

LBB 4402/00 Audio Expander

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Invented for life



- ▶ Four audio inputs – two selectable mic/line and two line inputs
- ▶ Four line audio outputs
- ▶ Eight supervised control inputs and five control outputs
- ▶ Audio processing functions
- ▶ Redundant network connection

The audio expander inserts external audio into the system and extracts audio from the system. This unit has control inputs and outputs for external interfacing. It can route its audio inputs permanently or conditionally to any of the zones or to other audio outputs. The routing conditions are configured using the configuration software. The audio output can be programmed to get its signal from any of the audio inputs. The equipment can be used freestanding (tabletop) or in a 19" rack.

Functions

The audio expander has four transformer isolated analog audio inputs. Two of these are selectable between microphone and line. The other two inputs are fixed line inputs. The expander has four transformer isolated analog audio line outputs. It has built-in digital audio processing capable of three parametric and two shelving equalizer sections for all audio in and outputs. They also have a selectable 20 kHz monitoring signal. The 2 x 16-character display and the rotary control enable local status enquiries. The display shows the VU-meter reading when audio monitoring mode is active. Audio can also be monitored by using a headphone. The eight control inputs are freely programmable for system actions, and priorities can be assigned to these inputs. Each control input has the ability to monitor

the attached line for open and short-circuits. Five control outputs are freely programmable for faults and call-related actions.

The audio expander supports redundant network cabling. The network can be either single branch or redundant loop. The unit is powered from the network controller via the network cable. The expander is self-monitoring and continuously reports its status to the network controller.

Controls and Indicators

- Two x 16-character LCD status display
- Rotary/push control for menu control and headphone volume

Interconnections

- Two system network connections
- Eight control inputs
- Two mic/line inputs
- Two line inputs
- Four line outputs
- Five control outputs
- Headphone output

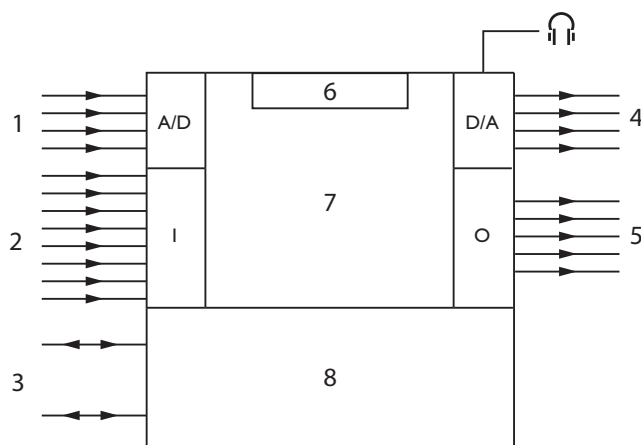
Certifications and approvals

Safety	acc. to IEC 60065 / EN 60065
Immunity	acc. to EN 55103-2
Emissions	acc. to EN 55103-1 / FCC-47 part 15B

Emergency	acc. to EN 60849 / EN 54-16 / ISO 7240-16
Maritime	acc. to IEC 60945

Region	Certification	
Europe	CPR	EU_CPR
	CE	
	CE	COC
	CE	CertAlarm
	CE	DOP
Poland	GL	
	CNBOP	

Installation/configuration notes



- 1 Audio inputs
- 2 Control inputs
- 3 Plastic optical fiber network
- 4 Audio outputs
- 5 Control outputs
- 6 Display and control
- 7 Network processor and DSP
- 8 Network redundancy switching

Parts included

Quantity	Component
1	LBB 4402/00 Audio Expander
1	Set of mounting brackets for 19" rack
1	Set of feet
1	Set of connectors

Technical specifications

Electrical

Power consumption	9 W (DC)
Performance	
Frequency response	20 Hz to 20 kHz (-3 dB)
Line inputs	
Connectors	2 x
Connectors	3-pin XLR and 2 cinch (for each line)
S/N	>87 dBA at maximum level
CMRR	>40 dB
Input range	+6 dBV to +18 dBV (XLR) -6 dBV to +6 dBV (cinch)
Mic/ line inputs	
Connector	2 x
Connector	3-pin XLR and 2 cinch (for each line)
Nominal Input Level	-57 dBV
S/N	>62 dBA with 25 dB headroom
CMRR	>55 dB at 100 Hz
Input Impedance	1360 ohm
Phantom supply	12 V ±1 V at 15 mA
Input range	-7 dB to 8 dB ref nominal input level
Line outputs	
Connectors	4 x
Connectors	XLR and 2 cinch (for each line)
Output Impedance	<100 ohm
S/N	>89 dBA at maximum level
Crosstalk	<-85 dB
Signal range	-12 dBV to +18 dBV (XLR) -24 dBV to +6 dBV (cinch)
Distortion at 1 kHz	<0.05%
Control inputs	
Connectors	8 x
Connectors	Removable screw terminals
Operation	Closing contact (with supervision)
Control outputs	
Connectors	5 x
Connectors	Removable screw terminals

Mechanical

Dimensions (H x W x D)	
for tabletop, with feet	92 x 440 x 400 mm (3.6 x 17.3 x 15.7 in)
for 19" rack, with brackets	88 x 483 x 400 mm (3.5 x 19 x 15.7 in)
in front of brackets	40 mm (1.6 in)
behind brackets	360 mm (14.2 in)

Weight	7 kg (15.4 lbs)
Mounting	Tabletop, 19"-rack
Color	Charcoal (PH 10736) with silver

Environmental

Operating temperature	-5 °C to +55 °C (23 °F to 131 °F)
Storage temperature	-20 °C to +70 °C (-4 °F to 158 °F)
Humidity	15% to 90%
Air pressure	600 to 1100 hPa

Ordering information

LBB 4402/00 Audio Expander

Audio expander, provides 4 audio inputs, 4 audio outputs, 8 control inputs, and 5 control outputs to a Praesideo system, powered from Praesideo network, rack unit 2 RU.

Order number **LBB4402/00**

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