

FF Data Sheet | PUBLIC ADDRESS AND VOICE ALARM SYSTEM

LDA ONE-500

AS 4428.16:2020 & AS 7240.4

The LDA ONE500 is a compact AS 4428.16:2020 certified public address and voice alarm system that ensures a fast, safe and controlled emergency evacuation.

ONE is the most versatile and cost-effective PA/VA system, thanks to its cutting-edge features, excellent audio quality and flexibility in minimum space. It has 2 class D amplifiers, 6 zones, 3 audio inputs, 6x6 audio matrix, DSP and LCD display.

The system can be configured without software or PC, thanks to the Plug & Set mode for PA/VA.

Audio inputs and automatic mixing allow high versatility for PA use in small installations.

ONE has an AS 7240.4 battery charger and can operate with one 12V battery. This feature and its advanced power saving control reduce maintenance costs to the maximum.

A Wall & Rack innovative design makes ONE suitable for wall mounting and rack integration.



Features

- 3 audio inputs.
- Up to 8 MPS-8Z multizone microphones or VAP-1 panels connected with CAT5 UTP cable.
- 2 class D amplifiers with two configurations for 100V/70V lines up to 500W.
- Digital audio matrix 6x6, expandable.
- 4-pre-amp outputs for external PA amplifiers connection.
- DSP: 3/7-band input/output parametric equalizer, loudness, LDA sound enhancer, independent volume control per each input and output master.
- Access control by LCD display.
- Control for up to 16 LDA AT6 attenuators.
- 8+2 GPIO ports, supervised for integration with Fire Alarm Control Panel.

NOTE: This is a preview datasheet. Technical data and characteristics may be changed or updated without prior notice.
Product image is indicative only.

Voice Alarm / Emergency Features

- Certified under AS 4428.16:2020, AS 7240.4 and EN 60849 standards.
- Failure detection and indication in all emergency functions.
- Fire Alarm Control Panel integration.
- Double player for pre-recorded evacuation messages.
- Manual control of emergency states with access control.
- Emergency log.
- Loudspeaker lines supervision.
- Line terminator without return for supervision.
- Backup amplifier included.
- 10 minutes storage for pre-recorded messages.

Technical specifications

Power supply	100 - 240V~ 50/60Hz
Power consumption	350W max / 100W at 1/8 output power
Frequency response	80 – 20000Hz +/-1dB
Signal to noise ratio	SNR~95dB, A-weighted
Distortion factor	<0.1% according to IEC 60268
Gain adjustment per channel	-100dB +10dB, 1dB steps
DSP	Integrated - 48 kHz, 24 bits - 344 MIPS
BGM audio input	1 x balanced audio 1 Vrms. 10 K Ω , 3 Pin, Euroblock type
Priority audio inputs	2 x balanced audio 1 Vrms. 10 K Ω , 4 Pin, Euroblock type (GPIO)
General control (GPIO)	2xcontrol/O,0-5V,100 Ω , inPRIO audioinputs
LDA ACSI Bus	1 x balanced audio 1 Vrms. 10 K Ω , RJ-45 female, total 800m / 2624.7ft
ACSI-Link connectivity	2 x balanced audio 1 Vrms. 10 K Ω , RJ-45 female, total 800m / 2624.7ft
Pre-amp audio outputs	4 x balanced audio 1 Vrms. 100 Ω , 3 Pin, Euroblock type
Attenuators control	6 x override 24V DC, 6 x 30mA, 2 Pin, Euroblock type (4 pin connector)
Emergency control inputs	8 x 0 - 5V DC, monitored inputs, 2 Pin, Euroblock type (4 pin connector)
Emergency control outputs	2 x contact closure output, NO, max 60V DC 130mA, 2 Pin, Euroblock type (4 pin connector)
Virtual matrix	15 x 24 maximum
Amplifier	2 x 500W D class (250Wrms x 2) @ 70 / 100V
Backup amplifiers	1 backup amplifier with automatic priority according to AS 4428.16:2020
Speaker line outputs	6 x 100V audio. Min. impedance: 20 Ω 500W (outputs 1 and 2), 80 Ω 120W (rest), 2 Pin, Euroblock type
Output power	500 W according to EN60065. 200 Wrms according to AS 4428.16:2020
Protection	Over-temperature, infrasonic, short circuit, slow start-up, overload
Emergency power	181x76x167mm battery housing, up to 22Ah
Battery charger	Integrated, smart charging up to 3 amperes
Display	Backlit LCD 2 rows x 16 characters
Operation conditions	-5 $^{\circ}$ C to +45 $^{\circ}$ C / 23 $^{\circ}$ F to 113 $^{\circ}$ F 5% to 95% relative humidity (without condensation)
Finish	Materials: Fe y AL Colours: RAL7016 and RAL9005
Weight	7.5 Kg / 15.76 lb
Dimensions (W x H x D)	453mm x 88mm x 455mm / 18.2" x 3.46" x 18"
Accessories	Male Euroblock connectors, installation screws, 4 x rubber foot