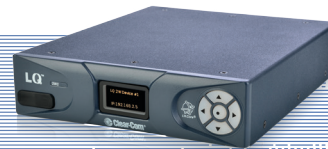


# LQ and LQ-R Devices

LQ™ Series IP Interfaces for Clear-Com

Linking  
People  
Together



LQ-2W2



LQ-R2W4-4W4

## Key Features and Benefits

- Available as a compact box or a 1RU panel
- 2-, 4- and 8-port IP interface devices
- Connect over LAN, WAN or Internet
- Adjustable bandwidth on a per port basis
- Uses low-latency OPUS codec
- Clear-Com and RTS 2-wire connectivity
- 2-wire powering, termination and auto-nulling
- 4-wire ports support data and audio for Clear-Com Eclipse and Drake 4000 panels
- Up to 6 devices can be connected together
- Browser-based configuration software (PC, MAC, Tablet)
- 2-port devices powered via local 12V DC power supply or PoE
- 4- and 8-port devices powered via redundant 12V DC power supplies
- Rugged and lightweight
- Yellow OLED front panel menu display
- Red/Green keypad status LED

LQ Series are interface devices that can connect 2-wire and 4-wire audio with call signaling over IP networks.

## Description

LQ IP interfaces enable connection of 2-wire partyline and 4-wire audio over LAN, WAN or Internet IP infrastructures. The LQ Series consists of compact LQ boxes and rack-mounted LQ-R panels, available in 2-wire (partyline) or 4-wire options in 2-, 4- or 8-port versions. The partyline ports are Clear-Com and RTS compatible. Two standalone partyline intercom circuits can easily be constructed by connecting two partyline ports. The 4-wire ports can interconnect with devices, such as analog ports of any matrix intercom system, analog telephone circuits, two-way radio gate-ways and audio consoles. A maximum of six LQ Series IP devices can be linked together in any 2- or 4-wire combination.

## Audio Assignments

At least two ports must be associated to a channel. When the two or more ports are added to a channel, it becomes a Virtual Partyline (VPL).

## Connectors

LQ Series devices have two Neutrik etherCON series lockable RJ45 chassis connectors for network connectivity. The partyline ports have 3-pin XLR-F audio port connectors, while the 4-wire ports have Neutrik etherCON audio port connectors.

## Power

The LQ-2W2 can power the partyline, allowing the user to connect a beltpack without the need of a power supply to locally power the line. A total of 5 beltpacks can be locally powered or one beltpack can be powered using PoE. The LQ-R partyline options supply more power and are able to support up to 10 beltpacks per channel (20 per device).

## Network Technology

The LQ devices use the low-latency OPUS codec. The OPUS adjustable audio codec meets various data rate, bandwidth and quality requirements.

## Core Configuration Manager (CCM)

CCM is a free browser-based software tool with intuitive menus for quick setup and configuration editing that supports the latest versions of all major browsers on MAC, PC and tablet platforms. LQ devices can be added and removed from the system by editing the configurations via the CCM software.

# LQ and LQ-R Devices

LQ™ Series IP Interfaces for Clear-Com

## Technical Specifications

### Audio

Resolution: 12 bit  
Sample Rate: 24KHz  
Frequency Response: 100 – 12KHz  
CODEC: OPUS

### Partyline Audio

Input Gain: -3dB to +3dB  
Output Gain: -3dB to +3dB

### 4-Wire Audio

Input Gain: -12dB to +12dB  
Output Gain: -12dB to +12dB

### Network Setting

Bit Rates: 16, 32, 48, 64, 128Kbps  
Packet Size: 5, 10, 20, 40, 60ms  
Jitter Buffers: 0 - 1000ms

### Connectors

Network/LAN: EtherCON/RJ45 (female)  
Partyline Audio I/O: 3 Pin XLR (female)  
4-wire Audio I/O: EtherCON/RJ45 (female)

### Partyline Output Current

Type: Clear-Com & RTS TW

### LQ

Local DC Powered: 150mA  
POE Powered: 70mA

### LQ-R4W8

Local DC Powered: 250mA

### LQ-R2W4/LQ-R4W4-2W4

Local DC Powered: 250mA per pair  
of PL ports (500mA total)

### Power Supply

#### LQ

Plug-in adapter with sleeve locking connector  
(US, UK, Europe, AUS & China sockets included)

Input: 100-240V, 47-63Hz, 0.58A MAX

Output: DC 12V, 2A, 24W MAX

#### LQ-R

In-line supply with sleeve locking connector

Input: 100-240V, 50-60Hz, 1.4A MAX

Output: DC 12V, 5A, 60W MAX

### Environmental

Operating Temperature: +32°F - +104°F  
(0°C - +40°C)

Storage Temperature: -67°F - +158°F  
(-55°C - +70°C)

Humidity: 90%, non-condensing

### Dimensions

#### LQ

6.8in W x 1.79in H x 8.45in D  
(173mm x 46mm x 215mm)

#### LQ-R

19in W x 1.79in H x 8.8in D  
(483mm x 46mm x 224mm)

### Weight

#### LQ

1.83lbs (.83kg)

#### LQ-R

4.29lbs (1.95kg)

## Order Codes

### Part Number and Description

**LQ-2W2:** Compact 2-port partyline  
IP interface

**LQ-4W2:** Compact 2-port 4-wire  
IP interface

**LQ-R2W4:** 1RU 4-port partyline with  
loop thru connectors IP interface

**LQ-R4W8:** 1RU 8-port 4-wire IP  
interface

**LQ-R2W4-4W4:** 1RU 8-port (4 port)  
partyline and (4 port) 4-wire IP interface

## Back Panels



LQ-R2W4-4W4



LQ-R4W8



LQ-R2W4

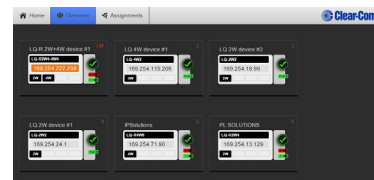


LQ-2W2

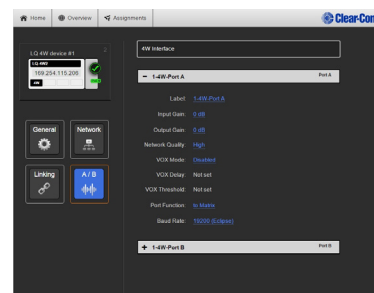


LQ-4W2

## Core Configuration Manager (CCM)



Devices Screen



Port Configuration Screen

### Notice About Specifications

While Clear-Com makes every attempt to maintain the accuracy of the information contained in its product manuals, that information is subject to change without notice. Performance specifications included in this manual are design-center specifications and are included for customer guidance and to facilitate system installation. Actual operating performance may vary.