



## V150.1 MER Support in SDP Passthrough Mode

The Cisco V.150.1 Minimum Essential Requirements (MER) feature complies with the requirements of the National Security Agency (NSA) SCIP-216 Minimum Essential Requirements for V.150.1 recommendation, which provides for four states: audio, voice-band data (VBD), modem relay, and T.38. This feature is added in CUBE (IP-IP gateway) for V.150.1 calls to traverse a CUBE in SDP passthrough flow-through mode.

- [Finding Feature Information, page 1](#)

### Finding Feature Information

Your software release may not support all the features documented in this module. For the latest caveats and feature information, see [Bug Search Tool](#) and the release notes for your platform and software release. To find information about the features documented in this module, and to see a list of the releases in which each feature is supported, see the feature information table.

Use Cisco Feature Navigator to find information about platform support and Cisco software image support. To access Cisco Feature Navigator, go to [www.cisco.com/go/cfn](http://www.cisco.com/go/cfn). An account on Cisco.com is not required.

### Information About VER.150.1 MER Support in SDP Passthrough Mode

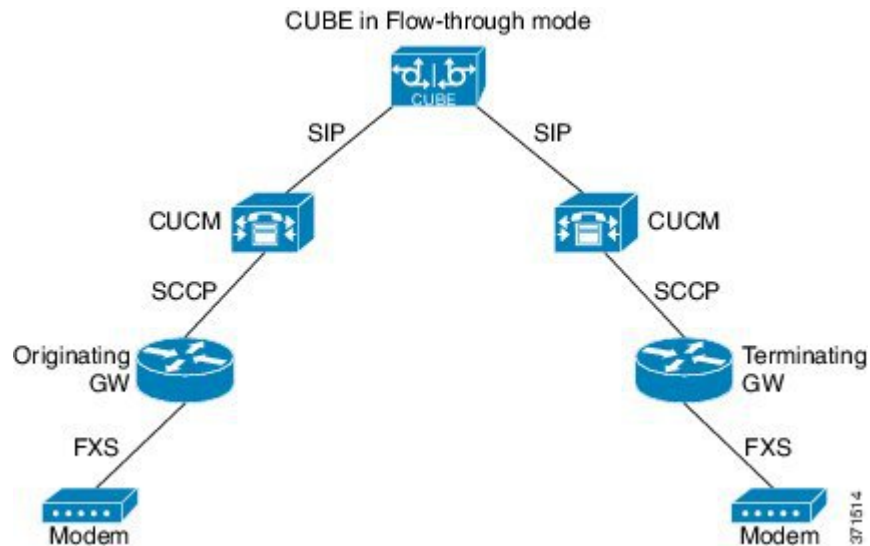
#### V.150.1 MER Support in SDP Passthrough Mode

V.150.1 is an ITU standard for relaying modem or fax transmission that uses state signaling event (SSE) packets to trigger the transition from audio to modem-relay mode or fax-relay mode. The SSE headers are carried in the RTP packet. After call setup, in-band signaling through Simple Packet Relay Transport (SPRT) and SSE messages is used to transition from one state to another. SPRT packets (non-RTP packets) carry the data after the digital signal processor (DSP) transitions into modem relay mode. UDPTL packets carry the data after the DSP transitions into fax-relay mode.

This feature is added in CUBE (IP-to-IP gateway) to support the V.150.1 MER modem relay in SDP passthrough mode. This is of importance when CUBE is in the media path between V.150.1 MER supported gateways and needs to handle non-RTP packets (such as SPRT packets).

## Modem Relay Topology

Figure 1: Topology—Modem Relay



## How to Configure V.150.1 MER Support for SDP Passthrough

### Configuring V.150.1 MER Support for SDP Passthrough

#### SUMMARY STEPS

1. **enable**
2. **configure terminal**
3. Set passthrough SDP mode to non-RTP:
  - **voice-class sip pass-thru content sdp mode non-rtp** in the dial-peer configuration mode.
  - **pass-thru content sdp mode non-rtp** in the global VoIP SIP configuration mode.
4. **end**

## DETAILED STEPS

	Command or Action	Purpose
Step 1	<p><b>enable</b></p> <p><b>Example:</b></p> <pre>Device&gt; enable</pre>	Enables privileged EXEC mode. Enter your password if prompted.
Step 2	<p><b>configure terminal</b></p> <p><b>Example:</b></p> <pre>Device# configure terminal</pre>	Enters global configuration mode.
Step 3	<p>Set passthrough SDP mode to non-RTP:</p> <ul style="list-style-type: none"> <li>• <b>voice-class sip pass-thru content sdp mode non-rtp</b> in the dial-peer configuration mode.</li> <li>• <b>pass-thru content sdp mode non-rtp</b> in the global VoIP SIP configuration mode.</li> </ul> <p><b>Example:</b> In dial-peer configuration mode</p> <pre>!Setting passthrough SDP mode for one dial peer only Device (config)#dial-peer voice 20 voip Device (config-dial-peer)#voice-class sip pass-thru content sdp mode non-rtp Device (config-dial-peer)#end</pre> <p><b>Example:</b> In global VoIP SIP mode</p> <pre>!Setting passthrough SDP mode globally Device (config)#voice service voip Device (conf-voi-serv)#sip Device (conf-serv-sip)#pass-thru content sdp mode non-rtp Device (conf-serv-sip)#end</pre>	
Step 4	<b>end</b>	Exits to privileged EXEC mode.

## Verifying V.150.1 MER Support in SDP Passthrough Mode

## SUMMARY STEPS

1. enable
2. debug ccsip verbose

## DETAILED STEPS

### Step 1 enable

**Example:**

```
Device> enable
```

Enables privileged EXEC mode.

### Step 2 debug ccsip verbose

**Example:**

```
Device# debug ccsip verbose
```

```
010362: *Jan 31 12:34:00.148: //31/14B4F1000000/SIP/Function/sipSPI_ipip_SetSdpPthruCfg:
010363: *Jan 31 12:34:00.148: //31/14B4F1000000/SIP/Function/sipSPI_ipip_IsSDPPassthruEnabled:
010364: *Jan 31 12:34:00.148:
//31/14B4F1000000/SIP/Info/critical/8192/sipSPI_ipip_IsSDPPassthruEnabled: - 1
010365: *Jan 31 12:34:00.148: //31/14B4F1000000/SIP/Function/sipSPI_ipip_SetSDPPassthruMode:
010366: *Jan 31 12:34:00.148: //31/14B4F1000000/SIP/Info/info/128/sipSPI_ipip_SetSDPPassthruMode:
SDP Passthru Mode is set to - 1

011365: *Jan 31 12:34:02.604: //31/14B4F1000000/SIP/Function/sipSPIGetStream:
011366: *Jan 31 12:34:02.604:
//32/14B4F1000000/SIP/Info/info/128/sipSPI_ipip_UpdatePthruStreamRtcpInfo: Setting stream xmit
function to voip_udp_xmit
011367: *Jan 31 12:34:02.604: //32/14B4F1000000/SIP/Function/sipSPIGetRSVPIPTos
```

## Feature Information for V.150.1 MER Support for SDP Passthrough

The following table provides release information about the feature or features described in this module. This table lists only the software release that introduced support for a given feature in a given software release train. Unless noted otherwise, subsequent releases of that software release train also support that feature.

Use Cisco Feature Navigator to find information about platform support and Cisco software image support. To access Cisco Feature Navigator, go to [www.cisco.com/go/cfn](http://www.cisco.com/go/cfn). An account on Cisco.com is not required.

**Table 1: Feature Information for V.150.1 MER Support for SDP Passthrough**

Feature Name	Releases	Feature Information
V.150.1 MER Support for SDP Passthrough	15.4(2)T	<p>The Cisco V.150.1 Minimum Essential Requirements (MER) feature complies with the requirements of the National Security Agency (NSA) SCIP-216 Minimum Essential Requirements for V.150.1 recommendation, which provides for four states: audio, voice-band data (VBD), modem relay, and T.38. This feature is added in CUBE (IP-IP gateway) for V.150.1 calls to traverse a CUBE in SDP passthrough flow-through mode.</p> <p>The following commands were introduced or modified: <b>pass-thru content sdp mode non-rtp</b> and <b>voice-class sip pass-thru content sdp mode non-rtp</b></p>

