

An input-only expansion box for the Converge™ Pro platform. The 8i delivers new economical configuration flexibility. It can be added to 880 or 840T systems for additional mic and line inputs, allowing customers to match the number of inputs and outputs required for audio conferencing and sound reinforcement installations.



## Applications



- Conference Rooms
- Boardrooms
- Courtrooms
- Distance Learning Facilities
- Convention Centers and Hotels
- Training Rooms
- Telemedicine Facilities
- Houses of Worshipp

## Features



### Advanced Conferencing Feature Set

- + Economical Mic/Line only mixer for large configurations where additional output channels are not required
- + Next-generation Acoustical Echo Cancellation
  - > Improved duplex performance
  - > Push-to-talk microphone compatibility
- + Next-generation Noise Cancellation
  - > Adaptive modeling to room ambient noise condition
- + Increased resolution on Microphone Preamp stage
  - > 0-56 dB in 7 dB increments
- + Pre-AEC routing for Sound Reinforcement Applications
  - > Maximum of 4 millisecond processing delay
- + Management Improvements
  - > Integrated Ethernet and USB connections
  - > SNMP and HTML remote management agents
  - > Event scheduler
  - > Diagnostic console
- + Simplified Configuration Software
  - > Drag & drop A/V and channel objects
  - > Selectable views—unit, matrix, channel
- + Expanded Serial Command List

### Superior Audio Performance

- + Next-generation Distributed Echo Cancellation® on every mic input
- + First-mic priority delivers clear audio to the far end
- + 20 Hz-22 kHz bandwidth for full-range audio response
- + ALC & AGC keep participants' audio balanced and consistent

### Configuration Flexibility

- + Scalable – link multiple Converge Pro units (880, 840T, 8i, TH20) for extensive microphone coverage and up to 16 phone lines
- + Enhanced expansion bus, featuring 12 mix-minus audio buses for routing between units
- + Ten mic gating groups (four internal & six global) allow separation of mics into individual mixer gating groups for greater configuration flexibility
- + 32 presets can be executed on-the-fly without disturbing other ongoing preset operations
- + 255 Macros for customized audio control/configuration with single command execution

### Conferencing Capability

- + Link with multiple Converge Pro TH20s for up to 16-line capability
- + Requires linking with Converge Pro 880, 840T, or TH20 for output & telephone interface capabilities

## CONVERGE PRO 8i BACK PANEL



## Functional Specifications



### Audio Performance

Conditions: Unless otherwise specified, all measurements are performed with a 20 Hz to 22 kHz BW limit (no weighting)  
 Frequency Response: 20 Hz to 22 kHz  $\pm 1$  dB  
 Noise (EIN): -126 dBu, 20 kHz BW, max gain,  $R_s=150 \Omega$   
 THD+N: <0.02%  
 Dynamic Range: 100 dB (non A-weighted)  
 Crosstalk <-91 dB re 20 dBu @ 20 kHz channel to channel

### Auto Mixer Parameters

Number of Open Microphones (NOM)  
 PA Adaptive Mode  
 First Mic Priority Mode  
 Last Mic Mode  
 Maximum # of Mics Mode  
 Ambient Level  
 Gate Threshold Adjust  
 Off Attenuation Adjust  
 Hold Time  
 Decay Rate

### Matrix Mixing Parameters

12 analog in/out  
 18 expansion bus in/out  
 8 assignable processing blocks in/out  
 4 assignable fader blocks in/out

### Assignable Processing Blocks

Filters  
 All pass  
 Low pass  
 High pass  
 Low shelving  
 High shelving  
 Parametric EQ  
 Notch  
 CD Horn

### Crossovers

Bessel  
 Butterworth  
 Linkwitz-Riley

### Compressor

Delay: adjustable up to 250 ms

### Assignable Fader Blocks

Gain/Mute

### Microphone Input Configuration

Input Gain Adjust  
 Mic or Line Level  
 Phantom Power on/off  
 Echo Cancellation on/off  
 Noise Cancellation on/off  
 Filters  
 All Pass  
 Low Pass  
 High Pass  
 Notch  
 PEQ

Mute on/off  
 Chairman Override on/off  
 AGC on/off  
 Automatic Level Control on/off  
 Auto Gate/Manual gate  
 Adaptive Ambient on/off  
 Pre AEC channel

### Mic/Line Inputs 1-8

Push-on mini-terminal block, balanced, bridging  
 Impedance: < 10 K $\Omega$   
 Nominal Level: adjustable -56 dBu to 0 dBu  
 (7 dB step coarse gain adjustment)  
 Maximum Level: -65 dBu to +20 dBu  
 Echo Cancellation: 130 ms tail time (works with 12 dB of room gain)  
 Noise Cancellation: 6-15 dB attenuation  
 Phantom Power: 24 V, selectable

### Line Inputs 9-12

Push-on mini-terminal block, balanced, bridging  
 Impedance: < 10 K $\Omega$   
 Nominal Level: 0 dBu  
 Maximum Level: 20 dBu



### Expansion Bus In/Out

Proprietary Network  
 RJ-45 (2), 1.9 Mbps  
 Category 5 twisted-pair cable 200' maximum cable length between any two Converge Pro products

### Ethernet

Autoswitching with Quality of Connection (QoC)  
 10/100 Mbps Ethernet Network Port  
 10/100 Mbps Ethernet PC Port  
 RJ-45 Connectors

### RS-232

Serial Command Protocol Only (Console software not supported on RS-232 port)  
 DB-9 female  
 9,600/19,200/38,400/57,600/115,200 baud rate; 8 bits, 1 stop, no parity  
 Hardware flow control on (default)/off

### USB

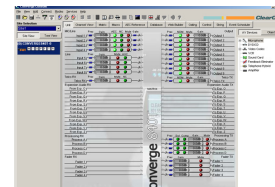
Version 2.0 compatible  
 Type B connector

### Control/Status

DB-25 female A/B (2)  
 Inputs A/B: active low (pull to ground)  
 Outputs A/B: open collector, 40 VDC max, 40 mA each  
 +3.3 VDC pins (2) (300 mA over-current protected)

### Configuration & Administration

Software  
 Converge Console™



### Power Input Range

Auto-adjusting  
 100-240 VAC; 50/60 Hz

### Power Consumption

30 W Typical

### Dimensions (L x D x H)

17.25" x 10.25" x 1.75"  
 43.8 x 26 x 4.5 cm

### Weight

7.5 lbs/3.3375 kg unit weight  
 12 lbs/5.4kg shipping weight

### Operating Temperature

14° F/-10° C to 122° F/50° C ambient unit temperature

### Approvals & Compliance

AES48 compliant (audio equip grounding)  
 U.S.A. & Canada  
 CSA safety listed  
 EU Countries  
 RoHS compliant  
 WEEE compliant  
 See product manual for additional details

### Optional Accessories

Converge Pro 880  
 Converge Pro 880T  
 Converge Pro 8i  
 Converge SR 1212  
 Converge SR 1212A  
 Converge Pro 840T  
 Converge Pro TH20  
 Tabletop Controller



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