Mobile Policy Diameter Commands

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 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 ]
```