74- Distributed Router Configuration Commands

74.1 Distributed Router Configuration Command Tree

Description

This chapter gives an overview of nodes that are handled by "Distributed Router Configuration Commands".

Command Tree

----configure
    ----dist-router
        ----[no] interface
            - (lt-vlan)
            - [no] addrtype
            - ip-address
            - [no] mpls
        ----mpls
            ----[no] interface
                - (index)
                - label-map
            ----[no] static-lsp
                - (lsp-name)
                - interface
                - push
                - [no] nexthopaddrtype
                - nexthop
        ----[no] sdp
            - (sdp-id)
            - lsp-name

74.2 Drouter IP Configuration Command

Command Description

This command allows the operator to configure a distributed router IP interface on a linecard and assign an IP address.

User Level

The command can be accessed by operators with drouter privileges, and executed by operators with drouter privileges.

Command Syntax

The command has the following syntax:

> configure dist-router (no interface (lt-vlan)) | (interface (lt-vlan) [no addrtype | addrtype <Drouter::IpAddressType>] ip-address <Drouter::IntfAddAndMask> [[no] mpls])

Command Parameters

Table 74.2-1 "Drouter IP Configuration Command" Resource Parameters

Resource Identifier	Type	Description
(lt-vlan)	Format: (slot-vlan : <Eqpt::RackId> / <Eqpt::ShelfId> / <Eqpt::SlotId> : <Eqpt::UnstackedVlan> | slot-stacked : <Eqpt::RackId> / <Eqpt::ShelfId> / <Eqpt::SlotId> : <Eqpt::SVlan> : <Eqpt::CVlan>) Possible values: - slot-vlan : slot unstacked (supported vlan [1...4093]) - slot-stacked : slot stacked (supported cvlan [0...4093]) Field type <Eqpt::RackId> - the rack number Field type <Eqpt::ShelfId> - the shelf number Field type <Eqpt::SlotId> - the LT slot number Field type <Eqpt::UnstackedVlan> - unstacked vlan id Field type <Eqpt::SVlan> - service vlan id Field type <Eqpt::CVlan> - customer vlan id	lt-vlan index

Table 74.2-2 "Drouter IP Configuration Command" Command Parameters

Parameter	Type	Description
[no] addrtype	Parameter type: <Drouter::IpAddressType> Format: (ipv4	*optional parameter with default value: "ipv4"* specify the type of IP address

Parameter	Type	Description
	| ipv6) Possible values: - ipv4 : ipv4 - ipv6 : ipv6	
ip-address	Parameter type: <Drouter::IntfAddAndMask> Format: <Drouter::V4AddressHex> / <Drouter::PrefixLength> Field type <Drouter::V4AddressHex> - IP Address Field type <Drouter::PrefixLength> - prefix length of the subnet - range: [1...31]	*mandatory parameter* specify IP Address
[no] mpls	Parameter type: boolean	*optional parameter* enable MPLS on the IP interface

74.3 Inbound MPLS LSP Configuration Command

Command Description

This command allows the operator to configure an inbound MPLS LSP, include the MPLS label of an incoming MPLS tunnel.

User Level

The command can be accessed by operators with drouter privileges, and executed by operators with drouter privileges.

Command Syntax

The command has the following syntax:

> configure dist-router mpls (no interface (index) label-map <Drouter::InSegLabel>) | (interface (index) label-map <Drouter::InSegLabel>)

Command Parameters

Table 74.3-1 "Inbound MPLS LSP Configuration Command" Resource Parameters

Resource Identifier	Type	Description
(index)	Format: (slot-vlan : <Eqpt::RackId> / <Eqpt::ShelfId> / <Eqpt::SlotId> : <Eqpt::UnstackedVlan> | slot-stacked : <Eqpt::RackId> / <Eqpt::ShelfId> / <Eqpt::SlotId> : <Eqpt::SVlan> : <Eqpt::CVlan>) Possible values: - slot-vlan : slot unstacked - slot-stacked : slot stacked Field type <Eqpt::RackId> - the rack number Field type <Eqpt::ShelfId> - the shelf number Field type <Eqpt::SlotId> - the LT slot number Field type <Eqpt::UnstackedVlan> - unstacked vlan id Field type <Eqpt::SVlan> - service vlan id Field type <Eqpt::CVlan> - customer vlan id	MPLS enabled ip interface index
label-map	Parameter type: <Drouter::InSegLabel> Format: - MPLS Insegment label - range: [32...1023]	Specify incoming MPLS label

74.4 Static Outbound MPLS LSP Configuration Command

Command Description

This command allows the operator to configure a static outbound MPLS LSP, include the MPLS label and nexthop of an outgoing MPLS tunnel.

User Level

The command can be accessed by operators with drouter privileges, and executed by operators with drouter privileges.

Command Syntax

The command has the following syntax:

> configure dist-router mpls (no static-lsp (lsp-name)) | (static-lsp (lsp-name) interface <Drouter::IfIndex> push <Drouter::OutLabel> [no nexthopaddrtype | nexthopaddrtype <Drouter::IpAddressType>] nexthop <Ip::V4AddressHex>)

Command Parameters

Table 74.4-1 "Static Outbound MPLS LSP Configuration Command" Resource Parameters

Resource Identifier	Type	Description
(lsp-name)	Format: - LSP name - range: [a-zA-Z0-9-_.] - length: 1<=x<=32	Administrative name for the LSP

Table 74.4-2 "Static Outbound MPLS LSP Configuration Command" Command Parameters

Parameter	Type	Description
interface	Parameter type: <Drouter::IfIndex> Format: (slot-vlan : <Eqpt::RackId> / <Eqpt::ShelfId> / <Eqpt::SlotId> : <Eqpt::UnstackedVlan> | slot-stacked : <Eqpt::RackId> / <Eqpt::ShelfId> / <Eqpt::SlotId> : <Eqpt::SVlan> : <Eqpt::CVlan>) Possible values: - slot-vlan : slot unstacked - slot-stacked : slot stacked Field type <Eqpt::RackId> - the rack number Field type <Eqpt::ShelfId> - the shelf number Field type <Eqpt::SlotId> - the LT slot number	*mandatory parameter* specify the outgoing interface

Parameter	Type	Description
	Field type <Eqpt::UnstackedVlan> - unstacked vlan id Field type <Eqpt::SVlan> - service vlan id Field type <Eqpt::CVlan> - customer vlan id	
push	Parameter type: <Drouter::OutLabel> Format: - Out Label - range: [1...1048575]	*mandatory parameter* specify the outgoing label
[no] nexthopaddrtype	Parameter type: <Drouter::IpAddressType> Format: (ipv4 | ipv6) Possible values: - ipv4 : ipv4 - ipv6 : ipv6	*optional parameter with default value: "ipv4"* specify the type of next hop IP address
nexthop	Parameter type: <Ip::V4AddressHex> Format: - IPv4-address	*mandatory parameter* Next hop IP address

74.5 SDP Configuration Command

Command Description

This command allows the operator to configure an SDP(typically corresponding to an MPLS tunnel).

User Level

The command can be accessed by operators with drouter privileges, and executed by operators with drouter privileges.

Command Syntax

The command has the following syntax:

> configure dist-router (no sdp (sdp-id)) | (sdp (sdp-id) lsp-name <Drouter::MplsLspName>)

Command Parameters

Table 74.5-1 "SDP Configuration Command" Resource Parameters

Resource Identifier	Type	Description
(sdp-id)	Format: - SDP ID - range: [1...17407]	SDP Identifier

Table 74.5-2 "SDP Configuration Command" Command Parameters

Parameter	Type	Description
lsp-name	Parameter type: <Drouter::MplsLspName> Format: - LSP name - range: [a-zA-Z0-9-_.] - length: 1<=x<=32	*mandatory parameter* LSP name to set the LSP list