

Desktop Video Conferencing Solution

The Desktop Video Conferencing based solution must be an integrated solution that includes a 20.1” monitor with 16:9 aspect ratio, integrated control key pad at base of the monitor, and built in speakers. Camera is built into the monitor. Video conferencing codec is a separate device that sits on the floor or desk.

1. The Desktop Video Conferencing unit must be capable of supporting 720p 30 frames per second High Definition video conferencing sessions, 4CIF video conferencing sessions, and CIF video conferencing session.
2. Must be able to support H.264, H.261, H.239, & H.263 & H.264 Error concealment.
3. Audio – Must support up to 22 khz High Definition Stereo, automatic noise suppression, audio error concealment.
4. Must have integrated Loss Packet Recovery technology.
5. Network Requirements – 10/100mbps
6. Power Requirements – 110 v – 230v

Room Based Video Conferencing Units

7. The Room based systems must be capable of supporting 720p 30 frames per second or better High Definition video conferencing sessions, 4CIF video conferencing sessions, and CIF video conferencing sessions. Hand held control pad per site, Mimio Pad or similar device.
8. Must be able to support H.264, H.261, H.239, & H.263 & H.264 Error concealment.
9. Must have integrated Loss Packet Recovery technology.
10. Video Conferencing Camera – High Definition Video Conferencing Camera that has 12 X (times) optical zoom, +/- 100 degree pan range, + 20/-30 degree tilt range. Output formats of SMPTE 296M 1280 x 720p, 50/60 FPS.
11. Audio – Must support up to 22 khz High Definition Stereo, automatic noise suppression, audio error concealment. 4 -8” speakers per site, speaker cable needs to be in wall speaker cable.
12. Video and Content Inputs on Video Conferencing Codec – Must include video camera Input with HDCI, DVI input for PC, optional S-Video source.

13. Video Display Output – Support up to 2 monitors. Each output supports High Definition 16:9 HD output.

13A. LCD projector/s with remote (depending on room dimensions) – Minimum 3600 Lumens with a 1920x1080 widescreen HD1080p capability and a 3 year manufacturer’s warranty (ceiling mounted).

13B. 52”X92” Wall or ceiling mounted HD projector screens or 42”or larger LCD monitors (2 frnt & 1 back, depends on room size).

14. The Gordon Persons Bldg (main office) will need a Polycom VBP 4350W Firewall/ NAT traversal unit for Sm to Md. Enterprise locations 4 port 10/100 Ethernet switch, integrated 10/100 Ethernet WAN interface, 802.11 A/B/G wireless access point with capacity of 3meg of traffic or similar device.

15. The Gordon Persons Bldg (main office) will need a Polycom RSS 2000 video recording and streaming solution or similar device. 1U appliance that provides 2 recording ports and up to 60 web viewers as well as up to 10 IP viewers, Network Requirement – 10/100Mb, and Power Requirement – 115v – 230V.

15A. Implementation Services for the Firewall/NAT transversal unit, Gatekeeper, and RSS server. Training to be provided during installation/configuration, Also 3yr warranty on all equipment, support to include –phone, next day parts, and software updates. The installers/integrators must have current CVE 2.0 Certifications.

Video Conferencing Bridge Minimal Requirements and Specifications

16. The Video Conferencing Bridge must be based on a flexible ATCA (hardware telecom) design that is a scalable solution to support video and audio bridging. The Video Conferencing Bridge must be able to support video conferencing standards H323, H.261, H263, and H264. It must have the ability to support CIF, 4CIF, 720p 30 and 60 frames per second and 1080p 30 frames per second.

17. Video Conferencing Bridge Capacity – the bridge must be a flexible architecture that allows for support of up to 160 CIF video conferencing session or 60 4CIF video conferencing sessions or, 40 High Definition 720p 30 frames per second sessions, or 20 High Definition 720p 60 frames per second sessions or a combination of multiple types of calls.

The video conferencing bridge must be flexible in its architecture to maximize capacity and allow for a mixture of different types of video conferencing sessions. With the CIF video conferencing calls as the baseline, consuming 1 resource with the Video Conferencing Bridge capable of supporting a maximum of 160 CIF sessions, the video conferencing bridge must be able to support multiple calls

with the following resources being allocated for each call. Each 4CIF call requiring 3 resources, and each 720p 30 frames per second High Definition video conferencing session requirement 4 resources, and each 720p 60 frames per second or 1080p 30 frames per second High Definition call requiring 8 resources on the bridge.

18. Audio Calls – The Bridge must be flexible to allow for Audio Bridging services. Must be able to support up to 400 PSTN calls or 800 VoIP calls and must be able to support Loss Packet Recovery Technology.

19. The Video Conferencing Bridge must be able to support IP and ISDN video conferencing sessions. ISDN also can be used for Audio Conferencing capability.

20. Network Support Requirements for Video Conferencing Bridge – H.323 and SIP, ISDN (H.320), 10/100/1000 Mb interface, Power Requirements for Video Conferencing Bridge – 100-240 VAC, 600 W max power consumption.

Video Conferencing Gatekeeper and Manager Minimal Requirements

21. The Video Conferencing Gatekeeper and Manager must be a 1U hardware appliance integrated into one device. This device must provide directory services, central provisioning, video conferencing scheduling, manage up to 5000 end points, and provide thin client PC based video conferencing solution for up to 5000 seats.

22. PC Based application must be able to receive HD video 720p High Definition Video and transmit up to 4CIF video resolution. Network Support Requirements – H.323, 10/100/1000 Ethernet and Power Requirements – 110/220 AC.