

MLX

Hybrid® horn/reflex Subwoofer

Features

- Ultra-high output subwoofer with onboard Class D amplification. DSP and networking
- Hybrid horn/reflex loading for maximum acoustic efficiency and low frequency extension
- Dual ultra-long excursion 18" (460mm)/4.5" (115mm) voice coil neodymium drivers
- Switched mode power supply with PFC (Power Factor Correction) and global mains voltage operation
- Forward or rear-facing operation
- Designed to meet IP24 environmental rating

Applications

- Outdoor festivals
- Stadiums, arenas and theatres
- Concert halls
- Premium fixed installations



The MLX is a very high performance subwoofer with onboard amplification, DSP and networking. Capable of more than 150dB peak output at 1m, it is the ultimate subwoofer for large-scale tours, festivals and installations.

Class-leading output levels are achieved by combining Hybrid® horn/reflex loading with IPAL driver and amplifier technology. Hybrid loading of two ultra-long excursion 18" (460mm) neodymium magnet drivers perfectly balances low frequency extension with astounding chest-thumping bass that has a physical impact.

MLX enclosures are designed to be flown or ground-stacked and a combination of forward and rear facing enclosures can be configured as a directional subwoofer array with specific directional properties, including cardioid. Audio settings for the MLX can be controlled either cabinet-by-cabinet or as complete arrays via the VU-NETTM network, with its intuitive graphical interface. Symmetrical rigging enables MLX's to face backwards in flown arrays.

MLX's onboard Class D amplifier delivers a total peak output of 8500W. Its lightweight power supply auto-ranges to global mains voltages from 100 to 240V 50/60Hz and Power Factor Correction ensures stable performance independent of mains fluctuations, as well as reducing demands on the mains supply. The amplifier, power supply and control electronics are housed in a field-replaceable, fan-cooled module that is designed to withstand the varied environmental conditions — such as rain and high ambient temperatures — typically found in live sound applications.

The MLX enclosure is constructed from multi-laminate birch plywood and finished in a hard-wearing, textured black polyurea coating. A rigid perforated steel grille protects the front of the enclosure, while rubber cheeks protect the sides. Interlocking skids protect the top and bottom surfaces and prevent movement when stacked.

Up to 15 MLX's can be flown from an MLA system flybar.

MLX

Hybrid® horn/reflex Subwoofer

Technical Specifications

Acoustical

TYPE	Hybrid® horn/reflex subwoofer
FREQUENCY RESPONSE (1)	35Hz-150Hz ± 3dB
MAXIMUM SPL	LF: 140dB continuous, 150dB peak (3)

Drivers

LF	2x18" 115mm / 4.5" voice coil, ultra-long excursion, high efficiency neodymium magnet
----	---

Rated Power (2)

LF	3000W AES, 12000W peak
----	------------------------

Dispersion Digitally controlled in an array

Audio Input

CONNECTORS	Female XLR input, male XLR link output
ANALOGUE INPUT IMPEDANCE	20kΩ balanced to ground
MAXIMUM ANALOGUE INPUT LEVEL	6.15Vrms (+18dBu), over voltage protected
AES/EBU IMPEDANCE	110ohms balanced, Receive and transmit termination

Network

CONNECTORS	IP68rated 8-way, quick-release type
PROTOCOL	U-NET

Amplifier Module

TYPE	Single channel Class D, fixed frequency
PEAK OUTPUT POWER	8500W
AVERAGE EFFICIENCY	85%
COOLING	2 x temperature controlled internal fans 1 x low-speed internal blower 1 x temperature controlled external fan

MAXIMUM AMBIENT TEMPERATURE	45°C (113°F) for full output
-----------------------------	------------------------------

Power Supply

TYPE	Switch mode, fixed frequency with PFC
AC INPUT OPERATING RANGE	100 – 240V ~ AC, 50 - 60Hz

POWER FACTOR	> 0.95
NOMINAL POWER CONSUMPTION	600W
MAINS CONNECTOR	16A IEC309 (Ceeform)

General

ENCLOSURE	Extensively braced, multi-laminate birch-ply
FINISH	Textured black PU coating
PROTECTIVE GRILLE	Black HEX perforated steel
FITTINGS	Proprietary rigging system Protective rubber side-cheeks incorporating skids Wheel-board Transit cover Weather protection cowl

IP Rating IP 24

DIMENSIONS (inc. wheel-board)	(W) 1126mm x (H) 607mm (607mm) x (D) 1027mm (1200mm) (W) 44.4in x (H) 23.9in (23.9in) x (D) 47.2in
-------------------------------	---

WEIGHT (ex. wheel-board)	160kg (352lbs)
--------------------------	----------------

Accessories

	Flying frame (including clinometer)
	Flying Pin
	Mains distribution system
	Tour-grade network interconnects
	DX4.0 Controller/U-NET Hub

Notes

- (1) Measured on-axis on ground plane (2p space) at 2 metres, then referred to 1 metre.
- (2) AES Standard ANSI S4.26-1984.
- (3) Measured in half-space at 1 metre with a tone burst signal.

Trade Descriptions Act

Due to Martin Audio's policy of continuing improvement, we reserve the right to alter these specifications without prior notice. Martin Audio is committed to refining state of the art sound reinforcement, combining in-depth product and field applications research with advanced manufacturing techniques. Every Martin Audio product is built to the highest manufacturing standards and rigorously tested to ensure that it meets the performance criteria specified in the design.

