SCS8000E Multipoint Control Unit (MCU)

This HD + SD and fully integrated powerful MCU assures you to enjoy a high quality of IP based videoconferencing communication.



SCS8000E is a high performance and fully integrated Multimedia Conference platform, which combines the latest technologies in video, audio and network transmission. This unique in-the-market MCU supports HD and SD resolution videoconferencing with fully integrated services such as Gatekeeper, firewall traversal and T.120, no need of any additional device or server in any IP network environment. No matter through Internet, VPN (Virtual Private Network) or leased lines, SCS8000E performs cost-effectively with the most concise architecture to replace the conventional "platform + additional servers" structure. SCS8000E supports efficient H.264 video codec technology and H.239 dual video stream, it also provides powerful media processing capabilities such as N+1, N+2 and N+3 style Continuous Presence and Intelligent Audio Mixing from 32 sites. After all, SCS8000E gives you a full variety of application features for your videoconferencing exercise.



Quality Conference Result

With efficient H.264 video codec and wideband audio processing technologies, SCS8000E can manage HD and SD image resolutions for videoconferencing effect and support H.239 dual video streaming standard, which allows multiple sites to share PC images with resolution of up to 1024×768 .

• Flexible Access Capacity

SCS8000E is configured of access capacity of 8 \sim 128 channels, with convention of 16 group meetings at the same time. Each access node supports a streaming bandwidth up to 4 Mbps with capability to adapt different calling rate automatically. It is very suitable to multiple access networks with different bandwidth conditions such as the Internet, VPN, leased lines and LANs.

· Excellent Network Adaptability

With the embedded proxy service with standard of H.460 protocol, SCS8000E supports NAT/firewall traversal and allows deploying endpoints at any place without interference of network security policies. Using Intelligent Packet Loss Recovery (IPLR) and QoS technologies, SCS8000E ensures operation stability under various network environment. Even through a home use ADSL access from a remote site, the video and audio qualities you can get for your conference can also be maintained very satisfactory.

Innovative Multi Service Provider Access Bridge

SCS8000E is capable to be connected simultaneously by multiple Internet Service Providers as a network bridge, which helps solving the bottleneck issues between different Service Providers caused by geography and commercial competition. Embedded within the machine, this function can maximize effective bandwidth and speed from each remote site, and no additional server is required.

Powerful Conference Features

With uniquely rich layouts of up to 16 sites in Continuous Presence and powerful function of Intelligent Audio Mixing, SCS8000E supports a perfect interactive conference with each party. Conference Template and Conference Booking Service allow you to originate a conference with number of participants and various preset parameters, anytime just by simple button click. Also, Virtual Conference can be accessed by calling a number without any preset of participants. Furthermore, you may use Meeting Control Console (MCC), a friendly GUI software for a complete conference management.

Cost Effective and Protect Investment

No matter with software or firmware platforms, both are fully integrated with service functions such as Gatekeeper (GK), firewall traversal proxy and T.120, SCS8000E is considered as an All-in-One solution for functions usually realized by several third party devices or servers. Thus, your system setup and maintenance cost will be tremendously reduced. Since the system can be easily upgraded through software to a higher version in terms of capacity, protocols and features, your investment is surely protected.

SCS8000E Multipoint Control Unit (MCU)

Technical Specifications

Standards Followed

System standard: H.323, SIP Video standard: H.263, H.263+, H.264 Audio standard: G.711、G.722.1 Annex

C/Polycom[®] Siren14[™]、G.728 Dual video standard: H.239

Network protocol: TCP/IP, Telnet, HTTP, FTP,

SNMP, DHCP, RTP/RTCP

Other standards: H.225, H.231, H.235, H.241, H.242, H.243, H.245, H.281, H.460, T.120

System Capacity

Twelve selective configurations: 8, 12, 16, 20, 24, 28, 32, 40, 48, 56, 64and128 users Supporting a maximum of 16 groups of conferences at the same time

Network Interface

One single 10/100Mbps interface and two 10/100/1000Mbps interfaces

Conference Rate

Up to 4 Mbps

Video Resolution

720P (1280×720)

4CIF (704×576)

CIF (352×288)

QCIF (176×144)

VGA (640×480)

SVGA (800×600)

XGA (1024×768)

SXGA(1080×1024)

Continuous Presence

2, 3, 4, 9 and 16 pictures

Multiple VIP layouts: 1 + N, 2 + N, 3 + N and

more styles

Voice activation auto-trace

Customized CP background and frame color

Audio Features

Intelligent Audio Mixing Mute and Dumb control Voice Active Detection

Conference Functions

Virtual Conference Conference Template Conference Booking Director Control, Chairman Control, Voice Activation, Auto Polling Endpoint join-in request, chairman request,

speaker request, and chime-in request

Cascade Conference

Supporting visual MCC software

Caption

Conference caption scrolling
Configuration and management in WEB mode
Caption entry or file loading
SMS by Group sending or selective sending

Dual Video Stream

H.239 dual video stream Adjustable dual stream bandwidth allocation Right setting to originate dual stream

Data Conference *

T.120 standard conference
Rate range: 64Kbps ~ 2Mbps
Whiteboard, application sharing, file transfer
and multi-party chatting
Supporting the access of a maximum of 32
parties

* This function module is optional

Embedded GK

Endpoint registration Address resolution Call control Bandwidth control Regional management

Network Adaptability

H.460 NAT/firewall transversal IPLR (Intelligent Packet Loss Recovery) QoS (DiffServ, IP Precedence) Auto recall after interruption Access bridging with multiple networks Multicast conference

Security Features

H.235 conference encryption
128-bit AES encryption
Conference password authentication, conference lock protection
Management User authentication and authorization
Multicast user authentication

Management and Maintenance

Configuration in interface mode Remote configuration/upgrade System log

Electricity Characteristics

Power consumption: ≤128W Power supply: AC (100V~240V/50~60Hz)

Environmental Requirement

Ground resistance: $\leq 5~\Omega$ Operating temperature: 0°C ~ 60°C Operating humidity: 10% ~ 85% (non-condensing)

Atmospheric pressure: 86 ~ 106 kPa

Physical Features

19-inch 2U rack mounted*
Height × width × depth: 88mm × 443mm × 338mm

Weight: ≤ 5.7 kg

* Only for firmware platform

SCS6210/6210E

At a great performance/cost ratio, ScS6210/6210E videoconferencing terminal ensures you the most efficient communication solutions tailored to suit the needs of your enterprise.



SCS6210/6210 is a set-top videoconferencing terminal, integrated with a PTZ camera. Its small form factor with highly fashionable Italian style design, incorporating outstanding video & audio performance and exceptional network adaptability, SCS6210/6210 brings you a perfect videoconferencing experience and delivers functions like synchronous transmission of speaker and laptop screen, telephone calls, streaming media, firewall traversal and encryption policy. SCS6210/6210 performs also a strong extension conference in order to create efficient and real life communications with remote instant collaboration.



Exceptional Video/Audio Quality

Embedded with efficient H.264 video codec and Broadband Sound Processing technologies and with integration of the Video Intelligence Optimization and Coding Policy Adjustment technologies®, SCS6210/6210 lets you enjoy an exceptional audiovisual experience in any type of bandwidth environment, even in limited uploading speed of ADSL access networks.

• Efficient Remote Collaboration

It becomes very easy by sharing a high resolution screen images from your laptop through this video communication channel with multiple sites. Every participant can browse your presentation slides, pictures, spreadsheets or documents simultaneously while watching your speech image. Audience can choose a PIP mode either on one TV set or use one TV and one projector separately.

Strong Network Adaptability

With power of IPLR (Intelligent Packet Loss Recovery), Dynamic Rate Adjustability and QoS Optimization technologies, this Meeting Terminal can automatically adapt to different network environments and ensure conference running under adverse Internet network conditions. SCS6210/6210 also consists of a built-in proxy, which allows setting up a traversal over NAT and firewall, without any additional equipment. Thus, you can rapidly deploy a highly secured network on the basis of Internet connection.

• Intensive Security Feature

SCS6210/6210 adopts the 128-bit high-reliability encryption mechanism to insure conference information security. In addition, it incorporates the embedded design architecture based on dedicated chips and strict authorization & authentication policies to prevent system security from unauthorized access.

Telephone Call

SCS6210/6210 provides user with the incoming/outgoing phone call function. Those who are not present to a conference site can also attend the conference by using a fixed line telephone or a mobile phone. Furthermore, it can serve as a standalone teleconferencing terminal.

• Conference Multicast

SCS6210/6210 supports conference multicast function, which makes live multicast of a conference to LAN users. In this way, those who are not present to conference site can watch the conference from their PC in office.

Embedded MCU (Only for SCS6210E)

By use of an embedded MCU, SCS6210 can get access to a maximum of five remote sites at the same time. To create a multipoint conference, it won't require any additional equipment, which saves considerably cost.

• Simple and Easy to Use

SCS6210/6210 is a compact and fashionable design product with integration of a high-performance PTZ camera. Besides, the package comes with a high-quality omni directional microphone. The setup is simple by connecting SCS6210/6210 to a TV set or projector and to a network connection. SCS6210/6210 provides you with friendly Graphic User Interface, you can use its remote control to initiate a conference, just as simple as making a phone call.

SCS6210/6210E

Technical Specifications:

Protocol Standards

System standard: H.323

Video standard: H.263, H.263+, H.264

Audio standard: G.711, G.722.1 Annex C/Polycom®

Siren 14^{TM} , G.728

Dual video standard: H.239

Network protocols: TCP/IP, Telnet, HTTP, FTP,

SNMP, DHCP, RTP/RTCP

Other standards: H.225, H.231, H.235, H.241,

H.242, H.243, H.245, H.281

Conference Rate

Up to 2 Mbps

Video Resolution

CIF (352×288)

VGA (640×480)

SVGA (800×600)

XGA (1024×768)

Video Frame Rate

PAL: 25 frame/second NTSC: 30 frame/second

Video Input

 $I \times RCA$, composite video

Video Output

 $2 \times RCA$, composite video $1 \times VGA$, PC content

Video Features

PIP display

Video input signal detection

Adjustment of brightness, saturation, and contrast Local video loop function

Audio Input

I × MIC, XLR interface (12V phantom power supply)

2×RCA, line level

 $I \times KAI$, dedicated Kedacom Audio Interface (Application functions to be extended)

Audio Output

2×RCA, line level

Audio Features

Automatic mixing of multiple inputs

Automatic Echo Cancellation (AEC) Automatic Noise Suppression (ANS) Automatic Gain Control (AGC) Mute and quiet control Active lip synchronization

Network Interface

SCS6210:1×10/100Mbps SCS6210E: 2 x 10/100Mbps WiFi optional, IEEE 802.11b/g

Control Interface

I×RS232

Infrared remote control

Phone Interface

I×FXO

Other Interfaces

I × USB 2.0 (Application functions to be extended)

Network Adaptability

NAT/firewall traversal

Socks5 traversal

IPLR

Dynamic rate adjustment

QoS (DiffServ, IP Precedence)

IP address conflict detection

PPPoE

Embedded MCU (Only for SCS6210E)

6-point MCU (local site + 5 remote sites)
Continuous Presence, and intelligent mixing

NAT/Firewall traversal Embedded gatekeeper

Security Features

H.235 conference encryption

128-bit AES encryption Conference password

Login authentication and authorization

Gatekeeper password authentication

Management and Diagnosis

OSD menu management via a remote control

PC Web login management

Online configuration and remote upgrade

Terminal self-test, loopback test, color bar test, and audio test

sending Address book management Virtual meeting room on SC S serial MCU

Running status monitoring, alarm display and

Multicast Functions

Conference streaming multicast Dual video streaming multicast Multicast password authentication

Dual Video Stream

H.239 dual video stream

Adjustable dual streaming bandwidth allocation PIP mode/Dual display mode

Language Support

Chinese, English, French Input Language: Chinese, English

Caption Function

Boardroom logo

Boardroom simulation banner

Short message sending/receiving

Camera

Optical zoom: 18X

Maximum horizontal angle of view: 48°

Pan Range: $\pm\,100^\circ$

Tilt Range: ±30°

Horizontal resolution: 460 lines Minimum illumination: 1.0 lux

Auto/manual zoom

Automatic white balance

PTZ control

Number of preset positions: 6

Electric Features

Power consumption: ≤30W

Adapter power supply: AC (90~246V/47~63Hz)

Environmental Requirement

Operating temperature: 0°C~40°C

Operating humidity: 5%~85% (non-condensing)

Atmospheric pressure: 86~106kPa

Physical Features

 $Dimensions: I\,50mm~(H) \times 270mm~(W) \times 2\,I\,0mm(D)$

Weight: ≤2kg

SCS6310/6310E

With perfect combination of excellent performance and powerful functions, videoconferencing terminal brings you the enhanced communication solutions tailored to suit the needs of your enterprise.



SCS63106310E is a set-top videoconferencing terminal, integrated with a PTZ camera. Its small form factor with highly fashionable Italian style design, incorporating outstanding video & audio performance and exceptional network adaptability, SCS6310/6310E brings you perfect videoconferencing experience and delivers functions like synchronous transmission of speaker and laptop screen, telephone calls, streaming media, firewall traversal and encryption policy. SCS63106310E performs also a strong extension conference in order to create efficient and real life communications with remote instant collaboration.



• Exceptional Video/Audio Quality

Embedded with efficient H.264 video codec and Broadband Sound Processing technologies and with integration of the Video Intelligence Optimization and Coding Policy Adjustment technologies®, SCS63106310E lets you enjoy an exceptional audiovisual experience in any type of bandwidth environment, even in limited uploading speed of ADSL access networks.

• Efficient Remote Collaboration

It becomes very easy by sharing a high resolution screen images from your laptop through this video communication channel with multiple sites. Every participant can browse your presentation slides, pictures, spreadsheets or documents simultaneously while watching your speech image. Audience can choose a PIP mode either on one TV set or use one TV and one projector separately.

Strong Network Adaptability

With power of IPLR (Intelligent Packet Loss Recovery), Dynamic Rate Adjustability and QoS Optimization technologies, this Meeting Terminal can automatically adapt to different network environments and ensure conference running under adverse Internet network conditions. SCS63106310 also consists of a built-in proxy, which allows setting up a traversal over NAT and firewall, without any additional equipment. Thus, you can rapidly deploy a highly secured network on the basis of Internet connection.

• Intensive Security Feature

SCS63106310E adopts the 128-bit high-reliability encryption mechanism to ensure conference information security. In addition, it incorporates the embedded design architecture based on dedicated chips and strict authorization & authentication policies to prevent system security from unauthorized access.

• Telephone Call

SCS63106310E provides user with the incoming/outgoing phone call function. Those who are not present to a conference site can also attend the conference by using a fixed line telephone or a mobile phone. In fact, it can serve as a standalone teleconferencing terminal.

• Conference Multicast

SCS63106310E supports conference multicast function. It can make live multicast of a conference to LAN users. In this way, those who are not present to conference site can watch the conference from their PC in office.

• Embedded MCU (Only for SCS6310E)

By use of an embedded MCU, SCS6310 can get access to a maximum of five remote sites at the same time. To create a multipoint conference, it won't require any additional equipment, which saves considerably cost.

• Simple and Easy to Use

SCS63106310E isa compact and fashionable design product with integration of a high-performance PTZ camera. Besides, the package comes with a high-quality omni directional microphone. The setup is simple by connecting SCS63106310E to a TV set or projector and to a network connection. SCS63106310Eprovides you with a friendly Graphic User Interface; you can use the remote control to initiate a conference, just as simple as making a phone call.

SCS6310/6310E

Technical Specifications:

Protocol Standards

System standard: H.323

Video standard: H.263, H.263+, H.264

Audio standard: G.711, G.722.1 Annex C/Polycom®

Siren 14^{TM} , G.728

Dual video standard: H.239

Network protocols: TCP/IP, Telnet, HTTP, FTP,

SNMP. DHCP. RTP/RTCP

Other standards: H.225, H.231, H.235, H.241,

H.242, H.243, H.245, H.281

Conference Rate

Up to 4 Mbps

Video Resolution

CIF (352×288)

4CIF (704×576)

VGA (640×480)

SVGA (800×600)

XGA (1024×768)

Video Frame Rate

PAL: 25 frame/second

NTSC: 30 frame/second

I×RCA, composite video

Video Output

Video Input

2×RCA, composite video

I×VGA, PC content

Video Features

PIP display

Video input signal detection

Adjustment of brightness, saturation, and contrast

Local video loop function

Audio Input

I×MIC, XLR interface (12V phantom power

supply)

2×RCA, line level

I×KAI, dedicated Samcen Audio Interface

(Application functions to be extended)

Audio Output

2×RCA, line level

Audio Features

Automatic mixing of multiple inputs

Automatic Echo Cancellation (AEC)

Automatic Noise Suppression (ANS)

Automatic Gain Control (AGC)

Mute and quiet control

Active lip synchronization

Network Interface

2×10/100Mbps

WiFi optional, IEEE802. I I b/g

Control Interface

 $1 \times RS232$

Infrared remote control

Phone Interface

I×FXO

Other Interfaces

 $I \times USB$ 2.0 (Application functions to be extended)

Network Adaptability

NAT/firewall traversal

Socks5 traversal

IPLR

Dynamic rate adjustment

QoS (DiffServ, IP Precedence)

IP address conflict detection

PPPoE

Security Features

H.235 conference encryption

128-bit AES encryption

Conference password

Login authentication and authorization

Gatekeeper password authentication

Management and Diagnosis

OSD menu management via a remote control

PC Web login management

Online configuration and remote upgrade

Terminal self-test, loopback test, color bar test, and

audio test

Running status monitoring, alarm display and

sending

Address book management

Virtual meeting room on SCS serial MCU

Embedded MCU (Only for SCS6310E)

6-point MCU (local site + 5 remote sites)

Continuous Presence, and intelligent mixing

NAT/Firewall traversal

Embedded gatekeeper

Multicast Functions

Conference code streaming multicast

Dual video streaming multicast

Multicast password authentication

Dual Video Stream

H.239 dual video stream

Adjustable dual streaming bandwidth allocation

PIP mode/Dual display mode

Caption Function

Boardroom logo

Boardroom simulation banner

Short message sending/receiving

Language Support

Chinese, English, French

Input Language: Chinese, English

Camera

Optical zoom: 18X

Maximum horizontal angle of view: 48°

Pan Range: ±100°

Tilt Range: ±30°

Horizontal resolution: 460 lines

Minimum illumination: 1.0 lux

Auto/manual zoom

Automatic white balance PTZ control

Number of preset positions: 6

Electric Features

Power consumption: ≤30W

Adapter power supply: AC (90~246V/47~63Hz)

Environmental Requirement

Operating temperature: 0°C~40°C

Operating humidity: 5%~85% (non-condensing)

Atmospheric pressure: 86~106kPa

Physical Features

Dimensions: $I50mm(H) \times 270mm(W) \times 210mm(D)$

Weight: ≤2kg