



# Cisco Process Orchestrator Northbound Web Services Guide

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# Preface

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The Northbound Web services documentation describes the Web services API used with Cisco Process Orchestrator. This documentation describes the XML formatting used to present the input and output of jobs processed via Web services as well as configuration of the http ports used to access the services.

## Audience

The information in this guide is intended for experienced users; typically, your IT organization. With Cisco Process Orchestrator Northbound Web services, your IT developers can, for example:

- Start Cisco Process Orchestrator processes and monitor the started process until its completion.
- View the process instance information of a started process.
- Programmatically automate the process of creating targets, runtime user accounts, and tasks using the Web service.

## Related Documentation

For more information about the Cisco Process Orchestrator and related products, see the Cisco Process Orchestrator Documentation Overview.

## Obtaining Documentation and Submitting a Service Request

For information on obtaining documentation, submitting a service request, and gathering additional information, see *What's New in Cisco Product Documentation* at:

<http://www.cisco.com/en/US/docs/general/whatsnew/whatsnew.html>

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# Configuring Cisco Process Orchestrator Web Services

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In Cisco Process Orchestrator, the end user can expose Northbound SOAP Web services into the Cisco Process Orchestrator server. The Web services are disabled by default. They can be configured from the Console.

## Configuring Web Services Settings Global Settings

The **Web Services** setting can be configured via the **File > Environment Properties > Web Services**

Users can configure the global settings for both secure (HTTPS) & non-secure (HTTP) REST web services. The settings will be applied to all Process Orchestrator servers in the same Process Orchestrator environment.

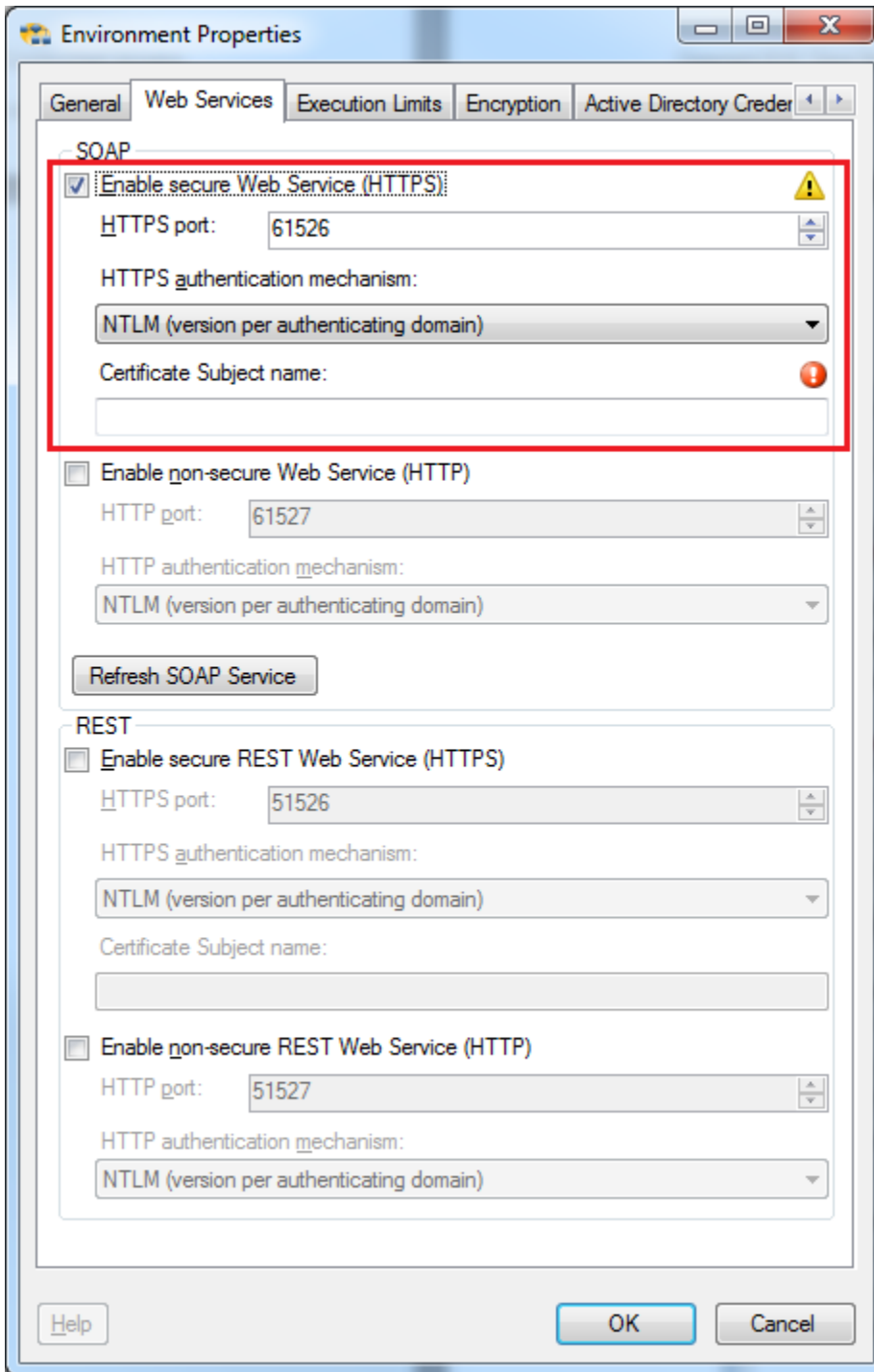
## Securing the Cisco Process Orchestrator SOAP Web service

Cisco Process Orchestrator allows users the ability to modify the authentication for the HTTPs endpoints. Use the following steps to secure the Cisco Process Orchestrator SOAP Web service.

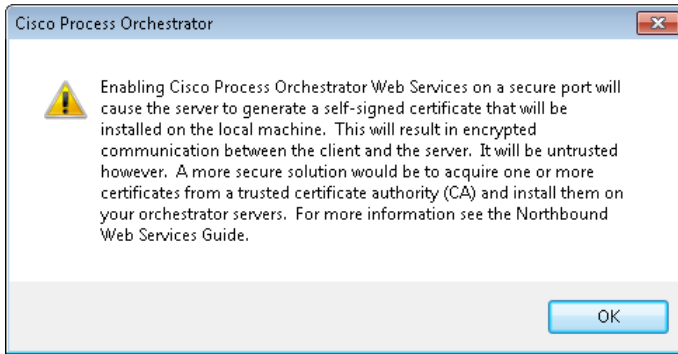
To enable the HTTPs Web service:

- Step 1** On the Cisco Process Orchestrator Console, choose **File > Environment Properties**. The Environment Properties dialog box displays.
- Step 2** Click the **Web Services** tab

Figure 1: Server Properties Dialog Box, Web service Tab



**Step 3** Check the **Enable secure Web service (HTTPS)** check box to configure the authentication for the HTTPS endpoint.



**Step 4** Click **OK** to continue.

**Step 5** Complete the following fields, as necessary.

Field	Description
HTTPS port	Enter or verify the secure HTTPS port for the Cisco Process Orchestrator Web service. (Default: 61526)
HTTPS authentication mechanism	Choose the appropriate authentication for the Web service. <ul style="list-style-type: none"> <li>▪ Basic—sends a username and password as the method of authentication. It's the simplest method of authentication, but the least secure.</li> <li>▪ Digest—sends cryptographic representation of the password rather than the password itself. This authentication method is more secure than basic authentication.</li> <li>▪ Ntlm—authentication protocol used on networks that include systems running on the Windows operating system. This option can be used to return to the normal mode of operation.</li> </ul>
Override default certificate	Specify the subject name of a valid certificate to be used by all Cisco Process Orchestrator servers in this environment. The certificate must be installed in the certificate store of the computers where Cisco Process Orchestrator server is installed.

**Step 6** Click **OK** to save the settings.

## Enabling a Non-Encrypted Endpoint of the Web service

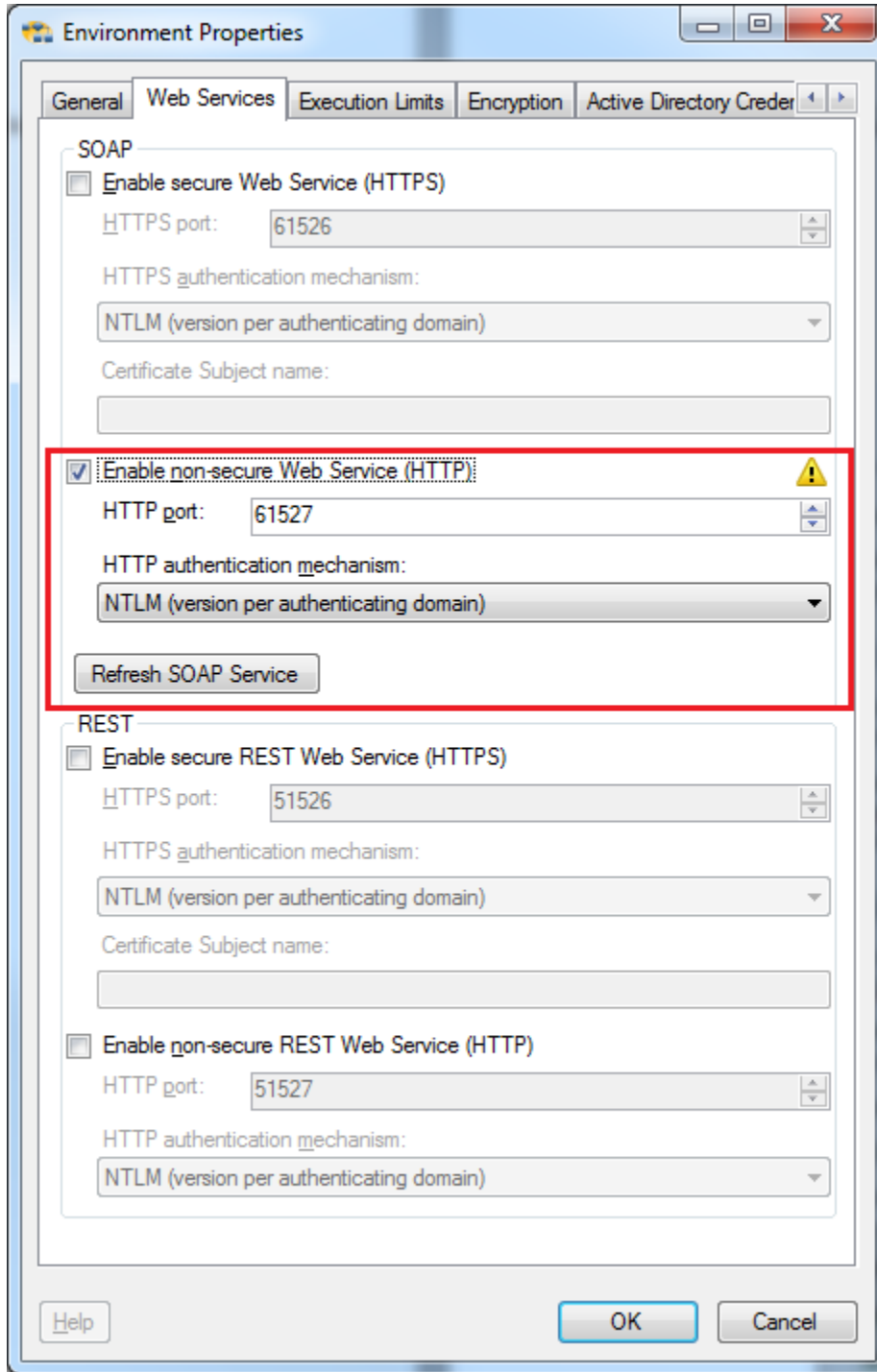
Use the following steps to open a non-encrypted endpoint of the Cisco Process Orchestrator SOAP Web service.

To open a non-encrypted endpoint:



- Step 1** On the Cisco Process Orchestrator Console, choose **File > Environment Properties**. The Environment Properties dialog box displays.
- Step 2** Click the **Web Service** tab

*Figure 2: Environment Properties Dialog Box—Web Service Tab*



- Step 3** Check the **Enable non-secure Web service (HTTP)** check box to unencrypt the HTTP endpoints.
- Step 4** Click **OK** to continue.

**Step 5** Complete the following fields, as necessary.

Field	Description
HTTP port	Enter or verify the secure HTTP port for the Web service. (Default: 61527)
HTTP authentication mechanism	<p>Choose the appropriate authentication for the Web service.</p> <ul style="list-style-type: none"> <li>▪ Basic—sends a username and password as the method of authentication. It's the simplest method of authentication, but the least secure.</li> <li>▪ Digest—sends cryptographic representation of the password rather than the password itself. This authentication method is more secure than basic authentication.</li> <li>▪ Ntlm—authentication protocol used on networks that include systems running on the Windows operating system. This option can be used to return to the normal mode of operation.</li> </ul>

**Step 6** Click **OK** to save the settings.

All transmissions through the chosen *NonsecuredHttpPort* are unencrypted. Communications over the SSL-enabled ports (and between the server and Console) will all be unaffected by this setting.

## Refreshing the Cisco Process Orchestrator Web service

Click the **Refresh Web services** button to regenerate the dynamic Web service methods in the Northbound Web service. This affects the Web service methods which start processes and retrieve process instance output variables.

For example, if you create a new process called My Process with a Started By Web service trigger, the method would be StartMyProcess. Click the **Refresh Web services** button to regenerate the Northbound Web service so that the Process service can launch the new StartMyProcess call.

## Override Web Services Settings for Individual Process Orchestrator Server

Users can overwrite the web services global settings for individual Process Orchestrator Server via the server config file (Tidal.Automation.Server.exe.config). This file can be found in the Cisco Process Orchestrator install directory.

Note that the *Cisco Process Orchestrator Server* service (*Service Name: Orchestrator Server*) needs to be restarted for the server to pick up the changes done to the config file.

The following properties can be overwritten.

- Non-secure SOAP Web Service Port
  - Locate the following block of XML in the config file. Specify a new port number in the value tag

```
<setting
  name="NonsecuredHttpPort"
  serializeAs="String">
  <value>-1</value>
</setting>
```

- Secure SOAP Web Service Port

- Locate the following block of XML in the config file. Specify a new port number in the value tag

```
<setting
  name="SecuredHttpPort"
  serializeAs="String">
  <value>-1</value>
</setting>
```

- Secure SOAP Web Service Certificate

- Locate the following block of XML in the config file. Specify a new certificate subject in the value tag

```
<setting
  name="ServerOverrideSOAPCertSubject"
  serializeAs="String">
  <value></value>
</setting>
```

# Process Web Service

---

The Process Web Service allows users to start processes and retrieve information, such as the description, ID, and whether the process is enabled or disabled.

The WSDL for the Process Web service methods is: <http://<server>:<port>/WS/Process?wsdl>

## CreateProcessEvent

Create a process event in Cisco Process Orchestrator.

### Parameters

**eventSource** (string) —source of the process event

**severity** (string) —event severity as Error, Warning, Information, Success, or Failure

**description** (string) —event description

**eventId** (integer) —event Id

**category** (string) —event category

**subject** (string) —event subject

**parameters** (string[]) – event parameters

**targetNameOrId** (string) —name or Guid of a target

### Return Type

None

## EnableOrDisableProcess

Enable or disable a process definition in Cisco Process Orchestrator

### Parameters

**processNameOrId** (string) —name or Guid of a process definition

**enable** (boolean) —flag to enable or disable a process

### Return Type

None

## ListProcessDefinitions

Enumerates all process definitions in Cisco Process Orchestrator

### Parameters

**northboundOnly** (boolean) —enumerate northbound processes only

### Return Type

ProcessDefinition[]

## Start[StartbyWebService]

Users can start any process that is defined in Cisco Process Orchestrator and contains a “Started by Web service” trigger. These Web services, which display in the list as *Start[Started by Web service]*, are based on the names of the triggers in the process.

The input variables for the process are the parameters of each process listed. You can also specify the `StartPointNameOrId` parameter that sets a start point for the process.

The Web service publishes these processes as dynamic methods that can change as processes are added, removed, or the input variables are modified. The list of the processes changes each time the Web service is refreshed or restarted. See [Refreshing the Cisco Process Orchestrator Web service](#).

## StartProcessByName

Start a Cisco Process Orchestrator process using a single process name or process ID. This method can only start processes that contain a *"Start by Web service"* trigger. To ensure the process can start on the trigger, be sure to add the *"Start by Web service"* trigger to the process during the authoring phase.

When starting a process, users have the option of overriding the target (or targets) that the job runs against. The user can specify either a single target or a single target group. If a target group is selected, the server will broadcast the job to all members of that target group.

If no target is specified, then the process will execute against the default target selection of the process.

### Parameters

**processNameOrId** (string)—display name or Id of the process

**targetOverride** (string)—display name or Id of a target to specify a non-default target for the run

**startPointNameOrId**(string) —point at which a process can be started

### Return Type

Guid[]

### Exceptions

`DeserializationFailed` if an improper type of variable parameter is provided to this call.

If no process is found with the Id or display name matches the specified *"processNameOrId"*. An exception with the following error message will be raised.

*"The request to run a process with name <name> could not be completed because no process with this name was found."*

# Process Instance Web Service

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This Web service allows users to stop processes and retrieve information, such as whether the process is completed and any input and output variables.

The WSDL for this Web service method is: <http://<server>:<port>/WS/ProcessInstance?wsdl>.

## GetInstanceStatuses

Checks the status of process instances that have run or are currently running

### Parameters

**instanceIds** (Guid[])—Ids of the instances with the statuses to be retrieved

### Return Type

InstanceStatus[]

## GetOutputVariablesGeneric

Retrieves all output variable values of a process instance. The values include their values, names, and types.

### Parameters

**instanceId** (Guid)—process Instance ID in guid format

### Return Type

VariableValue[]

## GetOutputVariablesFor[UniqueProcessName]

Retrieves output variables for a specific process instance. These processes show up in the list as `GetOutputVariablesFor[UniqueProcessName]`.

The Web service publishes these processes as dynamic methods that can change as processes are added, removed, or the input variables are modified. The list of the processes changes each time the Web service is refreshed or restarted.

### Parameters

**processInstanceId** (Guid)—process Instance ID in Guid format

### Return Type

VariableValue[]

## StopProcessInstance

Stop a running process instance in Cisco Process Orchestrator.

### Parameters

**instanceId** (Guid)—process Instance ID in Guid format

### Return Type

None

# Target Web Service

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This Web services allows users to create, update, and view targets for specific Cisco Process Orchestrator target types.

The WSDL for the Targets Web service is <http://<server>:<port>/WS/Target?wsdl>.

## Creating Targets

The following topics describe how to create targets for specific Cisco Process Orchestrator target types.

### CreateActiveDirectoryDomainTarget

Specifies the connection information for the Active Directory Domain server used for processes to run against

#### Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**ConnectionString** (string)—Active Directory authentication string

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### Return Type

String ID of the new target

### CreateAMQPBrokerTarget

Specifies the connection information for the AMQP Broker server used for processes to run against

#### Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**Host** (string)—host name of the AMQP Broker server

**Port** (string)—port number used by the protocol

**VirtualHost** (string)—name of the virtual host that specifies the namespace for entities (exchanges and queues) referred to by the protocol

**IgnoreCertificateErrors** (boolean)—indicates whether the target should ignore any certificate errors

**UseSSL** (boolean)—indicates whether the target should use SSL

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

String ID of the new target

## **CreateAzureServerTarget**

Specifies the connection information for the Azure server used for processes to run against

#### **Parameters**

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**Namespace** (string)—namespace for Azure Service Bus

**ServiceBusForWindowsServer** (string)—name of the host that specifies the namespace for entities referred to by the protocol

**RuntimePortNumber** (string)—runtime port number used by the protocol

**ManagementPortNumber** (string)—management port number used by the protocol

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

String ID of the new target

## **CreateCiscoServicePortalTarget**

Specifies the connection information for the *Cisco Prime Service Catalog* server used for processes to run against

#### **Parameters**

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the runtime user used to access *Request Center*

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**ServiceLinkRuntimeUserNameOrId** (string)—display name or unique identifier of the runtime user used to access *Service Link*.

**Server** (string)—host name or IP address where *Request Center* resides.

**ServiceLinkServer** (string)—host name or IP address where *Service Link* resides.

**UseSSL** (boolean)—indicates whether the target should use SSL to access *Request Center*

**ServiceLinkUseSSL** (boolean)—indicates whether the target should use SSL to access *Service Link*



**IgnoreCertificateErrors** (boolean)—indicates whether the target should ignore any certificate errors when accessing *Request Center*

**ServiceLinkIgnoreCertificateErrors** (boolean)—indicates whether the target should ignore any certificate errors when accessing *Service Link*

**ServiceLinkPort** (int32)—port number to access *Service Link*

**RequestCenterPort** (int32)—port number to access *Request Center*

**PublicKeyGuid** (Guid)—ID to the entry that contains the *Cisco Process Orchestrator* encryption public key stored in *Cisco Prime Service Catalog*

**EnabledServiceLinkConnection** (boolean)—indicates if service link connection information is provided.

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

String ID of the new target

### **CreateCiscoUCSDirectorTarget**

Specifies the connection information for the Cisco UCS Director server used for processes to run against.

#### **Parameters**

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**Server** (string)—host name or IP address of the Cisco Prime Service Catalog server

**UseSSL** (boolean)—indicates whether the target should use SSL

**IgnoreCertificateErrors** (boolean)—indicates whether the target should ignore any certificate errors

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

String ID of the new target

### **CreateCloudCenterServerTarget**

Specifies the connection information for the Cisco Cloud Center server used for processes to run against.

#### **Parameters**

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**HostName** (string)—host name or IP address of the Cisco Cloud Center server

**HttpPort** (string)—port number used to access Cisco Cloud Center server

**AMQPtarget** (string)— Id of the associated AMQP target

**IgnoreCertificateErrors** (boolean)—indicates whether the target should ignore any certificate errors

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### **Return Type**

String ID of the new target

## **CreateEmailIMAPTarget**

Specifies the connection information to an IMAP email server

### **Parameters**

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**EmailServer** (string)—DNS name or IP address of the IMAP server

**Port** (string)—port number used by the protocol

**EnableTLSAuthentication** (boolean)—indicate whether Transport Layer Security (TLS) authentication is enabled

**EnableSSL** (boolean) – indicate whether SSL is enabled

**PollingInterval** (int) – interval used to query the email server

**IgnoreCertificateError** (boolean)—indicates whether the target should ignore any certificate errors

**EnableServerPush** (boolean)—indicates whether to poll for emails from email server or subscribe to email server for email notification. Note that not all email servers have this option enabled.

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### **Return Type**

String ID of the new target

## CreateEmailPOP3Target

Specifies the connection information to a POP3 email server

### Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**EmailServer** (string)—DNS name or IP address of the POP3 server

**Port** (string)—port number used by the protocol

**EnableTLSAuthentication** (boolean)—indicate whether Transport Layer Security (TLS) authentication is enabled

**EnableSSL** (boolean) – indicate whether SSL is enabled

**PollingInterval** (int) – interval used to query the email server

**IgnoreCertificateError** (boolean)—indicates whether the target should ignore any certificate errors

**EnableServerPush** (boolean)—Not applicable

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

String ID of the new target

## CreateEmailSMTPTarget

Specifies the connection information to a SMTP email server

### Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**SMTPServer** (string)—DNS name or IP address of the SMTP gateway to use for sending email messages

**SMTPPort** (int32)—port used in the DNS name or IP address of the SMTP gateway

**Sender** (string)—email message address of the sender

**CredentialRequired** (boolean)—indicates if authentication credentials are required.

**EnabledDigitalSignature** (boolean)—indicates if digital signature is used when sending email

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

String ID of the new target

## CreateESXTarget

Specifies the connection information to an ESX/ESXi server

VMware ESX and VMware ESXi are "bare-metal" hypervisors, and are installed directly on top of the physical server and partitioned into multiple virtual machines that can run simultaneously, sharing the physical resources of the underlying server.

### Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**VirtualCenterESXServerName** (string)—host name or IP address of the Virtual Center/ESX Server

**VirtualCenterESXServerServicePort** (int)—port number used to access the Virtual Center/ESX Server service

**IsHttps** (bool)—indicates VMware target is configured for HTTPS

**IsSSLCertificateErrorIgnored** (boolean)—indicates whether the target should ignore any SSL certificate errors

**ConnectionLanguage** (string)—default language to use when connecting to the server

**UseDefaultLanguage** (boolean)—indicates whether the target should use the default language when connecting to the server

**ConnectionOverrideLanguage** (string)—alternative language to use when connecting to the server

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

String ID of the new target

## CreateGitRepositoryTarget

Specify the connection information to a GitHub repository used for saving or loading automation pack.

### Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**BaseUrl** (string)—URL to access the GitHub repository

**CodePath** (string)—Relative path within a repository

**Branch** (string)—Branch of the GitHub repository

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

String ID of the new target

## **CreateNetworkDeviceModuleTarget**

Some Cisco network devices are chassis systems that can hold other network devices such as ACE, FWSM, on boards that plug into the chassis.

This method creates a network device module target which can be used as a dependent of a terminal target, as well as, an independent network device target that can be used by network processes for execution.

#### **Parameters**

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**SwitchNumber** (string)—switch number for the chassis system

**SlotNumber** (string)—slot number on which the network device module resides

**ProcessorID** (string)—processor Id on which the network device module resides

**ChassisSystem** (string)—display name or target ID of the terminal target on which the network module resides

**PromptPrefix** (string)—command prompt prefix that will be used by the device type configurations and expects when issuing commands and connecting to the device. Adding a regex character, such as \$, >, and #, at the end of a prompt in the Prompt Prefix field invalidates the command prompt prefix.

**ExpectTemplateNameOrId** (string)—name or ID of the expect template

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

String ID of the new target

## **CreateOpenStackTarget**

Specifies the connection information to an OpenStack server

#### **Parameters**

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**UsePublicUrl** (boolean)—Indicates whether the target should use the public URL

**APIVersion** (string)—Version of the OpenStack API

**HostName** (string)— host name of the OpenStack server

**OverridenUrl** (string)— Url to the OpenStack keystone endpoint.

**IgnoreCertificateErrors** (boolean)—Indicates whether the target should ignore any certificate errors

**Tenant** (String)—Specify the OpenStack project to connect to

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

String ID of the new target

## **CreateOracleDatabaseTarget**

Specifies the connection information for the Oracle database used for processes to run against

#### **Parameters**

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**DataSource** (string)—ODBC data source name

**SID** (string)—site identifier

**PortNumber** (string)—port number used by the protocol

**TNSAlias** (string)—name of your Oracle service. This is the name that is specified in the tnsnames.ora file that is defined for your Oracle client.

**DatabaseOwner** (string)—user that created the database

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

String ID of the new target

## CreateRemedyServerTarget

Specify the connection information to a Remedy server which is used for processes to run against. It is recommended that the Remedy target is defined before attempting to define any Remedy activities. The Remedy target accesses the list of properties on the Remedy server.

### Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**Server** (string)—host name or IP address of the Remedy server

**Authentication** (string)—string used by the client for authentication, such as domain name

**Port** (int)—port number used to access the Remedy server

**PollingInterval** (int)—interval used to query the Remedy system

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

String ID of the new target

## CreateServiceTarget

Creates a target that represents an IT or business service. The service target can be used by process authors when creating content within Cisco Process Orchestrator. The Service target is a specialized target that cannot be used against any activities or triggers in Cisco Process Orchestrator.

### Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**ServiceType** (string)—represents a "service" target. String value representing a service type. For example, *Bronze SQL Server* or *HR Portal*.

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

String ID of the new target

## CreateSnmpAgentTarget

Configures the host and operation and notification settings for accessing an SNMP agent

### Parameters

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**Host** (string)—host name or IP address of the SNMP agent

**PortNumber** (int)—listening SNMP port to be used by Cisco Process Orchestrator to execute SNMP GET/SNMP SET activities against the device

**GetRuntimeUser** (string)—credential properties that enable reading only from device

**SetRuntimeUser** (string)—credential properties that enable writing to device

**TrapRuntimeUser** (string)—credential properties that enable traps from the device

**EngineID** (string)—SNMP v3 agent engine ID that serves as a unique identifier for the agent

**ContextName** (string)—context name to be used during SNMP V3 operation

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

String ID of the new target

## CreateSnmpManagerTarget

Configures the host and security settings for sending traps to a SNMP server

### Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target

**Host** (string)—host name or IP address of the SNMP server

**PortNumber** (int)—listening port to be used by Cisco Process Orchestrator to send traps to the SNMP server

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

String ID of the new target



## CreateTerminalTarget

Specifies the connection information used to access the terminal host used for processes to run against

### Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target

**Host** (string)—DNS name or IP address of the terminal host

**Port** (int)—port number used to access the appropriate terminal target port (Default: SSH server: 22, Telnet server: 23)

**Protocol** (TransProtocolType)—target protocol which can be either SSH or TELNET

**PromptPrefix** (string)—command prompt prefix that will be used by the device type configurations and expects when issuing commands and connecting to the device. Adding a regex character, such as \$, >, and #, at the end of a prompt in the Prompt Prefix field invalidates the command prompt prefix.

**MaxConcurrentSessions** (int32)—maximum number of sessions a device can accept

**ExpectTemplateNameOrId** (string)—name or ID of the expect template

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

String ID of the new target

## CreateUcsManagerTarget

Specifies the connection information for the UCS Manager server used for processes to run against

### Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target

**UcsManagerHostName** (string)—host name of the UCS Manager server

**UcsManagerPortNumber** (int32)—port number used by the UCS Manager server

**IsHttps** (boolean)—indicates VMware target is configured for HTTPS

**IgnoreSSLCertError** (boolean)—indicates whether the target should ignore any SSL certificate errors

**TimeZoneNameOrId** (string)—instance-specific time zone setting used to ensure the correct time display

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

String ID of the new target

## CreateUnixTarget

Specifies the connection information for the SSH server used for processes to run against

### Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target

**Host** (string)—DNS name or IP address of selected server

**Port** (int)—port number used to access the appropriate Unix/Linux target port (Default: SSH server: 22, Telnet server: 23)

**Protocol** (TransProtocolType)—target protocol, which can be either SSH or TELNET

**KshPath** (string)—path on the host where Korn Shell (ksh) is located. The default path is /usr/bin/ksh, but some systems use a different path like /bin/ksh.

**PromptPrefix** (string)—command prompt prefix that will be used by the device type configurations and expects when issuing commands and connecting to the device. Adding a regex character, such as \$, >, and #, at the end of a prompt in the Prompt Prefix field invalidates the command prompt prefix.

**MaxConcurrentSessions** (int32)—maximum number of sessions the server can accept

**ExpectTemplateNameOrId** (string)—name or ID of the expect template

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

String ID of the new target

## CreateVCloudDirectorTarget

Specifies the connection information for the VCloud Director server used for processes to run against

### Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**UsePublicUrl** (boolean)—indicates whether the target should use the public URL

**HostName** (string)—host name or IP address of selected server

**PublicApiUrl** (string)—URL used to connect to the VCloud Director

**IgnoreCertificateErrors** (boolean)—indicates whether the target should ignore any certificate errors

**APIVersion** (string)—API version of the VCloud Director

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

String ID of the new target

## CreateVCTarget

Specifies the connection information to the VMware virtual center server target

Virtual Center Server provides unified management of all the hosts and VMs in your datacenter from a single console with an aggregate performance monitoring of clusters, hosts and VMs.

### Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**VirtualCenterESXServerName** (string)—host name or IP address of the Virtual Center/ESX Server

**VirtualCenterESXServerServicePort** (int)—port number used to access the Virtual Center/ESX Server service

**IsHttps** (boolean)—indicates VMware target is configured for HTTPS

**IsSSLCertificateErrorIgnored** (boolean)—indicates whether the target should ignore any SSL certificate errors

**ConnectionLanguage** (string)—default language to use when connecting to the server

**UseDefaultLanguage** (boolean)—indicates whether the target should use the default language when connecting to the server

**ConnectionOverrideLanguage** (string)—alternative language to use when connecting to the server

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

String ID of the new target

## CreateWebTarget

Configures a target for execution by a Web service activity on which a web site may be hosted on several machines. The target allows an activity to execute against the specified URL address.

## Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**BaseUrl** (string)—target URL to use as a base for execution

**IgnoreCertificateErrors** (boolean)—indicates whether the target should ignore any certificate errors

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

## Return Type

String ID of the new target

## CreateWindowsTarget

Specifies the connection information for the Windows computer used for processes to run against

If Windows 2008 is used as the target, then the Windows firewall settings need to be adjusted in order to allow Windows Management Instrumentation (WMI) to pass through.

## Parameters

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**ComputerName** (string)—name of the computer (Local computer name, DNS name, NetBIOS name, IP address)

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

## Return Type

String ID of the new target

## Updating Targets

The Update Targets Web services allow users to update existing targets for specific Cisco Process Orchestrator target types.

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**Note:** Any use of an ambiguous name as the target identifier will result in an error being returned. For example, if two different targets are each named “name,” Cisco Process Orchestrator will not be able to choose which target the user intends to update.

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The following topics describe how to update targets for specific Cisco Process Orchestrator target types.

### DeleteTarget

Deletes any type of defined target in Cisco Process Orchestrator

#### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

#### Return Type

None

### EnableOrDisableTarget

Enables or disables a specified target in Cisco Process Orchestrator using a Boolean operator that determines whether the target will be enabled or disabled

#### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**enable** (bool)—*True* or *False* determines whether the target will be enabled or disabled

#### Return Type

None

### UpdateActiveDirectoryDomainTarget

Updates the connection information for the Active Directory Domain server used for processes to run against

#### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**ConnectionString** (string)—Active Directory authentication string

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

## Return Type

None

## UpdateAMQPBrokerTarget

Updates the connection information for the AMQP Broker server used for processes to run against

### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**Host** (string)—host name of the AMQP Broker server

**Port** (string)—port number used by the protocol

**VirtualHost** (string)—name of the virtual host that specifies the namespace for entities (exchanges and queues) referred to by the protocol

**IgnoreCertificateErrors** (boolean)—indicates whether the target should ignore any certificate errors

**UseSSL** (boolean)—indicates whether the target should use SSL

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

## Return Type

None

## UpdateAzureServerTarget

Updates the connection information for the Azure Service Bus server used for processes to run against

### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**Namespace** (string)—namespace for Azure Service Bus

**ServiceBusForWindowsServer** (string)—name of the host that specifies the namespace for entities referred to by the protocol

**RuntimePortNumber** (string)—runtime port number used by the protocol

**ManagementPortNumber** (string)—management port number used by the protocol

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### Return Type

None

## UpdateCiscoServicePortalTarget

Updates the connection information for the Cisco Prime Service Catalog server used for processes to run against

#### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**DefaultRuntimeUserNameOrId** (string)—display name or unique identifier of the runtime user used to access *Request Center*

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**ServiceLinkRuntimeUserNameOrId** (string)—display name or unique identifier of the runtime user used to access *Service Link*.

**Server** (string)—host name or IP address where *Request Center* resides.

**ServiceLinkServer** (string)—host name or IP address where *Service Link* resides.

**UseSSL** (boolean)—indicates whether the target should use SSL to access *Request Center*

**ServiceLinkUseSSL** (boolean)—indicates whether the target should use SSL to access *Service Link*

**IgnoreCertificateErrors** (boolean)—indicates whether the target should ignore any certificate errors when accessing *Request Center*

**ServiceLinkIgnoreCertificateErrors** (boolean)—indicates whether the target should ignore any certificate errors when accessing *Service Link*

**ServiceLinkPort** (int32)—port number to access *Service Link*

**RequestCenterPort** (int32)—port number to access *Request Center*

**PublicKeyGuid** (Guid)—ID to the entry that contains the *Cisco Process Orchestrator* encryption public key stored in *Cisco Prime Service Catalog*

**EnabledServiceLinkConnection** (boolean)—indicates if service link connection information is provided.

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### Return Type

None

## UpdateCiscoUCSDirectorTarget

Updates the connection information for the Cisco UCS Director server used for processes to run against

## Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**Server** (string)—host name or IP address of the Cisco Prime Service Catalog server

**UseSSL** (boolean)—indicates whether the target should use SSL

**IgnoreCertificateErrors** (boolean)—indicates whether the target should ignore any certificate errors

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

## Return Type

None

## UpdateCloudCenterServerTarget

Updates the connection information for the Cisco UCS Director server used for processes to run against

### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**HostName** (string)—host name or IP address of the Cisco Cloud Center server

**HttpPort** (string)—port number used to access Cisco Cloud Center server

**IgnoreCertificateErrors** (boolean)—indicates whether the target should ignore any certificate errors

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

None

## UpdateEmailIMAPTarget

Updates the connection information to an IMAP email server target

### Parameters



**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**EmailServer** (string)—DNS name or IP address of the IMAP server

**Port** (string)—port number used by the protocol

**EnableTLSAuthentication** (boolean)—indicate whether Transport Layer Security (TLS) authentication is enabled

**EnableSSL** (boolean) – indicate whether SSL is enabled

**PollingInterval** (int) – interval used to query the email server

**IgnoreCertificateError** (boolean)—indicates whether the target should ignore any certificate errors

**EnableServerPush** (boolean)—indicates whether to poll for emails from email server or subscribe to email server for email notification. Note that not all email servers have this option enabled.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

None

## **UpdateEmailPOP3Target**

Updates the connection information to a POP3 email server target

#### **Parameters**

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**EmailServer** (string)—DNS name or IP address of the POP3 server

**Port** (string)—port number used by the protocol

**EnableTLSAuthentication** (boolean)—indicate whether Transport Layer Security (TLS) authentication is enabled

**EnableSSL** (boolean) – indicate whether SSL is enabled

**PollingInterval** (int) – interval used to query the email server

**IgnoreCertificateError** (boolean)—indicates whether the target should ignore any certificate errors

**EnableServerPush** (boolean)—Not applicable

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

None

## UpdateEmailSMTPTarget

Updates the connection information to a SMTP email server

### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target

**SMTPServer** (string)—DNS name or IP address of the SMTP gateway to use for sending email messages

**SMTPPort** (int32)—port used in the DNS name or IP address of the SMTP gateway

**Sender** (string)—email message address of the sender

**CredentialRequired** (boolean)—indicates if authentication credentials are required

**EnableDigitalSignature** (boolean)—indicates if authentication credentials are required

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

None

## UpdateESXTarget

Updates the connection information to a VMware ESX server target

### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**VirtualCenterESXServerName** (string)—host name or IP address of the Virtual Center/ESX Server

**VirtualCenterESXServerServicePort** (int)—port number used to access the Virtual Center/ESX Server service

**IsHttps** (bool)—indicates VMware target is configured for HTTPS

**IsSSLCertificateErrorIgnored** (boolean)—indicates whether the target should ignore any SSL certificate errors

**ConnectionLanguage** (string)—default language to use when connecting to the server

**UseDefaultLanguage** (boolean)—indicates whether the target should use the default language when connecting to the server

**ConnectionOverrideLanguage** (string)—alternative language to use when connecting to the server

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### Return Type

None

## UpdateGitRepositoryTarget

Update the connection information to a GitHub repository used for saving or loading automation pack.

#### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**BaseUrl** (string)—URL to access the GitHub repository

**CodePath** (string)—Relative path within a repository

**Branch** (string)—Branch of the GitHub repository

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### Return Type

None

## UpdateNetworkDeviceModuleTarget

Updates a network device module target which can be used as a dependent of a terminal target

#### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**SwitchNumber** (string)—switch number for the chassis system

**SlotNumber** (string)—slot number on which the network device module resides

**ProcessorID** (string)—processor Id on which the network device module resides

**ChassisSystem** (string)—display name or target ID of the terminal target on which the network module resides

**PromptPrefix** (string)—command prompt prefix that will be used by the device type configurations and expects when issuing commands and connecting to the device. Adding a regex character, such as \$, >, and #, at the end of a prompt in the Prompt Prefix field invalidates the command prompt prefix.

**ExpectTemplateNameOrId** (string)—name or ID of the expect template

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

None

## **UpdateOpenStackTarget**

Update the connection information to an OpenStack server target

#### **Parameters**

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**UsePublicUrl** (boolean)—Indicates whether the target should use the public URL

**APIVersion** (string)—Version of the OpenStack API

**HostName** (string)— host name of the OpenStack server

**OverridenUrl** (string)— Url to the OpenStack keystone endpoint.

**IgnoreCertificateErrors** (boolean)—Indicates whether the target should ignore any certificate errors

**Tenant** (String)—OpenStack project name

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

None

## **UpdateOracleDatabaseTarget**

Updates the connection information for the Oracle database used for processes to run against

#### **Parameters**

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**DataSource** (string)—ODBC data source name

**SID** (string)—Site identifier

**PortNumber** (string)—port number used by the protocol

**TNSAlias** (string)—name of your Oracle service. This is the name that is specified in the tnsnames.ora file that is defined for your Oracle client.

**DatabaseOwner** (string)—user that created the database

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

None

## **UpdateRemedyServerTarget**

Updates the connection information to a Remedy server target

#### **Parameters**

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**Server** (string)—host name or IP address of the Remedy server

**Authentication** (string)—string used by the client for authentication, such as domain name

**Port** (int)—port number used to access the Remedy server

**PollingInterval** (int)—interval used to query the Remedy system

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

None

## UpdateServiceTarget

Updates a target that represents an IT or business service

### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**ServiceType** (string)—represents a "service" target. String value representing a service type. For example, *Bronze SQL Server* or *HR Portal*.

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

None

## UpdateSnmpAgentTarget

Updates the host and operation and notification settings for accessing an SNMP agent

### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**Host** (string)—host name or IP address of the SNMP agent

**PortNumber** (int)—listening SNMP port to be used by Cisco Process Orchestrator to execute SNMP GET/SNMP SET activities against the device

**GetRuntimeUser** (string)—credential properties that enable reading only from device

**SetRuntimeUser** (string)—credential properties that enable writing to device

**TrapRuntimeUser** (string)—credential properties that enable traps from the device

**EngineID** (string)—SNMP v3 agent engine ID that serves as a unique identifier for the agent.

**ContextName** (string)—context name to be used during SNMP V3 operation

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

None

## UpdateSnmpManagerTarget

Updates the host and security settings for sending traps to a SNMP server

### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**Host** (string)—host name or IP address of the SNMP server

**PortNumber** (int)—listening port to be used by Cisco Process Orchestrator to send traps to the SNMP server

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

None

## UpdateTerminalTarget

Updates the connection information used to access the terminal host used for a terminal target

### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**Host** (string)—DNS name or IP address of the terminal host

**Port** (int)—port number used to access the appropriate terminal target port (Default: SSH server: 22, Telnet server: 23)

**Protocol** (TransProtocolType)—target protocol which can be either SSH or TELNET

**PromptPrefix** (string)—command prompt prefix that will be used by the device type configurations and expects when issuing commands and connecting to the device. Adding a regex character, such as \$, >, and #, at the end of a prompt in the Prompt Prefix field invalidates the command prompt prefix.

**MaxConcurrentSessions** (int32)—maximum number of sessions a device can accept

**ExpectTemplateNameOrId** (string)—name or ID of the expect template

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### Return Type

None

## UpdateUcsManagerTarget

Updates the connection information for the UCS Manager server used for processes to run against

#### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**UcsManagerHostName** (string)—host name of the UCS Manager server

**UcsManagerPortNumber** (int32)—port number used by the UCS Manager server

**IsHttps** (boolean)—indicates VMware target is configured for HTTPS

**IgnoreSSLCertError** (boolean)—indicates whether the target should ignore any SSL certificate errors

**TimeZoneNameOrId** (string)—instance-specific time zone setting used to ensure the correct time display

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### Return Type

String ID of the new target

## UpdateUnixTarget

Updates the connection information for the SSH server used for processes to run against

#### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**Host** (string)—DNS name or IP address of selected server

**Port** (int)—port number used to access the appropriate Unix/Linux target port (Default: SSH server: 22, Telnet server: 23)

**Protocol** (TransProtocolType)—target protocol, which can be either SSH or TELNET

**KshPath** (string)—path on the host where Korn Shell (ksh) is located. The default path is /usr/bin/ksh, but some systems use a different path like /bin/ksh.



**PromptPrefix** (string)—command prompt prefix that will be used by the device type configurations and expects when issuing commands and connecting to the device. Adding a regex character, such as \$, >, and #, at the end of a prompt in the Prompt Prefix field invalidates the command prompt prefix.

**MaxConcurrentSessions** (int32)—maximum number of sessions the server can accept

**ExpectTemplateNameOrId** (string)—name or ID of the expect template

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

None

## UpdateVCloudDirectorTarget

Updates the connection information for the VCloud Director server used for processes to run against

### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**UsePublicUrl** (boolean)—indicates whether the target should use the public URL

**HostName** (string)—host name or IP address of selected server

**PublicApiUrl** (string)—URL used to connect to the VCloud Director

**IgnoreCertificateErrors** (boolean)—indicates whether the target should ignore any certificate errors

**APIVersion** (string)—API version of the VCloud Director

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

None

## UpdateVCTarget

Updates the connection information to the VMware virtual center server target

### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**VirtualCenterESXServerName** (string)—host name or IP address of the Virtual Center/ESX Server

**VirtualCenterESXServerServicePort** (int)—port number used to access the Virtual Center/ESX Server service

**IsHttps** (boolean)—indicates VMware target is configured for HTTPS

**IsSSLCertificateErrorIgnored** (boolean)—indicates whether the target should ignore any SSL certificate errors

**ConnectionLanguage** (string)—default language to use when connecting to the server

**UseDefaultLanguage** (boolean)—indicates whether the target should use the default language when connecting to the server

**ConnectionOverrideLanguage** (string)—alternative language to use when connecting to the server

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

None

## **UpdateWebTarget**

Updates the properties used target for execution by a Web service activity on which a web site may be hosted on several machines

#### **Parameters**

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**BaseUrl** (string)—target URL to use as a base for execution

**IgnoreCertificateErrors** (boolean)—indicates whether the target should ignore any certificate errors

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

#### **Return Type**

None

## UpdateWindowsTarget

Updates the connection information for the Windows computer target used for processes to run against

### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find this target

**defaultRuntimeUserNameOrId** (string)—display name or unique identifier of the default runtime user that should be associated with this target

**Validate** (boolean)—when validate is set to true, the adapter verifies specified connection information by connecting to the target.

**ComputerName** (string)—name of the computer (Local computer name, DNS name, NetBIOS name, IP address)

**Enabled** (boolean)—indicates if this target is enabled for execution. Targets that are not enabled are not available for execution.

**Name** (string)—display name of the target

**Description** (string)—text that describes the target

**Organization** (string)—name of the company that supports the target

### Return Type

None

## ViewingTargets

The View Targets Web services allow users to view the properties of existing targets for specific Cisco Process Orchestrator target types.

This section describes how to update targets for specific Cisco Process Orchestrator target types.

### ListTargets

Retrieves the list of defined targets in Cisco Process Orchestrator

#### Parameters

**nameFilter** (string)—A filter that will be applied to the display names of these objects. This filter may contain the "\*" wildcard character

**typeFilter** (string)—A filter that will be applied to the type names of these objects. This filter may contain the "\*" wildcard character

#### Return Type

TargetDefinition[]

### View[UniqueTargetType]TargetProperties

Users can view properties of a target that is defined in Cisco Process Orchestrator.

#### Parameters

**targetNameOrId** (string)—display name or unique identifier that will be used to find the target

#### Return Type

[UniqueTargetType]TargetConfigurationData

# Runtime User Web Service

---

This Web service allows users to create, update, and view specific runtime users in Cisco Process Orchestrator.

The WSDL for the Runtime User Web service is <http://<server>:<port>/WS/RuntimeUser?wsdl>.

## Creating Runtime Users

The following topics describe how to create runtime users in Cisco Process Orchestrator.

Note:

- For the APIs that have both Password & EncryptedPassword. Only 1 of the 2 should be specified. If you specify password as plaintext, use the Password parameter. If you have the password encrypted with the Process Orchestrator server public key, use the EncryptedPassword parameter to specify the encrypted password.
- Since most users do not have the encrypted password to specify, I'll not include the EncryptedPassword parameter in the all the API documentation below.

### CreateAzureAccessKeyConfiguration

Specifies the security credentials for a runtime user that can be assigned to processes and activities for different adapters

#### Parameters

**Validate** (boolean)—indicates if the runtime user credentials are validated

**SharedAccessKeyName** (string)—shared access key name to access Azure Service Bus server

**SharedAccessKey** (string)—shared access key to access Azure Service Bus server

**UserName** (string)—not used

**Name** (string)—display name of the runtime user

**Password** (string)—not used

**Description** (string)—text that describes the object

#### Return Type

string

### CreateClientCertificateUserConfiguration

Specifies the user administrative credentials required to configure client certificates

#### Parameters

**Validate** (boolean)—indicates if the runtime user credentials are validated

**RawData** (string)—raw data of the certificate

---

**Note:** The RawData is expected to be a Base64 string returned by the following sequence of calls in C#:  
X509Certificate2 cert = new X509Certificate2(filePath, password,X509KeyStorageFlags.Exportable);  
byte[] bytes = cert.Export(X509ContentType.Pfx, "");  
string rawDataString = Convert.ToBase64String(bytes);

---

**UserName** (string)—user name that will be associated with this user object

**Name** (string)—display name of the runtime user

**Password** (string)—password for this user account

**Description** (string)—text that describes the runtime user

**Return Type**

string

## CreateCloudCenterApiAccessCredentialsConfiguration

Specifies the security credentials for a runtime user that can be assigned to processes and activities for different adapters

**Parameters**

**Validate** (boolean)—indicates if the runtime user credentials are validated

**ApiKey** (string)—API key to access Cloud Center server

**UserName** (string)—user name to access Cloud Center server

**Name** (string)—display name of the runtime user

**Password** (string)—not used

**Description** (string)—text that describes the object

**Return Type**

string

## CreateCloudPortalUser

Specifies the credentials for a Cisco Prime Service Catalog runtime user.

**Parameters**

**EnableTokenAuth** (boolean)—indicates if token authentication should be used.

**AllowPersistentToken** (boolean)—indicates if persistent token should be used

**AllowAPIToken** (boolean)—indicates if API token should be used

**UserName** (string)—username of the credentials that can access Cisco Prime Service Catalog

**Password** (string)—password of the credentials that can access Cisco Prime Service Catalog

**Name** (string)—display name of the runtime user

**Description** (string)—text that describes the object

**Return Type**

string

## CreateGenericUser

Specifies the security credentials for a runtime user that can be assigned to processes and activities for different adapters

**Parameters**

**Validate** (boolean)—indicates if the runtime user credentials are validated

**UserName** (string)—user name that will be associated with this user object

**Name** (string)—display name of the runtime user

**Password** (string)—password for this user account

**Description** (string)—text that describes the object

**Return Type**

string

## CreateIOSUserConfiguration

Specifies the user administrative credentials required to access a Cisco IOS Device. The level of access for the Cisco IOS device is dependent upon the type of password used.

**Parameters**

**Validate** (boolean)—indicates if the runtime user credentials are validated

**AdminPassword** (string)—password for the administrator

**UserName** (string)—user name that will be associated with this user object

**Name** (string)—display name of the runtime user

**Password** (string)—password for this user account

**Description** (string)—text that describes the object

**Return Type**

string

## CreateOAuthUserConfiguration

Specifies the credentials for a client certificate runtime user.

**Parameters**

**Validate** (boolean)—indicates if the runtime user credentials are validated

**UserName** (string)—user name that will be associated with this user object

**Name** (string)—display name of the runtime user

**Password** (string)—password for this user account

**Description** (string)—text that describes the object

**Return Type**

string

## CreateOpenStackUser

Specifies the credentials for an OpenStack runtime user.

**Parameters**

**Validate** (boolean)—indicates if the runtime user credentials are validated

**UserName** (string)—user name that will be associated with this user object

**Name** (string)—display name of the runtime user

**Password** (string)—password for this user account

**Description** (string)—text that describes the object

### Return Type

string

## CreatePublicKeyAdminUserConfiguration

Specifies the credentials required to allow public key authentication and an administrative password to perform privileged operations.

If a target has set up public key authentication on the remote SSH server, the private key of the Public-key Authenticated Admin Runtime User will be used to form the SSH authentication request. The request is then authenticated against the stored public key on the remote server. It requires user level public key authentication as opposed to host level public key authentication.

If the target does not allow public key authentication, the SSH authentication will fail.

### Parameters

**Validate** (boolean)—indicates if the runtime user credentials are validated

**AdminPassword** (string)—password for the administrator

**PrivateKeyPassphrase**—private key passphrase used for authentication

**PrivateKey**—private key used for authentication

**UserName** (string)—user name that will be associated with this user object

**Name** (string)—display name of the runtime user

**Password** (string)—password assigned to access Privileged EXEC mode on the device. The Privileged EXEC mode provides the highest level of commands to users

**Description** (string)—text that describes the object

### Return Type

string

## CreateSnmpUserConfiguration

Specifies the credentials for a SNMP runtime user to be used to assign run options for SNMP processes or activities

### Parameters

**Validate** (boolean)—indicates if the runtime user credentials are validated

**SnmpVersion** (SnmpVersion)—appropriate SNMP version (SNMPv1, SNMPv2c, SNMPv3), case sensitive

**Community** (string)—indicates the relationship between the SNMP server system and the client system

**SecurityLevel** (SnmpSecurityLevels)—security level assigned to the user (noAuthNoPriv, authNoPriv, authPriv), case sensitive

**AuthenticationProtocol** (SnmpAuthenticationProtocol)—protocol used for authentication for authNoPriv or authPriv security levels (SHA, MD5), case sensitive

**PrivacyProtocol** (SnmpPrivacyProtocol)—format for transmitting encrypting data between the two devices for the security level authPriv. (DES, 3DES, AES128, AES256), case sensitive

**EncryptedAuthenticationKey** (string)—password used for authentication



**EncryptedPrivacyKey** (string)—password used for encrypting data

**UserName** (string)—user name that will be associated with this user object.

**Name** (string)—display name of the runtime user

**Password** (string)—password for this user account

**Description** (string)—text that describes the object

**Return Type**

string

## CreateVCloudDirectorUser

Specify the credentials required to access a VCloud Director

**Parameters**

**Validate** (boolean)—indicates if the runtime user credentials are validated

**UserType** (vCloudUserType)—System or Organization

**Organization** (string)—name of the company that supports the runtime user

**UserName** (string)—user name that will be associated with this user object

**Name** (string)—display name of the runtime user

**Password** (string)—password for this user account

**Description** (string)—text that describes the object

**Return Type**

string

## CreateWindowsUser

Specify the credentials for a Windows user to be used to assign run options for processes or activities

**Parameters**

**Validate** (boolean)—indicates if the runtime user credentials are validated

**Domain** (string)—Windows domain in which the user account resides

**UserName** (string)—user name that will be associated with this user object

**Name** (string)—display name of the runtime user

**Password** (string)—password for this user account

**Description** (string)—text that describes the object

**Return Type**

String

## Updating Runtime Users

This section describes how to update existing runtime users in Cisco Process Orchestrator.

### DeleteRuntimeUser

Deletes a runtime user based on the name or the provided name

#### Parameters

**runtimeUserNameOrId** (string)—display name or id of the runtime user

#### Return Type

None

### UpdateAzureAccessKeyConfiguration

Updates the security credentials for a runtime user that can be assigned to processes and activities for different adapters

#### Parameters

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Validate** (boolean)—indicates if the runtime user credentials are validated

**SharedAccessKeyName** (string)—shared access key name to access Azure Service Bus server

**SharedAccessKey** (string)—shared access key to access Azure Service Bus server

**UserName** (string)—not used

**Name** (string)—display name of the runtime user

**Password** (string)—not used

**Description** (string)—text that describes the object

#### Return Type

string

### UpdateClientCertificateUserConfiguration

Updates the user administrative credentials required to configure client certificates

#### Parameters

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Validate** (boolean)—indicates if the runtime user credentials are validated

**RawData** (string)—raw data of the certificate.

---

#### Note:

The RawData is expected to be a Base64 string returned by the following sequence of calls in C#:

```
X509Certificate2 cert = new X509Certificate2(filePath, password,X509KeyStorageFlags.Exportable);  
byte[] bytes = cert.Export(X509ContentType.Pfx, "");  
string rawDataString = Convert.ToBase64String(bytes);
```

---

**UserName** (string)—user name that will be associated with this user object

**Name** (string)—name of the object

**Password** (string)—password for this user account

**Description** (string)—text that describes the runtime user

**Return Type**

string

## UpdateCloudCenterApiAccessCredentialsConfiguration

Specifies the security credentials for a runtime user that can be assigned to processes and activities for different adapters

**Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Validate** (boolean)—indicates if the runtime user credentials are validated

**ApiKey** (string)—API key to access Cloud Center server

**UserName** (string)—user name to access Cloud Center server

**Name** (string)—display name of the runtime user

**Password** (string)—not used

**Description** (string)—text that describes the object

**Return Type**

string

## UpdateCloudPortalUser

Specifies the credentials for a Cisco Prime Service Catalog runtime user.

**Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**EnableTokenAuth** (boolean)—indicates if token authentication should be used.

**AllowPersistentToken** (boolean)—indicates if persistent token should be used

**AllowAPIToken** (boolean)—indicates if API token should be used

**UserName** (string)—username of the credentials that can access Cisco Prime Service Catalog

**Password** (string)—password of the credentials that can access Cisco Prime Service Catalog

**Name** (string)—display name of the runtime user

**Description** (string)—text that describes the object

**Return Type**

string

## UpdateGenericUser

Updates the security credentials for a generic runtime user

**Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Validate** (boolean)—indicates if the runtime user credentials are validated

**UserName** (string)—user name that is associated with this user object

**Name** (string)—name of the object

**Password** (string)—password for this user account

**Description** (string)—text that describes the object

**Return Type**

None

## UpdateIOSUserConfiguration

Updates the user administrative credentials required to access a Cisco IOS Device

**Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Validate** (boolean)—indicates if the runtime user credentials are validated

**AdminPassword** (string)—password for the administrator

**UserName** (string)—user name that will be associated with this user object

**Name** (string)—name of the object

**Password** (string)—password for this user account

**Description** (string)—text that describes the object

**Return Type**

None

## UpdateOAuthUserConfiguration

Updates the credentials for a client certificate runtime user

**Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Validate** (boolean)—indicates if the runtime user credentials are validated

**UserName** (string)—user name that will be associated with this user object

**Name** (string)—name of the object

**Password** (string)—password for this user account

**Description** (string)—text that describes the object

**Return Type**

None

## UpdateOpenStackUser

Updates the credentials for an OpenStack runtime user

**Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Validate** (boolean)—indicates if the runtime user credentials are validated

**UserName** (string)—user name that will be associated with this user object

**Name** (string)—name of the object

**Password** (string)—password for this user account

**Description** (string)—text that describes the object

#### **Return Type**

None

## **UpdatePublicKeyAdminUserConfiguration**

Updates the credentials required to allow public key authentication and an administrative password to perform privileged operations

#### **Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Validate** (boolean)—indicates if the runtime user credentials are validated

**AdminPassword** (string)—password for the administrator

**PrivateKeyPassphrase**—private key passphrase used for authentication

**PrivateKey**—private key used for authentication

**UserName** (string)—user name that will be associated with this user object

**Name** (string)—name of the object

**Password** (string)—password assigned to access Privileged EXEC mode on the device. The Privileged EXEC mode provides the highest level of commands to users

**Description** (string)—text that describes the object

#### **Return Type**

None

## **UpdateSnmpUserConfiguration**

Updates the credentials for a SNMP runtime user to be used to assign run options for SNMP processes or activities

#### **Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Validate** (boolean)—indicates if the runtime user credentials are validated

**SnmpVersion** (SnmpVersion)—appropriate SNMP version (SNMPv1, SNMPv2c, SNMPv3), case sensitive

**Community** (string)—indicates the relationship between the SNMP server system and the client system

**SecurityLevel** (SnmpSecurityLevels)—security level assigned to the user (noAuthNoPriv, authNoPriv, authPriv), case sensitive

**AuthenticationProtocol** (SnmpAuthenticationProtocol)—protocol used for authentication for authNoPriv or authPriv security levels (SHA, MD5), case sensitive

**PrivacyProtocol** (SnmpprivacyProtocol)—format for transmitting encrypting data between the two devices for the security level *authPriv*. (DES, 3DES, AES128, AES256), case sensitive

**EncryptedAuthenticationKey** (string)—password used for authentication

**EncryptedPrivacyKey** (string)—password used for encrypting data

**UserName** (string)—user name that will be associated with this user object.

**Name** (string)—name of the object

**Password** (string)—password for this user account

**Description** (string)—text that describes the object

#### **Return Type**

None

## **UpdateVCloudDirectorUser**

Updates the credentials required to access a VCloud Director

#### **Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Validate** (boolean)—indicates if the runtime user credentials are validated

**UserType** (vCloudUserType)—System or Organization

**Organization** (string)—name of the company that supports the runtime user

**UserName** (string)—user name that will be associated with this user object

**Name** (string)—name of the object

**Password** (string)—password for this user account

**Description** (string)—text that describes the object

#### **Return Type**

string

## **UpdateWindowsUser**

Updates the credentials for a Windows user to be used to assign run options for processes or activities

#### **Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Domain** (string)—Windows domain in which the user account resides

**UserName** (string)—user name that will be associated with this user object

**Name** (string)—name of the object

**Password** (string)—password for this user account

**Description** (string)—text that describes the object

#### **Return Type**

None

## Viewing Runtime Users

This section describes how to review the properties of existing runtime users in Cisco Process Orchestrator.

### ListRuntimeUsers

Retrieves the list of defined runtime users in Cisco Process Orchestrator

#### Parameters

**nameFilter** (string)—filter that will be applied to the display names of these objects. This filter may contain the "\*" wildcard character.

**typeFilter** (string)—filter that will be applied to the type names of these objects. This filter may contain the "\*" wildcard character.

#### Return Type

RuntimeUserDefinition[]

### ViewAzureAccessKeyConfigurationProperties

View the configuration properties for an Azure access key

#### Parameters

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

#### Return Type

AzureAccessKeyConfigurationData

### ViewClientCertificateUserConfigurationProperties

View the configuration properties for Client Certificate

#### Parameters

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

#### Return Type

ClientCertificateUserConfigurationData

### ViewCloudCenterApiAccessCredentialsConfigurationProperties

View the configuration properties for Cloud Center API access key

#### Parameters

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

#### Return Type

CloudCenterApiAccessCredentialsConfigurationData

### ViewCloudPortalUserProperties

View the configuration properties for Cisco Prime Service Catalog runtime user

#### Parameters

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Return Type**

CloudPortalUserData

## ViewGenericUserProperties

View the configuration properties of a runtime user

**Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Return Type**

GenericRuntimeUserConfigurationData

## ViewGitRepositoryUserProperties

View the configuration properties for the Git Repository user.

**Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Return Type**

GitRepositoryRuntimeUserConfigurationData

## ViewIOSUserConfigurationProperties

View the configuration properties for the IOS user.

**Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Return Type**

IOSUserConfigurationData

## ViewOAuthUserConfigurationProperties

View the configuration properties for the oAuth user.

**Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Return Type**

OAuthUserConfigurationData

## ViewOpenStackUserProperties

View the configuration properties for the oAuth user.

**Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user



**Return Type**

OpenStackUserData

**ViewPublicKeyAdminUserConfigurationProperties**

View the configuration properties for public key administrator

**Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Return Type**

PublicKeyAdminUserConfigurationData

**ViewSnmpUserProperties**

View the SNMP user configuration properties

**Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Return Type**

SnmpUserConfigurationData

**ViewVCloudDirectorUserProperties**

View the VCloud Direct user configuration properties

**Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Return Type**

VCloudDirectorUserData

**ViewWindowsUserProperties**

Retrieves the properties of a defined Windows user account in Cisco Process Orchestrator

**Parameters**

**userNameOrId** (string)—display name or unique identifier that will be used to find this user

**Return Type**

WindowsUserConfigurationData

# Task Web Service

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This Web service allows users to create, update, and view specific task in Cisco Process Orchestrator.

The WSDL for the Task Web service is located at the following location: <http://<server>:<port>/WS/Task?wsdl>

## Creating Tasks

The following topics describe how to create tasks for Cisco Process Orchestrator.

### CreateAlertTask

Creates an alert regarding any potential problems

An alert reflects potential problems that a user may want to investigate and possibly diagnose the problem.

#### Parameters

**AlertClass** (int)—incident identifier for the alert

**DuplicateTaskId** (Guid)—Task ID of the duplicated alert

**WebFormXSLFileName** (string)—name of the source XML text file to transform the task XML into HTML for viewing in the Web Console

**ItilStatus** (ItilTaskStatus)—status of the task (New, Assigned, Pending, InProgress, Canceled, Duplicate, Resolved, Closed)

**AffectedTargetConfigurationItemId** (Guid)—System ID on which the condition was detected

**ConfigurationItemId** (Guid)—IT component to which the alert pertains

**AffectedServices** (string)—IT Service affected by the alert or incident

**AffectedOrganizations** (string)—organizations that consume the IT service affected by the alert or incident

**Severity** (ItilTechnicalSeverity)—severity of the task (Low, Normal, High)

**AutomationSummary** (string)—file path for the related automation summary

**Name** (string)—name of the object

**Description** (string)—text that describes the object

**DueDate** (string)—indicates the time period the task should be resolved. Note that this is the date AND time in UTC when the task is due.

**ExpirationDate** (string)—when the task expires. Note that this is the date AND time in UTC when the task expired.

**CompletedTime** (string)—indicates the time period the task was completed. Note that this is the date AND time in UTC when the task is completed.

**Priority** (TaskPriority)—indicates the priority of the task (Low, Medium, High)

**NotificationRecipients** (List<Collection of strings>)—list of recipients to be notified about the task

**ExternalSystem** (string)—external system for the task

**ExternalId** (string)—external Id for the task

**RelatedTaskIds** (List<Collection of Guids>)—Task ID of the related task

**CategoryIds** (List<Collection of Guids>)—categories that this task directly belongs to, if any. Note that this does not include categories that the process has an INdirect membership in, such as in the case of a category within a category.

**Parameters** (List<NamedParameter>)—collection of named parameters. The named parameter is a generic name/value pair that can be used for any task to add extra information.

#### **Return Type**

string

## **CreateApprovalTask**

Specifies the user or group required to approve a task including the message associated for the approver

#### **Parameters**

**Message** (string)—informs the approver what is being requested

**ApprovalChoiceIndex** (int)—0-based index of the approval choices in the task

**AutomationSummary** (string)—file path for the related automation summary

**ApprovalChoices** (List<Collection of strings>)—choices available to the approver

**ApprovalStatus** (ApprovalTaskStatus)—current status of the task (New, Assigned, Pending, InProgress, Waiting, Canceled, Completed)

**WebFormXSLFileName** (string)—name of the source XML text file to transform the task XML into HTML for viewing in the Web Console

**Name** (string)—name of the object

**Description** (string)—text that describes the object

**DueDate** (string)—indicates the time period the task should be resolved. Note that this is the date AND time in UTC when the task is due.

**ExpirationDate** (string)—when the task expires. Note that this is the date AND time in UTC when the task expired.

**CompletedTime** (string)—indicates the time period the task was completed. Note that this is the date AND time in UTC when the task is completed.

**Priority** (TaskPriority)—indicates the priority of the task (Low, Medium, High)

**NotificationRecipients** (List<Collection of strings>)—list of recipients to be notified about the task

**ExternalSystem** (string)—external system for the task

**ExternalId** (string)—external Id for the task

**RelatedTaskIds** (List<Collection of Guid>)—Task ID of the related task

**CategoryIds** (List<Collection of Guid>)—categories that this task directly belongs to, if any. Note that this does not include categories that the process has an INdirect membership in, such as in the case of a category within a category.

**Parameters** (List<NamedParameter>)—collection of named parameters. The named parameter is a generic name/value pair that can be used for any task to add extra information.

#### **Return Type**

string

## **CreateChangeRequestTask**

Requests a modification to the configuration of an object or system

The change requests are used to request system enhancements, report problems with a system, or report changes from one system which affects another system.

## Parameters

**ChangeRequestClass** (int)—identifier for the change request

**ChangeStatus** (ChangeRequestTaskStatus)—current status of the task (New, Assigned, AuthorizationPending, AuthorizationDenied, Authorized, ChangeInProgress, ChangeComplete, Canceled, Duplicate)

**ChangeRequestIdentifier** (string)—Cisco Process Orchestrator generated ID number for the change request task

**ReasonForChange** (string)—describes the business justification for the request

**ChangeTiming** (string)—deadline date or time for the change

**WebFormXSLFileName** (string)—name of the source XML text file to transform the task XML into HTML for viewing in the Web Console

**AffectedTargetConfigurationItemId** (Guid)—System ID on which the condition was detected

**ConfigurationItemId** (Guid)—IT component to which the alert pertains.

**AffectedServices** (string)—IT Service affected by the alert or incident

**AffectedOrganizations** (string)—organizations that consume the IT service affected by the alert or incident

**Severity** (ItilTechnicalSeverity)—severity of the task (Low, Normal, High)

**AutomationSummary** (string)—file path for the related automation summary

**Name** (string)—name of the object

**Description** (string)—text that describes the object

**DueDate** (string)—indicates the time period the task should be resolved. Note that this is the date AND time in UTC when the task is due.

**ExpirationDate** (string)—when the task expires. Note that this is the date AND time in UTC when the task expired.

**CompletedTime** (string)—indicates the time period the task was completed. Note that this is the date AND time in UTC when the task is completed.

**Priority** (TaskPriority)—indicates the priority of the task (Low, Medium, High)

**NotificationRecipients** (List<Collection of strings>)—list of recipients to be notified about the task

**ExternalSystem** (string)—external system for the task

**ExternalId** (string)—external Id for the task

**RelatedTaskIds** (List<Collection of Guids>)—Task ID of the related task

**CategoryIds** (List<Collection of Guids>)—categories that this task directly belongs to, if any. Note that this does not include categories that the process has an INdirect membership in, such as in the case of a category within a category.

**Parameters** (List<NamedParameter>)—collection of named parameters. The named parameter is a generic name/value pair that can be used for any task to add extra information.

## Return Type

string

## CreateGuidedOperationTask

Creates detailed instructions for a user or group to perform a guided operation task

## Parameters

**GuidedOperationStatus** (GuidedOperationTaskStatus)—current status of the task (New, Assigned, Pending, InProgress, Waiting, Closed, Bypassed, Canceled, Completed)

**Instructions** (string)—step-by-step process for handling a task

**WebFormXSLFileName** (string)—name of the source XML text file to transform the task XML into HTML for viewing in the Web Console

**Name** (string)—name of the object

**Description** (string)—text that describes the object

**DueDate** (string)—indicates the time period the task should be resolved. Note that this is the date AND time in UTC when the task is due.

**ExpirationDate** (string)—when the task expires. Note that this is the date AND time in UTC when the task expired.

**CompletedTime** (string)—indicates the time period the task was completed. Note that this is the date AND time in UTC when the task is completed.

**Priority** (TaskPriority)—indicates the priority of the task (Low, Medium, High)

**NotificationRecipients** (List<Collection of strings>)—list of recipients to be notified about the task

**ExternalSystem** (string)—external system for the task

**ExternalId** (string)—external Id for the task

**RelatedTaskIds** (List<Collection of Guids>)—Task ID of the related task

**CategoryIds** (List<Collection of Guids>)—categories that this task directly belongs to, if any. Note that this does not include categories that the process has an INdirect membership in, such as in the case of a category within a category.

**Parameters** (List<NamedParameter>)—collection of named parameters. The named parameter is a generic name/value pair that can be used for any task to add extra information.

### Return Type

string

## CreateIncidentTask

Creates a task which requires an operator to take action in order to resolve an issue

### Parameters

**IncidentClass** (int)—value indicating the class of the incident

**IncidentIdentifier** (string)—ID of the incident

**ReportingUser** (string)—user name of the individual who reported the incident and contact information of the user who called IT to report the problem

**ReportingUserDetails** (string)—contact information of the individual who reported the incident

**OriginatingAlertIds** (List<Collection of Guids>)—Alert ID which triggered the incident

**ResolveOriginatingAlerts** (bool)—indicates whether Alert ID was resolved using *True/False* value

**WebFormXSLFileName** (string)—name of the source XML text file to transform the task XML into HTML for viewing in the Web Console

**ItilStatus** (ItilTaskStatus)—status of the task (New, Assigned, Pending, InProgress, Canceled, Duplicate, Resolved, Closed)

**AffectedTargetConfigurationItemId** (Guid)—System ID on which the condition was detected

**ConfigurationItemId** (Guid)—IT component to which the alert pertains.

**AffectedServices** (string)—IT Service affected by the alert or incident

**AffectedOrganizations** (string)—organizations that consume the IT service affected by the alert or incident

**Severity** (ItilTechnicalSeverity)—severity of the task (Low, Normal, High)

**AutomationSummary** (string)—file path for the related automation summary

**Name** (string)—name of the object

**Description** (string)—text that describes the object

**DueDate** (string)—indicates the time period the task should be resolved. Note that this is the date AND time in UTC when the task is due.

**ExpirationDate** (string)—when the task expires. Note that this is the date AND time in UTC when the task expired.

**CompletedTime** (string)—indicates the time period the task was completed. Note that this is the date AND time in UTC when the task is completed.

**Priority** (TaskPriority)—indicates the priority of the task (Low, Medium, High)

**NotificationRecipients** (List<Collection of strings>)—list of recipients to be notified about the task

**ExternalSystem** (string)—external system for the task

**ExternalId** (string)—external Id for the task

**RelatedTaskIds** (List<Collection of Guids>)—Task ID of the related task

**CategoryIds** (List<Collection of Guids>)—categories that this task directly belongs to, if any. Note that this does not include categories that the process has an INdirect membership in, such as in the case of a category within a category.

**Parameters** (List<NamedParameter>)—collection of named parameters. The named parameter is a generic name/value pair that can be used for any task to add extra information.

### Return Type

string

## CreateReviewTask

Submit a document for review as well as provide a message for the reviewer. In Cisco Process Orchestrator, this task is called the Review Request task.

### Parameters

**ReviewStatus** (ReviewTaskStatus)—status of the task (New, Assigned, Pending, InProgress, Waiting, Canceled, Completed)

**DocumentPath** (string)—file path for the document to be reviewed

Message (string)—message that informs the reviewer of why document needs to be reviewed

**WebFormXSLFileName** (string)—name of the source XML text file to transform the task XML into HTML for viewing in the Web Console

**Name** (string)—name of the object

**Description** (string)—text that describes the object

**DueDate** (string)—indicates the time period the task should be resolved. Note that this is the date AND time in UTC when the task is due.

**ExpirationDate** (string)—when the task expires. Note that this is the date AND time in UTC when the task expired.

**CompletedTime** (string)—indicates the time period the task was completed. Note that this is the date AND time in UTC when the task is completed.

**Priority** (TaskPriority)—indicates the priority of the task (Low, Medium, High)

**NotificationRecipients** (List<Collection of strings>)—list of recipients to be notified about the task

**ExternalSystem** (string)—external system for the task

**ExternalId** (string)—external Id for the task

**RelatedTaskIds** (List<Collection of Guids>)—Task ID of the related task

**CategoryIds** (List<Collection of Guids>)—categories that this task directly belongs to, if any. Note that this does not include categories that the process has an INdirect membership in, such as in the case of a category within a category.

**Parameters** (List<NamedParameter>)—collection of named parameters. The named parameter is a generic name/value pair that can be used for any task to add extra information.

### Return Type

string

## CreateSurveyTask

Creates a set of questions requiring a user or group response in order to gather a large set of information

In Cisco Process Orchestrator, this task is called the Input Request task.

### Parameters

**Message** (string)—introductory message for the input request

**SurveyStatus** (SurveyTaskStatus)—status of the task (New, Assigned, Pending, InProgress, Waiting, Canceled, Completed)

**WebFormXSLFileName** (string)—name of the source XML text file to transform the task XML into HTML for viewing in the Web Console

**Name** (string)—name of the object

**Description** (string)—text that describes the object

**DueDate** (string)—indicates the time period the task should be resolved. Note that this is the date AND time in UTC when the task is due.

**ExpirationDate** (string)—when the task expires. Note that this is the date AND time in UTC when the task expired.

**CompletedTime** (string)—indicates the time period the task was completed. Note that this is the date AND time in UTC when the task is completed.

**Priority** (TaskPriority)—indicates the priority of the task (Low, Medium, High)

**NotificationRecipients** (List<Collection of strings>)—list of recipients to be notified about the task

**ExternalSystem** (string)—external system for the task

**ExternalId** (string)—external Id for the task

**RelatedTaskIds** (List<Collection of Guids>)—Task ID of the related task

**CategoryIds** (List<Collection of Guid>)—categories that this task directly belongs to, if any. Note that this does not include categories that the process has an INdirect membership in, such as in the case of a category within a category.

**Parameters** (List<NamedParameter>)—collection of named parameters. The named parameter is a generic name/value pair that can be used for any task to add extra information.

**Return Type**

string



## Updating Tasks

This section describe how to modify configuration properties of an existing task in Cisco Process Orchestrator.

### AddNoteToTask

Updates an existing task with notes

#### Parameters

**taskId** (Guid)—Id of the task

**noteText** (string)—Any notes related to the task

#### Return Type

None

### UpdateAlertTask

Updates the properties or status of a defined alert containing potential problems that a user may want to investigate and possibly diagnose the problem.

#### Parameters

**nameOrId** (string)—display name or unique identifier of the task

**AlertClass** (int)—incident identifier for the alert

**DuplicateTaskId** (Guid)—Task ID of the duplicated alert

**WebFormXSLFileName** (string)—name of the source XML text file to transform the task XML into HTML for viewing in the Web Console

**ItilStatus** (ItilTaskStatus)—status of the task (New, Assigned, Pending, InProgress, Canceled, Duplicate, Resolved, Closed)

**AffectedTargetConfigurationItemId** (Guid)—System ID on which the condition was detected

**ConfigurationItemId** (Guid)—IT component to which the alert pertains

**AffectedServices** (string)—IT Service affected by the alert or incident

**AffectedOrganizations** (string)—organizations that consume the IT service affected by the alert or incident

**Severity** (ItilTechnicalSeverity)—severity of the task (Low, Normal, High)

**AutomationSummary** (string)—file path for the related automation summary

**Name** (string)—name of the object

**Description** (string)—text that describes the object

**DueDate** (string)—indicates the time period the task should be resolved. Note that this is the date AND time in UTC when the task is due.

**ExpirationDate** (string)—when the task expires. Note that this is the date AND time in UTC when the task expired.

**CompletedTime** (string)—indicates the time period the task was completed. Note that this is the date AND time in UTC when the task is completed.

**Priority** (TaskPriority)—indicates the priority of the task (Low, Medium, High)

**NotificationRecipients** (List<Collection of strings>)—list of recipients to be notified about the task

**ExternalSystem** (string)—external system for the task

**ExternalId** (string)—external Id for the task

**RelatedTaskIds** (List<Collection of Guid>)—Task ID of the related task

**CategoryIds** (List<Collection of Guid>)—categories that this task directly belongs to, if any. Note that this does not include categories that the process has an INdirect membership in, such as in the case of a category within a category.

**Parameters** (List<NamedParameter>)—collection of named parameters. The named parameter is a generic name/value pair that can be used for any task to add extra information.

#### **Return Type**

None

## **UpdateApprovalTask**

Updates the properties of a defined approval task

#### **Parameters**

**nameOrId** (string)—display name or unique identifier of the task

**Message** (string)—informs the approver what is being requested

**ApprovalChoiceIndex** (int)—0-based index of the approval choices in the task

**AutomationSummary** (string)—file path for the related automation summary

**ApprovalChoices** (List<Collection of string>)—choices available to the approver

**ApprovalStatus** (ApprovalTaskStatus)—current status of the task (New, Assigned, Pending, InProgress, Waiting, Canceled, Completed)

**WebFormXSLFileName** (string)—name of the source XML text file to transform the task XML into HTML for viewing in the Web Console

**Name** (string)—name of the object

**Description** (string)—text that describes the object

**DueDate** (string)—indicates the time period the task should be resolved. Note that this is the date AND time in UTC when the task is due.

**ExpirationDate** (string)—when the task expires. Note that this is the date AND time in UTC when the task expired.

**CompletedTime** (string)—indicates the time period the task was completed. Note that this is the date AND time in UTC when the task is completed.

**Priority** (TaskPriority)—indicates the priority of the task (Low, Medium, High)

**NotificationRecipients** (List<Collection of string>)—list of recipients to be notified about the task

**ExternalSystem** (string)—external system for the task

**ExternalId** (string)—external Id for the task

**RelatedTaskIds** (List<Collection of Guid>)—Task ID of the related task

**CategoryIds** (List<Collection of Guid>)—categories that this task directly belongs to, if any. Note that this does not include categories that the process has an INdirect membership in, such as in the case of a category within a category.

**Parameters** (List<NamedParameter>)—collection of named parameters. The named parameter is a generic name/value pair that can be used for any task to add extra information.

#### **Return Type**

None

## UpdateChangeRequestTask

Updates the properties of a change request task

### Parameters

**nameOrId** (string)—display name or unique identifier of the task.

**ChangeRequestClass** (int)—identifier for the change request

**ChangeStatus** (ChangeRequestTaskStatus)—current status of the task (New, Assigned, AuthorizationPending, AuthorizationDenied, Authorized, ChangeInProgress, ChangeComplete, Canceled, Duplicate)

**ChangeRequestIdentifier** (string)—Cisco Process Orchestrator generated ID number for the change request task

**ReasonForChange** (string)—describes the business justification for the request

**ChangeTiming** (string)—deadline date or time for the change

**WebFormXSLFileName** (string)—name of the source XML text file to transform the task XML into HTML for viewing in the Web Console

**AffectedTargetConfigurationItemId** (Guid)—System ID on which the condition was detected

**ConfigurationItemId** (Guid)—IT component to which the alert pertains.

**AffectedServices** (string)—IT Service affected by the alert or incident

**AffectedOrganizations** (string)—organizations that consume the IT service affected by the alert or incident

**Severity** (ItiTechnicalSeverity)—severity of the task (Low, Normal, High)

**AutomationSummary** (string)—file path for the related automation summary

**Name** (string)—name of the object

**Description** (string)—text that describes the object

**DueDate** (string)—indicates the time period the task should be resolved. Note that this is the date AND time in UTC when the task is due.

**ExpirationDate** (string)—when the task expires. Note that this is the date AND time in UTC when the task expired.

**CompletedTime** (string)—indicates the time period the task was completed. Note that this is the date AND time in UTC when the task is completed.

**Priority** (TaskPriority)—indicates the priority of the task (Low, Medium, High)

**NotificationRecipients** (List<Collection of strings>)—list of recipients to be notified about the task

**ExternalSystem** (string)—external system for the task

**ExternalId** (string)—external Id for the task

**RelatedTaskIds** (List<Collection of Guids>)—Task ID of the related task

**CategoryIds** (List<Collection of Guids>)—categories that this task directly belongs to, if any. Note that this does not include categories that the process has an INdirect membership in, such as in the case of a category within a category.

**Parameters** (List<NamedParameter>)—collection of named parameters. The named parameter is a generic name/value pair that can be used for any task to add extra information.

### Return Type

None

## UpdateGuidedOperationTask

Updates the properties of a guided operation task

### Parameters

**nameOrId** (string)—display name or unique identifier of the task

**GuidedOperationStatus** (GuidedOperationTaskStatus)—current status of the task (New, Assigned, Pending, InProgress, Waiting, Closed, Bypassed, Canceled, Completed)

**Instructions** (string)—step-by-step process for handling a task

**WebFormXSLFileName** (string)—name of the source XML text file to transform the task XML into HTML for viewing in the Web Console

**Name** (string)—name of the object

**Description** (string)—text that describes the object

**DueDate** (string)—indicates the time period the task should be resolved. Note that this is the date AND time in UTC when the task is due.

**ExpirationDate** (string)—when the task expires. Note that this is the date AND time in UTC when the task expired.

**CompletedTime** (string)—indicates the time period the task was completed. Note that this is the date AND time in UTC when the task is completed.

**Priority** (TaskPriority)—indicates the priority of the task (Low, Medium, High)

**NotificationRecipients** (List<Collection of strings>)—list of recipients to be notified about the task

**ExternalSystem** (string)—external system for the task

**ExternalId** (string)—external Id for the task

**RelatedTaskIds** (List<Collection of Guids>)—Task ID of the related task

**CategoryIds** (List<Collection of Guids>)—categories that this task directly belongs to, if any. Note that this does not include categories that the process has an INdirect membership in, such as in the case of a category within a category.

**Parameters** (List<NamedParameter>)—collection of named parameters. The named parameter is a generic name/value pair that can be used for any task to add extra information.

### Return Type

None

## UpdateIncidentTask

Updates the properties of a task which requires the assignee to resolve an issue

### Parameters

**nameOrId** (string)—display name or unique identifier of the task

**IncidentClass** (int)—value indicating the class of the incident

**IncidentIdentifier** (string)—ID of the incident

**ReportingUser** (string)—user name of the individual who reported the incident and contact information of the user who called IT to report the problem

**ReportingUserDetails** (string)—contact information of the individual who reported the incident

**OriginatingAlertIds** (List<Collection of Guids>)—Alert ID which triggered the incident

**ResolveOriginatingAlerts** (bool)—indicates whether Alert ID was resolved using True/False value

**WebFormXSLFileName** (string)—name of the source XML text file to transform the task XML into HTML for viewing in the Web Console

**ItilStatus** (ItilTaskStatus)—status of the task (New, Assigned, Pending, InProgress, Canceled, Duplicate, Resolved, Closed)

**AffectedTargetConfigurationItemId** (Guid)—System ID on which the condition was detected

**ConfigurationItemId** (Guid)—IT component to which the alert pertains

**AffectedServices** (string)—IT Service affected by the alert or incident

**AffectedOrganizations** (string)—organizations that consume the IT service affected by the alert or incident

**Severity** (ItilTechnicalSeverity)—severity of the task (Low, Normal, High)

**AutomationSummary** (string)—file path for the related automation summary

**Name** (string)—name of the object

**Description** (string)—text that describes the object

**DueDate** (string)—indicates the time period the task should be resolved. Note that this is the date AND time in UTC when the task is due.

**ExpirationDate** (string)—when the task expires. Note that this is the date AND time in UTC when the task expired.

**CompletedTime** (string)—indicates the time period the task was completed. Note that this is the date AND time in UTC when the task is completed.

**Priority** (TaskPriority)—indicates the priority of the task (Low, Medium, High)

**NotificationRecipients** (List<Collection of strings>)—list of recipients to be notified about the task

**ExternalSystem** (string)—external system for the task

**ExternalId** (string)—external Id for the task

**RelatedTaskIds** (List<Collection of Guids>)—Task ID of the related task

**CategoryIds** (List<Collection of Guids>)—categories that this task directly belongs to, if any. Note that this does not include categories that the process has an INdirect membership in, such as in the case of a category within a category.

**Parameters** (List<NamedParameter>)—collection of named parameters. The named parameter is a generic name/value pair that can be used for any task to add extra information.

## Return Type

None

## UpdateReviewTask

Updates the properties of the review task which requires a message and a file path for a document for review. In Cisco Process Orchestrator, this task is called the Review Request task.

### Parameters

**nameOrId** (string)—display name or unique identifier of the task

**ReviewStatus** (ReviewTaskStatus)—status of the task (New, Assigned, Pending, InProgress, Waiting, Canceled, Completed)

**DocumentPath** (string)—file path for the document to be reviewed

**Message** (string)—message that informs the reviewer of why document needs to be reviewed

**WebFormXSLFileName** (string)—name of the source XML text file to transform the task XML into HTML for viewing in the Web Console

**Name** (string)—name of the object

**Description** (string)—text that describes the object

**DueDate** (string)—indicates the time period the task should be resolved. Note that this is the date AND time in UTC when the task is due.

**ExpirationDate** (string)—when the task expires. Note that this is the date AND time in UTC when the task expired.

**CompletedTime** (string)—indicates the time period the task was completed. Note that this is the date AND time in UTC when the task is completed.

**Priority** (TaskPriority)—indicates the priority of the task (Low, Medium, High)

**NotificationRecipients** (List<Collection of strings>)—list of recipients to be notified about the task

**ExternalSystem** (string)—external system for the task

**ExternalId** (string)—external Id for the task

**RelatedTaskIds** (List<Collection of Guid>)—Task ID of the related task

**CategoryIds** (List<Collection of Guid>)—categories that this task directly belongs to, if any. Note that this does not include categories that the process has an INdirect membership in, such as in the case of a category within a category.

**Parameters** (List<NamedParameter>)—collection of named parameters. The named parameter is a generic name/value pair that can be used for any task to add extra information.

#### **Return Type**

None

## **UpdateSurveyTask**

Updates the set of questions requiring a user or group response in order to gather a large set of information. In Cisco Process Orchestrator, this task is called the Input Request task.

#### **Parameters**

**nameOrId** (string)—display name or unique identifier of the task

**Message** (string)—introductory message for the input request

**SurveyStatus** (SurveyTaskStatus)—status of the task (New, Assigned, Pending, InProgress, Waiting, Canceled, Completed)

**WebFormXSLFileName** (string)—name of the source XML text file to transform the task XML into HTML for viewing in the Web Console

**Name** (string)—name of the object

**Description** (string)—text that describes the object

**DueDate** (string)—indicates the time period the task should be resolved. Note that this is the date AND time in UTC when the task is due.

**ExpirationDate** (string)—when the task expires. Note that this is the date AND time in UTC when the task expired.

**CompletedTime** (string)—indicates the time period the task was completed. Note that this is the date AND time in UTC when the task is completed.

**Priority** (TaskPriority)—indicates the priority of the task (Low, Medium, High)

**NotificationRecipients** (List<Collection of strings>)—list of recipients to be notified about the task

**ExternalSystem** (string)—external system for the task

**ExternalId** (string)—external Id for the task

**RelatedTaskIds** (List<Collection of Guids>)—Task ID of the related task

**CategoryIds** (List<Collection of Guids>)—categories that this task directly belongs to, if any. Note that this does not include categories that the process has an INdirect membership in, such as in the case of a category within a category.

**Parameters** (List<NamedParameter>)—collection of named parameters. The named parameter is a generic name/value pair that can be used for any task to add extra information.

**Return Type**

None

## Viewing Tasks

This section describes how to view configuration properties of an existing task in Cisco Process Orchestrator.

### ViewAlertTaskProperties

Retrieves the configuration properties of an alert task

#### Parameters

**taskId** (string)—Id of the task

#### Return Type

AlertTaskConfigurationData

### ViewApprovalTaskProperties

Retrieves the configuration properties of an approval task

#### Parameters

**taskId** (string)—Id of the task

#### Return Type

ApprovalTaskConfigurationData

### ViewChangeRequestTaskProperties

Retrieves the properties of a change request task

#### Parameters

**taskId** (string)—Id of the task

#### Return Type

ChangeRequestTaskConfigurationData

### ViewGuidedOperationTaskProperties

Retrieves the properties of a guided operation task

#### Parameters

**taskId** (string)—Id of the task

#### Return Type

GuidedOperationTaskConfigurationData

#### Exception

If an ambiguous name is provided. "The given name matches more than one item. This operation will not be performed."

### ViewIncidentTaskProperties

Retrieves the properties of an incident task



**Parameters**

**taskId** (string)—Id of the task

**Return Type**

IncidentTaskConfigurationData

**ViewReviewTaskProperties**

Retrieves the properties of a review task

**Parameters**

**taskId** (string)—Id of the task

**Return Type**

ReviewTaskConfigurationData

**ViewSurveyTaskProperties**

Retrieves the properties of an input request task

**Parameters**

**taskId** (string)—Id of the task

**Return Type**

SurveyTaskConfigurationData

# System Web Service

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The System Web service allows users to import and retrieve external encryption RSA key information.

The WSDL for the System Web service methods is: <http://<server>:<port>/WS/System?wsdl>.

## GetPublicKey

Users will be able to retrieve a string representation of Cisco Process Orchestrator's public RSA key to be used for external string encryption. The returned string will be Base64 encoded.

### Parameters

None

### Return Type

String

## ImportEncryptionKeys

Imports a RSA public / private key pair file into a Cisco Process Orchestrator environment. Update permission on the "Environment Settings" object is required to import new public / private key pair.

### Parameters

keyFilePath (string)—Universal Naming Convention (UNC) file name of the RSA key file

encryptedPassword (string)—password to access the key file, encrypted by Cisco Process Orchestrator's RSA public key from the GetPublicKey Web service method

### Return Type

Boolean – Indicates if the method succeeds.

### Exceptions

Upon failure to decrypt the password, it raises an exception "The server failed to import encryption key file. It encountered an error when decrypting password of the encryption key file. The password should be encrypted with Cisco Process Orchestrator's external public key. Clear text password is not supported."

Upon failure to import the encryption keys, it raises an exception "The server failed to import encryption key file". Its inner exception has more error information.

## GetEnvironmentInformation

Returns Cisco Process Orchestrator's environment information, including environment name and environment GUID

### Parameters

None

### Return Type

EnvironmentInformation object