# HCS-5100MA/FS/16B 16 CHs Digital Infrared Transmitter



#### **Features**

- Compliant with ISO 22259
- Compatible with any other IR simultaneous interpretation system compliant to IEC 61603-7
- DQPSK digital modulation/demodulation technology
- Capable of distributing a maximum of 16 audio channels
- Conference hall privacy; the congress venue itself acts as a barrier to infrared signals escaping and being overheard, as infrared is unable to pass through opaque objects such as walls
- Suitable for various kinds (small/medium/large international) of conference halls and outdoor venues
- Transmitting in 1~8 MHz frequency band eliminates disturbance from high frequency lighting systems
- Each audio channel can be assigned a language name for easy identification
- Flexible configuration of channels and channel quality modes:
  - . Mono, standard quality, maximum 16 channels
  - Mono, perfect quality, maximum 8 channels
  - Stereo, standard quality, maximum 8 channels
  - · Stereo, perfect quality, maximum 4 channel
- Adjustable sensitivity for each input to enable fine tuning of audio levels, support levels indicating of audio input
- Automatic synchronization to the number of channels in use by the system
- "Bypass" mode for distribution of signals from another transmitter allows multiple rooms to be used
- During adjournment, music mode can be used to feed music to all channels
- Independent test facility: self-generates diverse frequencies for system debugging
- Built-in infrared emitters in transmitter for audio monitoring in operating room
- With optical fiber interface, DCS interface and 6P-DIN connector for connecting to HCS-4100M/50/ HCS-8300M/ HCS-4800M/ HCS-8600M Congress Main Unit directly
- With 16 (1+15) audio output channels for recording
- With web control function, transmitter can be controlled through web page
- Digital Infrared Radiator can be turned off remotely via RS-232 port
- With the function of synchronous shutdown of the radiator and the transmitter
- Universal mains power facility allows worldwide use

The transmitter is the heart of the HCS-5100Plus system. HCS-5100MA/FS/16B accepts and modulates up to 8 unbalanced audio signals onto carrier waves which are transmitted to radiators located in the room. It can be connected to HCS-4100M/50/ HCS-8300M/ HCS-4800M/ HCS-8600M congress main unit directly, or be used as a stand-alone system for distributing external audio signals. HCS-5100MA/FS/16B is suitable for either tabletop or 19-inch rack mounting using. Four feet (for tabletop) and two brackets (for rack mounting) are supplied..

#### **Controls and Indicators**

- 2.8" LCD displays status and menu of the system configuration, supporting multi language menu
- One operation knob` for configuration
- Standby switch with indicator
- Mini IR radiators

#### Interconnections

- Ø 3.5 mm jack for stereo monitor earphone
- 2 female XLR connectors for external audio inputs to connect auxiliary balanced audio signals such as music, floor language or emergency audio signal
- 16 audio signal output connectors (RCA sockets) for output DCS multi-channel audio
- 16 audio signal input connectors (RCA sockets) to connect external unbalanced audio input signals
- 6 BNC connectors for output HF signal to radiator. To each connector, up to 30 radiators can be connected
- 1 BNC connector for receiving HF signal from another transmitter
- 6P-DIN connector for connecting to HCS-4100M/50/ HCS-8300M/ HCS-4800M/ HCS-8600M Congress Main Unit or HCS-4385U/50 Interpreter Unit, compatible with HCS-8685 interpreter unit via HCS-4853T cable splitter,
- Duplex SC single-mode optical fiber interface and DCS interface (2 × RJ45 standard socket) for connecting to HCS-4100M/50/ HCS-8300M/ HCS-4800M/ HCS-8600M Congress Main Unit
- USB\_H interface to upgrade system and to save system parameters.
- Ethernet and RS232 ports for connection to computer
- Emergency signal interface: when the public emergency system is active, alarm signal can be fed to all channels automatically
- Power supply socket

### **Technical Specifications**

# **System Specifications**

Modulation	DQPSK, according to IEC 61603-7
Modulation frequency	1 to 8 MHz
Carriers (	to 5:2 to 6 MHz, according to IEC 61603-7
Frequency response	20 Hz to 10 kHz (-3dB) at standard quality
	20 Hz to 20 kHz (-3dB) at perfect quality
THD at 1 kHz	≤0.05%
Isolation	≥85 dB
Dynamic range	≥90 dB
Weighted SNR	≥85 dBA

### **Electrical**

Unbalanced audio inputs	12 dBV to +12 dBV nomina
Balanced audio inputs	-6 dBV to +18 dBV nomina
Emergency switch connector_	2-PIN 3.81 mm Phoenix connector
	alarm signal control inpu
Headphone output	32 Ohm to 2 kOhm
HF input/output	75 Ohm
Power supply	AC 100 V - 240 V, 50 Hz / 60 Hz
Power consumption	Maximum 25 W

### **Mechanical**

# **Ordering Information**

HCS-5100MA/FS/16B\_\_\_\_\_\_16 CHs Digital Infrared Transmitter (compatible with HCS-4100M/ HCS-8300M/ HCS-4800M/ HCS-8600M or HCS-4385U/50 interpreter unit, HCS-8685 interpreter unit can be connected via HCS-4853T cable splitter, single-mode optical fiber interface)