\125\004\012\023\014\104\055\124\162\165\163
\164\040\107\155\142\110\061\042\060\040\006\003\125\004\003\023
\031\104\055\124\122\125\123\124\040\105\126\040\122\157\157\164
\040\103\101\040\061\040\062\060\062\060
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\020\137\002\101\327\172\207\174\114\003\243\254\226\215\373
\377\320
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "DigiCert TLS ECC P384 Root G5"
# Issuer: CN=DigiCert TLS ECC P384 Root G5,O="DigiCert, Inc.",C=US
# Serial Number:09:e0:93:65:ac:f7:d9:c8:b9:3e:1c:0b:04:2a:2e:f3
# Subject: CN=DigiCert TLS ECC P384 Root G5,O="DigiCert, Inc.",C=US
# Not Valid Before: Fri Jan 15 00:00:00 2021
# Not Valid After: Sun Jan 14 23:59:59 2046
# Fingerprint (SHA-256):
01:8E:13:F0:77:25:32:CF:80:9B:D1:B1:72:81:86:72:83:FC:48:C6:E1:3B:E9:C6:98:12:85:4A:49:0C:1B:05
# Fingerprint (SHA1): 17:F3:DE:5E:9F:0F:19:E9:8E:F6:1F:32:26:6E:20:C4:07:AE:30:EE
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA TOKEN CK BBOOL CK TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA LABEL UTF8 "DigiCert TLS ECC P384 Root G5"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\label{eq:condition} $$ \060\116\061\013\060\011\006\003\125\004\006\023\002\125\123\061\
\027\060\025\006\003\125\004\012\023\016\104\151\147\151\103\145
\162\164\054\040\111\156\143\056\061\046\060\044\006\003\125\004
\003\023\035\104\151\147\151\103\145\162\164\040\124\114\123\040
\105\103\103\040\120\063\070\064\040\122\157\157\164\040\107\065
END
```

CKA\_ID UTF8 "0" CKA\_ISSUER MU

CKA\_ISSUER MULTILINE\_OCTAL

\060\116\061\013\060\011\006\003\125\004\006\023\002\125\123\061

 $\label{eq:condition} $$ \027\060\025\006\003\125\004\012\023\016\104\151\147\151\103\145\162\164\054\040\111\156\143\056\061\046\060\044\006\003\125\004\003\023\035\104\151\147\151\103\145\162\164\040\124\114\123\040\105\103\103\040\120\063\070\064\040\122\157\157\164\040\107\065\ END$ 

#### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\011\340\223\145\254\367\331\310\271\076\034\013\004\052\056\363

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:condition} $$ \060\202\003\002\003\002\001\002\002\001\1$ \340\223\145\254\367\331\310\271\076\034\013\004\052\056\363\060 \012\006\010\052\206\110\316\075\004\003\003\060\116\061\013\060 \011\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003 \125\004\012\023\016\104\151\147\151\103\145\162\164\054\040\111 \156\143\056\061\046\060\044\006\003\125\004\003\023\035\104\151 \063\070\064\040\122\157\157\164\040\107\065\060\036\027\015\062 \061\060\061\061\065\060\060\060\060\060\060\132\027\015\064\066  $\label{eq:condition} $$ \060\061\064\062\063\065\071\065\071\132\060\116\061\013\060$$$ \011\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003 \125\004\012\023\016\104\151\147\151\103\145\162\164\054\040\111  $\label{eq:condition} $$ \frac{156}{143}056\\061\\046\\060\\044\\006\\003\\125\\004\\003\\023\\035\\104\\151$ \147\151\103\145\162\164\040\124\114\123\040\105\103\103\040\120 \063\070\064\040\122\157\157\164\040\107\065\060\166\060\020\006 \007\052\206\110\316\075\002\001\006\005\053\201\004\000\042\003 \142\000\004\301\104\241\317\021\227\120\232\336\043\202\065\007 \315\320\313\030\235\322\361\177\167\065\117\073\335\224\162\122 \355\302\073\370\354\372\173\153\130\040\354\231\256\311\374\150 \263\165\271\333\011\354\310\023\365\116\306\012\035\146\060\114  $\label{eq:condition} $$ \273\037\107\012\074\141\020\102\051\174\245\010\016\340\042\351 $$$ \323\065\150\316\233\143\237\204\265\231\115\130\240\216\365\124 \347\225\311\243\102\060\100\060\035\006\003\125\035\016\004\026 \004\024\301\121\105\120\131\253\076\347\054\132\372\040\042\022 \007\200\210\174\021\152\060\016\006\003\125\035\017\001\001\377 \004\004\003\002\001\206\060\017\006\003\125\035\023\001\001\377 \004\005\060\003\001\001\377\060\012\006\010\052\206\110\316\075 \004\003\003\003\150\000\060\145\002\061\000\211\152\215\107\347 \354\374\156\125\003\331\147\154\046\116\203\306\375\311\373\053  $\label{eq:condition} $$ \023\274\267\172\214\264\145\322\151\151\143\023\143\073\046\120 $$$ \056\001\241\171\006\221\235\110\277\302\276\002\060\107\303\025 \173\261\240\221\231\111\223\250\074\174\350\106\006\213\054\362 \061\000\224\235\142\310\211\275\031\204\024\351\245\373\001\270 \015\166\103\214\056\123\313\174\337\014\027\226\120 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "DigiCert TLS ECC P384 Root G5"
# Issuer: CN=DigiCert TLS ECC P384 Root G5,O="DigiCert, Inc.",C=US
# Serial Number:09:e0:93:65:ac:f7:d9:c8:b9:3e:1c:0b:04:2a:2e:f3
# Subject: CN=DigiCert TLS ECC P384 Root G5,O="DigiCert, Inc.",C=US
# Not Valid Before: Fri Jan 15 00:00:00 2021
# Not Valid After: Sun Jan 14 23:59:59 2046
# Fingerprint (SHA-256):
01:8E:13:F0:77:25:32:CF:80:9B:D1:B1:72:81:86:72:83:FC:48:C6:E1:3B:E9:C6:98:12:85:4A:49:0C:1B:05
# Fingerprint (SHA1): 17:F3:DE:5E:9F:0F:19:E9:8E:F6:1F:32:26:6E:20:C4:07:AE:30:EE
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "DigiCert TLS ECC P384 Root G5"
CKA CERT SHA1 HASH MULTILINE OCTAL
\027\363\336\136\237\017\031\351\216\366\037\062\046\156\040\304
\007\256\060\356
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\323\161\004\152\103\034\333\246\131\341\250\243\252\305\161\355
END
CKA_ISSUER MULTILINE_OCTAL
\060\116\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\027\060\025\006\003\125\004\012\023\016\104\151\147\151\103\145
\162\164\054\040\111\156\143\056\061\046\060\044\006\003\125\004
\003\023\035\104\151\147\151\103\145\162\164\040\124\114\123\040
\label{eq:condition} $$ 105\103\103\040\120\063\070\064\040\122\157\157\164\040\107\065$
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \002\020\011\340\223\145\254\367\331\310\271\076\034\013\004\052
\056\363
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "DigiCert TLS RSA4096 Root G5"
# Issuer: CN=DigiCert TLS RSA4096 Root G5,O="DigiCert, Inc.",C=US
# Serial Number:08:f9:b4:78:a8:fa:7e:da:6a:33:37:89:de:7c:cf:8a
# Subject: CN=DigiCert TLS RSA4096 Root G5,O="DigiCert, Inc.",C=US
# Not Valid Before: Fri Jan 15 00:00:00 2021
# Not Valid After: Sun Jan 14 23:59:59 2046
# Fingerprint (SHA-256):
37:1A:00:DC:05:33:B3:72:1A:7E:EB:40:E8:41:9E:70:79:9D:2B:0A:0F:2C:1D:80:69:31:65:F7:CE:C4:AD:75
```

# Fingerprint (SHA1): A7:88:49:DC:5D:7C:75:8C:8C:DE:39:98:56:B3:AA:D0:B2:A5:71:35

CKA CLASS CK OBJECT CLASS CKO CERTIFICATE

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "DigiCert TLS RSA4096 Root G5"

CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \000115\061\013\060\011\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003\125\004\012\023\016\104\151\147\151\103\145\162\164\040\043\006\003\125\004\003\023\034\104\151\147\151\103\145\162\164\040\124\114\123\040\122\123\101\064\060\071\066\040\122\157\157\164\040\107\065\ END$ 

CKA\_ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

#### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

 $\label{eq:condition} $$ \002\020\010\371\264\170\250\372\176\332\152\063\067\211\336\174\317\212$ 

**END** 

#### CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \060\202\005\146\060\202\003\116\240\003\002\001\002\002\002\001\002$ \371\264\170\250\372\176\332\152\063\067\211\336\174\317\212\060 \015\006\011\052\206\110\206\367\015\001\001\014\005\000\060\115 \025\006\003\125\004\012\023\016\104\151\147\151\103\145\162\164 \054\040\111\156\143\056\061\045\060\043\006\003\125\004\003\023 \034\104\151\147\151\103\145\162\164\040\124\114\123\040\122\123 \101\064\060\071\066\040\122\157\157\164\040\107\065\060\036\027 \015\062\061\060\061\061\065\060\060\060\060\060\060\060\132\027\015 \064\066\060\061\061\064\062\063\065\071\065\071\132\060\115\061 \013\060\011\006\003\125\004\006\023\002\125\123\061\027\060\025 \040\111\156\143\056\061\045\060\043\006\003\125\004\003\023\034 \104\151\147\151\103\145\162\164\040\124\114\123\040\122\123\101  $\label{eq:condition} $$ \064\060\071\066\040\122\157\157\164\040\107\065\060\202\002\042 $$$ \060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003 \202\002\017\000\060\202\002\012\002\202\002\001\000\263\320\364 \311\171\021\235\375\374\146\201\347\314\325\344\274\354\201\076 \152\065\216\056\267\347\336\257\371\007\115\317\060\235\352\011 \013\231\275\154\127\332\030\112\270\170\254\072\071\250\246\110 \254\056\162\345\275\353\361\032\315\347\244\003\251\077\021\264

\330\057\211\026\373\224\001\075\273\057\370\023\005\241\170\034 \216\050\340\105\340\203\364\131\033\225\263\256\176\003\105\345 \276\302\102\376\356\362\074\266\205\023\230\062\235\026\250\051 \302\013\034\070\334\237\061\167\134\277\047\243\374\047\254\267 \053\275\164\233\027\055\362\201\332\135\260\341\043\027\076\210 \112\022\043\320\352\317\235\336\003\027\261\102\112\240\026\114 \244\155\223\351\077\072\356\072\174\235\130\235\364\116\217\374 \073\043\310\155\270\342\005\332\314\353\354\303\061\364\327\247 \051\124\200\317\104\133\114\157\060\236\363\314\335\037\224\103 \235\115\177\160\160\015\324\072\321\067\360\154\235\233\300\024  $\label{eq:condition} $$ \223\130\357\315\101\070\165\274\023\003\225\174\177\343\134\351 $$$ \325\015\325\342\174\020\142\252\153\360\075\166\363\077\243\350 \260\301\375\357\252\127\115\254\206\247\030\264\051\301\054\016 \277\144\276\051\214\330\002\055\315\134\057\362\177\357\025\364  $\label{eq:condition} $$ \014\025\254\012\260\361\323\015\117\152\115\167\227\001\240\361\$ \146\267\267\316\357\316\354\354\245\165\312\254\343\341\143\367  $\label{eq:condition} $$ \270\241\004\310\274\173\077\135\055\026\042\126\355\110\111\376$ \247\057\171\060\045\233\272\153\055\077\235\073\304\027\347\035 \056\373\362\317\246\374\343\024\054\226\230\041\214\264\221\351  $\label{eq:condition} $$ \031\140\203\362\060\053\006\163\120\325\230\073\006\351\307\212 $$$ \014\140\214\050\370\122\233\156\341\366\115\273\006\044\233\327 \053\046\077\375\052\057\161\365\326\044\276\177\061\236\017\155  $\label{eq:condition} $$ \frac{350}{217}117\\115\\243\\077\\377\\065\\352\\337\\111\\136\\101\\217\\206\\371$ \361\167\171\113\033\264\243\136\057\373\106\002\320\146\023\136 \136\205\117\316\330\160\210\173\316\001\265\226\227\327\315\175 \375\202\370\302\044\301\312\001\071\117\215\242\301\024\100\037 \234\146\325\014\011\106\326\362\320\321\110\166\126\072\103\313 \266\012\021\071\272\214\023\154\006\265\236\317\353\002\003\001 \000\001\243\102\060\100\060\035\006\003\125\035\016\004\026\004 \024\121\063\034\355\066\100\257\027\323\045\315\151\150\362\257  $\label{eq:condition} $$ 116\043\076\263\101\060\016\006\003\125\035\017\001\001\377\004$ \004\003\002\001\206\060\017\006\003\125\035\023\001\001\377\004 \005\060\003\001\001\377\060\015\006\011\052\206\110\206\367\015 \001\001\014\005\000\003\202\002\001\000\140\246\257\133\137\127 \332\211\333\113\120\251\304\043\065\041\377\320\141\060\204\221 \267\077\020\317\045\216\311\277\106\064\331\301\041\046\034\160 \031\162\036\243\311\207\376\251\103\144\226\072\310\123\004\012 \266\101\273\304\107\000\331\237\030\030\073\262\016\363\064\352 \044\367\335\257\040\140\256\222\050\137\066\347\135\344\336\307 \074\333\120\071\255\273\075\050\115\226\174\166\306\133\364\301 \333\024\245\253\031\142\007\030\100\137\227\221\334\234\307\253 \265\121\015\346\151\123\125\314\071\175\332\305\021\125\162\305 \073\213\211\370\064\055\244\027\345\027\346\231\175\060\210\041 \067\315\060\027\075\270\362\274\250\165\240\103\334\076\211\113 \220\256\155\003\340\034\243\240\226\011\273\175\243\267\052\020 \104\113\106\007\064\143\355\061\271\004\356\243\233\232\256\346 \061\170\364\352\044\141\073\253\130\144\377\273\207\047\142\045 \201\337\334\241\057\366\355\247\377\172\217\121\056\060\370\244

\001\322\205\071\137\001\231\226\157\132\133\160\031\106\376\206 \140\076\255\200\020\011\335\071\045\057\130\177\273\322\164\360 \367\106\037\106\071\112\330\123\320\363\056\073\161\245\324\157 \374\363\147\344\007\217\335\046\031\341\215\133\372\243\223\021 \233\351\310\072\303\125\150\232\222\341\122\166\070\350\341\272 \275\373\117\325\357\263\347\110\203\061\360\202\041\343\266\276 \247\253\157\357\237\337\114\317\001\270\142\152\043\075\347\011 \115\200\033\173\060\244\303\335\007\177\064\276\244\046\262\366 \101\350\011\035\343\040\230\252\067\117\377\367\361\342\051\160 \061\107\077\164\320\024\026\372\041\212\002\325\212\011\224\167  $\label{eq:condition} $$ \056\362\131\050\213\174\120\222\012\146\170\070\203\165\304\265$$ \132\250\021\306\345\301\235\146\125\317\123\304\257\327\165\205 \251\102\023\126\354\041\167\201\223\132\014\352\226\331\111\312 \241\010\362\227\073\155\233\004\030\044\104\216\174\001\362\334  $\label{eq:condition} $$ \045\330\136\206\232\261\071\333\365\221\062\152\321\246\160\212$ \242\367\336\244\105\205\046\250\036\214\135\051\133\310\113\330 \232\152\003\136\160\362\205\117\154\113\150\057\312\124\366\214 \332\062\376\303\153\203\077\070\306\176

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "DigiCert TLS RSA4096 Root G5"
- # Issuer: CN=DigiCert TLS RSA4096 Root G5,O="DigiCert, Inc.",C=US
- # Serial Number:08:f9:b4:78:a8:fa:7e:da:6a:33:37:89:de:7c:cf:8a
- # Subject: CN=DigiCert TLS RSA4096 Root G5,O="DigiCert, Inc.",C=US
- # Not Valid Before: Fri Jan 15 00:00:00 2021
- # Not Valid After: Sun Jan 14 23:59:59 2046
- # Fingerprint (SHA-256):
- 37:1A:00:DC:05:33:B3:72:1A:7E:EB:40:E8:41:9E:70:79:9D:2B:0A:0F:2C:1D:80:69:31:65:F7:CE:C4:AD:75
- # Fingerprint (SHA1): A7:88:49:DC:5D:7C:75:8C:8C:DE:39:98:56:B3:AA:D0:B2:A5:71:35
- CKA CLASS CK OBJECT CLASS CKO NSS TRUST
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA\_LABEL UTF8 "DigiCert TLS RSA4096 Root G5"
- CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL
- \247\210\111\334\135\174\165\214\214\336\071\230\126\263\252\320\262\245\161\065

**END** 

CKA CERT MD5 HASH MULTILINE OCTAL

 $\label{eq:condition} $$ \254\376\367\064\226\251\362\263\264\022\113\344\047\101\157\341 $$$ 

**END** 

CKA ISSUER MULTILINE OCTAL

\060\115\061\013\060\011\006\003\125\004\006\023\002\125\123\061 \027\060\025\006\003\125\004\012\023\016\104\151\147\151\103\145 \162\164\054\040\111\156\143\056\061\045\060\043\006\003\125\004

```
\003\023\034\104\151\147\151\103\145\162\164\040\124\114\123\040
\122\123\101\064\060\071\066\040\122\157\157\164\040\107\065
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\label{eq:condition} $$ \002\020\010\371\264\170\250\372\176\332\152\063\067\211\336\174 $$
\317\212
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "DigiCert SMIME ECC P384 Root G5"
# Issuer: CN=DigiCert SMIME ECC P384 Root G5,O="DigiCert, Inc.",C=US
# Serial Number:05:3f:6e:a0:06:01:72:7d:ed:3f:c3:a3:b6:a3:d6:ef
# Subject: CN=DigiCert SMIME ECC P384 Root G5,O="DigiCert, Inc.",C=US
# Not Valid Before: Fri Jan 15 00:00:00 2021
# Not Valid After: Sun Jan 14 23:59:59 2046
# Fingerprint (SHA-256):
E8:E8:17:65:36:A6:0C:C2:C4:E1:01:87:C3:BE:FC:A2:0E:F2:63:49:70:18:F5:66:D5:BE:A0:F9:4D:0C:11:1B
# Fingerprint (SHA1): 1C:B8:A7:08:C9:0D:20:79:01:A0:B2:36:7F:F0:95:65:E4:53:24:FE
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA PRIVATE CK BBOOL CK FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "DigiCert SMIME ECC P384 Root G5"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA SUBJECT MULTILINE OCTAL
\label{eq:condition} $$ \060\120\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$
\027\060\025\006\003\125\004\012\023\016\104\151\147\151\103\145
\162\164\054\040\111\156\143\056\061\050\060\046\006\003\125\004
\003\023\037\104\151\147\151\103\145\162\164\040\123\115\111\115
\label{eq:condition} $$ 105\040\105\103\103\040\120\063\070\064\040\122\157\157\164\040 $$
\107\065
END
CKA ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\120\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\027\060\025\006\003\125\004\012\023\016\104\151\147\151\103\145
\162\164\054\040\111\156\143\056\061\050\060\046\006\003\125\004
\003\023\037\104\151\147\151\103\145\162\164\040\123\115\111\115
\105\040\105\103\103\040\120\063\070\064\040\122\157\157\164\040
\107\065
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
```

\002\020\005\077\156\240\006\001\162\175\355\077\303\243\266\243

**END** 

#### CKA\_VALUE MULTILINE\_OCTAL

\060\202\002\034\060\202\001\243\240\003\002\001\002\002\005 \077\156\240\006\001\162\175\355\077\303\243\266\243\326\357\060 \012\006\010\052\206\110\316\075\004\003\003\060\120\061\013\060 \011\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003 \125\004\012\023\016\104\151\147\151\103\145\162\164\054\040\111 \156\143\056\061\050\060\046\006\003\125\004\003\023\037\104\151 \147\151\103\145\162\164\040\123\115\111\115\105\040\105\103\103  $\label{eq:condition} $$ \040\120\063\070\064\040\122\157\157\164\040\107\065\060\036\027 $$$  $\label{eq:condition} $$ \0.061\0.061\0.061\0.060\0.0$ \064\066\060\061\061\064\062\063\065\071\065\071\132\060\120\061  $\label{eq:condition} $$ \003\003\125\004\006\023\002\125\123\061\027\060\025 $$$  $\label{eq:condition} $$ \006\003\125\004\012\023\016\104\151\147\151\103\145\162\164\054$$$ \040\111\156\143\056\061\050\060\046\006\003\125\004\003\023\037 \104\151\147\151\103\145\162\164\040\123\115\111\115\105\040\105 \103\103\040\120\063\070\064\040\122\157\157\164\040\107\065\060 \166\060\020\006\007\052\206\110\316\075\002\001\006\005\053\201 \153\032\324\241\252\322\167\225\076\210\345\007\237\266\160\146 \040\050\244\210\354\160\065\257\263\062\377\067\023\112\236\274  $\label{eq:condition} $$ \001\003\336\204\301\270\306\346\145\107\211\362\023\125\277\315 $$$ \245\036\010\140\177\255\177\350\141\222\051\317\011\107\136\013  $\label{eq:condition} $$ \034\300\037\244\277\362\133\274\230\357\231\114\314\160\153\266$$ \272\320\050\035\277\276\004\243\102\060\100\060\035\006\003\125 \035\016\004\026\004\024\163\172\153\226\333\102\007\213\122\146 \302\144\062\027\376\340\147\220\056\255\060\016\006\003\125\035 \017\001\001\377\004\004\003\002\001\206\060\017\006\003\125\035 \023\001\001\377\004\005\060\003\001\001\377\060\012\006\010\052 \206\110\316\075\004\003\003\003\147\000\060\144\002\060\067\104 \365\062\200\343\161\353\364\155\317\174\314\221\232\303\156\161 \330\322\043\135\222\115\202\102\155\134\141\225\366\221\365\247 \010\366\152\227\351\234\224\055\230\160\375\063\266\011\002\060 \007\074\057\271\130\202\136\017\243\142\250\223\147\360\040\303 \151\277\003\054\073\120\247\073\257\101\070\311\122\110\221\326 \016\373\274\140\060\174\144\077\022\036\105\177\121\076\364\246 **END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

<sup>#</sup> Trust for "DigiCert SMIME ECC P384 Root G5"

<sup>#</sup> Issuer: CN=DigiCert SMIME ECC P384 Root G5,O="DigiCert, Inc.",C=US

<sup>#</sup> Serial Number:05:3f:6e:a0:06:01:72:7d:ed:3f:c3:a3:b6:a3:d6:ef

<sup>#</sup> Subject: CN=DigiCert SMIME ECC P384 Root G5,O="DigiCert, Inc.",C=US

<sup>#</sup> Not Valid Before: Fri Jan 15 00:00:00 2021 # Not Valid After : Sun Jan 14 23:59:59 2046

```
E8:E8:17:65:36:A6:0C:C2:C4:E1:01:87:C3:BE:FC:A2:0E:F2:63:49:70:18:F5:66:D5:BE:A0:F9:4D:0C:11:1B
# Fingerprint (SHA1): 1C:B8:A7:08:C9:0D:20:79:01:A0:B2:36:7F:F0:95:65:E4:53:24:FE
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "DigiCert SMIME ECC P384 Root G5"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\034\270\247\010\311\015\040\171\001\240\262\066\177\360\225\145
\344\123\044\376
END
CKA CERT MD5 HASH MULTILINE OCTAL
\246\376\364\122\066\104\330\356\015\267\003\013\357\164\263\003
END
CKA ISSUER MULTILINE OCTAL
\060\120\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\027\060\025\006\003\125\004\012\023\016\104\151\147\151\103\145
\162\164\054\040\111\156\143\056\061\050\060\046\006\003\125\004
\\ \\003\\\\023\\\\037\\\\104\\\\151\\\\147\\\\151\\\\103\\\\145\\\\162\\\\164\\\\040\\\\123\\\\115\\\\111\\\\115
\105\040\105\103\103\040\120\063\070\064\040\122\157\157\164\040
\107\065
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\020\005\077\156\240\006\001\162\175\355\077\303\243\266\243
\326\357
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS TRUSTED DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "DigiCert SMIME RSA4096 Root G5"
# Issuer: CN=DigiCert SMIME RSA4096 Root G5,O="DigiCert, Inc.",C=US
# Serial Number:05:f6:ba:04:23:83:46:cb:7d:5c:e6:b9:5b:ba:1c:55
# Subject: CN=DigiCert SMIME RSA4096 Root G5,O="DigiCert, Inc.",C=US
# Not Valid Before: Fri Jan 15 00:00:00 2021
# Not Valid After: Sun Jan 14 23:59:59 2046
# Fingerprint (SHA-256):
90:37:0D:3E:FA:88:BF:58:C3:01:05:BA:25:10:4A:35:84:60:A7:FA:52:DF:C2:01:1D:F2:33:A0:F4:17:91:2A
# Fingerprint (SHA1): 5B:C5:AD:E2:9A:A7:54:DA:84:89:53:A5:FE:D7:5B:46:86:D0:57:08
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "DigiCert SMIME RSA4096 Root G5"
```

# Fingerprint (SHA-256):

## CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA\_SUBJECT MULTILINE\_OCTAL

 $\label{eq:condition} $$ \0011\006\003\125\004\006\023\002\125\123\061 $$ \027\060\025\006\003\125\004\012\023\016\104\151\147\151\103\145 $$ \162\164\054\040\111\156\143\056\061\047\060\045\006\003\125\004 $$ \003\023\036\104\151\147\151\103\145\162\164\040\123\115\111\115 $$ \105\040\122\123\101\064\060\071\066\040\122\157\157\164\040\107 $$ \065$$ 

**END** 

CKA ID UTF8 "0"

#### CKA\_ISSUER MULTILINE\_OCTAL

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

 $\label{eq:condition} $$ \002\020\005\366\272\004\043\203\106\313\175\134\346\271\133\272\034\125$ 

**END** 

#### CKA\_VALUE MULTILINE\_OCTAL

\060\202\005\152\060\202\003\122\240\003\002\001\002\002\002\005 \366\272\004\043\203\106\313\175\134\346\271\133\272\034\125\060 \015\006\011\052\206\110\206\367\015\001\001\014\005\000\060\117 \061\013\060\011\006\003\125\004\006\023\002\125\123\061\027\060 \054\040\111\156\143\056\061\047\060\045\006\003\125\004\003\023 \036\104\151\147\151\103\145\162\164\040\123\115\111\115\105\040  $\label{eq:local_$ \036\027\015\062\061\060\061\061\065\060\060\060\060\060\060\060\132 \027\015\064\066\060\061\061\064\062\063\065\071\065\071\132\060 \117\061\013\060\011\006\003\125\004\006\023\002\125\123\061\027 \060\025\006\003\125\004\012\023\016\104\151\147\151\103\145\162 \164\054\040\111\156\143\056\061\047\060\045\006\003\125\004\003 \023\036\104\151\147\151\103\145\162\164\040\123\115\111\115\105 \040\122\123\101\064\060\071\066\040\122\157\157\164\040\107\065  $\label{eq:condition} $$ \0.060\202\0.042\0.060\0.15\0.06\0.11\0.52\2.06\1.10\2.06\3.67\0.15\0.01\0.01$$ \000\340\152\133\331\370\371\175\354\265\173\357\137\335\134\064  $\label{eq:condition} $$ 30\32\135\321\313\145\165\253\041\174\133\000\324\202\157\105$ \205\101\212\251\022\002\162\062\360\024\365\003\165\273\143\227 \111\017\100\231\013\032\036\126\247\322\320\341\253\335\345\004 \033\343\037\024\022\002\210\365\240\200\011\366\047\232\120\360 \272\343\242\340\254\152\024\221\265\153\070\020\172\242\061\341 \221\033\267\271\360\053\133\310\167\011\166\267\121\304\066\012 \231\123\124\104\045\267\011\065\206\027\005\126\223\075\101\267

\002\327\142\037\212\222\021\207\352\021\155\352\010\021\334\261 \170\110\111\222\366\264\121\200\170\043\330\376\341\126\032\072 \220\023\126\064\211\325\342\225\213\137\336\262\314\373\077\070 \267\205\367\352\236\277\056\241\056\057\115\175\152\021\056\066 \240\377\021\010\004\225\125\340\033\073\147\223\251\224\125\352 \062\355\006\072\177\302\177\343\255\023\047\321\064\101\263\060 \303\277\264\210\370\003\202\244\337\076\253\170\167\240\131\223 \161\347\335\353\000\004\173\314\110\071\050\340\036\243\025\151 \310\066\262\241\013\227\337\125\326\357\221\234\244\366\026\367 \121\012\356\003\043\221\334\004\377\340\335\070\366\042\003\000 \302\007\161\032\022\311\327\106\052\224\033\315\326\273\033\356  $\label{eq:condition} $$ \277\276\115\120\130\260\013\315\060\166\051\365\317\345\266\152$$ \057\166\260\260\151\152\320\155\145\030\065\176\223\274\162\027 \301\125\102\315\057\302\045\273\364\375\035\241\144\042\124\135 \342\236\162\101\204\156\161\226\352\105\007\266\136\172\112\206 \235\163\144\167\070\003\322\017\123\245\125\040\304\115\377\150  $\label{eq:condition} $$ \frac{157}{125}\frac{352}{335}\frac{161}{344}\frac{31}{205}\frac{243}{174}\frac{116}{051}\frac{236}{002}$$ \013\011\362\032\123\314\000\246\335\321\064\366\015\301\060\261 \234\002\144\254\065\355\245\260\051\261\322\225\063\017\322\040  $\label{eq:condition} $$ \063\275\354\043\113\362\031\371\332\230\144\344\054\061\037\056$$ \341\215\034\004\225\050\115\214\130\315\113\345\163\202\206\214 \354\250\326\171\134\373\144\273\334\014\114\050\366\027\257\342  $\label{eq:condition} $$ \frac{326}{226}\frac{320}{333}\frac{374}{001}\frac{334}{061}\frac{272}{370}\frac{34}{016}\frac{371}{050} $$$ \106\112\341\375\226\006\105\171\021\150\027\145\134\213\046\207 \133\002\003\001\000\001\243\102\060\100\060\035\006\003\125\035 \102\236\143\026\316\264\306\073\037\060\016\006\003\125\035\017  $\label{eq:condition} $$ \001\001\377\004\004\003\002\001\206\060\017\006\003\125\035\023$ \001\001\377\004\005\060\003\001\001\377\060\015\006\011\052\206 \110\206\367\015\001\001\014\005\000\003\202\002\001\000\007\247  $\label{eq:condition} $$ \012\336\123\273\232\353\160\277\262\066\220\315\344\247\270\361 $$$ \014\344\135\132\035\170\145\374\311\270\036\043\021\127\174\151 \065\155\001\377\123\120\277\007\016\272\307\001\077\130\052\224 \165\003\253\034\013\043\334\033\212\036\067\075\035\130\217\163 \331\263\052\157\337\020\240\133\014\247\312\260\177\271\044\242 \001\065\062\345\136\106\101\353\330\177\163\347\102\351\244\121 \046\167\201\012\250\353\017\012\120\235\176\212\040\147\374\013 \216\072\021\323\305\214\140\030\331\113\261\374\324\361\264\111  $\label{eq:condition} $$ \frac{321}{373}\frac{363}{006}\frac{317}{227}\frac{363}{014}\frac{351}{363} $$$ \236\165\201\134\123\015\042\374\066\346\111\156\164\333\000\205 \215\174\042\240\216\373\020\114\324\142\023\133\357\113\162\046 \213\374\116\212\217\376\227\020\123\305\170\213\102\144\033\137 \340\211\375\273\011\177\120\340\124\205\046\021\152\035\145\371 \111\051\334\174\066\337\373\075\367\322\254\356\062\215\156\246 \175\071\234\105\304\312\015\365\073\264\171\123\245\057\126\307 \121\305\212\114\144\135\220\103\043\216\153\114\027\170\314\350 \277\365\073\344\250\110\317\255\233\014\337\062\112\323\331\022 \216\043\170\015\055\257\237\257\236\074\011\302\227\000\355\072  $\begin{tabular}{l} $$1 \cdot 1034 \cdot 161 \cdot 1077 \cdot 1071 \cdot 337 \cdot 323 \cdot 217 \cdot 304 \cdot 146 \cdot 365 \cdot 357 \cdot 066 \cdot 224 \cdot 017 \cdot 363 \cdot 335 \cdot 222 \cdot 266 \cdot 226 \cdot 137 \cdot 220 \cdot 246 \cdot 335 \cdot 163 \cdot 252 \cdot 246 \cdot 040 \cdot 224 \cdot 224 \cdot 045 \cdot 152 \cdot 011 \cdot 014 \cdot 162 \cdot 344 \cdot 023 \cdot 043 \cdot 140 \cdot 114 \cdot 243 \cdot 312 \cdot 027 \cdot 056 \cdot 173 \cdot 147 \cdot 000 \cdot 333 \cdot 320 \cdot 315 \cdot 352 \cdot 172 \cdot 037 \cdot 071 \cdot 046 \cdot 127 \cdot 211 \cdot 060 \cdot 167 \cdot 313 \cdot 116 \cdot 345 \cdot 225 \cdot 105 \cdot 117 \cdot 137 \cdot 373 \cdot 066 \cdot 134 \cdot 075 \cdot 371 \cdot 040 \cdot 265 \cdot 072 \cdot 020 \cdot 045 \cdot 117 \cdot 223 \cdot 062 \cdot 132 \cdot 356 \cdot 301 \cdot 226 \cdot 350 \cdot 351 \cdot 126 \cdot 004 \cdot 260 \cdot 111 \cdot 141 \cdot 115 \cdot 354 \cdot 170 \cdot 250 \cdot 235 \cdot 030 \cdot 301 \cdot 377 \cdot 330 \cdot 352 \cdot 057 \cdot 126 \cdot 357 \cdot 225 \cdot 053 \cdot 173 \cdot 004 \cdot 136 \cdot 147 \cdot 343 \cdot 125 \cdot 100 \cdot 355 \cdot 071 \cdot 004 \cdot 371 \cdot 013 \cdot 171 \cdot 365 \cdot 152 \cdot 214 \cdot 134 \cdot 017 \cdot 211 \cdot 232 \cdot 220 \cdot 307 \cdot 315 \cdot 213 \cdot 336 \cdot 333 \cdot 046 \cdot 065 \cdot 241 \cdot 156 \cdot 315 \cdot 263 \cdot 102 \cdot 362 \cdot 242 \cdot 017 \cdot 073 \cdot 014 \cdot 216 \cdot 223 \cdot 377 \cdot 024 \cdot 317 \cdot 374 \cdot 367 \cdot 223 \cdot 367 \cdot 344 \cdot 101 \cdot 010 \cdot 156 \cdot 031 \cdot 122 \cdot 021 \cdot 017 \cdot 123 \cdot 031 \cdot 163 \cdot 170 \cdot 014 \cdot 317 \cdot 330 \cdot 205 \cdot 201 \cdot 370 \cdot 255 \cdot 125 \cdot 310 \cdot 260 \cdot 236 \cdot 106 \cdot 143 \cdot 257 \cdot 234 \cdot 122 \cdot 356 \cdot 134 \cdot 277 \cdot 360 \cdot 300 \cdot 133 \cdot 067 \cdot 036 \cdot 011 \cdot 040 \cdot 322 \cdot 076 \cdot 043 \cdot 306 \cdot 241 \cdot 025 \cdot 112 \cdot 016 \cdot 066 \cdot 176 \cdot 060 \cdot 305 \cdot 171 \cdot 152 \cdot 274 \cdot 042 \cdot 210 \cdot 331 \cdot 014 \cdot 122 \cdot 100 \cdot 037 \cdot 335 \cdot 116 \cdot 017 \cdot 147 \cdot 046 \cdot 026 \cdot 322 \cdot 255 \cdot 027 \cdot 034 \cdot END$ 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

- # Trust for "DigiCert SMIME RSA4096 Root G5"
- # Issuer: CN=DigiCert SMIME RSA4096 Root G5,O="DigiCert, Inc.",C=US
- # Serial Number:05:f6:ba:04:23:83:46:cb:7d:5c:e6:b9:5b:ba:1c:55
- # Subject: CN=DigiCert SMIME RSA4096 Root G5,O="DigiCert, Inc.",C=US
- # Not Valid Before: Fri Jan 15 00:00:00 2021
- # Not Valid After: Sun Jan 14 23:59:59 2046
- # Fingerprint (SHA-256):
- 90:37:0D:3E:FA:88:BF:58:C3:01:05:BA:25:10:4A:35:84:60:A7:FA:52:DF:C2:01:1D:F2:33:A0:F4:17:91:2A
- # Fingerprint (SHA1): 5B:C5:AD:E2:9A:A7:54:DA:84:89:53:A5:FE:D7:5B:46:86:D0:57:08
- CKA CLASS CK OBJECT CLASS CKO NSS TRUST
- CKA\_TOKEN CK\_BBOOL CK\_TRUE
- CKA\_PRIVATE CK\_BBOOL CK\_FALSE
- CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE
- CKA\_LABEL UTF8 "DigiCert SMIME RSA4096 Root G5"
- CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL
- **END**
- CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL
- $\label{eq:control} $$321\173\340\265\077\065\162\237\175\276\013\245\244\035\251\156$$  END
- CKA\_ISSUER MULTILINE\_OCTAL
- $\label{eq:condition} $$ \000117061013\060\011\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003\125\004\012\023\016\104\151\147\151\103\145\060\0045\006\003\125\004\003\023\036\104\151\147\151\103\145\162\164\040\123\115\111\115\105\040\122\123\101\064\060\071\066\040\122\157\157\164\040\107\065$

END

```
CKA SERIAL NUMBER MULTILINE OCTAL
\002\020\005\366\272\004\043\203\106\313\175\134\346\271\133\272
\034\125
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Certainly Root R1"
# Issuer: CN=Certainly Root R1,O=Certainly,C=US
# Serial Number:00:8e:0f:f9:4b:90:71:68:65:33:54:f4:d4:44:39:b7:e0
# Subject: CN=Certainly Root R1,O=Certainly,C=US
# Not Valid Before: Thu Apr 01 00:00:00 2021
# Not Valid After: Sun Apr 01 00:00:00 2046
# Fingerprint (SHA-256):
77:B8:2C:D8:64:4C:43:05:F7:AC:C5:CB:15:6B:45:67:50:04:03:3D:51:C6:0C:62:02:A8:E0:C3:34:67:D3:A0
# Fingerprint (SHA1): A0:50:EE:0F:28:71:F4:27:B2:12:6D:6F:50:96:25:BA:CC:86:42:AF
CKA CLASS CK OBJECT CLASS CKO CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "Certainly Root R1"
CKA CERTIFICATE TYPE CK CERTIFICATE TYPE CKC X 509
CKA SUBJECT MULTILINE OCTAL
\label{eq:condition} $$ \060\075\061\013\060\011\006\003\125\004\006\023\002\125\123\061$$
\022\060\020\006\003\125\004\012\023\011\103\145\162\164\141\151
\156\154\171\061\032\060\030\006\003\125\004\003\023\021\103\145
\162\164\141\151\156\154\171\040\122\157\157\164\040\122\061
END
CKA ID UTF8 "0"
CKA ISSUER MULTILINE OCTAL
\060\075\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\022\060\020\006\003\125\004\012\023\011\103\145\162\164\141\151
\156\154\171\061\032\060\030\006\003\125\004\003\023\021\103\145
\162\164\141\151\156\154\171\040\122\157\157\164\040\122\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\021\000\216\017\371\113\220\161\150\145\063\124\364\324\104
\071\267\340
```

**END** 

CKA\_VALUE MULTILINE\_OCTAL

\060\020\006\003\125\004\012\023\011\103\145\162\164\141\151\156 \154\171\061\032\060\030\006\003\125\004\003\023\021\103\145\162 \164\141\151\156\154\171\040\122\157\157\164\040\122\061\060\036 \027\015\062\061\060\064\060\061\060\060\060\060\060\060\060\132\027 \015\064\066\060\064\060\061\060\060\060\060\060\060\060\132\060\075 \020\006\003\125\004\012\023\011\103\145\162\164\141\151\156\154 \171\061\032\060\030\006\003\125\004\003\023\021\103\145\162\164 \141\151\156\154\171\040\122\157\157\164\040\122\061\060\202\002 \042\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000 \003\202\002\017\000\060\202\002\012\002\202\002\001\000\320\066 \324\037\352\335\253\344\321\266\346\373\042\300\335\023\015\152 \173\042\023\034\227\074\150\143\146\062\234\003\265\215\244\201 \203\332\170\060\021\317\334\262\053\276\222\277\216\344\304\023 \276\244\150\114\332\002\150\026\164\276\262\335\004\344\153\052 \335\067\037\140\054\333\365\367\241\174\225\267\014\160\206\056 \361\072\357\122\367\314\323\233\371\213\276\016\337\061\267\235 \150\134\222\246\365\345\363\012\064\265\377\173\242\344\207\241 \306\257\027\000\357\003\221\355\251\034\116\161\075\322\213\154 \211\364\170\206\346\152\111\240\316\265\322\260\253\233\366\364 \324\056\343\162\371\066\306\353\025\267\045\214\072\374\045\015 \263\042\163\041\164\310\112\226\141\222\365\057\013\030\245\364 \255\342\356\101\275\001\171\372\226\214\215\027\002\060\264\371 \257\170\032\214\264\066\020\020\007\005\160\320\364\061\220\212  $\label{eq:condition} $$ \frac{305}{206}046\frac{171}{262}021\frac{10}{136}305\frac{360}{012}124\frac{315}{111}246$ \277\002\234\322\104\247\355\343\170\357\106\136\155\161\321\171 \160\034\106\137\121\351\311\067\334\137\176\151\173\101\337\064 \105\340\073\204\364\241\212\012\066\236\067\314\142\122\341\211 \015\050\371\172\043\261\015\075\075\232\375\235\201\357\054\220 \300\173\104\116\273\111\340\016\112\126\222\274\313\265\335\171  $\label{eq:condition} $$ \027\211\221\336\141\211\164\222\250\343\062\205\276\116\205\244$$ \113\131\313\053\305\170\216\161\124\320\002\067\231\214\345\111 \352\340\124\162\244\021\006\057\013\214\301\133\276\265\241\260 \123\156\234\270\140\221\037\131\153\371\055\364\224\012\227\265 \354\305\166\003\124\033\145\122\272\114\222\126\121\065\240\100 \330\051\333\256\122\166\073\055\060\100\233\212\320\102\126\264 \267\210\001\244\207\073\123\226\315\243\026\217\363\146\252\027 \261\307\140\340\301\103\005\014\356\233\133\140\157\006\134\207 \133\047\371\100\021\236\234\063\301\267\345\065\127\005\177\047 \316\027\040\214\034\374\361\373\332\061\051\111\355\365\013\204 \247\117\301\366\116\302\050\234\372\356\340\257\007\373\063\021 \172\041\117\013\041\020\266\100\072\253\042\072\004\234\213\233 \204\206\162\232\322\247\245\304\264\165\221\251\053\043\002\003 \001\000\001\243\102\060\100\060\016\006\003\125\035\017\001\001 \377\004\004\003\002\001\006\060\017\006\003\125\035\023\001\001 \377\004\005\060\003\001\001\377\060\035\006\003\125\035\016\004  $\label{eq:condition} $$ \026\004\024\340\252\077\045\215\237\104\134\301\072\350\056\256$$ \167\114\204\076\147\014\364\060\015\006\011\052\206\110\206\367

\015\001\001\013\005\000\003\202\002\001\000\271\127\257\270\022 \332\127\203\217\150\013\063\035\003\123\125\364\225\160\344\053 \075\260\071\353\372\211\142\375\367\326\030\004\057\041\064\335 \361\150\360\325\226\132\336\302\200\243\301\215\306\152\367\131 \167\256\025\144\317\133\171\005\167\146\352\214\323\153\015\335 \361\131\054\301\063\245\060\200\025\105\007\105\032\061\042\266 \222\000\253\231\115\072\217\167\257\251\042\312\057\143\312\025 \326\307\306\360\075\154\374\034\015\230\020\141\236\021\242\042  $\label{eq:condition} $$ 327 \cdot 012 \cdot 362 \cdot 221 \cdot 172 \cdot 153 \cdot 071 \cdot 016 \cdot 057 \cdot 060 \cdot 303 \cdot 066 \cdot 111 \cdot 237 \cdot 340 \cdot 351$ \017\002\104\120\067\224\125\175\352\237\366\073\272\224\245\114 \351\274\076\121\264\350\312\222\066\124\155\134\045\050\332\335 \255\024\375\323\356\342\042\005\353\320\362\267\150\022\327\132 \212\101\032\306\222\245\132\073\143\105\117\277\341\072\167\042  $\label{eq:condition} $$ \057\134\277\106\371\132\003\205\023\102\137\312\336\123\327\142 $$$ \265\246\065\004\302\107\377\231\375\204\337\134\316\351\136\200 \050\101\362\175\347\036\220\330\117\166\076\202\074\015\374\245  $\label{eq:condition} $$ \033\372\173\032\331\105\036\140\332\304\216\371\374\053\311\173$ \225\305\052\377\252\211\337\202\061\017\162\377\014\047\327\012 \036\126\000\120\036\014\220\301\226\265\330\024\205\273\247\015  $\label{eq:condition} $$ \026\301\370\007\044\033\272\205\241\032\005\011\200\272\225\143 $$$ \311\072\354\045\237\177\235\272\244\107\025\233\104\160\361\152 \113\326\070\136\103\363\030\176\120\156\351\132\050\346\145\346  $\label{eq:condition} $$ 167\033\072\375\035\276\003\046\243\333\324\341\273\176\226\047 $$$ \053\035\356\244\373\332\045\124\023\003\336\071\306\303\037\115 \220\354\217\033\112\322\034\355\205\225\070\120\171\106\326\301 \220\120\061\251\134\232\156\035\365\063\126\213\247\231\322\362 \310\054\063\223\222\060\307\116\214\145\063\020\144\027\375\044  $\label{eq:condition} $$ \027\226\321\215\302\072\152\053\353\023\213\104\362\041\363\112$ \032\267\167\137\327\355\210\244\162\345\071\037\225\235\276\147 \301\160\021\075\273\364\370\111\267\343\046\227\072\237\322\137  $\label{eq:condition} $$ \frac{373}{300}231\frac{74}{071}051\frac{340}{173}035\frac{277}{015}247\frac{322}{051}$ \064\156\044\025\313\336\220\136\277\032\304\146\352\302\346\272 \071\137\212\231\251\101\131\007\260\054\257

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Certainly Root R1"
```

<sup>#</sup> Issuer: CN=Certainly Root R1,O=Certainly,C=US

<sup>#</sup> Serial Number:00:8e:0f:f9:4b:90:71:68:65:33:54:f4:d4:44:39:b7:e0

<sup>#</sup> Subject: CN=Certainly Root R1,O=Certainly,C=US

<sup>#</sup> Not Valid Before: Thu Apr 01 00:00:00 2021

<sup>#</sup> Not Valid After: Sun Apr 01 00:00:00 2046

<sup>#</sup> Fingerprint (SHA-256):

<sup>77:</sup>B8:2C:D8:64:4C:43:05:F7:AC:C5:CB:15:6B:45:67:50:04:03:3D:51:C6:0C:62:02:A8:E0:C3:34:67:D3:A0

<sup>#</sup> Fingerprint (SHA1): A0:50:EE:0F:28:71:F4:27:B2:12:6D:6F:50:96:25:BA:CC:86:42:AF

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

```
CKA PRIVATE CK BBOOL CK FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Certainly Root R1"
CKA CERT SHA1 HASH MULTILINE OCTAL
\240\120\356\017\050\161\364\047\262\022\155\157\120\226\045\272
\314\206\102\257
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\007\160\324\076\202\207\240\372\063\066\023\364\372\063\347\022
END
CKA_ISSUER MULTILINE_OCTAL
\060\075\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\label{eq:condition} $$ \022\060\020\006\003\125\004\012\023\011\103\145\162\164\141\151 
\label{eq:condition} $$ \frac{156}{154}\frac{061}{032}\frac{060}{030}\frac{006}{003}\frac{125}{004}\frac{003}{023}\frac{1103}{145} $$
\162\164\141\151\156\154\171\040\122\157\157\164\040\122\061
END
CKA SERIAL NUMBER MULTILINE OCTAL
\002\021\000\216\017\371\113\220\161\150\145\063\124\364\324\104
\071\267\340
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "Certainly Root E1"
# Issuer: CN=Certainly Root E1,O=Certainly,C=US
# Serial Number:06:25:33:b1:47:03:33:27:5c:f9:8d:9a:b9:bf:cc:f8
# Subject: CN=Certainly Root E1,O=Certainly,C=US
# Not Valid Before: Thu Apr 01 00:00:00 2021
# Not Valid After: Sun Apr 01 00:00:00 2046
# Fingerprint (SHA-256):
B4:58:5F:22:E4:AC:75:6A:4E:86:12:A1:36:1C:5D:9D:03:1A:93:FD:84:FE:BB:77:8F:A3:06:8B:0F:C4:2D:C2
# Fingerprint (SHA1): F9:E1:6D:DC:01:89:CF:D5:82:45:63:3E:C5:37:7D:C2:EB:93:6F:2B
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Certainly Root E1"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\label{eq:condition} $$ \060\075\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$
\022\060\020\006\003\125\004\012\023\011\103\145\162\164\141\151
\156\154\171\061\032\060\030\006\003\125\004\003\023\021\103\145
\162\164\141\151\156\154\171\040\122\157\157\164\040\105\061
```

CKA TOKEN CK BBOOL CK TRUE

**END** 

CKA ID UTF8 "0"

#### CKA\_ISSUER MULTILINE\_OCTAL

#### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\020\006\045\063\261\107\003\063\047\134\371\215\232\271\277 \314\370

**END** 

#### CKA VALUE MULTILINE OCTAL

 $\label{eq:condition} $$ \060\202\001\367\060\202\001\175\240\003\002\001\002\002\002\0006$ \045\063\261\107\003\063\047\134\371\215\232\271\277\314\370\060 \012\006\010\052\206\110\316\075\004\003\003\060\075\061\013\060  $\label{eq:condition} $$ \004\003\125\004\006\023\002\125\123\061\022\060\020\006\003$ \125\004\012\023\011\103\145\162\164\141\151\156\154\171\061\032 \060\030\006\003\125\004\003\023\021\103\145\162\164\141\151\156 \154\171\040\122\157\157\164\040\105\061\060\036\027\015\062\061 \060\064\060\061\060\060\060\060\060\060\132\027\015\064\066\060 \064\060\061\060\060\060\060\060\060\060\132\060\075\061\013\060\011  $\label{eq:condition} $$ \006\003\125\004\006\023\002\125\123\061\022\060\020\006\003\125$ \004\012\023\011\103\145\162\164\141\151\156\154\171\061\032\060 \030\006\003\125\004\003\023\021\103\145\162\164\141\151\156\154 \171\040\122\157\157\164\040\105\061\060\166\060\020\006\007\052 \206\110\316\075\002\001\006\005\053\201\004\000\042\003\142\000  $\label{eq:condition} $$ \004\336\157\370\177\034\337\355\371\107\207\206\261\244\300\212 $$$ \370\202\227\200\352\217\310\112\136\052\175\210\150\247\001\142 \024\221\044\172\134\236\243\027\175\212\206\041\064\030\120\033  $\label{eq:condition} $$ \020\336\320\067\113\046\307\031\140\200\351\064\275\140\031\066$$ \100\326\051\207\011\074\221\172\366\274\023\043\335\131\116\004 \136\317\310\002\034\030\123\301\061\330\332\040\351\104\215\344 \166\243\102\060\100\060\016\006\003\125\035\017\001\001\377\004 \004\003\002\001\006\060\017\006\003\125\035\023\001\001\377\004 \005\060\003\001\001\377\060\035\006\003\125\035\016\004\026\004 \024\363\050\030\313\144\165\356\051\052\353\355\256\043\130\070 \205\353\310\042\007\060\012\006\010\052\206\110\316\075\004\003  $\label{eq:condition} $$ \003\003\150\000\060\145\002\061\000\261\216\132\040\303\262\031\$ \142\115\336\260\117\337\156\322\160\212\361\237\176\152\214\346 \272\336\203\151\312\151\263\251\005\265\226\222\027\207\302\322 \352\320\173\316\330\101\133\174\256\002\060\106\336\352\313\135 \232\354\062\302\145\026\260\114\060\134\060\363\332\116\163\206 \006\330\316\211\004\110\067\067\370\335\063\121\235\160\257\173 \125\330\001\056\175\005\144\016\206\270\221

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "Certainly Root E1"
# Issuer: CN=Certainly Root E1,O=Certainly,C=US
# Serial Number:06:25:33:b1:47:03:33:27:5c:f9:8d:9a:b9:bf:cc:f8
# Subject: CN=Certainly Root E1,O=Certainly,C=US
# Not Valid Before: Thu Apr 01 00:00:00 2021
# Not Valid After: Sun Apr 01 00:00:00 2046
# Fingerprint (SHA-256):
B4:58:5F:22:E4:AC:75:6A:4E:86:12:A1:36:1C:5D:9D:03:1A:93:FD:84:FE:BB:77:8F:A3:06:8B:0F:C4:2D:C2
# Fingerprint (SHA1): F9:E1:6D:DC:01:89:CF:D5:82:45:63:3E:C5:37:7D:C2:EB:93:6F:2B
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA LABEL UTF8 "Certainly Root E1"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\371\341\155\334\001\211\317\325\202\105\143\076\305\067\175\302
\353\223\157\053
END
CKA CERT MD5 HASH MULTILINE OCTAL
\012\236\312\315\076\122\120\306\066\363\113\243\355\247\123\351
END
CKA ISSUER MULTILINE OCTAL
\label{eq:condition} $$ \060\075\061\013\060\011\006\003\125\004\006\023\002\125\123\061 $$
\022\060\020\006\003\125\004\012\023\011\103\145\162\164\141\151
\156\154\171\061\032\060\030\006\003\125\004\003\023\021\103\145
\162\164\141\151\156\154\171\040\122\157\157\164\040\105\061
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \002\020\006\045\063\261\107\003\063\047\134\371\215\232\271\277 
\314\370
END
CKA TRUST SERVER AUTH CK TRUST CKT NSS TRUSTED DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS MUST VERIFY TRUST
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NSS_MUST_VERIFY_TRUST
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
# Certificate "E-Tugra Global Root CA RSA v3"
# Issuer: CN=E-Tugra Global Root CA RSA v3,OU=E-Tugra Trust Center,O=E-Tugra EBG A.S.,L=Ankara,C=TR
# Serial Number:0d:4d:c5:cd:16:22:95:96:08:7e:b8:0b:7f:15:06:34:fb:79:10:34
# Subject: CN=E-Tugra Global Root CA RSA v3,OU=E-Tugra Trust Center,O=E-Tugra EBG
A.S.,L=Ankara,C=TR
# Not Valid Before: Wed Mar 18 09:07:17 2020
# Not Valid After: Sun Mar 12 09:07:17 2045
# Fingerprint (SHA-256):
```

EF:66:B0:B1:0A:3C:DB:9F:2E:36:48:C7:6B:D2:AF:18:EA:D2:BF:E6:F1:17:65:5E:28:C4:06:0D:A1:A3:F4:C2

# Fingerprint (SHA1): E9:A8:5D:22:14:52:1C:5B:AA:0A:B4:BE:24:6A:23:8A:C9:BA:E2:A9

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_CERTIFICATE

CKA TOKEN CK BBOOL CK TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA LABEL UTF8 "E-Tugra Global Root CA RSA v3"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509

CKA SUBJECT MULTILINE OCTAL

 $\label{eq:control} $$ \000\201\200\061\013\060\011\006\003\125\004\0003\125\0004\0006\101\156\153\141\162\141\061\031\060\027\006\003\125\0004\012\023\020\105\055\124\165\147\162\141\040\105\102\107\040\101\056\123\056\061\035\060\033\006\003\125\0004\013\023\024\105\055\124\165\147\162\141\040\124\162\165\163\164\040\103\145\156\164\145\162\061\046\060\044\006\003\125\0004\003\023\035\105\055\124\165\147\162\141\040\107\154\157\142\141\154\040\122\157\157\164\040\103\101\040\122\123\101\040\166\063$ 

**END** 

CKA\_ID UTF8 "0"

#### CKA ISSUER MULTILINE OCTAL

 $\label{eq:control} $$ \000\201\200\061\013\060\0011\006\003\125\004\007\023\006\101\156\153\141\162\141\061\031\060\027\006\003\125\004\012\023\020\105\055\124\165\147\162\141\040\105\102\107\040\101\056\123\056\061\035\060\033\006\003\125\004\013\023\024\105\055\124\165\147\162\141\040\124\162\165\163\164\040\103\145\156\164\145\162\061\046\060\044\006\003\125\004\003\023\035\105\055\124\165\147\162\141\040\107\154\157\142\141\154\040\122\157\157\164\040\103\101\040\122\123\101\040\166\063$ 

**END** 

### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\024\015\115\305\315\026\042\225\226\010\176\270\013\177\025 \006\064\373\171\020\064

**END** 

#### CKA VALUE MULTILINE OCTAL

\071\060\067\061\067\132\027\015\064\065\060\063\061\062\060\071 \060\067\061\067\132\060\201\200\061\013\060\011\006\003\125\004 \006\023\002\124\122\061\017\060\015\006\003\125\004\007\023\006 \101\156\153\141\162\141\061\031\060\027\006\003\125\004\012\023 \020\105\055\124\165\147\162\141\040\105\102\107\040\101\056\123 \056\061\035\060\033\006\003\125\004\013\023\024\105\055\124\165 \147\162\141\040\124\162\165\163\164\040\103\145\156\164\145\162 \061\046\060\044\006\003\125\004\003\023\035\105\055\124\165\147  $\label{eq:condition} $$ 162\141\040\107\154\157\142\141\154\040\122\157\157\164\040\103$$ \101\040\122\123\101\040\166\063\060\202\002\042\060\015\006\011 \052\206\110\206\367\015\001\001\001\005\000\003\202\002\017\000  $\label{eq:condition} $$ \002\002\002\002\000\000\242\146\360\211\267\162\173 $$$ \356\011\311\143\322\323\103\335\136\303\246\204\070\112\361\215  $\label{eq:condition} $$ \201\273\024\275\107\350\100\027\363\075\303\170\105\162\246\056$$ \220\336\232\072\324\040\161\312\274\237\035\113\227\012\307\061 \272\076\327\376\045\251\052\216\066\364\321\057\307\267\251\135  $\label{eq:condition} $$ \063\334\060\160\370\100\154\113\262\246\061\141\321\064\074\075$$$ \061\172\307\257\304\247\204\341\227\244\350\113\366\027\174 \356\074\007\355\342\212\127\334\266\373\370\103\045\120\352\047  $\label{eq:condition} $$ \201\250\206\274\217\122\112\226\072\140\032\226\273\375\163\364$$ \205\375\203\375\177\204\155\064\154\177\152\267\113\001\003\277 \255\151\267\327\062\331\365\127\152\351\206\202\076\245\146\061 \263\026\075\302\363\046\140\062\323\122\036\260\154\244\067\076 \364\365\257\353\341\337\200\006\317\052\101\347\146\011\341\113 \227\347\167\275\041\155\051\266\147\303\055\176\355\326\171\145 \321\317\072\266\321\261\136\126\141\120\172\132\316\116\120\061 \200\003\230\107\347\344\030\174\104\132\306\244\263\073\306\306 \303\072\360\154\303\213\310\244\221\005\363\365\331\266\252\006 \241\267\253\344\261\352\041\024\134\203\244\374\377\266\120\323 \214\022\046\231\166\160\351\300\017\246\164\374\273\320\033\170  $\label{eq:condition} $$ \frac{316}{162} 222 \frac{342}{050} \frac{234}{274} \frac{346}{351} \frac{11}{330} \frac{072}{323} \frac{211}{346} \frac{276}{276}$ \056\167\337\001\012\157\226\366\345\215\074\115\122\166\032\126 \341\163\176\027\254\075\255\154\243\122\022\030\160\346\200\116 \063\362\176\046\062\254\005\215\070\244\346\166\074\237\020\151 \016\155\235\322\301\171\040\153\133\317\063\215\321\224\166\065 \347\135\125\307\267\254\050\253\106\314\347\073\041\265\012\012 \344\112\131\334\201\065\113\104\225\022\012\147\245\241\377\133  $\label{eq:condition} $$ \000\007\322\300\314\371\077\374\237\063\362\000\370\214\154\207 $$$ \235\006\055\361\357\343\346\006\372\305\146\023\133\374\120\007 \236\161\206\262\332\157\164\060\317\223\123\350\334\042\326\336 \040\037\141\215\243\056\243\170\062\220\154\334\254\062\265\005 \344\365\074\063\015\326\340\207\167\027\114\235\260\330\011\250 \015\127\367\104\205\360\310\004\276\134\135\132\343\027\216\124 \143\151\177\111\164\144\005\214\243\002\003\001\000\001\243\143 \060\141\060\017\006\003\125\035\023\001\001\377\004\005\060\003 \001\001\377\060\037\006\003\125\035\043\004\030\060\026\200\024 \262\264\256\346\055\367\046\325\252\165\055\166\113\300\033\123  $\label{eq:condition} $$ \041\320\110\357\060\035\006\003\125\035\016\004\026\004\024\262$ 

\264\256\346\055\367\046\325\252\165\055\166\113\300\033\123\041 \320\110\357\060\016\006\003\125\035\017\001\001\377\004\004\003 \002\001\006\060\015\006\011\052\206\110\206\367\015\001\001\013  $\label{eq:condition} $$ \005\000\003\202\002\001\000\211\250\162\177\214\353\316\056\030 $$$ \304\020\200\055\020\014\377\373\024\315\004\340\024\074\116\232  $\label{eq:condition} $$ 373\237\051\277\042\236\127\271\202\163\022\143\046\265\314\220 $$$ \351\322\052\051\356\234\055\314\054\231\276\105\047\344\261\161 \355\344\070\225\061\101\362\175\172\143\170\337\312\066\026\057 \202\210\237\274\021\107\117\166\115\310\055\216\353\337\055\174 \116\073\332\256\366\343\332\135\024\246\256\350\205\104\235\006 \156\216\373\357\172\112\152\055\053\050\030\376\277\220\054\165  $\label{eq:condition} $$ \026\237\017\352\226\175\005\356\233\023\245\104\154\370\003\320 $$$ \335\043\341\375\003\022\022\010\364\030\064\263\340\067\013\167  $\label{eq:condition} $$ \021\001\110\277\141\264\265\370\031\331\313\115\352\243\214\357 $$$ \375\360\006\265\155\222\364\112\141\120\204\355\354\111\323\344 \276\150\346\056\343\061\013\124\013\032\222\326\202\330\266\242 \145\074\146\004\371\125\332\154\373\333\265\024\146\115\224\203 \073\315\036\246\053\262\376\167\100\206\253\347\337\012\311\375 \366\335\207\126\030\330\260\054\125\140\226\372\010\176\122\220 \365\113\246\056\207\174\313\040\333\006\076\240\135\003\167\175 \242\074\023\033\051\242\023\125\240\075\024\042\257\157\270\320 \232\033\162\335\005\001\215\206\140\277\244\147\356\265\245\015 \321\177\346\032\053\142\146\303\007\272\347\240\110\034\070\303 \351\105\373\247\177\374\355\002\150\032\312\167\022\167\246\000 \125\050\024\354\326\307\022\242\033\145\102\351\221\350\313\076 \207\211\124\135\331\257\235\227\234\151\347\012\377\017\132\170 \213\143\052\114\175\107\224\077\336\113\351\123\320\060\361\305 \366\236\111\337\073\240\221\243\243\376\315\130\314\352\337\257 \157\050\073\240\151\233\217\354\254\256\053\124\235\233\004\261 \107\040\257\226\022\076\143\224\035\004\347\056\273\206\307\014  $\verb|232|210|277|166|107|357|367|260|013|227|146|322|104|317|140|122|$ \007\341\325\054\112\072\047\141\167\312\327\217\347\207\016\060 \377\014\273\004\342\141\303\242\310\227\141\216\264\060\152\074 \155\302\007\137\112\163\057\077\371\026\212\001\146\357\272\221 \312\122\127\173\256\324\346\017\335\013\172\177\213\236\046\040 \317\073\357\201\161\203\131

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

A.S.,L=Ankara,C=TR

# Not Valid Before: Wed Mar 18 09:07:17 2020 # Not Valid After : Sun Mar 12 09:07:17 2045

<sup>#</sup> Trust for "E-Tugra Global Root CA RSA v3"

<sup>#</sup> Issuer: CN=E-Tugra Global Root CA RSA v3,OU=E-Tugra Trust Center,O=E-Tugra EBG A.S.,L=Ankara,C=TR

<sup>#</sup> Serial Number:0d:4d:c5:cd:16:22:95:96:08:7e:b8:0b:7f:15:06:34:fb:79:10:34

<sup>#</sup> Subject: CN=E-Tugra Global Root CA RSA v3,OU=E-Tugra Trust Center,O=E-Tugra EBG

```
EF:66:B0:B1:0A:3C:DB:9F:2E:36:48:C7:6B:D2:AF:18:EA:D2:BF:E6:F1:17:65:5E:28:C4:06:0D:A1:A3:F4:C2
# Fingerprint (SHA1): E9:A8:5D:22:14:52:1C:5B:AA:0A:B4:BE:24:6A:23:8A:C9:BA:E2:A9
CKA_CLASS CK_OBJECT_CLASS CKO_NSS_TRUST
CKA TOKEN CK BBOOL CK TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA MODIFIABLE CK BBOOL CK FALSE
CKA_LABEL UTF8 "E-Tugra Global Root CA RSA v3"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\351\250\135\042\024\122\034\133\252\012\264\276\044\152\043\212
\311\272\342\251
END
CKA CERT MD5 HASH MULTILINE OCTAL
\label{eq:condition} $$ \042\276\020\366\302\370\003\210\163\137\063\051\107\050\107\244 $$
END
CKA ISSUER MULTILINE OCTAL
\061\017\060\015\006\003\125\004\007\023\006\101\156\153\141\162
\141\061\031\060\027\006\003\125\004\012\023\020\105\055\124\165
\147\162\141\040\105\102\107\040\101\056\123\056\061\035\060\033
\006\003\125\004\013\023\024\105\055\124\165\147\162\141\040\124
\label{eq:condition} $$ \003\125\004\003\023\035\105\055\124\165\147\162\141\040\107\154
\157\142\141\154\040\122\157\157\164\040\103\101\040\122\123\101
\040\166\063
END
CKA SERIAL NUMBER MULTILINE OCTAL
\label{eq:condition} $$ \020\024\015\115\305\315\026\042\225\226\010\176\270\013\177\025 $$
\006\064\373\171\020\064
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NSS_TRUSTED_DELEGATOR
CKA TRUST EMAIL PROTECTION CK TRUST CKT NSS MUST VERIFY TRUST
CKA TRUST CODE SIGNING CK TRUST CKT NSS MUST VERIFY TRUST
CKA TRUST STEP UP APPROVED CK BBOOL CK FALSE
# Certificate "E-Tugra Global Root CA ECC v3"
# Issuer: CN=E-Tugra Global Root CA ECC v3,OU=E-Tugra Trust Center,O=E-Tugra EBG A.S.,L=Ankara,C=TR
# Serial Number:26:46:19:77:31:e1:4f:6f:28:36:de:39:51:86:e6:d4:97:88:22:c1
# Subject: CN=E-Tugra Global Root CA ECC v3,OU=E-Tugra Trust Center,O=E-Tugra EBG
A.S.,L=Ankara,C=TR
# Not Valid Before: Wed Mar 18 09:46:58 2020
# Not Valid After: Sun Mar 12 09:46:58 2045
# Fingerprint (SHA-256):
87:3F:46:85:FA:7F:56:36:25:25:2E:6D:36:BC:D7:F1:6F:C2:49:51:F2:64:E4:7E:1B:95:4F:49:08:CD:CA:13
# Fingerprint (SHA1): 8A:2F:AF:57:53:B1:B0:E6:A1:04:EC:5B:6A:69:71:6D:F6:1C:E2:84
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
```

# Fingerprint (SHA-256):

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA PRIVATE CK BBOOL CK FALSE

CKA MODIFIABLE CK BBOOL CK FALSE

CKA\_LABEL UTF8 "E-Tugra Global Root CA ECC v3"

CKA\_CERTIFICATE\_TYPE CK\_CERTIFICATE\_TYPE CKC\_X\_509 CKA SUBJECT MULTILINE OCTAL

 $\label{eq:condition} $$ \000\201\200\061\013\060\0011\006\003\125\0004\0007\023\006\101\156\153\141\162\141\061\031\060\027\006\003\125\0004\012\023\020\105\055\124\165\147\162\141\040\105\102\107\040\101\056\123\056\061\035\060\033\006\003\125\0004\013\023\024\105\055\124\165\147\162\141\040\124\162\165\163\164\040\103\145\156\164\145\162\061\0046\060\0044\006\003\125\0004\003\023\035\105\055\124\165\147\162\141\040\107\154\157\142\141\154\040\122\157\157\164\040\103\101\040\105\103\103\0040\166\063$ 

**END** 

CKA ID UTF8 "0"

#### CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:control} $$ \000\201\200\061\013\060\011\006\003\125\004\0003\125\0004\0006\101\156\153\141\162\141\061\031\060\027\006\003\125\0004\012\023\020\105\055\124\165\147\162\141\040\105\102\107\040\101\056\123\056\061\035\060\033\006\003\125\0004\013\023\024\105\055\124\165\147\162\141\040\124\162\165\163\164\040\103\145\156\164\145\162\061\046\060\044\006\003\125\0004\003\023\035\105\055\124\165\147\162\141\040\107\154\157\142\141\154\040\122\157\157\164\040\103\101\040\105\103\103\040\166\063$ 

**END** 

#### CKA SERIAL NUMBER MULTILINE OCTAL

\002\024\046\106\031\167\061\341\117\157\050\066\336\071\121\206 \346\324\227\210\042\301

**END** 

## CKA\_VALUE MULTILINE\_OCTAL

 $\label{eq:constraint} $$ \end{align} $$ \end{alig$ 

\141\162\141\061\031\060\027\006\003\125\004\012\023\020\105\055 \124\165\147\162\141\040\105\102\107\040\101\056\123\056\061\035  $\\ \backslash 060 \backslash 033 \backslash 006 \backslash 003 \backslash 125 \backslash 004 \backslash 013 \backslash 023 \backslash 024 \backslash 105 \backslash 055 \backslash 124 \backslash 165 \backslash 147 \backslash 162 \backslash 141$  $\label{eq:condition} $$ \040\124\162\165\163\164\040\103\145\156\164\145\162\061\046\060$$$ \044\006\003\125\004\003\023\035\105\055\124\165\147\162\141\040  $\label{eq:condition} $$ 107\154\157\142\141\154\040\122\157\157\164\040\103\101\040\105$$ \103\103\040\166\063\060\166\060\020\006\007\052\206\110\316\075 \002\001\006\005\053\201\004\000\042\003\142\000\004\216\230\051 \277\307\020\036\047\333\253\003\314\050\054\330\136\110\031\020 \051\314\313\131\201\314\214\270\222\027\211\203\052\222\366\303 \244\035\114\142\325\237\326\240\106\334\034\274\166\301\343\107  $\label{eq:condition} $$ 320\133\023\332\347\245\263\146\110\347\041\232\112\117\206\012$ \175\154\352\115\062\200\012\262\172\011\233\151\113\230\201\342  $\label{eq:condition} $$ \056\354\002\160\226\037\375\365\106\316\312\334\202\243\143\060$$$ \141\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001 \001\377\060\037\006\003\125\035\043\004\030\060\026\200\024\377  $\label{eq:condition} $$ \202\061\162\076\371\304\146\154\255\070\236\321\260\121\210\245 $$$ \220\314\365\060\035\006\003\125\035\016\004\026\004\024\377\202  $\label{eq:condition} $$ \061\162\076\371\304\146\154\255\070\236\321\260\121\210\245\220 $$$ \314\365\060\016\006\003\125\035\017\001\001\377\004\004\003\002 \001\006\060\012\006\010\052\206\110\316\075\004\003\003\003\151  $\label{eq:condition} $$ \000\060\146\002\061\000\346\005\130\151\141\345\055\312\015\313$  $\label{eq:condition} $$ \361\031\010\275\326\375\121\222\032\176\143\124\004\220\221\232$ \065\221\071\231\372\007\251\146\223\272\310\150\324\212\077\372 \102\226\246\254\135\212\171\126\330\212\033\337\232\336\137\307 \120\217\261\133\161\014\046\337\152\100\000\354\063\221\041\161 \276\150\344\043\244\331\255\241\067

**END** 

CKA\_NSS\_MOZILLA\_CA\_POLICY CK\_BBOOL CK\_TRUE
CKA\_NSS\_SERVER\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE
CKA\_NSS\_EMAIL\_DISTRUST\_AFTER CK\_BBOOL CK\_FALSE

```
# Trust for "E-Tugra Global Root CA ECC v3"
```

# Issuer: CN=E-Tugra Global Root CA ECC v3,OU=E-Tugra Trust Center,O=E-Tugra EBG A.S.,L=Ankara,C=TR

# Serial Number:26:46:19:77:31:e1:4f:6f:28:36:de:39:51:86:e6:d4:97:88:22:c1

# Subject: CN=E-Tugra Global Root CA ECC v3,OU=E-Tugra Trust Center,O=E-Tugra EBG

A.S.,L=Ankara,C=TR

# Not Valid Before: Wed Mar 18 09:46:58 2020

# Not Valid After: Sun Mar 12 09:46:58 2045

# Fingerprint (SHA-256):

87:3F:46:85:FA:7F:56:36:25:25:2E:6D:36:BC:D7:F1:6F:C2:49:51:F2:64:E4:7E:1B:95:4F:49:08:CD:CA:13

# Fingerprint (SHA1): 8A:2F:AF:57:53:B1:B0:E6:A1:04:EC:5B:6A:69:71:6D:F6:1C:E2:84

CKA\_CLASS CK\_OBJECT\_CLASS CKO\_NSS\_TRUST

CKA\_TOKEN CK\_BBOOL CK\_TRUE

CKA\_PRIVATE CK\_BBOOL CK\_FALSE

CKA\_MODIFIABLE CK\_BBOOL CK\_FALSE

CKA\_LABEL UTF8 "E-Tugra Global Root CA ECC v3"

#### CKA\_CERT\_SHA1\_HASH MULTILINE\_OCTAL

**END** 

#### CKA\_CERT\_MD5\_HASH MULTILINE\_OCTAL

\106\274\201\273\361\265\036\367\113\226\274\024\342\347\047\144

**END** 

#### CKA\_ISSUER MULTILINE\_OCTAL

 $\label{eq:control} $$ \000\201\200\061\013\060\0011\006\003\125\004\007\023\006\101\156\153\141\162\141\061\031\060\027\006\003\125\004\012\023\020\105\055\124\165\147\162\141\040\105\102\107\040\101\056\123\056\061\035\060\033\006\003\125\004\013\023\024\105\055\124\165\147\162\141\040\124\162\165\163\164\040\103\145\156\164\145\162\061\046\060\044\006\003\125\004\003\023\035\105\055\124\165\147\162\141\040\107\154\157\142\141\154\040\122\157\157\164\040\103\101\040\105\103\103\040\166\063$ 

**END** 

#### CKA\_SERIAL\_NUMBER MULTILINE\_OCTAL

\002\024\046\106\031\167\061\341\117\157\050\066\336\071\121\206 \346\324\227\210\042\301

**END** 

CKA\_TRUST\_SERVER\_AUTH CK\_TRUST CKT\_NSS\_TRUSTED\_DELEGATOR
CKA\_TRUST\_EMAIL\_PROTECTION CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_CODE\_SIGNING CK\_TRUST CKT\_NSS\_MUST\_VERIFY\_TRUST
CKA\_TRUST\_STEP\_UP\_APPROVED CK\_BBOOL CK\_FALSE

### Found in path(s):

 $*/opt/cola/permits/1376394069\_1659497040.3993607/0/ca-certificates-20220614-tar-bz2/ca-certificates-20220614/certdata.txt$ 

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#### Found in path(s):

\* /opt/cola/permits/1376394069\_1659497040.3993607/0/ca-certificates-20220614-tar-bz2/ca-certificates-20220614/mk-ca-bundle.pl

# 1.93 cpp-httplib 0.7.8

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## 1.94 libretls 3.3.4-r3

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/\*

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\*/

## 1.95 coreutils 9.0-r2

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Version 3.1, 31 March 2009

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bzip2/libbzip2 version 1.0.8 of 13 July 2019

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```
--- end ---
////

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[#mpl]
# MPL Support, <boost/mp11/mpl.hpp>
:toc-title:
:idprefix:
The header `<boost/mp11/mpl.hpp>`, when included, defines the
necessary support infrastructure for `mp_list` and `std::tuple`
to be valid link:../../../libs/mpl[MPL] sequences.
NOTE: `mpl.hpp` is not included by `<boost/mp11.hpp>`.
It's also possible to only enable support for `mp_list` by
including `<boost/mp11/mpl_list.hpp>`, and for `std::tuple`
by including `<boost/mp11/mpl_tuple.hpp>`. This may be required
because some libraries, such as Boost.Fusion, contain their own MPL
support for `std::tuple`, which conflicts with Mp11's one.
<!DOCTYPE html>
<html>
<head></head>
<body>
 <h3>
   Copyright Test
  </h3>
```

```
1963, 1964, 1965 Jane Doe
 2018 Joe Blow, John Coe
 1977, 1985 Someone else
 </body>
</html>
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License
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```

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<article id="copyright\_test" last-revision="DEBUG MODE Date: 2000/12/20 12:00:00 \$"

xmlns:xi="http://www.w3.org/2001/XInclude">

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<articleinfo>

<copyright>

<articleinfo>
<year>1963

<articleinfo>
<year>1963

<articleinfo>
<articleinfo

</copyright>

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<copyright>
   <year>2018</year> <holder>Joe Blow, John Coe</holder>
  </copyright>
 <copyright>
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# 1.101 tough-cookie 3.0.1

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## 1.102 fmt 7.0.1

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A. HISTORY OF THE SOFTWARE

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Python was created in the early 1990s by Guido van Rossum at Stichting Mathematisch Centrum (CWI, see http://www.cwi.nl) in the Netherlands as a successor of a language called ABC. Guido remains Python's principal author, although it includes many contributions from others.

In 1995, Guido continued his work on Python at the Corporation for National Research Initiatives (CNRI, see http://www.cnri.reston.va.us) in Reston, Virginia where he released several versions of the software.

In May 2000, Guido and the Python core development team moved to BeOpen.com to form the BeOpen PythonLabs team. In October of the same year, the PythonLabs team moved to Digital Creations (now Zope Corporation, see http://www.zope.com). In 2001, the Python Software Foundation (PSF, see http://www.python.org/psf/) was formed, a non-profit organization created specifically to own Python-related Intellectual Property. Zope Corporation is a sponsoring member of the PSF.

All Python releases are Open Source (see http://www.opensource.org for the Open Source Definition). Historically, most, but not all, Python releases have also been GPL-compatible; the table below summarizes the various releases.

Release Derived Year Owner GPL-

0.9.0 thru	1.2	1991-	1995 CV	VI yes
1.3 thru 1.5.2 1.2		1995-1999 CNRI ye		NRI yes
1.6	1.5.2	2000	CNRI	no
2.0	1.6	2000	BeOpen	.com no
1.6.1	1.6	2001	CNRI	yes (2)
2.1	2.0+1.6	5.1 2001	PSF	no
2.0.1	2.0+1.0	6.1 2001	PSF	yes
2.1.1	2.1+2.0	0.1 2001	PSF	yes
2.2	2.1.1	2001	PSF	yes
2.1.2	2.1.1	2002	PSF	yes
2.1.3	2.1.2	2002	PSF	yes
2.2.1	2.2	2002	PSF	yes
2.2.2	2.2.1	2002	PSF	yes
2.2.3	2.2.2	2003	PSF	yes
2.3	2.2.2	2002-2	003 PSF	yes
2.3.1	2.3	2002-2	003 PSF	yes
2.3.2	2.3.1	2002-2	2003 PSF	yes
2.3.3	2.3.2	2002-2	2003 PSF	yes
2.3.4	2.3.3	2004	PSF	yes
2.3.5	2.3.4	2005	PSF	yes
2.4	2.3	2004	PSF	yes
2.4.1	2.4	2005	PSF	yes
2.4.2	2.4.1	2005	PSF	yes
2.4.3	2.4.2	2006	PSF	yes
2.4.4	2.4.3	2006	PSF	yes
2.5	2.4	2006	PSF	yes
2.5.1	2.5	2007	PSF	yes
2.5.2	2.5.1	2008	PSF	yes
2.5.3	2.5.2	2008	PSF	yes
2.6	2.5	2008	PSF	yes
2.6.1	2.6	2008	PSF	yes
2.6.2	2.6.1	2009	PSF	yes
2.6.3	2.6.2	2009	PSF	yes
2.6.4	2.6.3	2009	PSF	yes
2.6.5	2.6.4	2010	PSF	yes
3.0	2.6	2008	PSF	yes
3.0.1	3.0	2009	PSF	yes
3.1	3.0.1	2009	PSF	yes
3.1.1	3.1	2009	PSF	yes
3.1.2	3.1.1	2010	PSF	yes
3.1.3	3.1.2	2010	PSF	yes
3.1.4	3.1.3	2011	PSF	yes
3.2	3.1	2011	PSF	yes
3.2.1	3.2	2011	PSF	yes
3.2.2	3.2.1	2011	PSF	yes
3.2.3	3.2.2	2012	PSF	yes
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Thanks to the many outside volunteers who have worked under Guido's direction to make these releases possible.

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