Contents

Track commands

delay

Use **delay** to set the period of time that the Track module must wait before notifying the application module of track entry state changes.

Use **undo delay** to remove the notification delay configuration.

Syntax

delay { **negative** *negative-time* | **positive** *positive-time* } *

undo delay

Default

The Track module notifies the application module immediately when the track entry state changes.

Views

Track view

Predefined user roles

network-admin

Parameters

negative *negative-time*: Specifies the delay for notifying the application module that the track entry state has changed to Negative. The *negative-time* argument represents the negative state notification delay in the range of 1 to 300 seconds.

positive *positive-time*: Specifies the delay for notifying the application module that the track entry state has changed to Positive. The *positive-time* argument represents the positive state notification delay in the range of 1 to 300 seconds.

Usage guidelines

If the Track module immediately notifies the application module of a track entry state change but route convergence is not complete, a communication failure might occur. To address this issue, you can set a notification delay to avoid immediate notification of track entry state changes.

The notification delay settings do not take effect if the track entry is not associated with an application module.

If you execute this command multiple times, the most recent configuration takes effect.

Examples

Set the negative state notification delay to 50 seconds and the positive state notification delay to 120 seconds for track entry 101 associated with a Boolean OR list.

```
<Sysname> system-view
[Sysname] track 101 list boolean or
[Sysname-track-101] delay negative 50 positive 120
```

Related commands

track bfd

track cfd

track interface

track ip route reachability

```
track list boolean
track list threshold percentage
track list threshold weight
track nqa
```

display track

Use **display track** to display track entry information.

Syntax

display track { *track-entry-number* | **all** [**negative** | **positive**] } [**brief**]

Views

Any view

Predefined user roles

network-admin

network-operator

Parameters

track-entry-number: Specifies the track entry ID in the range of 1 to 1024.

all: Specifies all track entries.

negative: Specifies track entries in Negative state.

positive: Specifies track entries in Positive state.

brief: Displays brief information about track entries.

Examples

Display information about all track entries.
```
<Sysname> display track all
Track ID: 1
  State: Positive
  Duration: 0 days 0 hours 0 minutes 7 seconds
  Tracked object type: NQA
  Notification delay: Positive 20, Negative 30 (in seconds)
  Tracked object:
    NQA entry: admin test
    Reaction: 10
    Remote IP/URL: 2.2.2.2
    Local IP: 1.1.1.1
    Interface: Vlan-interface1
Track ID: 2
  State: NotReady
  Duration: 0 days 0 hours 0 minutes 32 seconds
  Tracked object type: BFD ctrl
  Notification delay: Positive 20, Negative 30 (in seconds)
  Tracked object:
    BFD session mode: Echo
    Outgoing interface: Vlan-interface2
```

```
   VPN instance name: --
   Remote IP: 192.168.40.1
   Local IP: 192.168.40.2
Track ID: 3
  State: Negative
  Duration: 0 days 0 hours 0 minutes 32 seconds
  Tracked object type: Interface
  Notification delay: Positive 20, Negative 30 (in seconds)
  Tracked object:
    Interface:  Vlan-interface3
    Protocol: IPv4
Track ID: 4
  State: Negative
  Duration: 0 days 0 hours 0 minutes 32 seconds
  Tracked object type: CFD
  Notification delay: Positive 20, Negative 30 (in seconds)
  Tracked object:
    CFD service instance: MEP 2 in Ethernet service instance 1
Track ID: 5
  State: Positive
  Duration: 0 days 0 hours 0 minutes 32 seconds
  Tracked object type: Route
  Notification delay: Positive 20, Negative 30 (in seconds)
  Tracked object:
    IP route: 0.0.0.0/0 reachability
    VPN instance name: --
    Protocol: Static
    Nexthop interface : Vlan-Interface4
Track ID: 6
  State: Positive
  Duration: 0 days 0 hours 0 minutes 32 seconds
  Tracked object type: Failover group
  Notification delay: Positive 20, Negative 30 (in seconds)
  Tracked object:
    LLDP interface: Vlan-interface4
Track ID: 7
  State: Positive
  Duration: 0 days 0 hours 0 minutes 32 seconds
  Tracked object type: Percentage threshold list
  Notification delay: Positive 20, Negative 30 (in seconds)
  Threshold: Positive 40, Negative 30
  Percentage of positive objects: 50%
  Tracked objects:
    Object 1: Positive
    Object 3: Negative
Track ID: 8
  State: Positive
  Duration: 0 days 0 hours 0 minutes 32 seconds
```

```
   Tracked object type: Weight threshold list
   Notification delay: Positive 20, Negative 30 (in seconds)
   Threshold: Positive 50, Negative 30
   Positive weight/total weight: 50/80
   Tracked objects:
     Object 1: Positive, Weight: 50
     Object 3: Negative, Weight: 30
Track ID: 9
  State: Positive
  Duration: 0 days 0 hours 0 minutes 32 seconds
  Tracked object type: Boolean and list
  Notification delay: Positive 20, Negative 30 (in seconds)
  Tracked objects:
    Object 1: Positive
    Object 3: Negative(not)
    Object 10: NotReady(not)
```

Display information about track entries in Negative state.

```
<Sysname> display track all negative brief
ID    Status    Type       Remote IP/URL    Local IP        Interface
1     Negative Interface --               --              Vlan2
10    Negative Interface --               --              Vlan3
12    Negative List       --               --              --
```

Table 1 Command output

Field	Description
Track ID	ID of a track entry.
State	States of a track entry: • **Positive**—The tracked object operates correctly. • **NotReady**—The tracked object is invalid. • **Negative**—The tracked object is abnormal.
Duration	Time period during which the track entry stays in the state.
Type	Tracked object type: • **BFD ctrl**—Control-mode BFD session. • **BFD echo**—Echo-mode BFD session. • **CFD**. • **Interface**. • **Route**. • **NQA**. • **LLDP**. • **List**—Tracked list. This field is displayed only when the `display track brief` command is executed.
Tracked object type	Tracked object type: • **BFD ctrl**—Control-mode BFD session. • **BFD echo**—Echo-mode BFD session. • **CFD echo**. • **Interface**. • **Route**.

Field	Description
	• **LLDP**. • **NQA**. • **Boolean and list**—Boolean AND list. • **Boolean or list**—Boolean OR list. • **Percentage threshold list**. • **Weight threshold list**.
Notification delay: Positive 20, Negative 30 (in seconds)	• The Track module notifies the application modules that the status of the track entry changes to Positive after a delay time of 20 seconds. • The Track module notifies the application modules that the status of the track entry changes to Negative after a delay time of 30 seconds.
Threshold: Positive 40, Negative 30	Positive and negative state thresholds. This field is displayed only when the tracked object type is **Percentage threshold list** or **Weight threshold list**.
Percentage of positive objects	Percentage of Positive objects in the tracked list. This field is displayed only when the tracked object type is **Percentage threshold list**.
Positive weight/total weight: 50/80	Weight of Positive objects to the total weight of all objects in the tracked list. This field is displayed only when the tracked object type is **Weight threshold list**.
Tracked object	Tracked object associated with the track entry.
NQA entry	NQA operation associated with the track entry.
Reaction	Reaction entry associated with the track entry.
BFD session mode	BFD session mode.
Outgoing interface	Outgoing interface of BFD echo packets.
VPN instance name	Name of the VPN instance to which BFD session packets belong. If the packets belong to the public network, two consecutive hyphens (--) are displayed.
Remote IP/URL	Remote IP address or URL. If no remote IP address or URL exists, two consecutive hyphens (--) are displayed.
Local IP	Local IP address. If no local IP address exists, two consecutive hyphens (--) are displayed.
Interface	Interface to be monitored. If no interface is to be monitored, two consecutive hyphens (--) are displayed.
Protocol	Link states or Layer 3 protocol states of the monitored interface: • **None**—Link status of the monitored interface. • **IPv4**—IPv4 protocol status of the monitored Layer 3 interface. • **IPv6**—IPv6 protocol status of the monitored Layer 3 interface.
IP route	Route associated with the track entry.
VPN instance name	Name of the VPN instance to which the route belongs. If the route belongs to the public network, two consecutive hyphens (--) are displayed.
Protocol	Protocol type of the route. If the route does not exist, **N/A** is displayed.
Nexthop interface	Next hop of the route. If the route does not exist, **N/A** is displayed.

Field	Description
LLDP interface	Monitored LLDP interface.
Object 10 : Positive	State of a tracked object: **Positive**, **NotReady**, or **Negative**. If the tracked object type is **Weight threshold list**, the weight of the object is also displayed. If the **(not)** attribute is displayed, the tracked list will negate the state of the object.
Tracked by	Track entries that are tracking the track entry (tracked object). This field is displayed only when the tracked object is not a list.
Track-list 6	Tracked list that is tracking the track entry (tracked object). This field is displayed only when the tracked object is not a list.

Related commands

track bfd ctrl

track bfd echo

track cfd

track interface

track interface physical

track interface protocol

track ip route reachability

track lldp neighbor

track nqa

object

Use **object** to add a track entry as an object to a tracked list.

Use **undo object** to remove the object from a tracked list

Syntax

object *track-entry-number* [**not**] [**weight** *weight*]

undo object *track-entry-number*

Default

A tracked list does not contain any objects.

Views

Track view

Predefined user roles

network-admin

Parameters

track-entry-number: Specifies a track entry by its ID in the range of 1 to 1024.

not: Negates the state of the object. For example, the tracked list determines the object to be Negative when the object is in Positive state. This keyword is supported only by a Boolean list.

weight *weight*: Assigns a weight in the range of 1 to 255 to the object. This keyword is supported only by a weight threshold list. The default weight is 10.

Usage guidelines

The track entry ID of the object cannot be the same as the ID of the tracked list to which the object is added.

You can add a maximum of 16 objects to a tracked list.

Loops are not allowed between track entries. For example, after you add track entry 1 (object 1) to tracked list 2 and track entry 2 (object 2) to tracked list 3, you cannot add track entry 3 (object 3) to tracked list 1 because a loop will be created.

Examples

Create Boolean AND list 100 and add track entries 1 and 2 as tracked objects to the list.

```
<Sysname> system-view
[Sysname] track 100 list boolean and
[Sysname-track-100] object 1
[Sysname-track-100] object 2 not
```

Related commands

track list boolean

track list threshold percentage

track list threshold weight

threshold percentage

Use **threshold percentage** to set the threshold values for a percentage threshold list.

Use **undo threshold percentage** to restore the default.

Syntax

threshold **percentage** { **negative** *negative-threshold* | **positive** *positive-threshold* } *

undo threshold percentage

Default

The negative state threshold is 0% and the positive state threshold is 1%.

Views

Track view

Predefined user roles

network-admin

Parameters

negative *negative-threshold*: Specifies the negative state threshold in the range of 0 to 100. For the track entry to be set to the Negative state, the percentage of Positive objects must be equal to or smaller than the configured negative state threshold.

positive *positive-threshold*: Specifies the positive state threshold in the range of 0 to 100. For the track entry to be set to the Positive state, the percentage of Positive objects must be equal to or greater than the configured positive state threshold. The *positive-threshold* must be greater than the *negative-threshold*.

Usage guidelines

The track entry state remains unchanged if the percentage of Positive objects is below the positive state threshold and above the negative state threshold.

This command is supported only by a track entry associated with a percentage threshold list.

Examples

Set the negative state threshold to 30% and the positive state threshold to 50% for track entry 1 associated with a percentage threshold list.

```
<Sysname> system-view
[Sysname] track 1 list threshold percentage
[Sysname-track-1] threshold percentage negative 30 positive 50
```

Related commands

track list threshold percentage

threshold weight

Use **threshold weight** to set the threshold values for a weight threshold list.

Use **undo threshold weight** to restore the default.

Syntax

threshold weight { **negative** *negative-threshold* | **positive** *positive-threshold* } *

undo threshold weight

Default

The negative state threshold is 0 and the positive state threshold is 1.

Views

Track view

Predefined user roles

network-admin

Parameters

negative *negative-threshold*: Specifies the negative state threshold in the range of 0 to 254. For the track entry to be set to the Negative state, the total weight of Positive objects must be equal to or smaller than the configured negative state threshold.

positive *positive-threshold*: Specifies the positive state threshold in the range of 1 to 255. For the track entry to be set to the Positive state, the total weight of Positive objects must be equal to or greater than the configured positive state threshold. The *positive-threshold* must be greater than the *negative-threshold*.

Usage guidelines

The track entry state remains unchanged if the total weight of Positive objects is below the positive state threshold and above the negative state threshold.

This command is supported only by a track entry associated with a weight threshold list.

Examples

Set the negative state threshold to 30 and the positive state threshold to 50 for track entry 1 associated with a weight threshold list.

```
<Sysname> system-view
```

```
[Sysname] track 1 list threshold weight
[Sysname-track-1] threshold weight negative 30 positive 50
```

Related commands

track list threshold weight

track bfd ctrl

Use **track bfd ctrl** to create a track entry associated with a control-mode BFD session and enter Track view, or enter the view of an existing track entry.

Use **undo track** to remove the track entry and all its settings.

Syntax

track *track-entry-number* **bfd ctrl** [**interface** *interface-type interface-number* | **vpn-instance** *vpn-instance-name*] **remote ip** *remote-ip-address* **local ip** *local-ip-address*

undo track *track-entry-number*

Default

No track entries exist.

Views

System view

Predefined user roles

network-admin

Parameters

track-entry-number: Specifies the track entry ID in the range of 1 to 1024.

interface *interface-type interface-number*: Specifies the outgoing interface by its type and number of BFD control packets. If you do not specify an outgoing interface, the outgoing interface found through FIB table lookup is used.

vpn-instance *vpn-instance-name*: Specifies an MPLS L3VPN instance by its name, a case-sensitive string of 1 to 31 characters. If you do not specify this option, the BFD session is on the public network.

remote ip *remote-ip-address*: Specifies the destination IP address of the BFD control packets. The specified IP address must be the IP address of a directly connected interface.

local ip *local-ip-address*: Specifies the source IP address of the BFD control packets. The specified IP address must be the IP address of a directly connected interface.

Usage guidelines

To create a track entry, you must specify the tracked object type, which is **bfd ctrl** in this command.

To enter the view of an existing track entry, use the **track** *track-entry-number* command. The tracked object type is not required.

To modify the settings of a track entry, execute the **undo track** command to remove the track entry, and then execute the **track bfd ctrl** command again.

When you associate Track with a BFD session, do not use the virtual IP address of a VRRP group as the local or remote IP address of the BFD session.

Examples

Associate track entry 1 with a control-mode BFD session. The BFD control packets use destination IP address 192.168.1.1, source IP address 192.168.1.2, and outgoing interface VLAN-interface 2.

```
<Sysname> system-view
[Sysname] track 1 bfd ctrl interface vlan-interface 2 remote ip 192.168.1.1 local ip
192.168.1.2
[Sysname-track-1]
```

Related commands

delay

display track

track bfd echo

Use **track bfd echo** to create a track entry associated with an echo-mode BFD session and enter Track view, or enter the view of an existing track entry.

Use **undo track** to remove the track entry and all its settings.

Syntax

track *track-entry-number* **bfd echo interface** *interface-type interface-number* **remote ip** *remote-ip-address* **local ip** *local-ip-address*

undo track *track-entry-number*

Default

No track entries exist.

Views

System view

Predefined user roles

network-admin

Parameters

track-entry-number: Specifies the track entry ID in the range of 1 to 1024.

interface *interface-type interface-number*: Specifies the outgoing interface by its type and number of the BFD echo packets.

remote ip *remote-ip-address*: Specifies the destination IP address of the BFD echo packets. The specified IP address must be the IP address of a directly connected interface.

local ip *local-ip-address*: Specifies the source IP address of the BFD echo packets. The specified IP address must be the IP address of a directly connected interface.

Usage guidelines

To create a track entry, you must specify the tracked object type, which is **bfd echo** in this command.

To enter the view of an existing track entry, use the **track** *track-entry-number* command. The tracked object type is not required.

To modify the settings of a track entry, execute the **undo track** command to remove the track entry, and then execute the **track bfd echo** command again.

When you associate Track with BFD, the virtual IP address of a VRRP group cannot be the local or remote address of a BFD session.

Examples

Associate track entry 1 with an echo-mode BFD session. The BFD echo packets use destination IP address 1.1.1.1, source IP address 1.1.1.2, and outgoing interface VLAN-interface 2.

```
<Sysname> system-view
[Sysname] track 1 bfd echo interface vlan-interface 2 remote ip 1.1.1.1 local ip 1.1.1.2
[Sysname-track-1]
```

Related commands

delay

display track

track cfd

Use **track cfd** to create a track entry associated with CFD and enter Track view, or enter the view of an existing track entry.

Use **undo track** to remove the track entry and all its settings.

Syntax

track *track-entry-number* **cfd cc service-instance** *instance-id* **mep** *mep-id*

undo track *track-entry-number*

Default

No track entries exist.

Views

System view

Predefined user roles

network-admin

Parameters

track-entry-number: Specifies the track entry ID in the range of 1 to 1024.

service-instance *instance-id*: Specifies a service instance by its ID in the range of 1 to 32767.

mep *mep-id*: Specifies a MEP by its ID in the range of 1 to 8191.

Usage guidelines

To create a track entry, you must specify the tracked object type, which is **cfd** in this command.

To enter the view of an existing track entry, use the **track** *track-entry-number* command. The tracked object type is not required.

To modify the settings of a track entry, execute the **undo track** command to remove the track entry, and then execute the **track cfd** command again.

Examples

Create track entry 1 and specify the CFD service instance ID as 2 and MEP ID as 3.

```
<Sysname> system-view
[Sysname] track 1 cfd cc service-instance 2 mep 3
[Sysname-track-1]
```

Related commands

cfd mep

```
cfd service-instance

delay

display track
```

track interface

Use **track interface** to create a track entry associated with the link state of an interface and enter Track view, or enter the view of an existing track entry.

Use **undo track** to remove the track entry and all its settings.

Syntax

track *track-entry-number* **interface** *interface-type interface-number*

undo track *track-entry-number*

Default

No track entries exist.

Views

System view

Predefined user roles

network-admin

Parameters

track-entry-number: Specifies the track entry ID in the range of 1 to 1024.

interface-type interface-number: Specifies an interface by its type and number.

Usage guidelines

To create a track entry, you must specify the tracked object type, which is **interface** in this command.

To enter the view of an existing track entry, use the **track** *track-entry-number* command. The tracked object type is not required.

When you associate Track with interface management to monitor the link status of an interface, the track entry state changes as follows:

- The track entry state is Positive if the link state of the interface is up.

- The track entry state is Negative if the link state of the interface is down.

To display the link state of an interface, use the **display ip interface brief** command.

To modify the settings of a track entry, execute the **undo track** command to remove the track entry, and then execute the **track interface** command again.

Examples

Create track entry 1 and associate it with the link state of interface VLAN-interface 10.

```
<Sysname> system-view
[Sysname] track 1 interface vlan-interface 10
[Sysname-track-1]
```

Related commands

delay

display ip interface brief (*Layer 3—IP Services Command Reference*)

```
display track
```

track interface physical

Use `track interface physical` to create a track entry associated with the physical state of an interface and enter Track view, or enter the view of an existing track entry.

Use `undo track` to remove the track entry and all its settings.

Syntax

track *track-entry-number* **interface** *interface-type interface-number* **physical**

undo track *track-entry-number*

Default

No track entries exist.

Views

System view

Predefined user roles

network-admin

Parameters

track-entry-number: Specifies the track entry ID in the range of 1 to 1024.

interface-type interface-number: Specifies an interface by its type and number.

Usage guidelines

To create a track entry, you must specify the tracked object type, which is **interface physical** in this command.

To enter the view of an existing track entry, use the **track** *track-entry-number* command. The tracked object type is not required.

To modify the settings of a track entry, execute the **undo track** command to remove the track entry, and then execute the **track interface physical** command again.

Examples

Create track entry 1 and associate it with the physical state of VLAN-interface 2.
```
<Sysname> system-view
[Sysname] track 1 interface vlan-interface 2 physical
[Sysname-track-1]
```

Related commands

delay

display ip interface brief (*Layer 3—IP Services Command Reference*)

display track

track interface protocol

Use `track interface protocol` to create a track entry associated with the protocol state of an interface and enter Track view, or enter the view of an existing track entry.

Use `undo track` to remove the track entry and all its settings.

Syntax

```
track track-entry-number interface interface-type interface-number
protocol { ipv4 | ipv6 }

undo track track-entry-number
```

Default

No track entries exist.

Views

System view

Predefined user roles

network-admin

Parameters

track-entry-number: Specifies the track entry ID in the range of 1 to 1024.

interface-type interface-number: Specifies an interface by its type and number.

ipv4: Monitors the IPv4 protocol state. When the IPv4 protocol state of an interface is up, the state of the track object is Positive. When the IPv4 protocol state of an interface is down, the state of the track object is Negative. To display the IPv4 protocol state of an interface, use the **display ip interface brief** command.

ipv6: Monitors the IPv6 protocol state. When the IPv6 protocol state of an interface is up, the state of the track object is Positive. When the IPv6 protocol state of an interface is down, the state of the track object is Negative. To display the IPv6 protocol state of an interface, use the **display ipv6 interface brief** command.

Usage guidelines

To create a track entry, you must specify the tracked object type, which is **interface protocol** in this command.

To enter the view of an existing track entry, use the **track** *track-entry-number* command. The tracked object type is not required.

To modify the settings of a track entry, execute the **undo track** command to remove the track entry, and then execute the **track interface protocol** command again.

Examples

Create track entry 1 and associate it with the IPv4 protocol state of interface VLAN-interface 2.

```
<Sysname> system-view
[Sysname] track 1 interface vlan-interface 2 protocol ipv4
[Sysname-track-1]
```

Related commands

delay

display ip interface brief (*Layer 3—IP Services Command Reference*)

display ipv6 interface brief (*Layer 3—IP Services Command Reference*)

display track

track ip route reachability

Use **track ip route reachability** to create a track entry associated with a route entry and enter Track view, or enter the view of an existing track entry.

Use **undo track** to remove the track entry and all its settings.

Syntax

track *track-entry-number* **ip route** [**vpn-instance** *vpn-instance-name*] *ip-address* { *mask-length* | *mask* } **reachability**

undo track *track-entry-number*

Default

No track entries exist.

Views

System view

Predefined user roles

network-admin

Parameters

track-entry-number: Specifies the track entry ID in the range of 1 to 1024.

vpn-instance *vpn-instance-name*: Specifies an MPLS L3VPN instance by its name, a case-sensitive string of 1 to 31 characters. If you do not specify this option, this command creates the track entry for routes on the public network.

ip-address: Specifies the IP address of the route entry associated with the track entry in dotted decimal notation.

mask-length: Specifies the mask length in the range of 0 to 32.

mask: Specifies the mask of the IP address, in dotted decimal notation.

Usage guidelines

To create a track entry, you must specify the tracked object type, which is **ip route reachability** in this command.

To enter the view of an existing track entry, use the **track** *track-entry-number* command. The tracked object type is not required.

To modify the settings of a track entry, execute the **undo track** command to remove the track entry, and then execute the **track ip route reachability** command again.

Route management does not immediately notify the Track module of the route status changes when the following conditions are met:

- An active/standby device switchover or a RIB process switchover has occurred.
- The status of the monitored route entry is changed before the routing protocol completes the graceful restart.

You can resolve the problem by configuring the nonstop routing feature.

Examples

Create track entry 1 to monitor the status of the route entry 10.1.1.0/24.

```
<Sysname> system-view
[Sysname] track 1 ip route 10.1.1.0 24 reachability
[Sysname-track-1]
```

Related commands

delay

display ip route (*Layer 3—IP Routing Command Reference*)

display track

track list boolean

Use **track list boolean** to create a track entry associated with a Boolean list and enter Track view, or enter the view of an existing track entry.

Use **undo track** to remove the track entry and all its settings.

Syntax

track *track-entry-number* **list boolean** { **and** | **or** }

undo track *track-entry-number*

Default

No track entries exist.

Views

System view

Predefined user roles

network-admin

Parameters

track-entry-number: Specifies the track entry ID in the range of 1 to 1024.

and: Associates the track entry with a Boolean AND list.

or: Associates the track entry with a Boolean OR list.

Usage guidelines

A Boolean list is a list of tracked objects based on a Boolean logic. It can be further divided into the following types:

- **Boolean AND list**—When all objects in the list are in Positive state, the Track module sets the track entry to Positive state. When one or more objects are in Negative state, the Track module sets the track entry to Negative state.
- **Boolean OR list**—When any object is in Positive state, the Track module sets the track entry to Positive state. When all objects are in Negative state, the Track module sets the track entry to Negative state.

To create a track entry, you must specify the tracked object type, which is **list boolean** in this command.

To enter the view of an existing track entry, use the **track** *track-entry-number* command. The tracked object type is not required.

To modify the settings of a track entry, execute the **undo track** command to remove the track entry, and then execute the **track list boolean** command again.

Examples

Create track entry 101 and associate it with a Boolean OR list.

```
<Sysname> system-view
[Sysname] track 101 list boolean or
[Sysname-track-101]
```

Related commands

delay

object

track list threshold percentage

Use **track list threshold percentage** to create a track entry associated with a percentage threshold list and enter Track view, or enter the view of an existing track entry.

Use **undo track** to remove the track entry and all its settings.

Syntax

track *track-entry-number* **list threshold percentage**

undo track *track-entry-number*

Default

No track entries exist.

Views

System view

Predefined user roles

network-admin

Parameters

track-entry-number: Specifies the track entry ID in the range of 1 to 1024.

Usage guidelines

The Track module determines the state of a track entry by comparing the percentage of Positive objects in the list with the percentage thresholds configured for the list. To configure the threshold values used to determine the track entry state, use the **threshold percentage** command.

To create a track entry, you must specify the tracked object type, which is **list threshold percentage** in this command.

To enter the view of an existing track entry, use the **track** *track-entry-number* command. The tracked object type is not required.

To modify the settings of a track entry, execute the **undo track** command to remove the track entry, and then execute the **track list threshold percentage** command again.

Examples

Create track entry 101 and associate it with a percentage threshold list.

```
<Sysname> system-view
[Sysname] track 101 list threshold percentage
[Sysname-track-101]
```

Related commands

delay

object

threshold percentage

track list threshold weight

Use **track list threshold weight** to create a track entry associated with a weight threshold list and enter Track view, or enter the view of an existing track entry.

Use **undo track** to remove the track entry and all its settings.

Syntax

track *track-entry-number* **list threshold weight**

undo track *track-entry-number*

Default

No track entries exist.

Views

System view

Predefined user roles

network-admin

Parameters

track-entry-number: Specifies the track entry ID in the range of 1 to 1024.

Usage guidelines

The Track module determines the state of a track entry by comparing the weight of Positive objects in the list with the weight thresholds configured for the list. To configure the threshold values used to determine the track entry state, use the **threshold weight** command.

To create a track entry, you must specify the tracked object type, which is **list threshold weight** in this command.

To enter the view of an existing track entry, use the **track** *track-entry-number* command. The tracked object type is not required.

To modify the settings for a track entry, execute the **undo track** command to remove the track entry, and then execute the **track list threshold weight** command again.

Examples

Create track entry 101 and associate it with a weight threshold list.

```
<Sysname> system-view
[Sysname] track 101 list threshold weight
[Sysname-track-101]
```

Related commands

delay

object

threshold weight

track lldp neighbor

Use **track lldp neighbor** to create a track entry associated with the neighbor availability status of an LLDP interface and enter Track view, or enter the view of an existing track entry.

Use **undo track** to remove the track entry and all its settings.

Syntax

track *track-entry-number* **lldp neighbor interface** *interface-type interface-number*

undo track *track-entry-number*

Default

No track entries exist.

Views

System view

Predefined user roles

network-admin

Parameters

track-entry-number: Specifies the track entry ID in the range of 1 to 1024.

interface *interface-type interface-number*: Specifies an LLDP interface by its type and number.

Usage guidelines

To create a track entry, you must specify the tracked object type, which is **lldp neighbor** in this command.

To enter the view of an existing track entry, use the **track** *track-entry-number* command. The tracked object type is not required.

To modify the settings for a track entry, execute the **undo track** command to remove the track entry, and then execute the **track lldp neighbor** command again.

Examples

\# Create track entry 1 to monitor the neighbor availability status of Ten-GigabitEthernet 1/0/1.

```
<Sysname> system-view
[Sysname] track 1 lldp neighbor interface ten-gigabitethernet 1/0/1
[Sysname-track-1]
```

Related commands

delay

display track

track nqa

Use **track nqa** to create a track entry associated with the reaction entry of an NQA operation and enter Track view, or enter the view of an existing track entry.

Use **undo track** to remove the track entry and all its settings.

Syntax

track *track-entry-number* **nqa entry** *admin-name operation-tag* **reaction** *item-number*

undo track *track-entry-number*

Default

No track entries exist.

Views

System view

Predefined user roles

network-admin

Parameters

track-entry-number: Specifies the track entry ID in the range of 1 to 1024.

entry *admin-name operation-tag*: Specifies the NQA operation to be associated with the track entry. The *admin-name* argument specifies the name of the NQA operation administrator who creates the NQA operation, and is a case-insensitive string of 1 to 32 characters. The *operation-tag* argument specifies the NQA operation tag, and is a case-insensitive string of 1 to 32 characters.

reaction *item-number*: Specifies the reaction entry to be associated with the track entry. The *item-number* argument is the reaction entry ID in the range of 1 to 10.

Usage guidelines

To create a track entry, you must specify the tracked object type, which is **nqa** in this command.

To enter the view of an existing track entry, use the **track** *track-entry-number* command. The tracked object type is not required.

To modify the settings for a track entry, execute the **undo track** command to remove the track entry, and then execute the **track nqa** command again.

Examples

Create track entry 1 and associate it with reaction entry 3 of the NQA operation **admin-test**.

```
<Sysname> system-view
[Sysname] track 1 nqa entry admin test reaction 3
[Sysname-track-1]
```

Related commands

delay

display track