

H.320 게이트웨이 - H.323 게이트키퍼 비디오 통화 흐름

목차

[소개](#)

[사전 요구 사항](#)

[요구 사항](#)

[사용되는 구성 요소](#)

[표기 규칙](#)

[구성](#)

[네트워크 다이어그램](#)

[다이얼 플랜](#)

[구성](#)

[대역폭 소비](#)

[통화 흐름 예](#)

[용량 계획](#)

[다음을 확인합니다.](#)

[문제 해결](#)

[디버그 명령](#)

[디버그 출력](#)

[관련 정보](#)

소개

이 문서에서는 H.323 게이트키퍼 비디오 통화에 대한 기본 H.320 게이트웨이의 통화 흐름에 대해 설명합니다. H.320은 ISDN 네트워크를 통한 멀티미디어 데이터, 음성 및 비디오 통화를 위한 ITU-T 권장 사항입니다.

H.320은 다음 프로토콜로 구성됩니다.

- H.221 - 하나 이상의 ISDN B-채널에서 시청각 텔레스코서비스의 프레임 구조를 정의합니다.
- H.230 - 시청각 시스템에서 사용되는 제어 및 정보 신호를 정의합니다.
- H.242 - 멀티미디어 통화를 설정하는 데 필요한 모드 초기화, 기능 교환 및 모드 전환과 같은 신호 처리 절차를 정의합니다.

각 H.320 비디오 통화는 1차 통화와 0개 이상의 2차 통화로 구성됩니다. 예를 들어 128K 비디오 통화는 1개의 기본 통화 및 1개의 2차 통화로 구성됩니다.

[사전 요구 사항](#)

[요구 사항](#)

이 문서에 대한 특정 요건이 없습니다.

사용되는 구성 요소

이 문서의 정보는 다음 소프트웨어 및 하드웨어 버전을 기반으로 합니다.

- H.320 게이트웨이: Cisco 3725 with NM-HDV2(5510 DSP)
- H.323 게이트키퍼: Cisco 3660
- H.323 비디오 터미널: Polycom V500
- 대역폭 = 384K

이 문서의 정보는 특정 랩 환경의 디바이스를 토대로 작성되었습니다. 이 문서에 사용된 모든 디바이스는 초기화된(기본) 컨피그레이션으로 시작되었습니다. 현재 네트워크가 작동 중인 경우, 모든 명령어의 잠재적인 영향을 미리 숙지하시기 바랍니다.

표기 규칙

문서 규칙에 대한 자세한 내용은 [Cisco 기술 팁 규칙](#)을 참조하십시오.

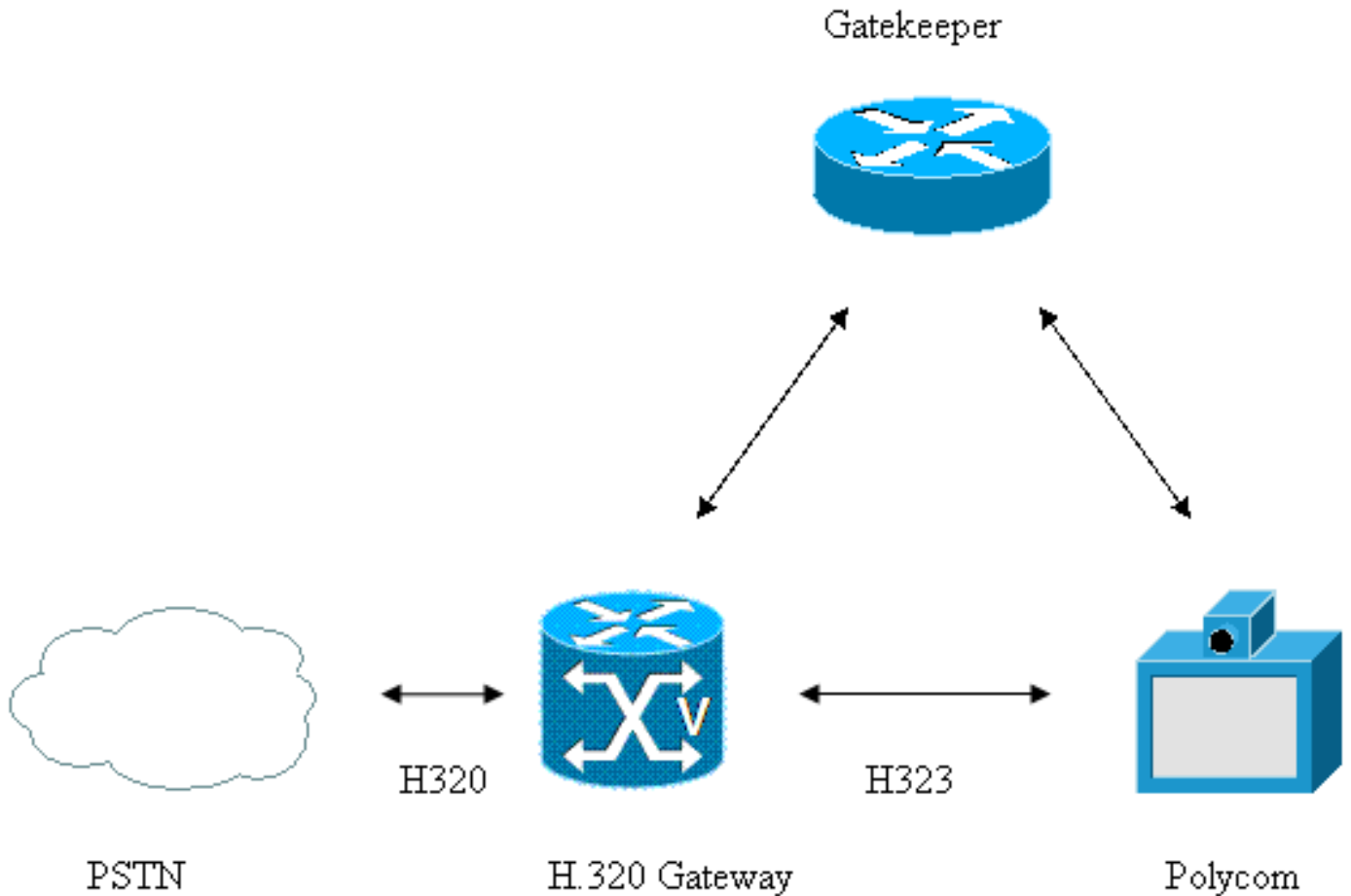
구성

이 섹션에는 이 문서에서 설명하는 기능을 구성하기 위한 정보가 표시됩니다.

참고: 이 섹션에 사용된 명령에 대한 자세한 내용을 보려면 [명령 조회 도구](#)([등록된](#) 고객만 해당)를 사용하십시오.

네트워크 다이어그램

이 문서에서는 다음 네트워크 설정을 사용합니다.



다이얼 플랜

이 문서에서는 다음 다이얼 플랜을 사용합니다.

- PSTN의 비디오 엔드포인트:919-392-6000H.320 기본 호출 번호:919-392-6000H.320 보조 호출 번호:919-392-6001 - 919-392-6005
- Polycom:919-991-5600H.320 기본 호출 번호:919-991-5600H.320 보조 호출 번호:919-991-5601 - 919-991-5605

구성

이 문서에서는 다음 구성을 사용합니다.

DeviceH.320 게이트웨이 구성 이름 1

```
voice class h323 1
!--- Slow start is required for Video calls call start
slow voice class called number inbound 1 index 1
9199915601 index 2 9199915602 index 3 9199915603 index 4
9199915604 index 5 9199915605 voice class called number
outbound 1 index 1 9193926001 index 2 9193926002 index 3
9193926003 index 4 9193926004 index 5 9193926005
controller T1 2/0 framing esf linecode b8zs pri-group
timeslots 1-24 interface Serial2/1:23 no ip address
encapsulation hdlc isdn switch-type primary-ni !---
Specifies gateway to accept data, voice and video !---
calls on the same ISDN interface isdn integrate calltype
all no cdp enable dial-peer voice 9190 pots description
```

```
"Inbound H320 Dial-peer" !--- Specifies that this is a
H.320 dial-peer information-type video !--- Specifies
the list of called-numbers used to associate !---
secondary calls with primary call of an inbound video
call voice-class called-number inbound 1 !--- Specifies
the list of called-numbers used for !--- making
secondary calls of an outbound video call voice-class
called-number outbound 1 incoming called-number
91991.... !--- Maximum bandwidth allowed for a video
call !--- across this dial-peer bandwidth maximum 384
direct-inward-dial port 2/1:23 forward-digits all dial-
peer voice 9910 voip description "Dial-peer to Polycom"
destination-pattern 91991.... voice-class h323 1 !---
Specifies video codec to be used video codec h263+ !---
Specifies the RTP Payload Type to be used !--- for the
Video codec rtp payload-type cisco-codec-video-h263+ 110
session target ras incoming called-number 919392....
codec g711ulaw no vad
```

대역폭 소비

이 문서에서 설명하는 비디오 통화는 384K 대역폭을 사용합니다.

비디오 통화의 대역폭 소비:

- = 384K
- = 6 * 64K
- = 6 B-Channels
- = 1 H.320 Primary call and 5 Secondary calls

통화 흐름 예

이 섹션에서는 이 컨피그레이션 예제의 결과로 나타나는 통화 흐름에 대해 설명합니다.

1. PSTN의 ISDN 통화는 H.320 게이트웨이에 도착하며, 919-991-5600은 호출된 번호이며, 베어러 기능(베어러 상한선)은 B-channel=1에서 *Unrestricted Digital*으로 설정됩니다.
2. H.320 게이트웨이는 수신 다이얼 피어 검색을 수행합니다. 베어러 캡은 *Unrestricted digital*으로 설정되었으므로 먼저 H.320 POTS 다이얼 피어(정보 유형이 *비디오*로 설정된 다이얼 피어)를 검색하고 다이얼 피어 9190을 확인합니다. 첫 번째 통화를 기본 통화라고 합니다.
3. H.320 게이트웨이는 발신 다이얼 피어 검색을 수행하고 다이얼 피어 9910을 통해 통화를 라우팅합니다.
4. H.320 게이트웨이는 게이트키퍼에게 ARQ(Admission Request)를 전송하고 ACF(Admission Confirmation) 메시지를 수신합니다.
5. H.320 게이트웨이는 Polycom에 H.225 SETUP 메시지를 전송합니다.
6. H.320 게이트웨이는 Polycom에서 H.225 CONNECT 메시지를 수신하고 비디오 통화는 IP 레그에 연결됩니다.
7. H.320 게이트웨이가 PSTN에 ISDN CONNECT 메시지를 전송하고 기본 통화가 연결됨
8. H.320 게이트웨이는 POTS 레그에 H.221 초기 기능을 전송합니다.
9. H.221 프레임 동기화는 B-channel = 1(초기 채널 또는 기본 통화라고도 함)에 걸쳐 설정됩니다.
10. 프레임 동기화가 설정되면 Polycom은 두 번째 통화를 차례로 5개 시작합니다. 프레임 동기화는 B-채널 2에서 6(추가 채널 또는 보조 통화라고도 함)으로 설정됩니다.
11. H.320 게이트웨이는 919-991-5601~919-991-5605 범위의 수신 2차 통화를 기본 통화(2단계

)와 음성 클래스의 착신 번호 1 명령을 컨피그레이션에 표시된 대로 정의합니다.

12. H.320 게이트웨이 및 Polycom은 IP 레그와 POTS 레그에 걸쳐 오디오 및 비디오 스트림을 위한 오디오 및 비디오 기능과 개방형 OLC(논리적 채널)를 교환합니다.

용량 계획

네트워크에 비디오 트래픽을 배치하기 전에 필요한 모든 애플리케이션에 적절한 대역폭이 있는지 확인합니다. 먼저 각 주요 애플리케이션(예: 음성, 비디오, 데이터)의 최소 대역폭 요구 사항을 계산합니다. 합계는 특정 링크의 최소 대역폭 요구 사항을 나타냅니다. 이 양은 해당 링크에서 사용 가능한 총 대역폭의 75%를 초과하지 않아야 합니다. 이 75% 규칙은 오버헤드 트래픽에 일부 대역폭이 필요하다고 가정합니다. 오버헤드 트래픽의 예로는 라우팅 프로토콜 업데이트, 레이어 2 keepalive 및 이메일 및 HTTP 트래픽과 같은 추가 애플리케이션이 있습니다. 음성 및 비디오 트래픽이 링크 용량의 33%를 넘지 않도록 함

H.323 비디오

H.323 표준에 따르면 H.323 터미널의 비디오 기능은 선택 사항입니다. 그러나 H.323 터미널을 구현할 때 터미널은 H.263 표준에 대한 선택적 지원과 함께 H.261 코덱을 지원해야 합니다.

- H.261 - 64kbps의 배수로 시청각 서비스를 위한 비디오 코덱입니다. H.261 호환 장치는 초기 프레임의 프레임을 완전히 인코딩합니다. 그런 다음 디바이스에서는 최소 패킷 전송을 위해 초기 프레임과 후속 프레임 간의 차이점만 코딩합니다. 동작 보정 옵션을 선택하면 이미지 품질이 향상됩니다.
- H.263 - POTS(Video Plain Old Telephone Service)용 비디오 코덱입니다. H.263 표준은 H.261 표준에 대한 이전 버전과 호환되는 업데이트입니다. H.263은 요구 사항인 절반 픽셀 동작 추정 기법을 사용하여 사진 품질을 크게 향상시킵니다.

다음을 확인합니다.

이 섹션을 사용하여 컨피그레이션이 제대로 작동하는지 확인합니다.

Output [Interpreter 도구\(등록된 고객만 해당\)](#)(OIT)는 특정 **show** 명령을 지원합니다. OIT를 사용하여 **show** 명령 출력의 분석을 봅니다.

• 음성 통화 요약 표시

```
PORT CODEC VAD VTSP STATE VPM STATE
=====
2/1:23.1 h320p n S_CONNECT S_TSP_CONNECT
2/1:23.2 h320s - S_CONNECT S_TSP_CONNECT
2/1:23.3 h320s - S_CONNECT S_TSP_CONNECT
2/1:23.4 h320s - S_CONNECT S_TSP_CONNECT
2/1:23.5 h320s - S_CONNECT S_TSP_CONNECT
2/1:23.6 h320s - S_CONNECT S_TSP_CONNEC
```

h320p --> H.320 Primary Call; h320s --> H.320 Secondary Call

- **통화 활성 비디오 개요 표시**이 출력에서 비디오 통화에 대한 Rx/Tx 카운터는 기본 통화에 대해서만 보고되며 보조 통화에 대해서는 보고되지 않습니다.

```
tx:H263+ 2056/1616633 à Refers to number of H.221 bytes transmitted by
the H.320 Gateway across the POTS leg
```

```
rx:H263+ 2175/1231395 à Refers to the number of H.221 bytes received by
the H.320 Gateway across the POTS Leg
```

Rx/Tx includes audio, video and signaling information carried across

H.221
frames.

Telephony call-legs: 6
SIP call-legs: 0
H323 call-legs: 1
Call agent controlled call-legs: 0
SCCP call-legs: 0
Multicast call-legs: 0
Media call-legs: 0
Total call-legs: 7
11F6 : 271 87874530ms.1 +130 pid:9190 Answer 9193926000 active
dur 00:01:14 tx:3585/602280 rx:6686/534880
Tele 2/1:23 (271) [2/1.1] tx:0/0/0ms g711ulaw noise:0 acom:
0 i/0:0/0 dBm
video: h320:Primary tx:H263+ 2056/1616633 rx:H263+ 2175/1231395
11F6 : 272 87874540ms.1 +110 pid:9910 Originate 9199915600 active
dur 00:01:14 tx:8777/2192461 rx:5789/1830054
IP 14.50.5.52:49192 SRTP: off rtt:0ms pl:0/0ms lost:0/0/0 delay:
0/0/0ms g711ulaw TextRelay: off
media inactive detected:n media contrl rcvd:n/a timestamp:n/a
long duration call detected:n long duration call duration:n/a
timestamp:n/a

11F7 : 273 87874820ms.1 +0 pid:9190 Answer 9193926000 active
dur 00:01:13 tx:0/0 rx:0/0
Tele 2/1:23 (273) [2/1.2] tx:0/0/0ms None noise:0 acom:0 i/0:0/0 dBm
video: h320:Secondary
11F8 : 274 87875140ms.1 +0 pid:9190 Answer 9193926000 active
dur 00:01:13 tx:0/0 rx:0/0
Tele 2/1:23 (274) [2/1.3] tx:0/0/0ms None noise:0 acom:0 i/0:0/0 dBm
video: h320:Secondary
11F9 : 275 87875460ms.1 +0 pid:9190 Answer 9193926000 active
dur 00:01:13 tx:0/0 rx:0/0
Tele 2/1:23 (275) [2/1.4] tx:0/0/0ms None noise:0 acom:0 i/0:0/0 dBm
video: h320:Secondary
11FA : 276 87875780ms.1 +0 pid:9190 Answer 9193926000 active
dur 00:01:14 tx:0/0 rx:0/0
Tele 2/1:23 (276) [2/1.5] tx:0/0/0ms None noise:0 acom:0 i/0:0/0 dBm
video: h320:Secondary
11FB : 277 87876100ms.1 +0 pid:9190 Answer 9193926000 active
dur 00:01:13 tx:0/0 rx:0/0
Tele 2/1:23 (277) [2/1.6] tx:0/0/0ms None noise:0 acom:0 i/0:0/0 dBm
video: h320:Secondary

Telephony call-legs: 6
SIP call-legs: 0
H323 call-legs: 1
Call agent controlled call-legs: 0
SCCP call-legs: 0
Multicast call-legs: 0
Media call-legs: 0
Total call-legs: 7

• 통화 활성 비디오 표시포트 레그 - 기본 통화

GENERIC:
SetupTime=87874530 ms
Index=1
PeerAddress=9193926000
PeerSubAddress=
PeerId=9190
PeerIfIndex=120
LogicalIfIndex=61
ConnectTime=87874660 ms
CallDuration=00:01:39 sec

CallState=4
CallOrigin=2
ChargedUnits=0
InfoType=video
TransmitPackets=4853
TransmitBytes=815304
ReceivePackets=9223
ReceiveBytes=737840
TELE:
ConnectionId=[0x37D44522 0x532111DB 0x801B000D 0x28D3D7C0]
IncomingConnectionId=[0x37D44522 0x532111DB 0x801B000D 0x28D3D7C0]
CallID=271
TxDuration=0 ms
VoiceTxDuration=0 ms
FaxTxDuration=0 ms
CoderTypeRate=g711ulaw
NoiseLevel=0
ACOMLevel=0
OutSignalLevel=0
InSignalLevel=0
InfoActivity=0
ERLLevel=0
SessionTarget=
ImgPages=0
CallerName=
CallerIDBlocked=False
LongDurationCallDetected=no
LongDurCallTimeStamp=
LongDurCallDuration=
OriginalCallingNumber=9193926000
OriginalCallingOctet=0x21
OriginalCalledNumber=9199915600
OriginalCalledOctet=0xA1
OriginalRedirectCalledNumber=
OriginalRedirectCalledOctet=0xFF
TranslatedCallingNumber=9193926000
TranslatedCallingOctet=0x21
TranslatedCalledNumber=9199915600
TranslatedCalledOctet=0xA1
TranslatedRedirectCalledNumber=
TranslatedRedirectCalledOctet=0xFF
GwReceivedCalledNumber=9199915600
GwReceivedCalledOctet3=0xA1
GwReceivedCallingNumber=9193926000
GwReceivedCallingOctet3=0x21
GwReceivedCallingOctet3a=0x82
DSPIdentifier=2/3:1
VIDEO:
H320CallType=Primary
VideoTransmitCodec=H263+
VideoReceiveCodec=H263+
VideoUsedBandwidth=3840
H221 STATS (AUDIO):
TxPackets=9123
TxDuration=91230 ms
RxPackets=4561
RxDuration=91130 ms
BadHeaders=0
PacketsLate=0
PacketsEarly=1
ReceiveDelay=35 ms
ConcealmentDuration=0 ms
BufferOverflowDiscards=80
H221 STATS (VIDEO):

TxPackets=2958
TxBytes=2547987
PSC=2686 --> Number of Picture Start Codes detected
GBSC=2686 --> Number of Group of Block Start Codes detected
TxVideoFormat=7
RxPackets=3037
RxBytes=1999240
VideoBytesConsumed=1986099
FillBytesConsumed=1658651
PSCPacketDrops=0 --> Number of packets dropped at beginning of
stream due to missing Picture Start Code
LatePacket=0
OutOfSequence=0
BadHeader=0
BadSSRC=0
BadPayloadType=0
BufferOverflow=0
ControlHeaderOverflow=0
FilteredDelay=450 ms --> Average delay of received video packets
MinimumDelay=3 ms
MaximumDelay=619 ms
RxVideoFormat=7

포트 레그 - 보조 통화

GENERIC:

SetupTime=87874820 ms
Index=1
PeerAddress=9193926000
PeerSubAddress=
PeerId=9190
PeerIfIndex=120
LogicalIfIndex=62
ConnectTime=87874820 ms
CallDuration=00:01:44 sec
CallState=4
CallOrigin=2
ChargedUnits=0
InfoType=video
TransmitPackets=0
TransmitBytes=0
ReceivePackets=0
ReceiveBytes=0

TELE:

ConnectionId=[0x38016FD6 0x532111DB 0x801C000D 0x28D3D7C0]
IncomingConnectionId=[0x37D44522 0x532111DB 0x801B000D 0x28D3D7C0]
CallID=273
TxDuration=0 ms
VoiceTxDuration=0 ms
FaxTxDuration=0 ms
CoderTypeRate=None
NoiseLevel=0
ACOMLevel=0
OutSignalLevel=0
InSignalLevel=0
InfoActivity=0
ERLLevel=0
SessionTarget=
ImgPages=0
CallerName=
CallerIDBlocked=False
LongDurationCallDetected=no
LongDurCallTimeStamp=
LongDurCallDuration=
OriginalCallingNumber=9193926000

OriginalCallingOctet=0x21
OriginalCalledNumber=9199915601
OriginalCalledOctet=0xA1
OriginalRedirectCalledNumber=
OriginalRedirectCalledOctet=0xFF
TranslatedCallingNumber=9193926000
TranslatedCallingOctet=0x21
TranslatedCalledNumber=9199915601
TranslatedCalledOctet=0xA1
TranslatedRedirectCalledNumber=
TranslatedRedirectCalledOctet=0xFF
GwReceivedCalledNumber=9199915601
GwReceivedCalledOctet3=0xA1
GwReceivedCallingNumber=9193926000
GwReceivedCallingOctet3=0x21
GwReceivedCallingOctet3a=0x82

VIDEO:

H320CallType=Secondary

IP 레그

GENERIC:

SetupTime=87874540 ms
Index=1
PeerAddress=9199915600
PeerSubAddress=
PeerId=9910
PeerIfIndex=121
LogicalIfIndex=0
ConnectTime=87874650 ms
CallDuration=00:01:41 sec
CallState=4
CallOrigin=1
ChargedUnits=0
InfoType=speech
TransmitPackets=12528
TransmitBytes=3429599
ReceivePackets=8123
ReceiveBytes=2914089

VOIP:

ConnectionId[0x37D44522 0x532111DB 0x801B000D 0x28D3D7C0]
IncomingConnectionId[0x37D44522 0x532111DB 0x801B000D 0x28D3D7C0]
CallID=272
RemoteIPAddress=14.50.5.52
RemoteSignallingIPAddress=14.50.5.52
RemoteSignallingPort=1720
RemoteMediaIPAddress=14.50.5.52
RoundTripDelay=0 ms
tx_DtmfRelay=inband-voice
FastConnect=FALSE

AnnexE=FALSE

Separate H245 Connection=TRUE

H245 Tunneling=FALSE

SessionProtocol=cisco
ProtocolCallId=
SessionTarget=ras
OnTimeRvPlayout=0
GapFillWithSilence=0 ms
GapFillWithPrediction=0 ms
GapFillWithInterpolation=0 ms
GapFillWithRedundancy=0 ms

HiWaterPlayoutDelay=0 ms
LoWaterPlayoutDelay=0 ms
TxPakNumber=0
TxSignalPak=0
TxComfortNoisePak=0
TxDuration=0
TxVoiceDuration=0
RxPakNumber=0
RxSignalPak=0
RxComfortNoisePak=0
RxDuration=0
RxVoiceDuration=0
RxOutOfSeq=0
RxLatePak=0
RxEarlyPak=0
RxBadProtocol=0
PlayDelayCurrent=0
PlayDelayMin=0
PlayDelayMax=0
PlayDelayClockOffset=0
PlayDelayJitter=0 ms
PlayErrPredictive=0
PlayErrInterpolative=0
PlayErrSilence=0
PlayErrBufferOverflow=0
PlayErrRetroactive=0
PlayErrTalkspurt=0
OutSignalLevel=0
InSignalLevel=0
LevelTxPowerMean=0
LevelRxPowerMean=0
LevelBgNoise=0
ERLLevel=0
ACOMLevel=0
ErrRxDrop=0
ErrTxDrop=0
ErrTxControl=0
ErrRxControl=0
Outgoing Area=Video-GK
VideoTransmitCodec=H263+
VideoTransmitPackets=0
VideoTransmitBytes=0
VideoReceiveCodec=H263+
VideoReceivePackets=0
VideoReceiveBytes=0
VideoCap_Codec=H263+
VideoCap_Format=4CIF
VideoLostPackets=0
VideoEarlyPackets=0
VideoLatePackets=0
VideoUsedBandwidth=7300
VideoNumberOfChannels=2

Incoming Channel Number = 3
Type = VIDEO
RX Bandwidth = 3010
RemotePort = 49192
LocalPort = 18982
SelectedQos = best-effort
Incoming Channel Number = 2
Type = AUDIO
RX Bandwidth = 640
RemotePort = 49190
LocalPort = 16640

```
SelectedQos = best-effort
```

```
ReceiveDelay=0 ms
```

```
LostPackets=0
```

```
EarlyPackets=0
```

```
LatePackets=0
```

```
SRTP = off
```

```
TextRelay = off
```

```
VAD = disabled
```

```
CoderTypeRate=g711ulaw
```

```
CodecBytes=160
```

```
Media Setting=flow-through
```

```
AlertTimepoint=87874600 ms
```

• voip rtp 연결 표시

```
VoIP RTP active connections :
```

```
No. CallId dstCallId LocalRTP RmtRTP LocalIP RemoteIP
```

```
1 272 271 16640 49190 14.1.16.220 14.50.5.52
```

```
2 278 279 18982 49192 14.1.16.220 14.50.5.52
```

```
Found 2 active RTP connections
```

문제 해결

이 섹션에서는 컨피그레이션 문제를 해결하는 데 사용할 수 있는 정보를 제공합니다.

디버그 명령

- 디버그 h225 asn1
- 디버그 h225 q931
- 디버그 h245 asn1
- 디버그 isdn q931
- debug voip h221 inout
- 디버그 voip ccapi inout

참고: debug 명령을 사용하기 전에 디버그 [명령에 대한 중요 정보](#)를 참조하십시오.

디버그 출력

이 섹션에서는 이 샘플 통화 흐름에 대한 디버그 출력을 제공합니다.

1. [수신 SETUP\(수신자 번호 = 9199915600 및 베어러-CAP가 무제한 디지털로 설정\)](#)
2. [인바운드 다이얼 피어 9190이 일치함](#)
3. [아웃바운드 Dial-Peer 9910이 일치함](#)
4. [H.320 게이트웨이가 게이트키퍼에게 ARQ 요청 전송](#)
5. [H.320 게이트웨이가 게이트키퍼로부터 ACF 응답을 수신함](#)
6. [H.320 게이트웨이가 H.225 설정 메시지를 Polycom으로 전송](#)
7. [IP 레그에 연결된 통화](#)
8. [H.320 게이트웨이가 ISDN 측에서 CONNECT를 보내고 통화가 연결됨](#)
9. [H.320 게이트웨이가 초기 기능 세트를 전송합니다.](#)
10. [B-Channel 1에서 프레임 동기화 설정](#)
11. [H.320 게이트웨이가 첫 번째 보조 통화를 수신함](#)
12. [첫 번째 보조 통화가 연결됨](#)
13. [B-Channel 2에서 프레임 동기화 설정](#)
14. [H.320 게이트웨이가 두 번째 보조 통화를 수신함](#)

15. [두 번째 보조 통화가 연결됨](#)
16. [H.320 게이트웨이가 PSTN의 비디오 엔드포인트에서 BAS 명령 수신](#)
17. [B-Channel 3에서 프레임 동기화 설정](#)
18. [H.320 게이트웨이가 세 번째 보조 통화를 수신함](#)
19. [세 번째 보조 통화가 연결됨](#)
20. [B-Channel 4에서 프레임 동기화 설정](#)
21. [H.320 게이트웨이가 네 번째 보조 통화를 수신함](#)
22. [네 번째 보조 통화가 연결됨](#)
23. [B-Channel 4에서 프레임 동기화 설정](#)
24. [H.320 게이트웨이가 다섯 번째 보조 통화를 수신함](#)
25. [다섯 번째 보조 통화가 연결됨](#)
26. [B-Channel 6에서 프레임 동기화 설정](#)
27. [H.320 게이트웨이가 PSTN의 비디오 엔드포인트에서 기능 집합 수신](#)
28. [H.320 게이트웨이가 PSTN의 비디오 엔드포인트에 기능 집합 전송](#)
29. [H.320 게이트웨이는 TCS를 통해 오디오\(G711ulaw\) 및 비디오\(H.263\) 기능을 IP 레그를 통해 Polycom에 광고합니다.](#)
30. [H.320 게이트웨이가 MSD 요청을 Polycom으로 전송](#)
31. [H.320 게이트웨이가 Polycom의 오디오\(G.722, G.728, G.711\) 및 비디오\(H.263\) 기능 집합을 수신함](#)
32. [H.320 게이트웨이가 TCS ACK를 Polycom으로 전송](#)
33. [H.320 게이트웨이가 Polycom에서 MSD 요청을 수신함](#)
34. [H.320 게이트웨이가 MSD ACK를 Polycom으로 전송](#)
35. [H.320 게이트웨이가 Polycom에서 TCS ACK 수신](#)
36. [H.320 게이트웨이가 Polycom에서 MSD ACK를 수신함](#)
37. [H.320 게이트웨이가 Polycom에서 오디오 OLC\(G.711\)를 수신함](#)
38. [H.320 게이트웨이가 POTS 레그의 전 범위에서 발신 오디오 모드 설정](#)
39. [H.320 게이트웨이가 Polycom에 오디오 OLC ACK 전송](#)
40. [H.320 게이트웨이가 Polycom에서 비디오 OLC\(H.263\)를 수신함](#)
41. [Polycom에서 H.320 게이트웨이로 H.263 비디오 스트림에 대한 RTP 페이로드 유형이 96으로 설정됩니다.](#)
42. [H.320 게이트웨이가 POTS 레그를 통해 발신 비디오 모드를 설정](#)
43. [H.320 게이트웨이가 Polycom에 비디오 OLC ACK 전송](#)
44. [H.320 게이트웨이가 오디오를 전송하여 PSTN의 원격 비디오 엔드포인트에 활성 제어 및 정보 신호를 표시합니다.](#)
45. [PSTN의 비디오 엔드포인트에서 전송 속도 및 오디오 모드 설정](#)
46. [H.320 게이트웨이가 Polycom에 오디오 OLC\(G.711\)를 전송합니다.](#)
47. [H.320 게이트웨이가 Polycom에서 오디오 OLC ACK 수신](#)
48. [PSTN의 비디오 엔드포인트가 비디오 모드를 설정합니다.](#)
49. [H.320 게이트웨이가 오디오를 수신하여 PSTN의 원격 비디오 엔드포인트에서 활성 제어 및 정보 신호를 나타냅니다.](#)
50. [H.320 게이트웨이가 Polycom에 비디오 OLC\(H.263\)를 전송합니다.](#)
51. [H.320 게이트웨이에서 Polycom으로의 H.263 비디오 스트림에 대한 RTP 페이로드 유형이 110으로 설정됩니다.](#)
52. [H.320 게이트웨이가 Polycom에서 비디오 OLC ACK 수신](#)
53. [H.320 게이트웨이가 Polycom에서 VFU\(Video Fast Update\) 사진 요청을 수신함](#)
54. [H.320 게이트웨이가 PSTN의 비디오 엔드포인트에 비디오 빠른 업데이트 사진 제어 및 정보 신호를 보냅니다.](#)
55. [H.320 게이트웨이가 Polycom에서 흐름 제어 명령 수신](#)

56. [H.320 게이트웨이가 PSTN의 비디오 엔드포인트에 흐름 제어 명령을 보냅니다.](#)
57. [H.320 게이트웨이가 Polycom에 흐름 제어 명령 전송](#)
58. [H.320 게이트웨이가 PSTN의 비디오 엔드포인트에서 흐름 제어 명령 수신](#)
59. [H.320 게이트웨이가 Polycom에 흐름 제어 명령 전송](#)
60. [PSTN의 비디오 엔드포인트가 비디오 통화의 연결을 끊습니다.](#)
61. [H.320 게이트웨이가 IP 레그에서 통화를 지웁니다.](#)
62. [H.320 게이트웨이가 DRQ를 게이트키퍼로 전송](#)

[수신 SETUP\(수신자 번호 = 9199915600 및 베어러-CAP가 무제한 디지털로 설정\)](#)

H.320 기본 통화입니다.

```
001297: Oct 4 21:02:10.563: RCF (seq# 2048) rcvd
001298: Oct 4 21:02:16.748: ISDN Se2/1:23 Q931:
    RX <- SETUP pd = 8 callref = 0x009F
Bearer Capability i = 0x8890
Standard = CCITT
Transfer Capability = Unrestricted Digital
Transfer Mode = Circuit
Transfer Rate = 64 kbit/s
Channel ID i = 0xA98381
Exclusive, Channel 1
Display i = '111'
Calling Party Number i = 0x2182, '9193926000'
Plan:ISDN, Type:National
Called Party Number i = 0xA1, '9199915600'
Plan:ISDN, Type:National
001299: Oct 4 21:02:16.756:
    //-1/736483928021/CCAPI/cc_api_display_ie_subfields:
cc_api_call_setup_ind_common:
cisco-username=
----- ccCallInfo IE subfields -----
cisco-ani=9193926000
cisco-anitype=2
cisco-aniplan=1
cisco-anipi=0
cisco-anisi=2
dest=9199915600
cisco-desttype=2
cisco-destplan=1
cisco-rdie=FFFFFFFF
cisco-rdn=
cisco-rdntype=-1
cisco-rdnplan=-1
cisco-rdnpi=-1
cisco-rdntype=-1
cisco-redirectreason=-1 fwd_final_type =0
final_redirectNumber =
hunt_group_timeout =0
```

[인바운드 다이얼 피어 9190이 일치함](#)

```
001300: Oct 4 21:02:16.756: //-1/736483928021/CCAPI/
    cc_api_call_setup_ind_common:
Interface=0x65A8CAD4, Call Info(
Calling Number=9193926000,(Calling Name=)(TON=National,
NPI=ISDN, Screening=User, Failed, Presentation=Allowed),
```

Called Number=9199915600(TON=National, NPI=ISDN),
Calling Translated=FALSE, Subscriber Type Str=RegularLine,
FinalDestinationFlag=TRUE,
Incoming Dial-peer=9190, Progress Indication=NULL(0), Calling IE Present=TRUE,
Source Trkgrp Route Label=, Target Trkgrp Route Label=,
CLID Transparent=FALSE), Call Id=-1
001301: Oct 4 21:02:16.756: //-1/736483928021/CCAPI/ccCheckClipClir:
In: Calling Number=9193926000(TON=National, NPI=ISDN, Screening=User, Failed,
Presentation=Allowed)
001302: Oct 4 21:02:16.756: //-1/736483928021/CCAPI/ccCheckClipClir:
Out: Calling Number=9193926000(TON=National, NPI=ISDN, Screening=User, Failed,
Presentation=Allowed)
001303: Oct 4 21:02:16.756: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:

001304: Oct 4 21:02:16.756: :cc_get_feature_vsa malloc success
001305: Oct 4 21:02:16.756: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:

001306: Oct 4 21:02:16.756: cc_get_feature_vsa count is 1
001307: Oct 4 21:02:16.756: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:

001308: Oct 4 21:02:16.756: :FEATURE_VSA attributes are: feature_name:0,
fearture_time:1710265896,feature_id:78
001309: Oct 4 21:02:16.756:
//280/736483928021/CCAPI/cc_api_call_setup_ind_common:
Set Up Event Sent:
Call Info(Calling Number=9193926000(TON=National, NPI=ISDN, Screening=User,
Failed, Presentation=Allowed),
Called Number=9199915600(TON=National, NPI=ISDN))
001310: Oct 4 21:02:16.760: //280/736483928021/CCAPI/cc_process_call_setup_ind:
Event=0x6587C660
001311: Oct 4 21:02:16.760: //280/736483928021/CCAPI/ccCallSetContext:
Context=0x64C5F570
001312: Oct 4 21:02:16.760: //280/736483928021/CCAPI/cc_process_call_setup_ind:
>>>CCAPI handed cid 280 with tag 9190 to app "_ManagedAppProcess_Default"
001313: Oct 4 21:02:16.764: //280/736483928021/CCAPI/ccCallProceeding:
Progress Indication=NULL(0)
001314: Oct 4 21:02:16.764: //280/736483928021/CCAPI/ccCallSetupRequest:
Destination=, Calling IE Present=TRUE, Mode=0,
Outgoing Dial-peer=9910, Params=0x64C5DA10, Progress Indication=NULL(0)
001315: Oct 4 21:02:16.764: //280/736483928021/CCAPI/ccCheckClipClir:
In: Calling Number=9193926000(TON=National, NPI=ISDN, Screening=User, Failed,
Presentation=Allowed)
001316: Oct 4 21:02:16.764: //280/736483928021/CCAPI/ccCheckClipClir:
Out: Calling Number=9193926000(TON=National, NPI=ISDN, Screening=User, Failed,
Presentation=Allowed)
001317: Oct 4 21:02:16.764: //280/736483928021/CCAPI/ccCallSetupRequest:
Destination Pattern=919991..., Called Number=9199915600, Digit Strip=FALSE
001318: Oct 4 21:02:16.764: //280/736483928021/CCAPI/ccCallSetupRequest:
Calling Number=9193926000(TON=National, NPI=ISDN, Screening=User, Failed,
Presentation=Allowed),
Called Number=9199915600(TON=National, NPI=ISDN),
Redirect Number=, Display Info=
Account Number=, Final Destination Flag=TRUE,
Guid=73648392-5322-11DB-8021-000D28D3D7C0, Outgoing Dial-peer=9910
001319: Oct 4 21:02:16.764:
//280/736483928021/CCAPI/cc_api_display_ie_subfields:
ccCallSetupRequest:
cisco-username=
----- ccCallInfo IE subfields -----
cisco-ani=9193926000
cisco-anitype=2
cisco-aniplan=1
cisco-anipi=0
cisco-anisi=2

```
dest=9199915600
cisco-desttype=2
cisco-destplan=1
cisco-rdie=FFFFFFFF
cisco-rdn=
cisco-rdntype=-1
cisco-rdnplan=-1
cisco-rdnpi=-1
cisco-rdnsi=-1
cisco-redirectreason=-1 fwd_final_type =0
final_redirectNumber =
hunt_group_timeout =0
```

[아웃바운드 Dial-Peer 9910이 일치함](#)

```
001320: Oct 4 21:02:16.768: //280/736483928021/CCAPI/
ccIFCallSetupRequestPrivate:
Interface=0x65D7A87C, Interface Type=1, Destination=, Mode=0x0,
Call Params(Calling Number=9193926000,(Calling Name=)(TON=National, NPI=ISDN,
Screening=User, Failed, Presentation=Allowed),
Called Number=9199915600(TON=National, NPI=ISDN), Calling Translated=FALSE,
Subscriber Type Str=RegularLine, FinalDestinationFlag=TRUE,
Outgoing Dial-peer=9910, Call Count On=FALSE,
Source Trkgrp Route Label=, Target Trkgrp Route Label=, tg_label_flag=0,
Application Call Id=)
001321: Oct 4 21:02:16.768: //-1/xxxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:

001322: Oct 4 21:02:16.768: :cc_get_feature_vsa malloc success
001323: Oct 4 21:02:16.768: //-1/xxxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:

001324: Oct 4 21:02:16.768: cc_get_feature_vsa count is 2
001325: Oct 4 21:02:16.768: //-1/xxxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:

001326: Oct 4 21:02:16.768: :FEATURE_VSA attributes are: feature_name:0,
fearture_time:1710266976,feature_id:79
001327: Oct 4 21:02:16.768:
//281/736483928021/CCAPI/ccIFCallSetupRequestPrivate:
SPI Call Setup Request Is Success; Interface Type=1, FlowMode=1
001328: Oct 4 21:02:16.768: //281/736483928021/CCAPI/ccCallSetContext:
Context=0x64C5D9C0
001329: Oct 4 21:02:16.768: //280/736483928021/CCAPI/ccSaveDialpeerTag:
Outgoing Dial-peer=9910
```

[H.320 게이트웨이가 게이트키퍼에게 ARQ 요청 전송](#)

```
001330: Oct 4 21:02:16.768: H225 NONSTD OUTGOING PDU ::=

value ARQnonStandardInfo ::=
{
sourceAlias
{
}
sourceExtAlias
{
}
callingOctet3a 130
interfaceSpecificBillingId "ISDN 2/1:23"
gtd '49414D2C0D0A50524E2C6973646E2A2C2C4E492A...'H
}

001331: Oct 4 21:02:16.772: H225 NONSTD OUTGOING ENCODE BUFFER::=
```

80000010A801820C144953444E20322F313A323380A300A049414D2C0D0A50524
E2C6973646E2A2C2C4E492A2A2A2C0D0A5553492C726174652C632C642C632C310
D0A544D522C30310D0A43504E2C30342C2C312C393139393931353630300D0A434
74E2C30342C2C312C792C332C393139333932363030300D0A4350432C30390D0A46
43492C2C2C2C2C2C2C792C0D0A4743492C3733363438333932353332323131646
2383032313030306432386433643763300D0A0D0A

001332: Oct 4 21:02:16.772:
001333: Oct 4 21:02:16.772: RAS OUTGOING PDU ::=

value RasMessage ::= admissionRequest :
{
requestSeqNum 2049
callType pointToPoint : NULL
callModel direct : NULL
endpointIdentifier {"65766C6C00000001"}
destinationInfo
{
dialedDigits : "9199915600"
}
srcInfo
{
dialedDigits : "9193926000",
h323-ID : {"Video-GW-2"}
}
bandWidth 179200
callReferenceValue 28
nonStandardData
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 18
}
data '80000010A801820C144953444E20322F313A3233...'H
}
conferenceID '73648392532211DB8021000D28D3D7C0'H
activeMC FALSE
answerCall FALSE
canMapAlias TRUE
callIdentifier
{
guid '73651FB9532211DB817D90162806D3F1'H
}
willSupplyUUIEs FALSE
}

001334: Oct 4 21:02:16.776: RAS OUTGOING ENCODE BUFFER::=
2788080000F00036003500370036003600430036004300300030003000300030003000300030003000
031010480C4CCC48933020480C4C6C5933340090056006900640065006F002D0047005700
2D00328002BC00001C40B500001280B980000010A801820C144953444E20322F313A32338
0A300A049414D2C0D0A50524E2C6973646E2A2C2C4E492A2A2A2C0D0A5553492C72617465
2C632C642C632C310D0A544D522C30310D0A43504E2C30342C2C312C39313939393135363
0300D0A43474E2C30342C2C312C792C332C393139333932363030300D0A4350432C30390D
0A4643492C2C2C2C2C2C2C792C0D0A4743492C37333634383339323533323231316462383
032313030306432386433643763300D0A0D0A73648392532211DB8021000D28D3D7C008E0
20000180110073651
FB9532211DB817D90162806D3F10100

001335: Oct 4 21:02:16.776: h323chan_dgram_send:Sent UDP msg. Bytes sent: 316
to 14.50.3.101:1719 fd=2

001336: Oct 4 21:02:16.776: RASLib::GW_RASSendARQ: ARQ (seq# 2049) sent to
14.50.3.101

001337: Oct 4 21:02:16.776: ISDN Se2/1:23 Q931: TX -> CALL_PROC pd = 8


```
callref = 0x809F
Channel ID i = 0xA98381
Exclusive, Channel 1
001338: Oct 4 21:02:16.780: h323chan_chn_process_read_socket
001339: Oct 4 21:02:16.780: h323chan_chn_process_read_socket: fd=2 of type
CONNECTED has data
001340: Oct 4 21:02:16.780: h323chan_chn_process_read_socket:
h323chan accepted/connected fd=2

001341: Oct 4 21:02:16.780: h323chan_dgram_recvdata:rcvd from
[14.50.3.101:1719] on fd=2

001342: Oct 4 21:02:16.780: RAS INCOMING ENCODE BUFFER::=
2B8008008002BC00000E32053406B800EF40B50000122700020480C4C6C59333400900560
06900640065006F002D00470057002D0032010480C4CCC489332800C20001000200000401
4CB800
001343: Oct 4 21:02:16.780:
```

H.320 게이트웨이가 게이트키퍼로부터 ACF 응답을 수신함

```
001344: Oct 4 21:02:16.780: RAS INCOMING PDU ::=

value RasMessage ::= admissionConfirm :
{
requestSeqNum 2049
bandWidth 179200
callModel direct : NULL
destCallSignalAddress ipAddress :
{
ip '0E320534'H
port 1720
}
irrFrequency 240
nonStandardData
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 18
}
data '00020480C4C6C593334009005600690064006500...'H
}
willRespondToIRR FALSE
uuiesRequested
{
setup FALSE
callProceeding FALSE
connect FALSE
alerting FALSE
information FALSE
releaseComplete FALSE
facility FALSE
progress FALSE
empty FALSE
}
usageSpec
{

{
when
{
```

```
end NULL
inIrr NULL
}
callStartingPoint
{
connect NULL
}
required
{
nonStandardUsageTypes
{
}
startTime NULL
endTime NULL
terminationCause NULL
}
}
}
}
```

```
001345: Oct 4 21:02:16.784: ACF (seq# 2049) rcvd
001346: Oct 4 21:02:16.784: H225 NONSTD INCOMING ENCODE BUFFER::=
      00020480C4C6C5933340090056006900640065006F002D00470057002D0032010
480C4CCC48933
001347: Oct 4 21:02:16.784:
001348: Oct 4 21:02:16.784: H225 NONSTD INCOMING PDU ::=
```

```
value ACFnonStandardInfo ::=
{
srcTerminalAlias
{
e164 : "9193926000",
h323-ID : {"Video-GW-2"}
}
dstTerminalAlias
{
e164 : "9199915600"
}
}
}
```

```
parse_acf_nonstd: ACF Nonstd decode succeeded, remlen = 1652959360
001349: Oct 4 21:02:16.792: h323chan_chn_process_read_socket
001350: Oct 4 21:02:16.792: h323chan_chn_process_read_socket: fd=3 of
      type CONNECT_PENDING has data
001351: Oct 4 21:02:16.792: H450 OUTGOING PDU ::=
```

```
value CmnArg ::=
{
featureList
{
ssCFreRoutingSupported NULL
ssCTreRoutingSupported NULL
}
}
}
```

```
001352: Oct 4 21:02:16.792: H450 OUTGOING ENCODE BUFFER::= 43000000
001353: Oct 4 21:02:16.792:
001354: Oct 4 21:02:16.792: H450 OUTGOING PDU ::=
```

```
value H4501SupplementaryService ::=
{
networkFacilityExtension
{
sourceEntity endpoint : NULL
}
}
}
```

```
destinationEntity endpoint : NULL
}
interpretationA pdu discardAnyUnrecognizedInvokePdu : NULL
serviceA pdu rosA pdus :
{
  invoke :
  {
    invokeId 44
    opcode local : 85
    argument {"43000000"}
  }
}
}
```

```
001355: Oct 4 21:02:16.792: H450 OUTGOING ENCODE BUFFER::=
        60000110002C0001550443000000
```

```
001356: Oct 4 21:02:16.792:
```

```
001357: Oct 4 21:02:16.792: H225 NONSTD OUTGOING PDU ::=
```

```
value H323_UU_NonStdInfo ::=
{
  version 2
  protoParam qsigNonStdInfo :
  {
    iei 4
    rawMesg '040288901803A9838128033131316C0C21823931...'H
  }
}
```

```
001358: Oct 4 21:02:16.796: H225 NONSTD OUTGOING ENCODE BUFFER::=
        60010200010429040288901803A9838128033131316C0C2182393139333932363
        03030700BA139313939393135363030
```

```
001359: Oct 4 21:02:16.796:
```

[H.320 게이트웨이가 H.225 설정 메시지를 Polycom으로 전송](#)

```
001360: Oct 4 21:02:16.796: H225.0 OUTGOING PDU ::=
```

```
value H323_UserInformation ::=
{
  h323-uu-pdu
  {
    h323-message-body setup :
    {
      protocolIdentifier { 0 0 8 2250 0 4 }
      sourceAddress
      {
        h323-ID : {"Video-GW-2"}
      }
      sourceInfo
      {
        vendor
        {
          vendor
          {
            t35CountryCode 181
            t35Extension 0
            manufacturerCode 18
          }
          productId '436973636F47617465776179'H
          versionId '32'H
        }
      }
    }
  }
}
```

```

gateway
{
protocol
{
voice :
{
supportedPrefixes
{

{
prefix dialedDigits : "1#"
}
}
}, h323 :
{
supportedPrefixes
{
}
}
}
}
mc FALSE
undefinedNode FALSE
}
activeMC FALSE
conferenceID '73648392532211DB8021000D28D3D7C0'H
conferenceGoal create : NULL
callType pointToPoint : NULL
sourceCallSignalAddress ipAddress :
{
ip '0E0110DC'H
port 15025
}
callIdentifier
{
guid '73651FB9532211DB817D90162806D3F1'H
}
mediaWaitForConnect FALSE
canOverlapSend FALSE
multipleCalls TRUE
maintainConnection TRUE
}
h4501SupplementaryService
{
'60000110002C0001550443000000'H
}
h245Tunneling FALSE
nonStandardControl
{

{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 18
}
}
data '60010200010429040288901803A9838128033131...'H
}
}
}
}

```

001361: Oct 4 21:02:16.804: H225.0 OUTGOING ENCODE BUFFER::=

20A0060008914A00040140090056006900640065006F002D00470057002D003228C0B5
0000120B436973636F47617465776179003240023C0504010020402C05010000736483
92532211DB8021000D28D3D7C000CD0D800007000E0110DC3AB1110073651FB9532211
DB817D90162806D3F1010001000180018011A010010E60000110002C00015504430000
000100370140B50000123060010200010429040288901803A9838128033131316C0C21
8239313933393236303030700BA139313939393135363030

001362: Oct 4 21:02:16.804:

Q931 Message IE Decodes

Protocol Discriminator : 0x08

CRV Length : 2

CRV Value : 0x001C

Message Type : 0x05: SETUP

Bearer Capability: Length Of IE=4

Data 88188CA5

Calling Party Number: Length Of IE=12

Data 218239313933393236303030

Called Party Number: Length Of IE=11

Data A139313939393135363030

User-User: Length Of IE=200

Data 0520A0060008914A00040140090056006900640065006F002D00470057002D003228C0B5
0000120B436973636F47617465776179003240023C0504010020402C0501000073648392
532211DB8021000D28D3D7C000CD0D800007000E0110DC3AB1110073651FB9532211DB81
7D90162806D3F1010001000180018011A010010E60000110002C00015504430000000100
370140B50000123060010200010429040288901803A9838128033131316C0C2182393139
33393236303030700BA139313939393135363030

001363: Oct 4 21:02:16.808: h323chan_chn_process_read_socket

001364: Oct 4 21:02:16.808: h323chan_chn_process_read_socket: fd=3 of type
CONNECTED has data

001365: Oct 4 21:02:16.808: h323chan_chn_process_read_socket: h323chan
accepted/connected fd=3

001366: Oct 4 21:02:16.836: h323chan_chn_process_read_socket

001367: Oct 4 21:02:16.836: h323chan_chn_process_read_socket: fd=3 of type
CONNECTED has data

001368: Oct 4 21:02:16.836: h323chan_chn_process_read_socket: h323chan
accepted/connected fd=3

Q931 Message IE Decodes

Protocol Discriminator : 0x08

CRV Length : 2

CRV Value : 0x801C

Message Type : 0x01: ALERTING

User-User: Length Of IE=87

Data 052380060008914A000422C0B500233103563530301E52656C6561736520372E352E31202
D2031314A616E323030352031353A353801B0D800110073651FB9532211DB817D90162806
D3F1010001800100014010800100

001369: Oct 4 21:02:16.836: H225.0 INCOMING ENCODE BUFFER ::= 2380060008914A000
422C0B500233103563530301E52656C6561736520372E352E31202D2031314A616E323030
352031353A353801B0D800110073651FB9532211DB817D90162806D3F1010001800100014
010800100

001370: Oct 4 21:02:16.836:

001371: Oct 4 21:02:16.836: H225.0 INCOMING PDU ::=

value H323_UserInformation ::=

```
{  
h323-uu-pdu  
{  
h323-message-body alerting :  
{  
protocolIdentifier { 0 0 8 2250 0 4 }  
destinationInfo  
{  
vendor  
{
```

```
vendor
{
t35CountryCode 181
t35Extension 0
manufacturerCode 9009
}
productId '56353030'H
versionId '52656C6561736520372E352E31202D2031314A61...'H
}
terminal
{
}
mc FALSE
undefinedNode FALSE
}
callIdentifier
{
guid '73651FB9532211DB817D90162806D3F1'H
}
multipleCalls FALSE
maintainConnection TRUE
presentationIndicator presentationAllowed : NULL
screeningIndicator 2
}
h245Tunneling FALSE
}
}
```

```
001372: Oct 4 21:02:16.840: //281/736483928021/CCAPI/cc_api_set_delay_xport:
CallInfo(delay xport=TRUE)
001373: Oct 4 21:02:16.840: //281/736483928021/CCAPI/cc_api_call_alert:
Interface=0x65D7A87C, Progress Indication=NULL(0), Signal Indication=SIGNAL
RINGBACK(1)
001374: Oct 4 21:02:16.840: //281/736483928021/CCAPI/cc_api_call_alert:
Call Entry(Retry Count=0, Responded=TRUE)
001375: Oct 4 21:02:16.844: //280/736483928021/CCAPI/ccCallAlert:
Progress Indication=NULL(0), Signal Indication=SIGNAL RINGBACK(1)
001376: Oct 4 21:02:16.844: //280/736483928021/CCAPI/ccCallAlert:
Call Entry(Responded=TRUE, AlertSent=TRUE)
001377: Oct 4 21:02:16.844: //280/736483928021/CCAPI/ccGenerateToneInfo:
Stop Tone On Digit=FALSE, Tone=Ring Back,
Tone Direction=Network, Params=0x0, Call Id=280
001378: Oct 4 21:02:16.844: //280/736483928021/H221():
h221_set_initial_outgoing_caps:
001379: Oct 4 21:02:16.844: //280/736483928021/H221():
h221_set_outgoing_bchnl_map:
B-Channel=1, Include B-channel In H.320 Call=TRUE
001380: Oct 4 21:02:16.844: //280/736483928021/H221():
h221_set_outgoing_bchnl_map:
B-Channel(s)=1, Connected=0, Not InSync=1, InSync=0
001381: Oct 4 21:02:16.848: ISDN Se2/1:23 Q931: TX ->
ALERTING pd = 8 callref = 0x809F
001382: Oct 4 21:02:16.880: h323chan_chn_process_read_socket
001383: Oct 4 21:02:16.880: h323chan_chn_process_read_socket:
fd=3 of type CONNECTED has data
001384: Oct 4 21:02:16.880: h323chan_chn_process_read_socket:
h323chan accepted/connected fd=3
```

```
Q931 Message IE Decodes
Protocol Discriminator : 0x08
CRV Length : 2
CRV Value : 0x801C
Message Type : 0x07: CONNECT
Display: Length Of IE=3
```

Data 323232

User-User: Length Of IE=110

Data 0522C006008914A0004000E3205340A2322C0B500233103563530301E52656C6
561736520372E352E31202D2031314A616E323030352031353A35380073648392
532211DB8021000D28D3D7C01D0CC0110073651FB9532211DB817D90162806D3F
1010001800100014010800100

001385: Oct 4 21:02:16.884: H225.0 INCOMING ENCODE BUFFER ::= 22C006000
8914A0004000E3205340A2322C0B500233103563530301E52656C656173652037
2E352E31202D2031314A616E323030352031353A35380073648392532211DB802
1000D28D3D7C01D0CC0110073651FB9532211DB817D90162806D3F10100018001
00014010800100

001386: Oct 4 21:02:16.884:

IP 레그에 연결된 통화

001387: Oct 4 21:02:16.884: H225.0 INCOMING PDU ::=

value H323_UserInformation ::=

```
{
h323-uu-pdu
{
h323-message-body connect :
{
protocolIdentifier { 0 0 8 2250 0 4 }
h245Address ipAddress :
{
ip '0E320534'H
port 2595
}
destinationInfo
{
vendor
{
vendor
{
t35CountryCode 181
t35Extension 0
manufacturerCode 9009
}
productId '56353030'H
versionId '52656C6561736520372E352E31202D2031314A61...'H
}
terminal
{
}
mc FALSE
undefinedNode FALSE
}
conferenceID '73648392532211DB8021000D28D3D7C0'H
callIdentifier
{
guid '73651FB9532211DB817D90162806D3F1'H
}
multipleCalls FALSE
maintainConnection TRUE
presentationIndicator presentationAllowed : NULL
screeningIndicator 2
}
h245Tunneling FALSE
}
}
```

001388: Oct 4 21:02:16.888: //281/736483928021/CCAPI/cc_api_call_connected:
Interface=0x65D7A87C, Data Bitmask=0x0, Progress Indication=NULL(0),
Connection Handle=0
001389: Oct 4 21:02:16.888: //281/736483928021/CCAPI/cc_api_call_connected:
Call Entry(Connected=TRUE, Responded=TRUE, Retry Count=0)
001390: Oct 4 21:02:16.888: //281/736483928021/CCAPI/cc_api_event_indication:
Event=148, Call Id=281
001391: Oct 4 21:02:16.888: //281/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly
001392: Oct 4 21:02:16.888: H225 NONSTD OUTGOING PDU ::=

```
value IRRperCallnonStandardInfo ::=
{
  startTime 1159995736
}
```

001393: Oct 4 21:02:16.888: H225 NONSTD OUTGOING ENCODE BUFFER::= 7045242158
001394: Oct 4 21:02:16.888:
001395: Oct 4 21:02:16.888: RAS OUTGOING PDU ::=

```
value RasMessage ::= infoRequestResponse :
{
  requestSeqNum 2050
  endpointType
  {
    vendor
    {
      vendor
      {
        t35CountryCode 181
        t35Extension 0
        manufacturerCode 18
      }
      productId '436973636F47617465776179'H
      versionId '32'H
    }
    gateway
    {
      protocol
      {
        voice :
        {
          supportedPrefixes
          {
            {
              prefix dialedDigits : "1#"
            }
          }
        }, h323 :
        {
          supportedPrefixes
          {
            }
          }
        }
      }
    }
    mc FALSE
    undefinedNode FALSE
  }
  endpointIdentifier {"65766C6C00000001"}
  rasAddress ipAddress :
  {
    ip '0E0110DC'H
  }
}
```



```
port 53355
}
callSignalAddress
{
  ipAddress :
  {
    ip '0E0110DC'H
    port 1720
  }
}
endpointAlias
{
  dialedDigits : "7561",
  dialedDigits : "4321",
  dialedDigits : "8000",
  dialedDigits : "7111",
  dialedDigits : "7931",
  dialedDigits : "7560",
  dialedDigits : "7701",
  dialedDigits : "7702",
  dialedDigits : "7565",
  h323-ID : {"Video-GW-2"}
}
perCallInfo
{
  {
    nonStandardData
    {
      nonStandardIdentifier h221NonStandard :
      {
        t35CountryCode 181
        t35Extension 0
        manufacturerCode 18
      }
      data '7045242158'H
    }
    callReferenceValue 28
    conferenceID '73648392532211DB8021000D28D3D7C0'H
    originator TRUE
    h245
    {
    }
    callSignaling
    {
    }
    callType pointToPoint : NULL
    bandwidth 179200
    callModel direct : NULL
    callIdentifier
    {
      guid '73651FB9532211DB817D90162806D3F1'H
    }
    substituteConfIDs
    {
    }
    usageInformation
    {
      nonStandardUsageFields
      {
      }
    }
    connectTime 1159995736
  }
}
```

```

}
needResponse FALSE
unsolicited TRUE
}

001396: Oct 4 21:02:16.900: RAS OUTGOING ENCODE BUFFER::=
5AC0080128C0B50000120B436973636F47617465776179003240023C05040100
20402C0501000780003600350037003600360043003600430030003000300030
0030003000300031000E0110DCD06B01000E0110DC06B80A0180A89401807654
0180B3330180A4440180AC640180A8930180AA340180AA350180A89840090056
006900640065006F002D00470057002D003201E100B500001205704524215800
1C73648392532211DB8021000D28D3D7C0802002BC0003C900110073651FB953
2211DB817D90162806D3F10100072000C0452421570E2401000180
001397: Oct 4 21:02:16.900: h323chan_dgram_send:Sent UDP msg. Bytes sent:
219 to 14.50.3.101:1719 fd=2

001398: Oct 4 21:02:16.900: RASLib::GW_RASSendIRR: IRR (seq# 2050) sent to
14.50.3.101
001399: Oct 4 21:02:16.900: //280/736483928021/CCAPI/ccGenerateToneInfo:
Stop Tone On Digit=FALSE, Tone=NULL,
Tone Direction=Network, Params=0x0, Call Id=280
001400: Oct 4 21:02:16.900: //280/xxxxxxxxxxxx/CCAPI/ccConferenceCreate:
(confID=0x64D15380, callID1=0x118, callID2=0x119, tag=0x0)
001401: Oct 4 21:02:16.900: //280/736483928021/CCAPI/ccConferenceCreate:
Conference Id=0x64D15380, Call Id1=280, Call Id2=281, Tag=0x0
001402: Oct 4 21:02:16.900: //280/xxxxxxxxxxxx/CCAPI/cc_api_bridge_done:
Conference Id=0x12, Source Interface=0x65A8CAD4, Source Call Id=280,
Destination Call Id=281, Disposition=0x0, Tag=0xFFFFFFFF
001403: Oct 4 21:02:16.904: //281/xxxxxxxxxxxx/CCAPI/cc_api_get_xcode_stream:

001404: Oct 4 21:02:16.904: cc_api_get_xcode_stream : 4369
001405: Oct 4 21:02:16.904: //281/xxxxxxxxxxxx/CCAPI/cc_api_bridge_done:
Conference Id=0x12, Source Interface=0x65D7A87C, Source Call Id=281,
Destination Call Id=280, Disposition=0x0, Tag=0x0
001406: Oct 4 21:02:16.904: //280/736483928021/CCAPI/cc_generic_bridge_done:
Conference Id=0x12, Source Interface=0x65D7A87C, Source Call Id=281,
Destination Call Id=280, Disposition=0x0, Tag=0x0
001407: Oct 4 21:02:16.904: //280/736483928021/CCAPI/ccConferenceCreate:
Call Entry(Conference Id=0x12, Destination Call Id=281)
001408: Oct 4 21:02:16.904: //281/736483928021/CCAPI/ccConferenceCreate:
Call Entry(Conference Id=0x12, Destination Call Id=280)
001409: Oct 4 21:02:16.904:
//280/736483928021/CCAPI/cc_process_notify_bridge_done:
Conference Id=0x12, Call Id1=280, Call Id2=281
001410: Oct 4 21:02:16.904: //280/736483928021/CCAPI/ccCallConnect:
Progress Indication=NULL(0), Data Bitmask=0x0
001411: Oct 4 21:02:16.904: //280/736483928021/CCAPI/ccCallConnect:
Call Entry(Connected=TRUE, Responded=TRUE)

```

H.320 게이트웨이가 ISDN 측에서 CONNECT를 보내고 통화가 연결됨

이것이 기본 통화입니다.

```

001412: Oct 4 21:02:16.908: ISDN Se2/1:23 Q931: TX -> CONNECT pd = 8
callref = 0x809F
001413: Oct 4 21:02:16.916: ISDN Se2/1:23 Q931: RX <- CONNECT_ACK pd = 8
callref = 0x009F
001414: Oct 4 21:02:16.916: %ISDN-6-CONNECT: Interface Serial2/1:0 is now
connected to 9193926000 N/A

```

H.320 게이트웨이가 초기 기능 세트를 전송합니다.

```
001415: Oct 4 21:02:17.056: //280/736483928021/H221():
    h221_outgoing_message_entry:
Outgoing BAS Command=Send Initial Caps
001416: Oct 4 21:02:17.056: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel=1, Include B-channel In H.320 Call=TRUE
```

B-Channel 1에서 프레임 동기화 설정

```
001417: Oct 4 21:02:17.056: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel=1, B-channel H.221 Sync=TRUE
001418: Oct 4 21:02:17.056: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel(s)=1, Connected=0, Not InSync=0, InSync=1
```

H.320 게이트웨이가 첫 번째 보조 통화를 수신함

```
001419: Oct 4 21:02:17.056: ISDN Se2/1:23 Q931:
    RX <- SETUP pd = 8 callref = 0x00A0
Bearer Capability i = 0x8890
Standard = CCITT
Transfer Capability = Unrestricted Digital
Transfer Mode = Circuit
Transfer Rate = 64 kbit/s
Channel ID i = 0xA98382
Exclusive, Channel 2
Display i = '111'
Calling Party Number i = 0x2182, '9193926000'
Plan:ISDN, Type:National
Called Party Number i = 0xA1, '9199915601'
Plan:ISDN, Type:National
001420: Oct 4 21:02:17.060:
    //-1/7392E89B8022/CCAPI/cc_api_create_cc_entry_common:
Interface=0x65A8CAD4, Call Id=-1,
Call Info=9193926000(TON=National, NPI=ISDN, Screening=User, Failed,
    Presentation=Allowed),
Called Number=9199915601(TON=National, NPI=ISDN),
FinalDestinationFlag=FALSE, Incoming Dial-peer=9190
001421: Oct 4 21:02:17.060: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:

001422: Oct 4 21:02:17.060: :cc_get_feature_vsa malloc success
001423: Oct 4 21:02:17.060: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:

001424: Oct 4 21:02:17.060: cc_get_feature_vsa count is 3
001425: Oct 4 21:02:17.060: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:

001426: Oct 4 21:02:17.060: :FEATURE_VSA attributes are: feature_name:0,
    fearture_time:1710267192,feature_id:80
001427: Oct 4 21:02:17.060: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel=2, Q.931 Connect Indicated=TRUE
001428: Oct 4 21:02:17.060: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel(s)=1, Connected=0, Not InSync=0, InSync=1
001429: Oct 4 21:02:17.060: //282/736483928021/CCAPI/cc_api_call_connected:
Interface=0x65A8CAD4, Data Bitmask=0x0, Progress Indication=NULL(0),
Connection Handle=0
001430: Oct 4 21:02:17.060: //282/736483928021/CCAPI/cc_api_call_connected:
Call Entry(Connected=TRUE, Responded=FALSE, Retry Count=0)
```

```
001431: Oct 4 21:02:17.064: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel=2, Include B-channel In H.320 Call=TRUE
001432: Oct 4 21:02:17.064: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel(s)=2, Connected=1, Not InSync=1, InSync=1
001433: Oct 4 21:02:17.064: ISDN Se2/1:23 Q931:
    TX -> CALL_PROC pd = 8 callref = 0x80A0
Channel ID i = 0xA98382
Exclusive, Channel 2
```

첫 번째 보조 통화가 연결됨

```
001434: Oct 4 21:02:17.064: ISDN Se2/1:23 Q931: TX ->
    CONNECT pd = 8 callref = 0x80A0
001435: Oct 4 21:02:17.076: ISDN Se2/1:23 Q931: RX <- CONNECT_ACK pd = 8
    callref = 0x00A0
001436: Oct 4 21:02:17.076: %ISDN-6-CONNECT: Interface Serial2/1:1 is now
    connected to 9193926000 N/A
```

B-Channel 2에서 프레임 동기화 설정

```
001437: Oct 4 21:02:17.376: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel=2, B-channel H.221 Sync=TRUE
001438: Oct 4 21:02:17.376: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel(s)=2, Connected=1, Not InSync=0, InSync=2
```

H.320 게이트웨이가 두 번째 보조 통화를 수신함

```
001439: Oct 4 21:02:17.376: ISDN Se2/1:23 Q931: RX <- SETUP pd =
    8 callref = 0x00A1
Bearer Capability i = 0x8890
Standard = CCITT
Transfer Capability = Unrestricted Digital
Transfer Mode = Circuit
Transfer Rate = 64 kbit/s
Channel ID i = 0xA98383
Exclusive, Channel 3
Display i = '111'
Calling Party Number i = 0x2182, '9193926000'
Plan:ISDN, Type:National
Called Party Number i = 0xA1, '9199915602'
Plan:ISDN, Type:National
001440: Oct 4 21:02:17.380:
    //-1/73C3BCD78023/CCAPI/cc_api_create_cc_entry_common:
Interface=0x65A8CAD4, Call Id=-1,
Call Info=9193926000(TON=National, NPI=ISDN, Screening=User, Failed,
    Presentation=Allowed),
Called Number=9199915602(TON=National, NPI=ISDN),
FinalDestinationFlag=FALSE, Incoming Dial-peer=9190
001441: Oct 4 21:02:17.380: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:
001442: Oct 4 21:02:17.380: :cc_get_feature_vsa malloc success
001443: Oct 4 21:02:17.380: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:
001444: Oct 4 21:02:17.380: cc_get_feature_vsa count is 4
001445: Oct 4 21:02:17.380: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:
```

```
001446: Oct 4 21:02:17.380: :FEATURE_VSA attributes are: feature_name:0,
      fearture_time:1710266760,feature_id:81
001447: Oct 4 21:02:17.380: //280/736483928021/H221():
      h221_set_outgoing_bchnl_map:
B-Channel=3, Q.931 Connect Indicated=TRUE
001448: Oct 4 21:02:17.380: //280/736483928021/H221():
      h221_set_outgoing_bchnl_map:
B-Channel(s)=2, Connected=1, Not InSync=0, InSync=2
001449: Oct 4 21:02:17.380: //283/736483928021/CCAPI/cc_api_call_connected:
Interface=0x65A8CAD4, Data Bitmask=0x0, Progress Indication=NULL(0),
Connection Handle=0
001450: Oct 4 21:02:17.380: //283/736483928021/CCAPI/cc_api_call_connected:
Call Entry(Connected=TRUE, Responded=FALSE, Retry Count=0)
001451: Oct 4 21:02:17.380: //280/736483928021/H221():
      h221_set_outgoing_bchnl_map:
B-Channel=3, Include B-channel In H.320 Call=TRUE
001452: Oct 4 21:02:17.384: //280/736483928021/H221():
      h221_set_outgoing_bchnl_map:
B-Channel(s)=3, Connected=2, Not InSync=1, InSync=2
001453: Oct 4 21:02:17.384: ISDN Se2/1:23 Q931: TX ->
      CALL_PROC pd = 8 callref = 0x80A1
Channel ID i = 0xA98383
Exclusive, Channel 3
```

두 번째 보조 통화가 연결됨

```
001454: Oct 4 21:02:17.384: ISDN Se2/1:23 Q931: TX ->
      CONNECT pd = 8 callref = 0x80A1
001455: Oct 4 21:02:17.392: ISDN Se2/1:23 Q931: RX <- CONNECT_ACK
      pd = 8 callref = 0x00A1
001456: Oct 4 21:02:17.396: %ISDN-6-CONNECT: Interface Serial2/1:2
      is now connected to 9193926000 N/A
001457: Oct 4 21:02:17.532: //280/736483928021/H221():
      dsmp_h221_update_dsp_timestamp:
BAS Message Timestamp=500(ms), Last Squelch Timestamp=0(ms)
Last Fast Video Update Timestamp=0(ms), Update Bas Timestamp=FALSE
001458: Oct 4 21:02:17.536: //280/736483928021/H221():
      h221_incoming_message_entry:
DSP Message Squelch Status=0x0, H221 Squelch Map=0x0
```

H.320 게이트웨이가 PSTN의 비디오 엔드포인트에서 BAS 명령 수신

H.320 게이트웨이는 PSTN의 비디오 엔드포인트에서 BAS 명령을 수신하며, 이는 H.263 기능을 사용할 수 있음을 나타냅니다.

```
001459: Oct 4 21:02:17.536: //280/736483928021/H221():
      h221_incoming_handle_mbe:
MBE Received=H.263, Length=18
001460: Oct 4 21:02:17.536: //280/736483928021/H221():
      h221_incoming_message_entry:
Return Code=H221 Partial Message
001461: Oct 4 21:02:17.536: //280/736483928021/H221():
      dsmp_h221_check_for_bas_squelch:
H221 Squelch Map=0x0
001462: Oct 4 21:02:17.536: //280/736483928021/H221():
      dsmp_h221_check_for_bas_squelch:
H221 Squelch Map=0x0
```

B-Channel 3에서 프레임 동기화 설정

```
001463: Oct 4 21:02:17.696: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel=3, B-channel H.221 Sync=TRUE
001464: Oct 4 21:02:17.696: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel(s)=3, Connected=2, Not InSync=0, InSync=3
```

H.320 게이트웨이가 세 번째 보조 통화를 수신함

```
001465: Oct 4 21:02:17.696: ISDN Se2/1:23 Q931:
    RX <- SETUP pd = 8 callref = 0x00A2
Bearer Capability i = 0x8890
Standard = CCITT
Transfer Capability = Unrestricted Digital
Transfer Mode = Circuit
Transfer Rate = 64 kbit/s
Channel ID i = 0xA98384
Exclusive, Channel 4
Display i = '111'
Calling Party Number i = 0x2182, '9193926000'
Plan:ISDN, Type:National
Called Party Number i = 0xA1, '9199915603'
Plan:ISDN, Type:National
001466: Oct 4 21:02:17.700:
    //-1/73F4907B8024/CCAPI/cc_api_create_cc_entry_common:
Interface=0x65A8CAD4, Call Id=-1,
Call Info=9193926000(TON=National, NPI=ISDN, Screening=User, Failed,
    Presentation=Allowed),
Called Number=9199915603(TON=National, NPI=ISDN),
FinalDestinationFlag=FALSE, Incoming Dial-peer=9190
001467: Oct 4 21:02:17.700: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:

001468: Oct 4 21:02:17.700: :cc_get_feature_vsa malloc success
001469: Oct 4 21:02:17.700: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:

001470: Oct 4 21:02:17.700: cc_get_feature_vsa count is 5
001471: Oct 4 21:02:17.700: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:

001472: Oct 4 21:02:17.700: :FEATURE_VSA attributes are:
    feature_name:0, fearture_time:1710266544, feature_id:82
001473: Oct 4 21:02:17.700: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel=4, Q.931 Connect Indicated=TRUE
001474: Oct 4 21:02:17.700: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel(s)=3, Connected=2, Not InSync=0, InSync=3
001475: Oct 4 21:02:17.700: //284/736483928021/CCAPI/cc_api_call_connected:
Interface=0x65A8CAD4, Data Bitmask=0x0, Progress Indication=NULL(0),
Connection Handle=0
001476: Oct 4 21:02:17.700: //284/736483928021/CCAPI/cc_api_call_connected:
Call Entry(Connected=TRUE, Responded=FALSE, Retry Count=0)
001477: Oct 4 21:02:17.700: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel=4, Include B-channel In H.320 Call=TRUE
001478: Oct 4 21:02:17.704: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel(s)=4, Connected=3, Not InSync=1, InSync=3
001479: Oct 4 21:02:17.704: ISDN Se2/1:23 Q931: TX -> CALL_PROC
    pd = 8 callref = 0x80A2
Channel ID i = 0xA98384
Exclusive, Channel 4
```

세 번째 보조 통화가 연결됨

```
001480: Oct 4 21:02:17.704: ISDN Se2/1:23 Q931: TX ->
      CONNECT pd = 8 callref = 0x80A2
001481: Oct 4 21:02:17.712: ISDN Se2/1:23 Q931: RX <- CONNECT_ACK pd =
      8 callref = 0x00A2
001482: Oct 4 21:02:17.716: %ISDN-6-CONNECT: Interface Serial2/1:3
      is now connected to 9193926000 N/A
```

B-Channel 4에서 프레임 동기화 설정

```
001483: Oct 4 21:02:18.016: //280/736483928021/H221():
      h221_set_outgoing_bchnl_map:
B-Channel=4, B-channel H.221 Sync=TRUE
001484: Oct 4 21:02:18.016: //280/736483928021/H221():
      h221_set_outgoing_bchnl_map:
B-Channel(s)=4, Connected=3, Not InSync=0, InSync=4
```

H.320 게이트웨이가 네 번째 보조 통화를 수신함

```
001485: Oct 4 21:02:18.016: ISDN Se2/1:23 Q931:
      RX <- SETUP pd = 8 callref = 0x00A3
Bearer Capability i = 0x8890
Standard = CCITT
Transfer Capability = Unrestricted Digital
Transfer Mode = Circuit
Transfer Rate = 64 kbit/s
Channel ID i = 0xA98385
Exclusive, Channel 5
Display i = '111'
Calling Party Number i = 0x2182, '9193926000'
Plan:ISDN, Type:National
Called Party Number i = 0xA1, '9199915604'
Plan:ISDN, Type:National
001486: Oct 4 21:02:18.020:
      //-1/742566BC8025/CCAPI/cc_api_create_cc_entry_common:
Interface=0x65A8CAD4, Call Id=-1,
Call Info=9193926000(TON=National, NPI=ISDN, Screening=User, Failed,
      Presentation=Allowed),
Called Number=9199915604(TON=National, NPI=ISDN),
FinalDestinationFlag=FALSE, Incoming Dial-peer=9190
001487: Oct 4 21:02:18.020: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:

001488: Oct 4 21:02:18.020: :cc_get_feature_vsa malloc success
001489: Oct 4 21:02:18.020: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:

001490: Oct 4 21:02:18.020: cc_get_feature_vsa count is 6
001491: Oct 4 21:02:18.020: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:

001492: Oct 4 21:02:18.020: :FEATURE_VSA attributes are: feature_name:
      0, fearture_time:1710266328, feature_id:83
001493: Oct 4 21:02:18.020: //280/736483928021/H221():
      h221_set_outgoing_bchnl_map:
B-Channel=5, Q.931 Connect Indicated=TRUE
001494: Oct 4 21:02:18.020: //280/736483928021/H221():
      h221_set_outgoing_bchnl_map:
B-Channel(s)=4, Connected=3, Not InSync=0, InSync=4
001495: Oct 4 21:02:18.020: //285/736483928021/CCAPI/cc_api_call_connected:
Interface=0x65A8CAD4, Data Bitmask=0x0, Progress Indication=NULL(0),
```

Connection Handle=0
001496: Oct 4 21:02:18.020: //285/736483928021/CCAPI/cc_api_call_connected:
Call Entry(Connected=TRUE, Responded=FALSE, Retry Count=0)
001497: Oct 4 21:02:18.024: //280/736483928021/H221():
h221_set_outgoing_bchnl_map:
B-Channel=5, Include B-channel In H.320 Call=TRUE
001498: Oct 4 21:02:18.024: //280/736483928021/H221():
h221_set_outgoing_bchnl_map:
B-Channel(s)=5, Connected=4, Not InSync=1, InSync=4
001499: Oct 4 21:02:18.024: ISDN Se2/1:23 Q931: TX ->
CALL_PROC pd = 8 callref = 0x80A3
Channel ID i = 0xA98385
Exclusive, Channel 5

네 번째 보조 통화가 연결됨

001500: Oct 4 21:02:18.024: ISDN Se2/1:23 Q931: TX ->
CONNECT pd = 8 callref = 0x80A3
001501: Oct 4 21:02:18.032: //280/736483928021/H221():
dsmp_h221_update_dsp_timestamp:
BAS Message Timestamp=1000(ms), Last Squelch Timestamp=0(ms)
Last Fast Video Update Timestamp=0(ms), Update Bas Timestamp=FALSE
001502: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_incoming_message_entry:
DSP Message Squelch Status=0x0, H221 Squelch Map=0x0

001503: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Cisco GW non-standard Indication Received, Command=Cisco H.221
Version Indication, Version=(1.0)
001504: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Cisco GW non-standard Indication Received, Command=Caps From H.320
Peer Endpoint Present
001505: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Cisco GW non-standard Indication Received, Command=H.263 Non-Standard
Caps, Custom Picture Number=0
001506: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Standard MPI Received=TRUE, Standard MPI=2
001507: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Standard Pixel Aspect Ratio Received=TRUE, Aspect Ratio=10:11 (3)
001508: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Cisco GW non-standard Indication Received, Command=H.263 Non-Standard
Caps, Custom Picture Number=1
001509: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Standard MPI Received=TRUE, Standard MPI=1
001510: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Standard Pixel Aspect Ratio Received=TRUE, Aspect Ratio=10:11 (3)
001511: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Cisco GW non-standard Indication Received, Command=Cisco
H.221 Minimum Bchannel Caps Indication, B-channel Caps=1
001512: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_incoming_unsupported_other_mode:
BAS=0x60
001513: Oct 4 21:02:18.036: //280/736483928021/H221():


```
h221_incoming_unsupported_other_mode:
BAS=0x70
001514: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_incoming_handle_cap_mark:
Audio Codec(s)=0x0, H.261 Cap=FALSE, H.263 Cap=TRUE,
H.264 Cap=FALSE, B-channel Caps=6
001515: Oct 4 21:02:18.036: //280/736483928021/H221():
dsmp_h221_check_for_bas_squelch:
H221 Squelch Map=0x0
001516: Oct 4 21:02:18.036: //280/736483928021/H221():
dsmp_h221_check_for_bas_squelch:
H221 Squelch Map=0x0
001517: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_outgoing_message_entry:
Outgoing BAS Command=Send Caps
001518: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_set_outgoing_bchnl_map:
B-Channel=1, Include B-channel In H.320 Call=TRUE
001519: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_set_outgoing_bchnl_map:
B-Channel=1, B-channel H.221 Sync=TRUE
001520: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_set_outgoing_bchnl_map:
B-Channel=1, Q.931 Connect Indicated=TRUE
```

B-Channel 4에서 프레임 동기화 설정

```
001521: Oct 4 21:02:18.036: //280/736483928021/H221():
h221_set_outgoing_bchnl_map:
B-Channel(s)=5, Connected=5, Not InSync=1, InSync=4
001522: Oct 4 21:02:18.036: ISDN Se2/1:23 Q931: RX <- CONNECT_ACK pd
= 8 callref = 0x00A3
001523: Oct 4 21:02:18.040: %ISDN-6-CONNECT: Interface Serial2/1:4
is now connected to 9193926000 N/A
001524: Oct 4 21:02:18.336: //280/736483928021/H221():
h221_set_outgoing_bchnl_map:
B-Channel=5, B-channel H.221 Sync=TRUE
001525: Oct 4 21:02:18.336: //280/736483928021/H221():
h221_set_outgoing_bchnl_map:
B-Channel(s)=5, Connected=5, Not InSync=0, InSync=5
```

H.320 게이트웨이가 다섯 번째 보조 통화를 수신함

```
001526: Oct 4 21:02:18.336: ISDN Se2/1:23 Q931:
RX <- SETUP pd = 8 callref = 0x00A4
Bearer Capability i = 0x8890
Standard = CCITT
Transfer Capability = Unrestricted Digital
Transfer Mode = Circuit
Transfer Rate = 64 kbit/s
Channel ID i = 0xA98386
Exclusive, Channel 6
Display i = '111'
Calling Party Number i = 0x2182, '9193926000'
Plan:ISDN, Type:National
Called Party Number i = 0xA1, '9199915605'
Plan:ISDN, Type:National
001527: Oct 4 21:02:18.340:
//-1/74563AF88026/CCAPI/cc_api_create_cc_entry_common:
Interface=0x65A8CAD4, Call Id=-1,
Call Info=9193926000(TON=National, NPI=ISDN, Screening=User,
```

```
Failed, Presentation=Allowed),
Called Number=9199915605(TON=National, NPI=ISDN),
FinalDestinationFlag=FALSE, Incoming Dial-peer=9190
001528: Oct 4 21:02:18.340: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:
001529: Oct 4 21:02:18.340: :cc_get_feature_vsa malloc success
001530: Oct 4 21:02:18.340: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:
001531: Oct 4 21:02:18.340: cc_get_feature_vsa count is 7
001532: Oct 4 21:02:18.340: //-1/xxxxxxxxxxxx/CCAPI/cc_get_feature_vsa:
001533: Oct 4 21:02:18.340: :FEATURE_VSA attributes are:
    feature_name:0,fearture_time:1710266112,feature_id:84
001534: Oct 4 21:02:18.340: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel=6, Q.931 Connect Indicated=TRUE
001535: Oct 4 21:02:18.340: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel(s)=5, Connected=5, Not InSync=0, InSync=5
001536: Oct 4 21:02:18.340: //286/736483928021/CCAPI/cc_api_call_connected:
Interface=0x65A8CAD4, Data Bitmask=0x0, Progress Indication=NULL(0),
Connection Handle=0
001537: Oct 4 21:02:18.340: //286/736483928021/CCAPI/cc_api_call_connected:
Call Entry(Connected=TRUE, Responded=FALSE, Retry Count=0)
001538: Oct 4 21:02:18.340: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel=6, Include B-channel In H.320 Call=TRUE
001539: Oct 4 21:02:18.344: //280/736483928021/H221():
    h221_set_outgoing_bchnl_map:
B-Channel(s)=6, Connected=6, Not InSync=1, InSync=5
001540: Oct 4 21:02:18.344: ISDN Se2/1:23 Q931:
    TX -> CALL_PROC pd = 8 callref = 0x80A4
Channel ID i = 0xA98386
Exclusive, Channel 6
```

다섯 번째 보조 통화가 연결됨

```
001541: Oct 4 21:02:18.344: ISDN Se2/1:23 Q931:
    TX -> CONNECT pd = 8 callref = 0x80A4
001542: Oct 4 21:02:18.352: ISDN Se2/1:23 Q931:
    RX <- CONNECT_ACK pd = 8 callref = 0x00A4
001543: Oct 4 21:02:18.356: %ISDN-6-CONNECT:
    Interface Serial2/1:5 is now connected to 9193926000 N/A
001544: Oct 4 21:02:18.532: //280/736483928021/H221():
    dsmp_h221_update_dsp_timestamp:
BAS Message Timestamp=1500(ms), Last Squelch Timestamp=0(ms)
Last Fast Video Update Timestamp=0(ms), Update Bas Timestamp=FALSE
001545: Oct 4 21:02:18.536: //280/736483928021/H221():
    h221_incoming_message_entry:
DSP Message Squelch Status=0x0, H221 Squelch Map=0x0
001546: Oct 4 21:02:18.536: //280/736483928021/H221():
    h221_incoming_handle_mbe:
MBE Received=H.263, Length=18
001547: Oct 4 21:02:18.536: //280/736483928021/H221():
    h242_incoming_handle_mbe_h263_caps:
Identical H.263 Caps Detected, skip parsing
001548: Oct 4 21:02:18.536: //280/736483928021/H221():
    h221_incoming_message_entry:
Return Code=H221 Partial Message
001549: Oct 4 21:02:18.536: //280/736483928021/H221():
    dsmp_h221_check_for_bas_squelch:
H221 Squelch Map=0x0
```

001550: Oct 4 21:02:18.536: //280/736483928021/H221():
dsmp_h221_check_for_bas_sqelch:
H221 Sqelch Map=0x0

B-Channel 6에서 프레임 동기화 설정

001551: Oct 4 21:02:18.656: //280/736483928021/H221():
h221_set_outgoing_bchnl_map:
B-Channel=6, B-channel H.221 Sync=TRUE
001552: Oct 4 21:02:18.656: //280/736483928021/H221():
h221_set_outgoing_bchnl_map:
B-Channel(s)=6, Connected=6, Not InSync=0, InSync=6
001553: Oct 4 21:02:19.032: //280/736483928021/H221():
dsmp_h221_update_dsp_timestamp:
BAS Message Timestamp=2000(ms), Last Sqelch Timestamp=0(ms)
Last Fast Video Update Timestamp=0(ms), Update Bas Timestamp=FALSE
001554: Oct 4 21:02:19.036: //280/736483928021/H221():
h221_incoming_message_entry:
DSP Message Sqelch Status=0x0, H221 Sqelch Map=0x0

H.320 게이트웨이가 PSTN의 비디오 엔드포인트에서 기능 집합 수신

기능 집합은 MPI(Minimum Picture Interval), 종횡비, 오디오 코덱과 비디오 코덱을 지정하고 비디오 엔드포인트에서 지원하는 b 채널 수를 지정합니다.

001555: Oct 4 21:02:19.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Cisco GW non-standard Indication Received, Command=Cisco
H.221 Version Indication, Version=(1.0)
001556: Oct 4 21:02:19.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Cisco GW non-standard Indication Received, Command=Caps From
H.320 Peer Endpoint Present
001557: Oct 4 21:02:19.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Cisco GW non-standard Indication Received, Command=
H.263 Non-Standard Caps, Custom Picture Number=0
001558: Oct 4 21:02:19.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Standard MPI Received=TRUE, Standard MPI=2
001559: Oct 4 21:02:19.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Standard Pixel Aspect Ratio Received=TRUE, Aspect Ratio=10:11 (3)
001560: Oct 4 21:02:19.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Cisco GW non-standard Indication Received, Command=
H.263 Non-Standard Caps, Custom Picture Number=1
001561: Oct 4 21:02:19.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Standard MPI Received=TRUE, Standard MPI=1
001562: Oct 4 21:02:19.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Standard Pixel Aspect Ratio Received=TRUE, Aspect Ratio=10:11 (3)
001563: Oct 4 21:02:19.036: //280/736483928021/H221():
h221_incoming_ns_cap_comm:
Cisco GW non-standard Indication Received, Command=
Cisco H.221 Minimum Bchannel Caps Indication, B-channel Caps=1
001564: Oct 4 21:02:19.036: //280/736483928021/H221():
h221_incoming_handle_cap_mark:
Audio Codec(s)=0x2A, H.261 Cap=FALSE, H.263 Cap=TRUE,
H.264 Cap=FALSE, B-channel Caps=6

```
001565: Oct 4 21:02:19.036: //280/736483928021/H221():
    h221_incoming_unsupported_other_mode:
BAS=0x60
001566: Oct 4 21:02:19.036: //280/736483928021/H221():
    h221_incoming_unsupported_other_mode:
BAS=0x70
001567: Oct 4 21:02:19.036: //280/736483928021/H221():
    dsmp_h221_check_for_bas_squelch:
H221 Squelch Map=0x0
001568: Oct 4 21:02:19.036: //280/736483928021/H221():
    dsmp_h221_check_for_bas_squelch:
H221 Squelch Map=0x0
```

H.320 게이트웨이가 PSTN의 비디오 엔드포인트에 기능 집합 전송

```
001569: Oct 4 21:02:19.036: //280/736483928021/H221():
    dsmp_h221_build_audio_caps_ind:
Audio Codec(s)=G.711 u-law,
001570: Oct 4 21:02:19.036: //280/736483928021/H221():
    dsmp_h221_calculate_max_video_bandwidth_internal:
Calculation Type=Max Capability, B-Channel(s)=6, Bandwidth=3017
001571: Oct 4 21:02:19.036: //280/736483928021/H221():
    dsmp_h221_build_video_caps_ind:
Number Of Caps=1
001572: Oct 4 21:02:19.036: //280/736483928021/H221():
    dsmp_h221_build_video_caps_ind:
Video Caps=H.263, Max Bit Rate=3017
16CIF=0, 4CIF=2, CIF=1, QCIF=1
format_bit_mask=0xF, cc_h263_base_caps_mask=0x204,
    cc_h263_options_mask=0x200000, ccH263Options->bit_mask=0x10000000
001573: Oct 4 21:02:19.040: //280/736483928021/CCAPI/cc_api_caps_ind:
Destination Interface=0x65D7A87C, Destination Call Id=281, Source Call Id=280,
Caps(Codec=0x1, Fax Rate=0x1, Vad=0x1,
Modem=0x2, Codec Bytes=20, Signal Type=3)
001574: Oct 4 21:02:19.040: //280/736483928021/CCAPI/cc_api_caps_ind:
Caps(Playout Mode=1, Playout Initial=60(ms), Playout Min=40(ms),
Playout Max=250(ms), Fax Nom=300(ms))
001575: Oct 4 21:02:19.044: h323chan_chn_process_read_socket
001576: Oct 4 21:02:19.044: h323chan_chn_process_read_socket:
    fd=4 of type CONNECT_PENDING has data
```

H.320 게이트웨이는 TCS를 통해 오디오(G711ulaw) 및 비디오(H.263) 기능을 IP 레그를 통해 Polycom에 광고합니다.

```
001577: Oct 4 21:02:19.044: H245 MSC OUTGOING PDU ::=

value MultimediaSystemControlMessage ::= request : terminalCapabilitySet :
{
sequenceNumber 1
protocolIdentifier { 0 0 8 245 0 7 }
multiplexCapability h2250Capability :
{
maximumAudioDelayJitter 20
receiveMultipointCapability
{
multicastCapability FALSE
multiUniCastConference FALSE
mediaDistributionCapability
{
{
centralizedControl FALSE
```

```
distributedControl FALSE
centralizedAudio FALSE
distributedAudio FALSE
centralizedVideo FALSE
distributedVideo FALSE
}
}
}
transmitMultipointCapability
{
multicastCapability FALSE
multiUniCastConference FALSE
mediaDistributionCapability
{
{
centralizedControl FALSE
distributedControl FALSE
centralizedAudio FALSE
distributedAudio FALSE
centralizedVideo FALSE
distributedVideo FALSE
}
}
}
receiveAndTransmitMultipointCapability
{
multicastCapability FALSE
multiUniCastConference FALSE
mediaDistributionCapability
{
{
centralizedControl FALSE
distributedControl FALSE
centralizedAudio FALSE
distributedAudio FALSE
centralizedVideo FALSE
distributedVideo FALSE
}
}
}
mcCapability
{
centralizedConferenceMC FALSE
decentralizedConferenceMC FALSE
}
rtcpVideoControlCapability FALSE
mediaPacketizationCapability
{
h261aVideoPacketization FALSE
rtpPayloadType
{
{
payloadDescriptor rfc-number : 2429
}
}
}
logicalChannelSwitchingCapability FALSE
t120DynamicPortCapability FALSE
}
capabilityTable
{
```

```

{
capabilityTableEntryNumber 34
capability receiveRTPAudioTelephonyEventCapability :
{
dynamicRTPPayloadType 101
audioTelephoneEvent "0-16"
}
},
{
capabilityTableEntryNumber 3
capability receiveAudioCapability : g711Ulaw64k : 20
},
{
capabilityTableEntryNumber 39
capability receiveVideoCapability : h263VideoCapability :
{
sqcifMPI 1
qcifMPI 1
cifMPI 1
cif4MPI 2
maxBitRate 3017
unrestrictedVector FALSE
arithmeticCoding FALSE
advancedPrediction TRUE
pbFrames FALSE
temporalSpatialTradeOffCapability FALSE
errorCompensation FALSE
h263Options
{
advancedIntraCodingMode FALSE
deblockingFilterMode FALSE
improvedPBFramesMode FALSE
unlimitedMotionVectors FALSE
fullPictureFreeze FALSE
partialPictureFreezeAndRelease FALSE
resizingPartPicFreezeAndRelease FALSE
fullPictureSnapshot FALSE
partialPictureSnapshot FALSE
videoSegmentTagging FALSE
progressiveRefinement FALSE
dynamicPictureResizingByFour FALSE
dynamicPictureResizingSixteenthPel FALSE
dynamicWarpingHalfPel FALSE
dynamicWarpingSixteenthPel FALSE
independentSegmentDecoding FALSE
slicesInOrder-NonRect FALSE
slicesInOrder-Rect FALSE
slicesNoOrder-NonRect FALSE
slicesNoOrder-Rect FALSE
alternateInterVLCMode FALSE
modifiedQuantizationMode TRUE
reducedResolutionUpdate FALSE
separateVideoBackChannel FALSE
customPictureFormat
{
{
maxCustomPictureWidth 176
maxCustomPictureHeight 120
minCustomPictureWidth 176
minCustomPictureHeight 120
mPI
{

```

```

standardMPI 2
}
pixelAspectRatio pixelAspectCode :
{
3
}
},
{
maxCustomPictureWidth 88
maxCustomPictureHeight 60
minCustomPictureWidth 88
minCustomPictureHeight 60
mPI
{
standardMPI 1
}
pixelAspectRatio pixelAspectCode :
{
3
}
}
}
}
}
}
}
}
}
capabilityDescriptors
{
{
capabilityDescriptorNumber 1
simultaneousCapabilities
{
{
3
},
{
39
},
{
34
}
}
}
}
}
}
}

```

```

001578: Oct 4 21:02:19.060: H245 MSC OUTGOING ENCODE BUFFER ::=
  0270010600088175000780198000140001000001000001000402040008097C0
  66001000100028000218A061404302D313680000220C01380002609FC00000A
  0BC820705001001B080000104000AF007700AF00774120400057003B0057003
  B40204000800102000002000026000021

```

```

001579: Oct 4 21:02:19.060:

```

[H.320 게이트웨이가 MSD 요청을 Polycom으로 전송](#)

```

001580: Oct 4 21:02:19.064: H245 MSC OUTGOING PDU ::=

```

```

value MultimediaSystemControlMessage ::= request : masterSlaveDetermination :

```

```

{
terminalType 60
statusDeterminationNumber 4223
}

001581: Oct 4 21:02:19.064: H245 MSC OUTGOING ENCODE BUFFER ::= 01003C40107F
001582: Oct 4 21:02:19.064:
001583: Oct 4 21:02:19.064: h323chan_chn_process_read_socket
001584: Oct 4 21:02:19.064: h323chan_chn_process_read_socket:
    fd=4 of type CONNECTED has data
001585: Oct 4 21:02:19.064: h323chan_chn_process_read_socket:
    h323chan accepted/connected fd=4

001586: Oct 4 21:02:19.088: h323chan_chn_process_read_socket
001587: Oct 4 21:02:19.088: h323chan_chn_process_read_socket:
    fd=4 of type CONNECTED has data
001588: Oct 4 21:02:19.088: h323chan_chn_process_read_socket:
    h323chan accepted/connected fd=4

001589: Oct 4 21:02:19.088: h245_decode_one_pdu: more_pdus = 0,
    bytesLeftToDecode = 433
001590: Oct 4 21:02:19.088: H245 MSC INCOMING ENCODE BUFFER ::=
    02700106000881750007801C00003C00010000010000010004020D0108097C1007
    000881710000001180000024301660C0B5000001019340BB80010CB50000010101
    200001800000124301660C0B50000010192407D00010CB500000101012000018000
    0224301660C0B50000010191405DC0010CB5000001010120000180000324301160
    00060007B8350100407D0001001200018000042430116000060007B8350100405D
    C0010012000180000524301660C0B50000010196403E80010CB500000101012000
    0180000621401380000722400780000820C01380000920401380000A0C00216000
    0700088171000001400F000502914002A2001D0032001400620015004200078000
    0B09FC00000A0EFF20705001001B080000104000AF007700AF0077412040005700
    3B0057003B40204080000C0C000900C0B500233102210180000D0C001220C0B500
    0001019D010CB50000010101101080000E08B0000EFF40000F48C600328000104A
    0C09000006000881600100003280001104B5002331045153404400800003090000
    00010002000300040005000600070008000904000A000B000C000D000E01000F00
    10000011

```

001591: Oct 4 21:02:19.092:

[H.320 게이트웨이가 Polycom의 오디오\(G.722, G.728, G.711\) 및 비디오\(H.263\) 기능 집합을 수신함](#)

```

001592: Oct 4 21:02:19.092: H245 MSC INCOMING PDU ::=

value MultimediaSystemControlMessage ::= request : terminalCapabilitySet :
{
sequenceNumber 1
protocolIdentifier { 0 0 8 245 0 7 }
multiplexCapability h2250Capability :
{
maximumAudioDelayJitter 60
receiveMultipointCapability
{
multicastCapability FALSE
multiUniCastConference FALSE
mediaDistributionCapability
{

{
centralizedControl FALSE
distributedControl FALSE
centralizedAudio FALSE
distributedAudio FALSE

```



```
centralizedVideo FALSE
distributedVideo FALSE
}
}
}
transmitMultipointCapability
{
multicastCapability FALSE
multiUniCastConference FALSE
mediaDistributionCapability
{
{
centralizedControl FALSE
distributedControl FALSE
centralizedAudio FALSE
distributedAudio FALSE
centralizedVideo FALSE
distributedVideo FALSE
}
}
}
receiveAndTransmitMultipointCapability
{
multicastCapability FALSE
multiUniCastConference FALSE
mediaDistributionCapability
{
{
centralizedControl FALSE
distributedControl FALSE
centralizedAudio FALSE
distributedAudio FALSE
centralizedVideo FALSE
distributedVideo FALSE
}
}
}
mcCapability
{
centralizedConferenceMC FALSE
decentralizedConferenceMC FALSE
}
rtcpVideoControlCapability FALSE
mediaPacketizationCapability
{
h261aVideoPacketization FALSE
rtpPayloadType
{
{
payloadDescriptor rfc-number : 2429
},
{
payloadDescriptor oid : { 0 0 8 241 0 0 0 }
}
}
}
}
capabilityTable
{
{
```

```

capabilityTableEntryNumber 1
capability receiveAudioCapability : genericAudioCapability :
{
capabilityIdentifier h221NonStandard :
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 1
}
data '93'H
}
maxBitRate 48000
collapsing
{
{
parameterIdentifier h221NonStandard :
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 1
}
data '01'H
}
parameterValue unsignedMin : 1
}
}
},
{
capabilityTableEntryNumber 2
capability receiveAudioCapability : genericAudioCapability :
{
capabilityIdentifier h221NonStandard :
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 1
}
data '92'H
}
maxBitRate 32000
collapsing
{
{
parameterIdentifier h221NonStandard :
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 1
}
data '01'H
}
parameterValue unsignedMin : 1
}
}
}

```

```

}
}
},
{
capabilityTableEntryNumber 3
capability receiveAudioCapability : genericAudioCapability :
{
capabilityIdentifier h221NonStandard :
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 1
}
data '91'H
}
maxBitRate 24000
collapsing
{

{
parameterIdentifier h221NonStandard :
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 1
}
data '01'H
}
parameterValue unsignedMin : 1
}
}
}
},
{
capabilityTableEntryNumber 4
capability receiveAudioCapability : genericAudioCapability :
{
capabilityIdentifier standard : { 0 0 7 7221 1 0 }
maxBitRate 32000
collapsing
{

{
parameterIdentifier standard : 1
parameterValue unsignedMin : 1
}
}
}
},
{
capabilityTableEntryNumber 5
capability receiveAudioCapability : genericAudioCapability :
{
capabilityIdentifier standard : { 0 0 7 7221 1 0 }
maxBitRate 24000
collapsing
{

{
parameterIdentifier standard : 1

```

```

parameterValue unsignedMin : 1
}
}
},
{
capabilityTableEntryNumber 6
capability receiveAudioCapability : genericAudioCapability :
{
capabilityIdentifier h221NonStandard :
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 1
}
data '96'H
}
maxBitRate 16000
collapsing
{

{
parameterIdentifier h221NonStandard :
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 1
}
data '01'H
}
parameterValue unsignedMin : 1
}
}
},
{
capabilityTableEntryNumber 7
capability receiveAudioCapability : g722-64k : 20
},
{
capabilityTableEntryNumber 8
capability receiveAudioCapability : g728 : 8
},
{
capabilityTableEntryNumber 9
capability receiveAudioCapability : g711Ulaw64k : 20
},
{
capabilityTableEntryNumber 10
capability receiveAudioCapability : g711Alaw64k : 20
},
{
capabilityTableEntryNumber 11
capability receiveVideoCapability : genericVideoCapability :
{
capabilityIdentifier standard : { 0 0 8 241 0 0 1 }
maxBitRate 3840
collapsing
{

```

```

{
parameterIdentifier standard : 41
parameterValue booleanArray : 64
},
{
parameterIdentifier standard : 42
parameterValue unsignedMin : 29
},
{
parameterIdentifier standard : 3
parameterValue unsignedMin : 20
},
{
parameterIdentifier standard : 6
parameterValue unsignedMin : 21
},
{
parameterIdentifier standard : 4
parameterValue unsignedMin : 7
}
}
},
{
capabilityTableEntryNumber 12
capability receiveVideoCapability : h263VideoCapability :
{
sqcifMPI 1
qcifMPI 1
cifMPI 1
cif4MPI 2
maxBitRate 3840
unrestrictedVector FALSE
arithmeticCoding FALSE
advancedPrediction TRUE
pbFrames FALSE
temporalSpatialTradeOffCapability FALSE
errorCompensation FALSE
h263Options
{
advancedIntraCodingMode FALSE
deblockingFilterMode FALSE
improvedPBFramesMode FALSE
unlimitedMotionVectors FALSE
fullPictureFreeze FALSE
partialPictureFreezeAndRelease FALSE
resizingPartPicFreezeAndRelease FALSE
fullPictureSnapshot FALSE
partialPictureSnapshot FALSE
videoSegmentTagging FALSE
progressiveRefinement FALSE
dynamicPictureResizingByFour FALSE
dynamicPictureResizingSixteenthPel FALSE
dynamicWarpingHalfPel FALSE
dynamicWarpingSixteenthPel FALSE
independentSegmentDecoding FALSE
slicesInOrder-NonRect FALSE
slicesInOrder-Rect FALSE
slicesNoOrder-NonRect FALSE
slicesNoOrder-Rect FALSE
alternateInterVLCMode FALSE
modifiedQuantizationMode TRUE
reducedResolutionUpdate FALSE
separateVideoBackChannel FALSE

```

```
customPictureFormat
{
{
maxCustomPictureWidth 176
maxCustomPictureHeight 120
minCustomPictureWidth 176
minCustomPictureHeight 120
mPI
{
standardMPI 2
}
pixelAspectInformation pixelAspectCode :
{
3
}
},
{
maxCustomPictureWidth 88
maxCustomPictureHeight 60
minCustomPictureWidth 88
minCustomPictureHeight 60
mPI
{
standardMPI 1
}
pixelAspectInformation pixelAspectCode :
{
3
}
}
},
{
capabilityTableEntryNumber 13
capability receiveVideoCapability : genericVideoCapability :
{
capabilityIdentifier h221NonStandard :
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 9009
}
}
data '2101'H
}
},
{
capabilityTableEntryNumber 14
capability receiveVideoCapability : genericVideoCapability :
{
capabilityIdentifier h221NonStandard :
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 1
}
}
data '9D'H
```

```
}
collapsing
{

{
parameterIdentifier h221NonStandard :
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 1
}
data '01'H
}
parameterValue booleanArray : 16
}
}
},
{
capabilityTableEntryNumber 15
capability receiveVideoCapability : h261VideoCapability :
{
qcifMPI 1
cifMPI 1
temporalSpatialTradeOffCapability FALSE
maxBitRate 3840
stillImageTransmission FALSE
}
},
{
capabilityTableEntryNumber 16
capability receiveAndTransmitDataApplicationCapability :
{
application h224 : hdlcFrameTunnelling : NULL
maxBitRate 50
}
},
{
capabilityTableEntryNumber 17
capability receiveAndTransmitDataApplicationCapability :
{
application genericDataCapability :
{
capabilityIdentifier standard : { 0 0 8 224 1 0 }
}
}
maxBitRate 50
}
},
{
capabilityTableEntryNumber 18
capability nonStandard :
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 9009
}
data '51534044'H
}
}
}
```

capabilityDescriptors

```
{  
  
{  
capabilityDescriptorNumber 0  
simultaneousCapabilities  
{  
  
{  
1,  
2,  
3,  
4,  
5,  
6,  
7,  
8,  
9,  
10  
},  
  
{  
11,  
12,  
13,  
14,  
15  
},  
  
{  
16,  
17  
},  
  
{  
18  
}  
}  
}  
}
```

001593: Oct 4 21:02:19.140: h245_decode_one_pdu: H245ASNDecodePdu rc = 0,
bytesLeftToDecode = 0

001594: Oct 4 21:02:19.140: h245_decode_nonstd_cap: parse_tcs_nonstd failed

001595: Oct 4 21:02:19.140: h245_decode_nonstd_cap: parse_tcs_nonstd failed

001596: Oct 4 21:02:19.140: h245_decode_one_pdu: Read Pkt body: more_pdu:0
rc:0 asn_rc:0

001597: Oct 4 21:02:19.144: //281/736483928021/CCAPI/cc_api_caps_ind:
Destination Interface=0x65A8CAD4, Destination Call Id=280, Source Call Id=281,
Caps(Codec=0x1, Fax Rate=0x2, Vad=0x2,
Modem=0x0, Codec Bytes=20, Signal Type=2)

001598: Oct 4 21:02:19.144: //281/736483928021/CCAPI/cc_api_caps_ind:
Caps(Playout Mode=1, Playout Initial=60(ms), Playout Min=40(ms),
Playout Max=250(ms), Fax Nom=300(ms))

001599: Oct 4 21:02:19.144: //280/736483928021/CCAPI/cc_api_caps_ack:
Destination Interface=0x65D7A87C, Destination Call Id=281, Source Call Id=280,
Caps(Codec=g711ulaw(0x1), Fax Rate=FAX_RATE_VOICE(0x2), Vad=ON(0x2),
Modem=OFF(0x0), Codec Bytes=20, Signal Type=2, Seq Num Start=0)

001600: Oct 4 21:02:19.148: //280/736483928021/H221():
dsmp_h221_decode_ccapi_audio_caps:

Audio Codec(s)=G.711 u-law,

001601: Oct 4 21:02:19.148: //280/736483928021/H221():
dsmp_h221_decode_ccapi_video_caps:


```
Video Caps=H.263, Max Bit Rate=3840
16CIF=0, 4CIF=2, CIF=1, QCIF=1
format_bit_mask=0xF, cc_h263_base_caps_mask=0x204,
    cc_h263_options_mask=0x200000, ccH263Options->bit_mask=0x10000000
001602: Oct 4 21:02:19.148: //280/736483928021/H221:():
    h221_outgoing_message_entry:
Outgoing BAS Command=Send Caps
```

H.320 게이트웨이가 TCS ACK를 Polycom으로 전송

```
001603: Oct 4 21:02:19.148: H245 MSC OUTGOING PDU ::=
```

```
value MultimediaSystemControlMessage ::= response : terminalCapabilitySetAck :
{
sequenceNumber 1
}
```

```
001604: Oct 4 21:02:19.148: H245 MSC OUTGOING ENCODE BUFFER ::= 218001
```

```
001605: Oct 4 21:02:19.148:
```

```
001606: Oct 4 21:02:19.148: h323chan_chn_process_read_socket
```

```
001607: Oct 4 21:02:19.148: h323chan_chn_process_read_socket:
```

```
    fd=4 of type CONNECTED has data
```

```
001608: Oct 4 21:02:19.148: h323chan_chn_process_read_socket:
```

```
    h323chan accepted/connected fd=4
```

```
001609: Oct 4 21:02:19.148: h245_decode_one_pdu: more_pdus = 0,
```

```
    bytesLeftToDecode = 7
```

```
001610: Oct 4 21:02:19.148: H245 MSC INCOMING ENCODE BUFFER ::=
```

```
    01003280741139
```

```
001611: Oct 4 21:02:19.148:
```

H.320 게이트웨이가 Polycom에서 MSD 요청을 수신함

```
001612: Oct 4 21:02:19.148: H245 MSC INCOMING PDU ::=
```

```
value MultimediaSystemControlMessage ::= request : masterSlaveDetermination :
{
terminalType 50
statusDeterminationNumber 7606585
}
```

```
001613: Oct 4 21:02:19.152: h245_decode_one_pdu: H245ASNDecodePdu rc = 0,
```

```
    bytesLeftToDecode = 0
```

```
001614: Oct 4 21:02:19.152: h245_decode_one_pdu: Read Pkt body:
```

```
    more_pdus:0 rc:0 asn_rc:0
```

H.320 게이트웨이가 MSD ACK를 Polycom으로 전송

```
001615: Oct 4 21:02:19.152: H245 MSC OUTGOING PDU ::=
```

```
value MultimediaSystemControlMessage ::= response :
    masterSlaveDeterminationAck :
{
decision slave : NULL
}
```

```
001616: Oct 4 21:02:19.152: H245 MSC OUTGOING ENCODE BUFFER ::= 20A0
```

```
001617: Oct 4 21:02:19.152:
```

001618: Oct 4 21:02:19.152: h323chan_chn_process_read_socket
001619: Oct 4 21:02:19.152: h323chan_chn_process_read_socket:
fd=4 of type CONNECTED has data
001620: Oct 4 21:02:19.152: h323chan_chn_process_read_socket:
h323chan accepted/connected fd=4

001621: Oct 4 21:02:19.152: h245_decode_one_pdu: more_pdus = 0,
bytesLeftToDecode = 3
001622: Oct 4 21:02:19.152: H245 MSC INCOMING ENCODE BUFFER ::= 218001
001623: Oct 4 21:02:19.152:

[H.320 게이트웨이가 Polycom에서 TCS ACK 수신](#)

001624: Oct 4 21:02:19.152: H245 MSC INCOMING PDU ::=

```
value MultimediaSystemControlMessage ::= response : terminalCapabilitySetAck :  
{  
sequenceNumber 1  
}
```

001625: Oct 4 21:02:19.152: h245_decode_one_pdu: H245ASNDecodePdu rc = 0,
bytesLeftToDecode = 0
001626: Oct 4 21:02:19.152: h245_decode_one_pdu: Read Pkt body:
more_pdus:0 rc:0 asn_rc:0
001627: Oct 4 21:02:19.152: //281/736483928021/CCAPI/cc_api_caps_ack:
Destination Interface=0x65A8CAD4, Destination Call Id=280, Source Call Id=281,
Caps(Codec=gsmefr(0x0), Fax Rate=Invalid(0x0), Vad=Invalid(0x0),
Modem=OFF(0x0), Codec Bytes=0, Signal Type=0, Seq Num Start=0)
001628: Oct 4 21:02:19.152: h323chan_chn_process_read_socket
001629: Oct 4 21:02:19.152: h323chan_chn_process_read_socket:
fd=4 of type CONNECTED has data
001630: Oct 4 21:02:19.152: h323chan_chn_process_read_socket:
h323chan accepted/connected fd=4

001631: Oct 4 21:02:19.152: h245_decode_one_pdu: more_pdus = 0,
bytesLeftToDecode = 2
001632: Oct 4 21:02:19.152: H245 MSC INCOMING ENCODE BUFFER ::= 2080
001633: Oct 4 21:02:19.152:
001634: Oct 4 21:02:19.152: H245 MSC INCOMING PDU ::=

[H.320 게이트웨이가 Polycom에서 MSD ACK를 수신함](#)

```
value MultimediaSystemControlMessage ::= response :  
masterSlaveDeterminationAck :  
{  
decision master : NULL  
}
```

001635: Oct 4 21:02:19.152: h245_decode_one_pdu: H245ASNDecodePdu rc = 0,
bytesLeftToDecode = 0
001636: Oct 4 21:02:19.152: h245_decode_one_pdu: Read Pkt body:
more_pdus:0 rc:0 asn_rc:0
001637: Oct 4 21:02:19.172: h323chan_chn_process_read_socket
001638: Oct 4 21:02:19.172: h323chan_chn_process_read_socket:
fd=4 of type CONNECTED has data
001639: Oct 4 21:02:19.172: h323chan_chn_process_read_socket:
h323chan accepted/connected fd=4

001640: Oct 4 21:02:19.172: h245_decode_one_pdu: more_pdus = 0,
bytesLeftToDecode = 19
001641: Oct 4 21:02:19.172: H245 MSC INCOMING ENCODE BUFFER ::=
030000010C6013800A040001000E320534C02B

001642: Oct 4 21:02:19.172:

H.320 게이트웨이가 Polycom에서 오디오 OLC(G.711)를 수신함

Polycom의 RTCP ipaddress:오디오 스트림용 포트는 14.50.5.52:49195입니다.

001643: Oct 4 21:02:19.172: H245 MSC INCOMING PDU ::=

```
value MultimediaSystemControlMessage ::= request : openLogicalChannel :
{
forwardLogicalChannelNumber 2
forwardLogicalChannelParameters
{
dataType audioData : g711Ulaw64k : 20
multiplexParameters h2250LogicalChannelParameters :
{
sessionID 1
mediaControlChannel unicastAddress : ipAddress :
{
network '0E320534'H
tsapIdentifier 49195
}
}
}
}
```

001644: Oct 4 21:02:19.172: h245_decode_one_pdu: H245ASNDcodePdu rc = 0,
bytesLeftToDecode = 0

001645: Oct 4 21:02:19.172: h245_decode_one_pdu: Read Pkt body:
more_p dus:0 rc:0 asn_rc:0

001646: Oct 4 21:02:19.172: //281/736483928021/CCAPI/cc_api_event_indication:
Event=140, Call Id=281

001647: Oct 4 21:02:19.172: //281/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly

001648: Oct 4 21:02:19.176: //280/736483928021/H221():
dsmp_h221_set_outgoing_requested_audio_mode:
Outgoing Audio Mode=G.711 u-law 56k

H.320 게이트웨이가 POTS 레그의 전 범위에서 발신 오디오 모드 설정

001649: Oct 4 21:02:19.176: //280/736483928021/H221():
h221_lock_audio_mode:
Incoming Audio Mode=OFF, Outgoing Audio Mode=G.711 u-law 56k

001650: Oct 4 21:02:19.176: //280/736483928021/H221():
h221_outgoing_message_entry:

Outgoing BAS Command=Send Caps
001651: Oct 4 21:02:19.176: //280/736483928021/H221():

dsmp_h221_populate_config_rtp_params:
Direction=Outgoing, Type=Audio
001652: Oct 4 21:02:19.176: //280/736483928021/H221():
dsmp_h221_populate_config_rtp_params:
Audio Mode=G.711 u-law 56k, Coding Type=0x65, Channel Mask=0xFE

001653: Oct 4 21:02:19.176: //280/736483928021/CCAPI/cc_api_event_indication:
Event=141, Call Id=280

001654: Oct 4 21:02:19.176: //280/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly

H.320 게이트웨이가 Polycom에 오디오 OLC ACK 전송

H.320 게이트웨이의 RTP 및 RTCP ipaddress:port for audio stream은 14.1.16.220:18718 및 14.1.16.220:18719입니다.

001655: Oct 4 21:02:19.176: H245 MSC OUTGOING PDU ::=

```
value MultimediaSystemControlMessage ::= response : openLogicalChannelAck :
{
forwardLogicalChannelNumber 2
forwardMultiplexAckParameters h2250LogicalChannelAckParameters :
{
mediaChannel unicastAddress : ipAddress :
{
network '0E0110DC'H
tsapIdentifier 18718
}
mediaControlChannel unicastAddress : ipAddress :
{
network '0E0110DC'H
tsapIdentifier 18719
}
flowControlToZero FALSE
}
}
```

001656: Oct 4 21:02:19.176: H245 MSC OUTGOING ENCODE BUFFER::=
22C000010480134C000E0110DC491E000E0110DC491F03000100

001657: Oct 4 21:02:19.176:

001658: Oct 4 21:02:19.204: h323chan_chn_process_read_socket

001659: Oct 4 21:02:19.204: h323chan_chn_process_read_socket:
fd=4 of type CONNECTED has data

001660: Oct 4 21:02:19.204: h323chan_chn_process_read_socket:
h323chan accepted/connected fd=4

001661: Oct 4 21:02:19.204: h245_decode_one_pdu: more_pdus = 0,
bytesLeftToDecode = 63

001662: Oct 4 21:02:19.204: H245 MSC INCOMING ENCODE BUFFER::=
0300000208FE0000050BC100705001001B080000104000AF007700AF007741204000
57003B0057003B4020408011046002000E320534C02D04000448097CC0

001663: Oct 4 21:02:19.204:

[H.320 게이트웨이가 Polycom에서 비디오 OLC\(H.263\)를 수신함](#)

Polycom의 RTCP ipaddress:port for Video stream은 14.50.5.52:49197입니다.

[Polycom에서 H.320 게이트웨이로 H.263 비디오 스트림에 대한 RTP 페이로드 유형이 96으로 설정됩니다.](#)

001664: Oct 4 21:02:19.204: H245 MSC INCOMING PDU ::=

```
value MultimediaSystemControlMessage ::= request : openLogicalChannel :
{
forwardLogicalChannelNumber 3
forwardLogicalChannelParameters
{
dataType videoData : h263VideoCapability :
{
sqcifMPI 1
qcifMPI 1
cifMPI 1
cif4MPI 2
maxBitRate 3010
unrestrictedVector FALSE
}
}
}
```

```
arithmeticCoding FALSE
advancedPrediction FALSE
pbFrames FALSE
temporalSpatialTradeOffCapability FALSE
errorCompensation FALSE
h263Options
{
advancedIntraCodingMode FALSE
deblockingFilterMode FALSE
improvedPBFramesMode FALSE
unlimitedMotionVectors FALSE
fullPictureFreeze FALSE
partialPictureFreezeAndRelease FALSE
resizingPartPicFreezeAndRelease FALSE
fullPictureSnapshot FALSE
partialPictureSnapshot FALSE
videoSegmentTagging FALSE
progressiveRefinement FALSE
dynamicPictureResizingByFour FALSE
dynamicPictureResizingSixteenthPel FALSE
dynamicWarpingHalfPel FALSE
dynamicWarpingSixteenthPel FALSE
independentSegmentDecoding FALSE
slicesInOrder-NonRect FALSE
slicesInOrder-Rect FALSE
slicesNoOrder-NonRect FALSE
slicesNoOrder-Rect FALSE
alternateInterVLCMode FALSE
modifiedQuantizationMode TRUE
reducedResolutionUpdate FALSE
separateVideoBackChannel FALSE
customPictureFormat
{
{
maxCustomPictureWidth 176
maxCustomPictureHeight 120
minCustomPictureWidth 176
minCustomPictureHeight 120
mPI
{
standardMPI 2
}
pixelAspectRatioInformation pixelAspectRatioCode :
{
3
}
},
{
maxCustomPictureWidth 88
maxCustomPictureHeight 60
minCustomPictureWidth 88
minCustomPictureHeight 60
mPI
{
standardMPI 1
}
pixelAspectRatioInformation pixelAspectRatioCode :
{
3
}
}
}
```

```
}
multiplexParameters h2250LogicalChannelParameters :
{
sessionID 2
mediaControlChannel unicastAddress : ipAddress :
{
network '0E320534'H
tsapIdentifier 49197
}
dynamicRTPPayloadType 96
mediaPacketization rtpPayloadType :
{
payloadDescriptor rfc-number : 2429
payloadType 96
}
}
}
}
```

001665: Oct 4 21:02:19.216: h245_decode_one_pdu: H245ASNDecodePdu rc = 0,
bytesLeftToDecode = 0

001666: Oct 4 21:02:19.216: h245_decode_one_pdu: Read Pkt body:
more_pdus:0 rc:0 asn_rc:0

001667: Oct 4 21:02:19.216: //281/736483928021/CCAPI/cc_api_event_indication:
Event=140, Call Id=281

001668: Oct 4 21:02:19.216: //281/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly

[H.320 게이트웨이가 POTS 레그를 통해 발신 비디오 모드를 설정](#)

001669: Oct 4 21:02:19.216: //280/736483928021/H221():
dsmp_h221_set_outgoing_requested_video_mode:

Outgoing Video Mode=H.263

001670: Oct 4 21:02:19.216: //280/736483928021/H221():
h221_lock_video_mode:

Incoming Video Mode=OFF, Outgoing Video Mode=H.263

001671: Oct 4 21:02:19.216: //280/736483928021/H221():
h221_outgoing_message_entry:

Outgoing BAS Command=Send Caps

001672: Oct 4 21:02:19.216: //280/736483928021/H221():
dsmp_h221_populate_config_rtp_params:

Direction=Outgoing, Type=Video

001673: Oct 4 21:02:19.216: //280/736483928021/H221():
dsmp_h221_populate_config_rtp_params:

Audio Mode=G.711 u-law 56k, Coding Type=0x65, Channel Mask=0xFE

001674: Oct 4 21:02:19.216: //280/736483928021/H221():
dsmp_h221_populate_config_rtp_params:

Video Mode=H.263, Coding Type=0xC9, RFC Number=0x2, Payload Type=0x60

001675: Oct 4 21:02:19.216: //280/736483928021/H221():
dsmp_h221_calculate_max_video_bandwidth_internal:

Calculation Type=Flow Control, B-Channel(s)=6, Bandwidth=3017

001676: Oct 4 21:02:19.216: //280/736483928021/H221():
dsmp_h221_populate_flow_control_internal:

Video Flow Control, Value=3017, Bandwidth Calculated From H.320 Legs=3017

001677: Oct 4 21:02:19.220: //280/736483928021/CCAPI/cc_api_event_indication:
Event=141, Call Id=280

001678: Oct 4 21:02:19.220: //280/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly

001679: Oct 4 21:02:19.220: //280/736483928021/CCAPI/cc_api_event_indication:
Event=151, Call Id=280

001680: Oct 4 21:02:19.220: //280/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly

H.320 게이트웨이가 Polycom에 비디오 OLC ACK 전송

H.320 게이트웨이의 RTP 및 RTCP ipaddress:port for video stream은 14.1.16.220:18078과 14.1.16.220:18079입니다.

001681: Oct 4 21:02:19.220: H245 MSC OUTGOING PDU ::=

```
value MultimediaSystemControlMessage ::= response : openLogicalChannelAck :
{
forwardLogicalChannelNumber 3
forwardMultiplexAckParameters h2250LogicalChannelAckParameters :
{
mediaChannel unicastAddress : ipAddress :
{
network '0E0110DC'H
tsapIdentifier 18078
}
mediaControlChannel unicastAddress : ipAddress :
{
network '0E0110DC'H
tsapIdentifier 18079
}
flowControlToZero FALSE
}
}
```

001682: Oct 4 21:02:19.220: H245 MSC OUTGOING ENCODE BUFFER::=

22C000020480134C000E0110DC469E000E0110DC469F03000100

001683: Oct 4 21:02:19.220:

001684: Oct 4 21:02:19.220: H245 MSC OUTGOING PDU ::=

```
value MultimediaSystemControlMessage ::= command : flowControlCommand :
{
scope logicalChannelNumber : 3
restriction maximumBitRate : 3017
}
```

001685: Oct 4 21:02:19.224: H245 MSC OUTGOING ENCODE BUFFER::= 48000002200BC9

001686: Oct 4 21:02:19.224:

001687: Oct 4 21:02:19.224: h323chan_chn_process_read_socket

001688: Oct 4 21:02:19.224: h323chan_chn_process_read_socket:

fd=4 of type CONNECTED has data

001689: Oct 4 21:02:19.224: h323chan_chn_process_read_socket:

h323chan accepted/connected fd=4

001690: Oct 4 21:02:19.224: h245_decode_one_pdu: more_pdus = 0,

bytesLeftToDecode = 5

001691: Oct 4 21:02:19.224: H245 MSC INCOMING ENCODE BUFFER::= 6900000100

001692: Oct 4 21:02:19.224:

001693: Oct 4 21:02:19.224: H245 MSC INCOMING PDU ::=

```
value MultimediaSystemControlMessage ::= indication : miscellaneousIndication :
{
logicalChannelNumber 2
type logicalChannelActive : NULL
}
```

001694: Oct 4 21:02:19.224: h245_decode_one_pdu: H245ASNDecodePdu rc = 0,

bytesLeftToDecode = 0

001695: Oct 4 21:02:19.224: h245_decode_one_pdu: Read Pkt body:

more_pdus:0 rc:0 asn_rc:0

001696: Oct 4 21:02:19.224: //281/736483928021/CCAPI/cc_api_event_indication:
Event=151, Call Id=281
001697: Oct 4 21:02:19.224: //281/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly
001698: Oct 4 21:02:19.224:

H.320 게이트웨이가 오디오를 전송하여 PSTN의 원격 비디오 엔드포인트에 활성 제어 및 정보 신호를 표시합니다.

오디오 채널을 활성화하기 위해 H.320 게이트웨이가 오디오를 전송하면 PSTN의 원격 비디오 엔드포인트에 활성 제어 및 정보 신호를 나타냅니다.

```
//280/736483928021/H221:():h221_outgoing_message_entry:  
Outgoing BAS Command=Send Miscellaneous  
001699: Oct 4 21:02:19.224: //280/736483928021/H221:():  
    h221_outgoing_send_misc_cmd_indication:  
Send Miscellaneous Command=Audio Channel Active  
001700: Oct 4 21:02:19.248: h323chan_chn_process_read_socket  
001701: Oct 4 21:02:19.248: h323chan_chn_process_read_socket:  
    fd=4 of type CONNECTED has data  
001702: Oct 4 21:02:19.248: h323chan_chn_process_read_socket:  
    h323chan accepted/connected fd=4  
  
001703: Oct 4 21:02:19.248: h245_decode_one_pdu: more_pdus = 0,  
    bytesLeftToDecode = 9  
001704: Oct 4 21:02:19.248: H245 MSC INCOMING ENCODE BUFFER ::=  
    70E006000002200BC2  
001705: Oct 4 21:02:19.248:  
001706: Oct 4 21:02:19.248: H245 MSC INCOMING PDU ::=  
  
value MultimediaSystemControlMessage ::= indication : flowControlIndication :  
{  
    scope logicalChannelNumber : 3  
    restriction maximumBitRate : 3010  
}  
  
001707: Oct 4 21:02:19.248: h245_decode_one_pdu: H245ASNDecodePdu rc = 0,  
    bytesLeftToDecode = 0  
001708: Oct 4 21:02:19.248: h245_decode_one_pdu: Read Pkt body:  
    ore_pdus:0 rc:0 asn_rc:0  
001709: Oct 4 21:02:19.532: //280/736483928021/H221:():  
    dsmp_h221_update_dsp_timestamp:  
BAS Message Timestamp=2500(ms), Last Squelch Timestamp=0(ms)  
Last Fast Video Update Timestamp=0(ms), Update Bas Timestamp=FALSE  
001710: Oct 4 21:02:19.536:
```

!--- Some debug outputs have been removed.

PSTN의 비디오 엔드포인트에서 전송 속도 및 오디오 모드 설정

```
001815: Oct 4 21:02:24.036: //280/736483928021/H221:():  
    h221_incoming_transfer_rate_mode:  
Incoming B-channel Mode=6  
001816: Oct 4 21:02:24.036: //280/736483928021/H221:():  
    h221_incoming_audio_mode:  
Incoming Audio Mode=G.711 u-law 56k  
001817: Oct 4 21:02:24.036: //280/736483928021/H221:():  
    h221_incoming_unsupported_other_mode:  
BAS=0x60  
001818: Oct 4 21:02:24.036: //280/736483928021/H221:():
```



```
h221_incoming_unsupported_other_mode:
BAS=0x70
001819: Oct 4 21:02:24.036: //280/736483928021/H221():
h221_incoming_message_entry:
Return Code=H221 Partial Message
001820: Oct 4 21:02:24.036: //280/736483928021/H221():
dsmp_h221_check_for_bas_sqelch:
H221 Sqelch Map=0x0
001821: Oct 4 21:02:24.036: //280/736483928021/H221():
dsmp_h221_check_for_bas_sqelch:
H221 Sqelch Map=0x0
001822: Oct 4 21:02:24.036: //280/736483928021/H221():
h221_lock_audio_mode:
Incoming Audio Mode=G.711 u-law 56k, Outgoing Audio Mode=G.711 u-law 56k
001823: Oct 4 21:02:24.036: //280/736483928021/CCAPI/cc_api_event_indication:
Event=140, Call Id=280
001824: Oct 4 21:02:24.036: //280/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly
```

[H.320 게이트웨이가 Polycom에 오디오 OLC\(G.711\)를 전송합니다.](#)

H.320 게이트웨이의 RTCP ipaddress:port for audio stream은 14.1.16.220:18719입니다.

```
001825: Oct 4 21:02:24.036: H245 MSC OUTGOING PDU ::=
value MultimediaSystemControlMessage ::= request : openLogicalChannel :
{
forwardLogicalChannelNumber 1
forwardLogicalChannelParameters
{
dataType audioData : g711Ulaw64k : 20
multiplexParameters h2250LogicalChannelParameters :
{
sessionID 1
mediaControlChannel unicastAddress : ipAddress :
{
network '0E0110DC'H
tsapIdentifier 18719
}
silenceSuppression FALSE
}
}
}
```

```
001826: Oct 4 21:02:24.040: H245 MSC OUTGOING ENCODE BUFFER::=
0300000000C6013800B050001000E0110DC491F00
001827: Oct 4 21:02:24.040:
001828: Oct 4 21:02:24.052: h323chan_chn_process_read_socket
001829: Oct 4 21:02:24.052: h323chan_chn_process_read_socket:
fd=4 of type CONNECTED has data
001830: Oct 4 21:02:24.052: h323chan_chn_process_read_socket:
h323chan accepted/connected fd=4
001831: Oct 4 21:02:24.052: h245_decode_one_pdu: more_pdus = 0,
bytesLeftToDecode = 23
001832: Oct 4 21:02:24.052: H245 MSC INCOMING ENCODE BUFFER::=
22C000000480101C00000E320534C02A000E320534C02B
001833: Oct 4 21:02:24.052:
```

[H.320 게이트웨이가 Polycom에서 오디오 OLC ACK 수신](#)

오디오 스트림에 대한 Polycom의 RTP 및 RTCP ipaddress:port는 14.50.5.52:49194 및

14.50.5.52:49195입니다.

001834: Oct 4 21:02:24.052: H245 MSC INCOMING PDU ::=

```
value MultimediaSystemControlMessage ::= response : openLogicalChannelAck :
{
forwardLogicalChannelNumber 1
forwardMultiplexAckParameters h2250LogicalChannelAckParameters :
{
sessionID 1
mediaChannel unicastAddress : ipAddress :
{
network '0E320534'H
tsapIdentifier 49194
}
mediaControlChannel unicastAddress : ipAddress :
{
network '0E320534'H
tsapIdentifier 49195
}
}
}
```

001835: Oct 4 21:02:24.052: h245_decode_one_pdu: H245ASNDecodePdu rc = 0,
bytesLeftToDecode = 0

001836: Oct 4 21:02:24.052: h245_decode_one_pdu: Read Pkt body:
more_pdus:0 rc:0 asn_rc:0

001837: Oct 4 21:02:24.056: //281/736483928021/CCAPI/cc_api_event_indication:
Event=141, Call Id=281

001838: Oct 4 21:02:24.056: //281/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly

001839: Oct 4 21:02:24.056: RAS OUTGOING PDU ::=

```
value RasMessage ::= bandwidthRequest :
{
requestSeqNum 2051
endpointIdentifier {"65766C6C00000001"}
conferenceID '73648392532211DB8021000D28D3D7C0'H
callReferenceValue 28
bandWidth 7300
callIdentifier
{
guid '73651FB9532211DB817D90162806D3F1'H
}
answeredCall FALSE
}
```

001840: Oct 4 21:02:24.056: RAS OUTGOING ENCODE BUFFER::=
320008021E0036003500370036003600430036004300300030003000300030003
00030003173648392532211DB8021000D28D3D7C0001C401C8415080011007365
1FB9532211DB817D90162806D3F10100

001841: Oct 4 21:02:24.056: h323chan_dgram_send:Sent UDP msg.
Bytes sent: 81 to 14.50.3.101:1719 fd=2

001842: Oct 4 21:02:24.056: RASLib::GW_RASSendBRQ:
BRQ (seq# 2051) sent to 14.50.3.101

001843: Oct 4 21:02:24.056: //280/736483928021/H221():
dsmp_h221_populate_config_rtp_params:
Direction=Incoming, Type=Audio

001844: Oct 4 21:02:24.056: //280/736483928021/H221():
dsmp_h221_populate_config_rtp_params:
Audio Mode=G.711 u-law 56k, Coding Type=0x65, Channel Mask=0xFE

```
001845: Oct 4 21:02:24.060: h323chan_chn_process_read_socket
001846: Oct 4 21:02:24.060: h323chan_chn_process_read_socket:
    fd=2 of type CONNECTED has data
001847: Oct 4 21:02:24.060: h323chan_chn_process_read_socket:
    h323chan accepted/connected fd=2

001848: Oct 4 21:02:24.060: h323chan_dgram_recvdata:rcvd from
    [14.50.3.101:1719] on fd=2

001849: Oct 4 21:02:24.060: RAS INCOMING ENCODE BUFFER::= 340802401C84
001850: Oct 4 21:02:24.060:
001851: Oct 4 21:02:24.060: RAS INCOMING PDU ::=
```

```
value RasMessage ::= bandwidthConfirm :
{
requestSeqNum 2051
bandWidth 7300
}
```

!--- Some debug outputs are removed

PSTN의 비디오 엔드포인트가 비디오 모드를 설정합니다.

```
001870: Oct 4 21:02:25.036: //280/736483928021/H221():
    h221_incoming_video_mode:
Incoming Video Mode=H.263
001871: Oct 4 21:02:25.036: //280/736483928021/H221():
    dsmp_h221_video_mode:
Video Mode=H.263
001872: Oct 4 21:02:25.036: //280/736483928021/H221():
    h221_incoming_unsupported_other_mode:
BAS=0x60
001873: Oct 4 21:02:25.036: //280/736483928021/H221():
    h221_incoming_unsupported_other_mode:
BAS=0x70
001874: Oct 4 21:02:25.036: //280/736483928021/H221():
    h221_incoming_handle_table_4_H230:
Handling H.230 BAS=0x3
```

H.320 게이트웨이가 오디오를 수신하여 PSTN의 원격 비디오 엔드포인트에서 활성화 제어 및 정보 신호를 나타냅니다.

오디오 채널을 활성화하기 위해 H.320 게이트웨이가 오디오를 수신하면 PSTN의 원격 비디오 엔드포인트에서 활성화 제어 및 정보 신호를 나타냅니다.

```
001875: Oct 4 21:02:25.036: //280/736483928021/H221():
    dsmp_h221_misc_command:
Received Miscellaneous Command=Audio Channel Active
001876: Oct 4 21:02:25.036: //280/736483928021/H221():
    h221_incoming_message_entry:
Return Code=H221 Partial Message
001877: Oct 4 21:02:25.036: //280/736483928021/H221():
    dsmp_h221_check_for_bas_sqelch:
H221 Squelch Map=0x0
001878: Oct 4 21:02:25.036: //280/736483928021/H221():
    dsmp_h221_check_for_bas_sqelch:
H221 Squelch Map=0x1
001879: Oct 4 21:02:25.036: //280/736483928021/H221():
    h221_lock_video_mode:
Incoming Video Mode=H.263, Outgoing Video Mode=H.263
```

```
001880: Oct 4 21:02:25.036: //280/736483928021/H221():
    h221_outgoing_message_entry:
Outgoing BAS Command=Send Mode
001881: Oct 4 21:02:25.036: //280/736483928021/H221():
    dsmp_h221_calculate_max_video_bandwidth_internal:
Calculation Type=Max Capability, B-Channel(s)=6, Bandwidth=3017
001882: Oct 4 21:02:25.036:
    //280/736483928021/CCAPI/cc_api_event_indication:
Event=140, Call Id=280
001883: Oct 4 21:02:25.036:
    //280/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly
001884: Oct 4 21:02:25.036:
    //280/736483928021/CCAPI/cc_api_event_indication:
Event=151, Call Id=280
001885: Oct 4 21:02:25.040:
    //280/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly
```

[H.320 게이트웨이가 Polycom에 비디오 OLC\(H.263\)를 전송합니다.](#)

H.320 게이트웨이의 RTCP ipaddress:비디오 스트림용 포트는 14.1.16.220:18079입니다.

[H.320 게이트웨이에서 Polycom으로의 H.263 비디오 스트림에 대한 RTP 페이로드 유형이 110으로 설정됩니다.](#)

```
001886: Oct 4 21:02:25.040: H245 MSC OUTGOING PDU ::=
value MultimediaSystemControlMessage ::= request : openLogicalChannel :
{
forwardLogicalChannelNumber 2
forwardLogicalChannelParameters
{
dataType videoData : h263VideoCapability :
{
qcifMPI 1
cifMPI 1
cif4MPI 2
maxBitRate 3017
unrestrictedVector FALSE
arithmeticCoding FALSE
advancedPrediction TRUE
pbFrames FALSE
temporalSpatialTradeOffCapability FALSE
errorCompensation FALSE
h263Options
{
advancedIntraCodingMode FALSE
deblockingFilterMode FALSE
improvedPBFramesMode FALSE
unlimitedMotionVectors FALSE
fullPictureFreeze FALSE
partialPictureFreezeAndRelease FALSE
resizingPartPicFreezeAndRelease FALSE
fullPictureSnapshot FALSE
partialPictureSnapshot FALSE
videoSegmentTagging FALSE
progressiveRefinement FALSE
dynamicPictureResizingByFour FALSE
dynamicPictureResizingSixteenthPel FALSE
dynamicWarpingHalfPel FALSE
```

```

dynamicWarpingSixteenthPel FALSE
independentSegmentDecoding FALSE
slicesInOrder-NonRect FALSE
slicesInOrder-Rect FALSE
slicesNoOrder-NonRect FALSE
slicesNoOrder-Rect FALSE
alternateInterVLCMode FALSE
modifiedQuantizationMode TRUE
reducedResolutionUpdate FALSE
separateVideoBackChannel FALSE
customPictureFormat
{
{
maxCustomPictureWidth 176
maxCustomPictureHeight 120
minCustomPictureWidth 176
minCustomPictureHeight 120
mPI
{
standardMPI 2
}
pixelAspectInformation pixelAspectCode :
{
3
}
},
{
maxCustomPictureWidth 88
maxCustomPictureHeight 60
minCustomPictureWidth 88
minCustomPictureHeight 60
mPI
{
standardMPI 1
}
pixelAspectInformation pixelAspectCode :
{
3
}
}
}
multiplexParameters h2250LogicalChannelParameters :
{
sessionID 2
mediaControlChannel unicastAddress : ipAddress :
{
network '0E0110DC'H
tsapIdentifier 18079
}
dynamicRTPPayloadType 110
mediaPacketization rtpPayloadType :
{
payloadDescriptor rfc-number : 2429
payloadType 110
}
}
}
}

```

```

001887: Oct 4 21:02:25.048: H245 MSC OUTGOING ENCODE BUFFER::=
0300000108EE0000A00BC820705001001B080000104000AF007700AF007

```

74120400057003B0057003B4020408011046002000E0110DC469F740004
48097CDC

001888: Oct 4 21:02:25.048:

001889: Oct 4 21:02:25.048: H245 MSC OUTGOING PDU ::=

```
value MultimediaSystemControlMessage ::= indication : miscellaneousIndication :  
{  
logicalChannelNumber 1  
type logicalChannelActive : NULL  
}
```

001890: Oct 4 21:02:25.048: H245 MSC OUTGOING ENCODE BUFFER ::= 6900000000

001891: Oct 4 21:02:25.052:

001892: Oct 4 21:02:25.068: h323chan_chn_process_read_socket

001893: Oct 4 21:02:25.068: h323chan_chn_process_read_socket:
fd=4 of type CONNECTED has data

001894: Oct 4 21:02:25.068: h323chan_chn_process_read_socket:
h323chan accepted/connected fd=4

001895: Oct 4 21:02:25.068: h245_decode_one_pdu: more_pdus = 0,
bytesLeftToDecode = 23

001896: Oct 4 21:02:25.068: H245 MSC INCOMING ENCODE BUFFER ::=
22C000010480101C02000E320534C02C000E320534C02D

001897: Oct 4 21:02:25.068:

[H.320 게이트웨이가 Polycom에서 비디오 OLC ACK 수신](#)

비디오 스트림용 Polycom의 RTP 및 RTCP ipaddress:포트는 14.50.5.52:49196 및 14.50.5.52:49197입니다.

001898: Oct 4 21:02:25.068: H245 MSC INCOMING PDU ::=

```
value MultimediaSystemControlMessage ::= response : openLogicalChannelAck :  
{  
forwardLogicalChannelNumber 2  
forwardMultiplexAckParameters h2250LogicalChannelAckParameters :  
{  
sessionID 2  
mediaChannel unicastAddress : ipAddress :  
{  
network '0E320534'H  
tsapIdentifier 49196  
}  
mediaControlChannel unicastAddress : ipAddress :  
{  
network '0E320534'H  
tsapIdentifier 49197  
}  
}  
}
```

001899: Oct 4 21:02:25.072: h245_decode_one_pdu: H245ASNDecodePdu rc = 0,
bytesLeftToDecode = 0

001900: Oct 4 21:02:25.072: h245_decode_one_pdu: Read Pkt body:
more_pdus:0 rc:0 asn_rc:0

001901: Oct 4 21:02:25.072: //281/736483928021/CCAPI/cc_api_event_indication:
Event=141, Call Id=281

001902: Oct 4 21:02:25.072: //281/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly

001903: Oct 4 21:02:25.072: //280/736483928021/H221():
dsmp_h221_populate_config_rtp_params:

Direction=Incoming, Type=Video

```
001904: Oct 4 21:02:25.072: //280/736483928021/H221():
    dsmp_h221_populate_config_rtp_params:
Audio Mode=G.711 u-law 56k, Coding Type=0x65, Channel Mask=0xFE
001905: Oct 4 21:02:25.072: //280/736483928021/H221():
    dsmp_h221_populate_config_rtp_params:
Video Mode=H.263, Coding Type=0xC9, RFC Number=0x2, Payload Type=0x6E
001906: Oct 4 21:02:25.072: //280/736483928021/H221():
    dsmp_h221_populate_config_rtp_params:
Direction=Outgoing, Type=Video
001907: Oct 4 21:02:25.072: //280/736483928021/H221():
    dsmp_h221_populate_config_rtp_params:
Audio Mode=G.711 u-law 56k, Coding Type=0x65, Channel Mask=0xFE
001908: Oct 4 21:02:25.072: //280/736483928021/H221():
    dsmp_h221_populate_config_rtp_params:
Video Mode=H.263, Coding Type=0xC9, RFC Number=0x2, Payload Type=0x60
001909: Oct 4 21:02:25.072: h323chan_chn_process_read_socket
001910: Oct 4 21:02:25.072: h323chan_chn_process_read_socket:
    fd=4 of type CONNECTED has data
001911: Oct 4 21:02:25.076: h323chan_chn_process_read_socket:
    h323chan accepted/connected fd=4

001912: Oct 4 21:02:25.076: h245_decode_one_pdu: more_pdus = 0,
    bytesLeftToDecode = 7
001913: Oct 4 21:02:25.076: H245 MSC INCOMING ENCODE BUFFER ::= 48000001200C80
001914: Oct 4 21:02:25.076:
001915: Oct 4 21:02:25.076: H245 MSC INCOMING PDU ::=
```

```
value MultimediaSystemControlMessage ::= command : flowControlCommand :
{
scope logicalChannelNumber : 2
restriction maximumBitRate : 3200
}
```

```
001916: Oct 4 21:02:25.076: h245_decode_one_pdu:
    H245ASNDecodePdu rc = 0, bytesLeftToDecode = 0
001917: Oct 4 21:02:25.076: h245_decode_one_pdu:
    Read Pkt body: more_pdus:0 rc:0 asn_rc:0
001918: Oct 4 21:02:25.076: //281/736483928021/CCAPI/cc_api_event_indication:
Event=151, Call Id=281
001919: Oct 4 21:02:25.076: //281/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly
001920: Oct 4 21:02:25.076: h323chan_chn_process_read_socket
001921: Oct 4 21:02:25.076: h323chan_chn_process_read_socket:
    fd=4 of type CONNECTED has data
001922: Oct 4 21:02:25.076: h323chan_chn_process_read_socket:
    h323chan accepted/connected fd=4

001923: Oct 4 21:02:25.076: h245_decode_one_pdu: more_pdus = 0,
    bytesLeftToDecode = 4
001924: Oct 4 21:02:25.076: H245 MSC INCOMING ENCODE BUFFER ::= 4C000128
001925: Oct 4 21:02:25.076:
```

[H.320 게이트웨이가 Polycom에서 VFU\(Video Fast Update\) 사진 요청을 수신함](#)

이 출력에서 H.320 게이트웨이는 Polycom에서 VFU 사진 요청을 수신하며, 이는 비디오 스트림을 받을 준비가 되었음을 나타냅니다.

```
001926: Oct 4 21:02:25.076: H245 MSC INCOMING PDU ::=

value MultimediaSystemControlMessage ::= command : miscellaneousCommand :
{
logicalChannelNumber 2
```

```
type videoFastUpdatePicture : NULL
}
```

```
001927: Oct 4 21:02:25.076: h245_decode_one_pdu: H245ASNDecodePdu rc = 0,
      bytesLeftToDecode = 0
001928: Oct 4 21:02:25.076: h245_decode_one_pdu: Read Pkt body:
      more_pdus:0 rc:0 asn_rc:0
001929: Oct 4 21:02:25.076: //281/736483928021/CCAPI/cc_api_event_indication:
Event=151, Call Id=281
001930: Oct 4 21:02:25.076: //281/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly
001931: Oct 4 21:02:25.076: //280/736483928021/H221:():
      h221_outgoing_message_entry:
Outgoing BAS Command=Send Miscellaneous
001932: Oct 4 21:02:25.076: //280/736483928021/H221:():
      h221_outgoing_send_misc_cmd_indication:
Send Miscellaneous Command=Flow Control
001933: Oct 4 21:02:25.076: //280/736483928021/H221:():
      h221_outgoing_send_misc_cmd_indication:
Sending Non-Standard Flow-Control To Cisco Peer, Value=3200
001934: Oct 4 21:02:25.076: //280/736483928021/H221:():
      h221_outgoing_message_entry:
Outgoing BAS Command=Send Miscellaneous
001935: Oct 4 21:02:25.076:
```

[H.320 게이트웨이가 PSTN의 비디오 엔드포인트에 비디오 빠른 업데이트 사진 제어 및 정보 신호를 보냅니다.](#)

```
//280/736483928021/H221:():h221_outgoing_send_misc_cmd_indication:
Send Miscellaneous Command=Video Fast Update Picture
```

```
!--- Some debug outputs have been removed. 001973: Oct 4 21:02:26.168:
h323chan_chn_process_read_socket: h323chan accepted/connected fd=4 001974: Oct 4 21:02:26.168:
h245_decode_one_pdu: more_pdus = 0, bytesLeftToDecode = 7 001975: Oct 4 21:02:26.168: H245 MSC
INCOMING ENCODE BUFFER ::= 48000001200C80 001976: Oct 4 21:02:26.168:
```

[H.320 게이트웨이가 Polycom에서 흐름 제어 명령 수신](#)

```
001977: Oct 4 21:02:26.168: H245 MSC INCOMING PDU ::=
value MultimediaSystemControlMessage ::= command : flowControlCommand :
{
scope logicalChannelNumber : 2
restriction maximumBitRate : 3200
}
```

```
001978: Oct 4 21:02:26.168: h245_decode_one_pdu: H245ASNDecodePdu rc = 0,
      bytesLeftToDecode = 0
001979: Oct 4 21:02:26.168: h245_decode_one_pdu: Read Pkt body:
      more_pdus:0 rc:0 asn_rc:0
001980: Oct 4 21:02:26.168: //281/736483928021/CCAPI/cc_api_event_indication:
Event=151, Call Id=281
001981: Oct 4 21:02:26.168: //281/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly
001982: Oct 4 21:02:26.168: //280/736483928021/H221:():
      h221_outgoing_message_entry:
Outgoing BAS Command=Send Miscellaneous
001983: Oct 4 21:02:26.168:
```

[H.320 게이트웨이가 PSTN의 비디오 엔드포인트에 흐름 제어 명령을 보냅니다.](#)


```
//280/736483928021/H221():h221_outgoing_send_misc_cmd_indication:
Send Miscellaneous Command=Flow Control
001984: Oct 4 21:02:26.168: //280/736483928021/H221():
    h221_outgoing_send_misc_cmd_indication:
Sending Non-Standard Flow-Control To Cisco Peer, Value=3200
```

!--- Some debug outputs have been removed

H.320 게이트웨이가 Polycom에 흐름 제어 명령 전송

H.320 게이트웨이가 PSTN의 비디오 엔드포인트에서 흐름 제어 명령 수신

```
002005: Oct 4 21:02:26.536: //280/736483928021/H221():
    h221_incoming_ns_cap_comm:
Cisco GW non-standard Indication Received, Command=Flow Control, Value=3200
002006: Oct 4 21:02:26.536: //280/736483928021/H221():dsmp_h221_misc_command:
Received Miscellaneous Command=Flow Control
002007: Oct 4 21:02:26.536: //280/736483928021/H221():
    dsmp_h221_calculate_max_video_bandwidth_internal:
Calculation Type=Flow Control, B-Channel(s)=6, Bandwidth=3017
002008: Oct 4 21:02:26.536: //280/736483928021/H221():
    dsmp_h221_populate_flow_control_internal:
Video Flow Control, Value=3017, Bandwidth Calculated From H.320 Legs=3017
Flow Control Bandwidth Received From H.320 Peer=3200
002009: Oct 4 21:02:26.536: //280/736483928021/H221():
    dsmp_h221_check_for_bas_sqelch:
H221 Squelch Map=0x1
002010: Oct 4 21:02:26.536: //280/736483928021/H221():
    dsmp_h221_check_for_bas_sqelch:
H221 Squelch Map=0x1
002011: Oct 4 21:02:26.536: //280/736483928021/CCAPI/cc_api_event_indication:
Event=151, Call Id=280
002012: Oct 4 21:02:26.536: //280/736483928021/CCAPI/cc_api_event_indication:
Event Is Sent To Conferenced SPI(s) Directly
```

H.320 게이트웨이가 Polycom에 흐름 제어 명령 전송

```
002013: Oct 4 21:02:26.536: H245 MSC OUTGOING PDU ::=
value MultimediaSystemControlMessage ::= command : flowControlCommand :
{
scope logicalChannelNumber : 3
restriction maximumBitRate : 3017
}
```

```
002014: Oct 4 21:02:26.536: H245 MSC OUTGOING ENCODE BUFFER ::= 48000002200BC9
```

!--- Some debug outputs have been removed

PSTN의 비디오 엔드포인트가 비디오 통화의 연결을 끊습니다.

```
002136: Oct 4 21:02:55.578: RCF (seq# 2052) rcvd
002137: Oct 4 21:03:14.223: ISDN Se2/1:23 Q931:
    RX <- DISCONNECT pd = 8 callref = 0x00A0
Cause i = 0x829F - Normal, unspecified
002138: Oct 4 21:03:14.227: %ISDN-6-DISCONNECT:
    Interface Serial2/1:1 disconnected from 9193926000 ,
    call lasted 57 seconds
002139: Oct 4 21:03:14.227: ISDN Se2/1:23 Q931:
```

RX <- DISCONNECT pd = 8 callref = 0x00A1
Cause i = 0x829F - Normal, unspecified
002140: Oct 4 21:03:14.227: ISDN Se2/1:23 Q931:
TX -> RELEASE pd = 8 callref = 0x80A0
002141: Oct 4 21:03:14.227: ISDN Se2/1:23 Q931:
RX <- DISCONNECT pd = 8 callref = 0x00A2
Cause i = 0x829F - Normal, unspecified
002142: Oct 4 21:03:14.231: %ISDN-6-DISCONNECT:
Interface Serial2/1:2 disconnected from 9193926000 ,
call lasted 56 seconds
002143: Oct 4 21:03:14.231: %ISDN-6-DISCONNECT:
Interface Serial2/1:3 disconnected from 9193926000 ,
call lasted 56 seconds
002144: Oct 4 21:03:14.231: ISDN Se2/1:23 Q931:
RX <- DISCONNECT pd = 8 callref = 0x00A3
Cause i = 0x829F - Normal, unspecified
002145: Oct 4 21:03:14.231: ISDN Se2/1:23 Q931:
RX <- DISCONNECT pd = 8 callref = 0x00A4
Cause i = 0x829F - Normal, unspecified
002146: Oct 4 21:03:14.235: ISDN Se2/1:23 Q931:
TX -> RELEASE pd = 8 callref = 0x80A1
002147: Oct 4 21:03:14.235: ISDN Se2/1:23 Q931:
TX -> RELEASE pd = 8 callref = 0x80A2
002148: Oct 4 21:03:14.235: ISDN Se2/1:23 Q931:
RX <- DISCONNECT pd = 8 callref = 0x009F
Cause i = 0x829F - Normal, unspecified
002149: Oct 4 21:03:14.239: %ISDN-6-DISCONNECT:
Interface Serial2/1:4 disconnected from 9193926000 ,
call lasted 56 seconds
002150: Oct 4 21:03:14.239: %ISDN-6-DISCONNECT:
Interface Serial2/1:5 disconnected from 9193926000 ,
call lasted 55 seconds
002151: Oct 4 21:03:14.239: %ISDN-6-DISCONNECT:
Interface Serial2/1:0 disconnected from 9193926000 ,
call lasted 57 seconds
002152: Oct 4 21:03:14.239: ISDN Se2/1:23 Q931:
RX <- RELEASE_COMP pd = 8 callref = 0x00A0
002153: Oct 4 21:03:14.243: ISDN Se2/1:23 Q931:
TX -> RELEASE pd = 8 callref = 0x80A3
002154: Oct 4 21:03:14.243: ISDN Se2/1:23 Q931:
TX -> RELEASE pd = 8 callref = 0x80A4
002155: Oct 4 21:03:14.243: ISDN Se2/1:23 Q931:
TX -> RELEASE pd = 8 callref = 0x809F
002156: Oct 4 21:03:14.243: ISDN Se2/1:23 Q931:
RX <- RELEASE_COMP pd = 8 callref = 0x00A1
002157: Oct 4 21:03:14.243:
//280/736483928021/CCAPI/cc_api_call_disconnected:
Cause Value=31, Interface=0x65A8CAD4, Call Id=280
002158: Oct 4 21:03:14.243:
//280/736483928021/CCAPI/cc_api_call_disconnected:
Call Entry(Responded=TRUE, Cause Value=31, Retry Count=0)
002159: Oct 4 21:03:14.243: ISDN Se2/1:23 Q931:
RX <- RELEASE_COMP pd = 8 callref = 0x00A2
002160: Oct 4 21:03:14.247: //280/736483928021/CCAPI/ccConferenceDestroy:
Conference Id=0x12, Tag=0x0
002161: Oct 4 21:03:14.247: //280/xxxxxxxxxxxx/CCAPI/cc_api_bridge_drop_done:
Conference Id=0x12, Source Interface=0x65A8CAD4, Source Call Id=280,
Destination Call Id=281, Disposition=0x0, Tag=0x0
002162: Oct 4 21:03:14.247: //281/xxxxxxxxxxxx/CCAPI/cc_api_bridge_drop_done:
Conference Id=0x12, Source Interface=0x65D7A87C, Source Call Id=281,
Destination Call Id=280, Disposition=0x0, Tag=0x0
002163: Oct 4 21:03:14.247: //280/736483928021/CCAPI/cc_generic_bridge_done:
Conference Id=0x12, Source Interface=0x65D7A87C, Source Call Id=281,
Destination Call Id=280, Disposition=0x0, Tag=0x0

002164: Oct 4 21:03:14.247: ISDN Se2/1:23 Q931:
RX <- RELEASE_COMP pd = 8 callref = 0x00A3

002165: Oct 4 21:03:14.255: ISDN Se2/1:23 Q931:
RX <- RELEASE_COMP pd = 8 callref = 0x00A4

002166: Oct 4 21:03:14.255: ISDN Se2/1:23 Q931:
RX <- RELEASE_COMP pd = 8 callref = 0x009F

002167: Oct 4 21:03:14.255: //280/736483928021/CCAPI/ccCallDisconnect:
Cause Value=31, Tag=0x0, Call Entry(Previous Disconnect Cause=0,
Disconnect Cause=31)

002168: Oct 4 21:03:14.255: //280/736483928021/CCAPI/ccCallDisconnect:
Cause Value=31, Call Entry(Responded=TRUE, Cause Value=31)

002169: Oct 4 21:03:14.255: //280/736483928021/CCAPI/cc_api_get_transfer_info:
Transfer Number Is Null

002170: Oct 4 21:03:14.255: //281/736483928021/CCAPI/ccCallDisconnect:
Cause Value=31, Tag=0x0, Call Entry(Previous Disconnect Cause=0,
Disconnect Cause=0)

002171: Oct 4 21:03:14.255: //281/736483928021/CCAPI/ccCallDisconnect:
Cause Value=31, Call Entry(Responded=TRUE, Cause Value=31)

002172: Oct 4 21:03:14.259: //281/736483928021/CCAPI/cc_api_get_transfer_info:
Transfer Number Is Null

002173: Oct 4 21:03:14.259:
//282/736483928021/CCAPI/cc_api_call_disconnect_done:
Disposition=0, Interface=0x65A8CAD4, Tag=0x0, Call Id=282,
Call Entry(Disconnect Cause=0, Voice Class Cause Code=0, Retry Count=0)

002174: Oct 4 21:03:14.259:
//282/736483928021/CCAPI/cc_api_call_disconnect_done:
Call Disconnect Event Sent

002175: Oct 4 21:03:14.259: //-1/xxxxxxxxxxxx/CCAPI/cc_free_feature_vsa:

002176: Oct 4 21:03:14.259: :cc_free_feature_vsa freeing 65F09B30

002177: Oct 4 21:03:14.259: //-1/xxxxxxxxxxxx/CCAPI/cc_free_feature_vsa:

002178: Oct 4 21:03:14.259: vsacount in free is 6

002179: Oct 4 21:03:14.259:
//283/736483928021/CCAPI/cc_api_call_disconnect_done:
Disposition=0, Interface=0x65A8CAD4, Tag=0x0, Call Id=283,
Call Entry(Disconnect Cause=0, Voice Class Cause Code=0, Retry Count=0)

002180: Oct 4 21:03:14.259:
//283/736483928021/CCAPI/cc_api_call_disconnect_done:
Call Disconnect Event Sent

002181: Oct 4 21:03:14.259: //-1/xxxxxxxxxxxx/CCAPI/cc_free_feature_vsa:

002182: Oct 4 21:03:14.259: :cc_free_feature_vsa freeing 65F09980

002183: Oct 4 21:03:14.259: //-1/xxxxxxxxxxxx/CCAPI/cc_free_feature_vsa:

002184: Oct 4 21:03:14.259: vsacount in free is 5

002185: Oct 4 21:03:14.263:
//284/736483928021/CCAPI/cc_api_call_disconnect_done:
Disposition=0, Interface=0x65A8CAD4, Tag=0x0, Call Id=284,
Call Entry(Disconnect Cause=0, Voice Class Cause Code=0, Retry Count=0)

002186: Oct 4 21:03:14.263:
//284/736483928021/CCAPI/cc_api_call_disconnect_done:
Call Disconnect Event Sent

002187: Oct 4 21:03:14.263: //-1/xxxxxxxxxxxx/CCAPI/cc_free_feature_vsa:

002188: Oct 4 21:03:14.263: :cc_free_feature_vsa freeing 65F098A8

002189: Oct 4 21:03:14.263: //-1/xxxxxxxxxxxx/CCAPI/cc_free_feature_vsa:

002190: Oct 4 21:03:14.263: vsacount in free is 4

002191: Oct 4 21:03:14.263:
//285/736483928021/CCAPI/cc_api_call_disconnect_done:
Disposition=0, Interface=0x65A8CAD4, Tag=0x0, Call Id=285,
Call Entry(Disconnect Cause=0, Voice Class Cause Code=0, Retry Count=0)

002192: Oct 4 21:03:14.263:

```
//285/736483928021/CCAPI/cc_api_call_disconnect_done:
Call Disconnect Event Sent
002193: Oct 4 21:03:14.263: //-1/xxxxxxxxxxxx/CCAPI/cc_free_feature_vsa:
002194: Oct 4 21:03:14.263: :cc_free_feature_vsa freeing 65F097D0
002195: Oct 4 21:03:14.263: //-1/xxxxxxxxxxxx/CCAPI/cc_free_feature_vsa:
002196: Oct 4 21:03:14.263: vsacount in free is 3
002197: Oct 4 21:03:14.263: H225 NONSTD OUTGOING PDU ::=
```

```
value H323_UU_NonStdInfo ::=
{
  version 2
  protoParam qsigNonStdInfo :
  {
    iei 8
    rawMesg '0802829F1C269E8100036774640000001B52454C...'H
  }
}
```

```
002198: Oct 4 21:03:14.263: H225 NONSTD OUTGOING ENCODE BUFFER::=
        6001020001082C0802829F1C269E8100036774640000001B52454C2C0D0A50524
E2C6973646E2A2C2C4E492A2A2A2C0D0A0D0A
002199: Oct 4 21:03:14.263:
```

[H.320 게이트웨이가 IP 레그에서 통화를 지웁니다.](#)

```
002200: Oct 4 21:03:14.267: H225.0 OUTGOING PDU ::=
```

```
value H323_UserInformation ::=
{
  h323-uu-pdu
  {
    h323-message-body releaseComplete :
    {
      protocolIdentifier { 0 0 8 2250 0 4 }
      callIdentifier
      {
        guid '73651FB9532211DB817D90162806D3F1'H
      }
    }
    h245Tunneling FALSE
    nonStandardControl
    {
      {
        nonStandardIdentifier h221NonStandard :
        {
          t35CountryCode 181
          t35Extension 0
          manufacturerCode 18
        }
        data '6001020001082C0802829F1C269E810003677464...'H
      }
    }
    tunnelledSignallingMessage
    {
      tunnelledProtocolID
      {
        id tunnelledProtocolAlternateID :
        {
          protocolType "gtd"
        }
      }
    }
  }
}
```

```
}
}
messageContent
{
'52454C2C0D0A50524E2C6973646E2A2C2C4E492A...'H
}
tunnellingRequired NULL
}
}
}
```

```
002201: Oct 4 21:03:14.271: H225.0 OUTGOING ENCODE BUFFER::=
2580060008914A00041100110073651FB9532211DB817D90162806D3
F110A801003A0140B5000012336001020001082C0802829F1C269E81
00036774640000001B52454C2C0D0A50524E2C6973646E2A2C2C4E49
2A2A2A2C0D0A0D0A224204677464011B52454C2C0D0A50524E2C6973
646E2A2C2C4E492A2A2A2C0D0A0D0A
```

```
002202: Oct 4 21:03:14.271:
Q931 Message IE Decodes
Protocol Discriminator : 0x08
CRV Length : 2
CRV Value : 0x001C
Message Type : 0x5A: RELEASE_COMP
Cause: Length Of IE=2
Data 829F
```

```
User-User: Length Of IE=128
Data 052580060008914A00041100110073651FB9532211DB817D90162806D3
F110A801003A0140B5000012336001020001082C0802829F1C269E8100
036774640000001B52454C2C0D0A50524E2C6973646E2A2C2C4E492A2A
2A2C0D0A0D0A224204677464011B52454C2C0D0A50524E2C6973646E2A
2C2C4E492A2A2A2C0D0A0D0A
```

```
002203: Oct 4 21:03:14.271: H225 NONSTD OUTGOING PDU ::=
```

```
value RasnonStdUsageInformation ::=
{
rasMessageSpecificData drqRasnonStdUsageData :
{
callReleaseSource callingPartyInPstn : NULL
}
}
```

```
002204: Oct 4 21:03:14.271: H225 NONSTD OUTGOING ENCODE BUFFER::= 4800
```

```
002205: Oct 4 21:03:14.271:
```

```
002206: Oct 4 21:03:14.271: H225 NONSTD OUTGOING PDU ::=
```

```
value DRQnonStandardInfo ::=
{
gtd '52454C2C0D0A50524E2C6973646E2A2C2C4E492A...'H
}
```

```
002207: Oct 4 21:03:14.271: H225 NONSTD OUTGOING ENCODE BUFFER::=
40001A52454C2C0D0A50524E2C6973646E2A2C2C4E492A2A2A2C0D0A0D0A
```

```
002208: Oct 4 21:03:14.271:
```

[H.320 게이트웨이가 DRQ를 게이트키퍼로 전송](#)

```
002209: Oct 4 21:03:14.271: RAS OUTGOING PDU ::=
```

```
value RasMessage ::= disengageRequest :
{
requestSeqNum 2053
endpointIdentifier {"65766C6C00000001"}
```

```
conferenceID '73648392532211DB8021000D28D3D7C0'H
callReferenceValue 28
disengageReason normalDrop : NULL
nonStandardData
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 18
}
data '40001A52454C2C0D0A50524E2C6973646E2A2C2C...'H
}
callIdentifier
{
guid '73651FB9532211DB817D90162806D3F1'H
}
answeredCall FALSE
usageInformation
{
nonStandardUsageFields
{
{
nonStandardIdentifier h221NonStandard :
{
t35CountryCode 181
t35Extension 0
manufacturerCode 18
}
data '4800'H
}
}
connectTime 1159995736
endTime 1159995793
}
terminationCause releaseCompleteCauseIE : '0802809F'H
}
```

```
002210: Oct 4 21:03:14.275: RAS OUTGOING ENCODE BUFFER::=
3F08041E003600350037003600360043003600430030003000300030003000
300030003173648392532211DB8021000D28D3D7C0001C28B50000121E4000
1A52454C2C0D0A50524E2C6973646E2A2C2C4E492A2A2A2C0D0A0D0A1908C0
110073651FB9532211DB817D90162806D3F1010014300140B5000012024800
C045242157C04524219005440802809F
```

```
002211: Oct 4 21:03:14.279: h323chan_dgram_send:Sent UDP msg.
Bytes sent: 140 to 14.50.3.101:1719 fd=2
```

```
002212: Oct 4 21:03:14.279: RASLib::GW_RASSendDRQ: DRQ (seq# 2053)
sent to 14.50.3.101
```

```
002213: Oct 4 21:03:14.279: h323chan_chn_process_read_socket
```

```
002214: Oct 4 21:03:14.279: h323chan_chn_process_read_socket:
```

```
fd=2 of type CONNECTED has data
```

```
002215: Oct 4 21:03:14.279: h323chan_chn_process_read_socket:
```

```
h323chan accepted/connected fd=2
```

```
002216: Oct 4 21:03:14.279: h323chan_dgram_recvdata:rcvd
from [14.50.3.101:1719] on fd=2
```

```
002217: Oct 4 21:03:14.279: RAS INCOMING ENCODE BUFFER::= 400804
```

```
002218: Oct 4 21:03:14.279:
```

```
002219: Oct 4 21:03:14.279: RAS INCOMING PDU ::=
```

```
value RasMessage ::= disengageConfirm :
```

```

{
requestSeqNum 2053
}

002220: Oct 4 21:03:14.283: DCF (seq# 2053) rcvd
002221: Oct 4 21:03:14.283:
//286/736483928021/CCAPI/cc_api_call_disconnect_done:
Disposition=0, Interface=0x65A8CAD4, Tag=0x0, Call Id=286,
Call Entry(Disconnect Cause=0, Voice Class Cause Code=0, Retry Count=0)
002222: Oct 4 21:03:14.283:
//286/736483928021/CCAPI/cc_api_call_disconnect_done:
Call Disconnect Event Sent
002223: Oct 4 21:03:14.287: //-1/xxxxxxxxxxxx/CCAPI/cc_free_feature_vsa:

002224: Oct 4 21:03:14.287: :cc_free_feature_vsa freeing 65F096F8
002225: Oct 4 21:03:14.287: //-1/xxxxxxxxxxxx/CCAPI/cc_free_feature_vsa:

002226: Oct 4 21:03:14.287: vsacount in free is 2
002227: Oct 4 21:03:14.287:
//280/736483928021/H221():h221_free_context_saved_map:
002228: Oct 4 21:03:14.287:
//280/736483928021/CCAPI/cc_api_call_disconnect_done:
Disposition=0, Interface=0x65A8CAD4, Tag=0x0, Call Id=280,
Call Entry(Disconnect Cause=31, Voice Class Cause Code=0, Retry Count=0)
002229: Oct 4 21:03:14.287:
//280/736483928021/CCAPI/cc_api_call_disconnect_done:
Call Disconnect Event Sent
002230: Oct 4 21:03:14.291: //-1/xxxxxxxxxxxx/CCAPI/cc_free_feature_vsa:

002231: Oct 4 21:03:14.291: :cc_free_feature_vsa freeing 65F09620
002232: Oct 4 21:03:14.291: //-1/xxxxxxxxxxxx/CCAPI/cc_free_feature_vsa:

002233: Oct 4 21:03:14.291: vsacount in free is 1
002234: Oct 4 21:03:14.307: h323chan_chn_process_read_socket
002235: Oct 4 21:03:14.307: h323chan_chn_process_read_socket:
fd=4 of type CONNECTED has data
002236: Oct 4 21:03:14.307: h323chan_chn_process_read_socket:
h323chan accepted/connected fd=4

002237: Oct 4 21:03:14.307: h245_decode_one_pdu: more_pdus = 0,
bytesLeftToDecode = 2
002238: Oct 4 21:03:14.307: H245 MSC INCOMING ENCODE BUFFER ::= 4A40
002239: Oct 4 21:03:14.307:
002240: Oct 4 21:03:14.307: H245 MSC INCOMING PDU ::=

value MultimediaSystemControlMessage ::= command : endSessionCommand :
disconnect : NULL

002241: Oct 4 21:03:14.307: h245_decode_one_pdu: H245ASNDecodePdu rc = 0,
bytesLeftToDecode = 0
002242: Oct 4 21:03:14.307: h245_decode_one_pdu:
Read Pkt body: more_pdus:0 rc:0 asn_rc:0
002243: Oct 4 21:03:14.307: H245 MSC OUTGOING PDU ::=

value MultimediaSystemControlMessage ::= command : endSessionCommand :
disconnect : NULL

002244: Oct 4 21:03:14.307: H245 MSC OUTGOING ENCODE BUFFER ::= 4A40
002245: Oct 4 21:03:14.307:
002246: Oct 4 21:03:14.319: h323chan_chn_process_read_socket
002247: Oct 4 21:03:14.319: h323chan_chn_process_read_socket: fd=4 of
type CONNECTED has data
002248: Oct 4 21:03:14.319: h323chan_chn_process_read_socket:
h323chan accepted/connected fd=4

```

```
002249: Oct 4 21:03:14.319: h323chan_chn_process_read_socket
002250: Oct 4 21:03:14.319: h323chan_chn_process_read_socket:
    fd=3 of type CONNECTED has data
002251: Oct 4 21:03:14.319: h323chan_chn_process_read_socket:
    h323chan accepted/connected fd=3

002252: Oct 4 21:03:14.319:
    //281/736483928021/CCAPI/cc_api_call_disconnect_done:
Disposition=0, Interface=0x65D7A87C, Tag=0x0, Call Id=281,
Call Entry(Disconnect Cause=31, Voice Class Cause Code=0, Retry Count=0)
002253: Oct 4 21:03:14.319:
    //281/736483928021/CCAPI/cc_api_call_disconnect_done:
Call Disconnect Event Sent
```

[관련 정보](#)

- [Cisco IP 텔레포니 문제 해결](#)
- [기본 2개 영역 Cisco 게이트웨이-게이트키퍼 컨피그레이션](#)
- [H.323 VoIP 게이트웨이에 대한 Call Admission Control](#)
- [게이트키퍼가 있는 VoIP](#)
- [기술 지원 및 문서 - Cisco Systems](#)