



Mobile Policy Diameter Commands

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advance-tuning istio-resource-control diameter

Configures the istio-resource-control for diameter.

Command Modes

Exec > Global Configuration

Syntax Description

advance-tuning istio-resource-control diameter

istio-resource-control diameter

Specify the istio-resource-control value for diameter.

Must be an integer.

Usage Guidelines

Use this command to configure the istio-resource-control for diameter.

advance-tuning istio-resource-control diameter concurrency

Configures the istio-concurrency in the diameter-ep pod.

Command Modes

Exec > Global Configuration

Syntax Description

advance-tuning istio-resource-control diameter concurrency *value*

istio-resource-control diameter concurrency *value*

Specify the istio-resource-control diameter concurrency value.

Must be an integer.

Default Value: 2

Usage Guidelines

Use this command to configure the istio-concurrency in the diameter-ep pod.

advance-tuning istio-resource-control diameter limits proxy-cpu

Configures the istio-resource-control for CPU proxy in the diameter.

Command Modes

Exec > Global Configuration

Syntax Description

advance-tuning istio-resource-control diameter limits proxy-cpu *value*

istio-resource-control diameter limits proxy-cpu *value*

Specify the istio-resource-control for CPU proxy.

Must be an integer.

Default Value: 100

Usage Guidelines

Use this command to configure the istio-resource-control for CPU proxy in diameter.

advance-tuning istio-resource-control diameter limits proxy-cpu-limit

Configures the istio-resource-control for CPU proxy limit in the diameter.

Command Modes

Exec > Global Configuration

Syntax Description

advance-tuning istio-resource-control diameter limits proxy-cpu-limit *value*

istio-resource-control diameter limits proxy-cpu-limit *value*

Specify the istio-resource-control for CPU proxy limit.

Must be an integer.

Default Value: 4

Usage Guidelines

Use this command to configure the istio-resource-control for CPU proxy limit in diameter.

advance-tuning istio-resource-control diameter limits proxy-memory

Configures the istio-resource-control for proxy memory in the diameter.

Command Modes

Exec > Global Configuration

Syntax Description

advance-tuning istio-resource-control diameter limits proxy-memory *value*

istio-resource-control diameter limits proxy-memory *value*

Specify the istio-resource-control value for proxy memory.

Must be an integer.

Default Value: 128

Usage Guidelines

Use this command to configure the istio-resource-control for proxy memory in diameter.

advance-tuning istio-resource-control diameter limits proxy-memory-limit

Configures the istio-resource-control for memory proxy limit in the diameter.

Command Modes

Exec > Global Configuration

Syntax Description

advance-tuning istio-resource-control diameter limits proxy-memory-limit *value*

istio-resource-control diameter limits proxy-memory-limit *value*

Specify the istio-resource-control for memory proxy limit.

Must be an integer.

Default Value: 1

Usage Guidelines

Use this command to configure the istio-resource-control for memory proxy limit in diameter.

diameter

Displays the configured Diameter stack definition.

Command Modes

Exec

Syntax Description

show diameter

Usage Guidelines

Use this command to view the configured Diameter stack definition.

Example

The following command displays the configured Diameter stack definition:

```
show diameter peer-status
```

diameter application

Configures the Diameter application definition.

Command Modes

Exec > Global Configuration

Syntax Description

diameter application *application_name* { **application-id** *application_id* | **tgpp-application** { **false** | **true** } | **vendor** *vendor_id* }

application-id *application_id*

Specify the application ID.

Must be an integer.

application *application_name*

Specify the application abbreviation. For example, gx.

Must be a string.

tgpp-application { **false** | **true** }

Specify whether the application is a 3GPP application.

Must be one of the following:

- **false**
- **true**

Default Value: false.

vendor *vendor_id*

Specify the vendor IDs.

Must be an integer.

Usage Guidelines

Use this command to configure the Diameter application definition.

diameter group

Configures the Diameter stack group parameters.

Command Modes

Exec > Global Configuration

Syntax Description

```
diameter group [ group group_name | mode mode | repository repository_name | stack stack_name ]
```

group *group_name*

Specify the group and stack name.

Must be a string in the pattern [a-zA-Z][a-zA-Z0-9-]*.

mode *mode*

Specify the mode in which the Diameter stack must run.

Must be one of the following:

- **client**
- **server**

Default Value: client.

repository *repository_name*

Specify the helm repository.

Usage Guidelines

Use this command to configure the Diameter stack group.

diameter group stack

Configures the Diameter stack definition.

Command Modes

Exec > Global Configuration

Syntax Description

```
diameter group group_name stack stack_name { application application_name | bind-ip bind_ip_address | bind-port bind_port_number | fqdn fqdn_name | realm realm | peer-host peer_host_name | peer-port peer_port_number | peer-realm peer_realm | node-host node_host }
```

application *application_name*

Specify the Diameter application.

bind-ip *bind_ip_address*

Specify the IP address to use in the CER or CEA message.

bind-port *bind_port_number*

Specify the port number to bind the server.

Default Value: 3868.

fqdn *fqdn*

Specify the fully qualified domain name (FQDN) to use in CER or CEA messages.

Must be a string.

node-host *node_host*

Specify the node host to start the stack on.

Must be a string.

peer-host *peer_host_name*

Specify the remote peer host address or FQDN.

Must be a string.

peer-port *peer_port_number*

Specify the peer port number.

Default Value: 3868.

peer-realm *peer_realm*

Specify the remote peer realm.

Must be a string.

realm *realm*

Specify the realm to use in CER or CEA messages.

Must be a string.

replicas *replica_count*

Specify the replica count.

Must be an integer.

Default Value: 1.

stack *stack_name*

Specify the stack name.

Must be a string.

Usage Guidelines

Use this command to configure the Diameter stack definition.

diameter group stack diameter-engine alt-engines

Configures the alternate Diameter engine parameters.

Command Modes

Exec > Global Configuration > Diameter Group Configuration > Stack Configuration

Syntax Description

diameter-engine alt-engines check-session-exists { false | true }

check-session-exists { false | true }

Specify whether to check if the session exists on the alternate-engines before forwarding requests.

Must be one of the following:

- **false**
- **true**

Default Value: false.

Usage Guidelines

Use this command to configure the alternate Diameter engine parameters.

diameter group stack diameter-engine alt-engines primary

Configures the primary Diameter Engine parameters.

Command Modes

Exec > Global Configuration > Diameter Group Configuration > Stack Configuration

Syntax Description

primary svc-name *service_name* port *port_number*

port *port_number*

Specify the port number exposed by the external service.

Default Value: 8884.

svc-name *service_name*

Specify the external service name that represents the Diameter engine.

Usage Guidelines

Use this command to configure the primary Diameter Engine parameters.

diameter group stack diameter-engine alt-engines secondary

Configures the secondary Diameter Engine parameters.

Command Modes Exec > Global Configuration > Diameter Group Configuration > Stack Configuration

Syntax Description **secondary** **svc-name** *service_name* **port** *port_number*

port *port_number*

Specify the port number exposed by the external service.

Default Value: 8884.

svc-name *service_name*

Specify the external service name that represents the Diameter engine.

Usage Guidelines Use this command to configure the secondary Diameter Engine parameters.

diameter group stack grpc ext-svc

Configures the external gRPC service parameters for the Diameter interface.

Command Modes Exec > Global Configuration

Syntax Description **diameter grpc** [**port** *port_number* | **ip** *ip_address*]

ip *ip_address*

Specify the gRPC server's IP address.

port *port_number*

Specify the port number to bind the server.

Default Value: 8868.

Usage Guidelines Use this command to configure the external gRPC service parameters for the Diameter interface.

diameter group stack settings timeouts-ms

Configures the timeout parameters for the Diameter interface.

Command Modes Exec > Global Configuration

Syntax Description **diameter settings timeout-ms** [**cea** *cea_timeout* | **dpa** *dpa_timeout* | **dwa** *dwa_timeout* | **iac** *inactivity_timeout* | **request** *request_timeout* | **stop** *timeout_stop_diameter*]

cea cea_exchange_timeout

Specify the timeout duration for completing the CEA exchange in milliseconds.

Must be an integer.

Default Value: 10000.

dpa dpa_timeout

Specify the DPA timeout duration in milliseconds.

Must be an integer.

Default Value: 10000.

dwa dwa_timeout

Specify the DWA timeout duration in milliseconds.

Must be an integer.

Default Value: 10000.

iac inactivity_timeout

Specify the inactivity timeout duration in milliseconds.

Must be an integer.

Default Value: 5000.

request request_timeout

Specify the request timeout duration in milliseconds.

Must be an integer.

Default Value: 1750.

stop stop_timeout

Specify the timeout duration for stopping the Diameter interface in milliseconds.

Must be an integer.

Default Value: 9000.

Usage Guidelines

Use this command to configure the timeout duration for the Diameter interface.

Example

The following command configures the timeout duration for the Diameter interface:

```
diameter settings timeout-ms [ cea 10000 | dpa 10000 | dwa 10000 | iac 5000 | request 1750  
| stop 9000 ]
```

diameter grpc

Configures the global gRPC settings.

Command Modes

Exec > Global Configuration

Syntax Description

diameter grpc channel count *count*

Usage Guidelines

Use this command to configure the global gRPC settings.

Example

The following command configures the global gRPC settings:

```
diameter grpc channel count 100
```

diameter grpc channel

Configures the gRPC channels to open towards the server.

Command Modes

Exec > Global Configuration

Syntax Description

diameter grpc channel count *channel_count*

channel *channel_count*

Specify the number of channel to open towards the server.

Must be an integer.

Default Value: 10.

Usage Guidelines

Use this command to configure the gRPC channels to open towards the server.

diameter next-hop-route next-hop-host

Configures the next-hop host name.

Command Modes

Exec > Global Configuration

Syntax Description

next_hop_realm rating *rating*

next-hop-host-name *hostname_list*

Specify the DRA hosts name list as received in the Origin-Host AVP in CER or CEA message.

Must be a string.

rating *rating*

Specify the rating that determines the priority.

Must be an integer.

Default Value: 0.

Usage Guidelines

Use this command to configure the next-hop host name.

Example

The following command configures the next-hop host name:

```
next_hop_realm rating 2
```

diameter properties grpc-tcp-nodelay value

Configures the TCP_NODELAY option in Diameter application.

Command Modes

Exec > Global Configuration

Syntax Description

```
diameter properties grpc-tcp-nodelay value { true | false }
```

grpc-tcp-nodelay value { true | false }

Specify the TCP_NODELAY value to be enabled or disabled.

Must be one of the following:

- **true**
- **false**

Default Value: false.

Usage Guidelines

Use this command to configure the TCP_NODELAY option in Diameter application.

diameter settings max-heap-size

Configures the maximum heap size for diameter.

Command Modes

Exec > Global Configuration

Syntax Description

```
diameter settings max-heap-size
```

max-heap-size

Specify the the maximum heap size value.

Must be a string.

Default Value: 768m.

Usage Guidelines Use this command to configure the maximum heap size for diameter.

diameter settings istio-proxy-limits

Configures the istio-proxy-limits for diameter.

Command Modes Exec > Global Configuration

Syntax Description **diameter settings istio-proxy-limits** { *true* | *false* }

istio-proxy-limits { *true* | *false* }

Specify the istio-proxy-limits value to be enabled or disabled.

Must be one of the following:

- **true**
- **false**

Default Value: true.

Usage Guidelines Use this command to configure the istio-proxy-limits for diameter.

diameter settings timeouts-ms

Configures the timeout parameters for the Diameter interface.

Command Modes Exec > Global Configuration

Syntax Description **diameter settings timeout-ms** [**cea** *cea_timeout* | **dpa** *dpa_timeout* | **dwa** *dwa_timeout* | **iac** *inactivity_timeout* | **request** *request_timeout* | **stop** *timeout_stop_diameter*]

cea *cea_exchange_timeout*

Specify the timeout duration for completing the CEA exchange in milliseconds.

Must be an integer.

Default Value: 10000.

dpa *dpa_timeout*

Specify the DPA timeout duration in milliseconds.

Must be an integer.

Default Value: 10000.

dwa *dwa_timeout*

Specify the DWA timeout duration in milliseconds.

Must be an integer.

Default Value: 10000.

iac inactivity_timeout

Specify the inactivity timeout duration in milliseconds.

Must be an integer.

Default Value: 5000.

request request_timeout

Specify the request timeout duration in milliseconds.

Must be an integer.

Default Value: 1750.

stop stop_timeout

Specify the timeout duration for stopping the Diameter interface in milliseconds.

Must be an integer.

Default Value: 9000.

Usage Guidelines

Use this command to configure the timeout duration for the Diameter interface.

Example

The following command configures the timeout duration for the Diameter interface:

```
diameter settings timeout-ms [ cea 10000 | dpa 10000 | dwa 10000 | iac 5000 | request 1750  
| stop 9000 ]
```

diameter settings timeouts-ms