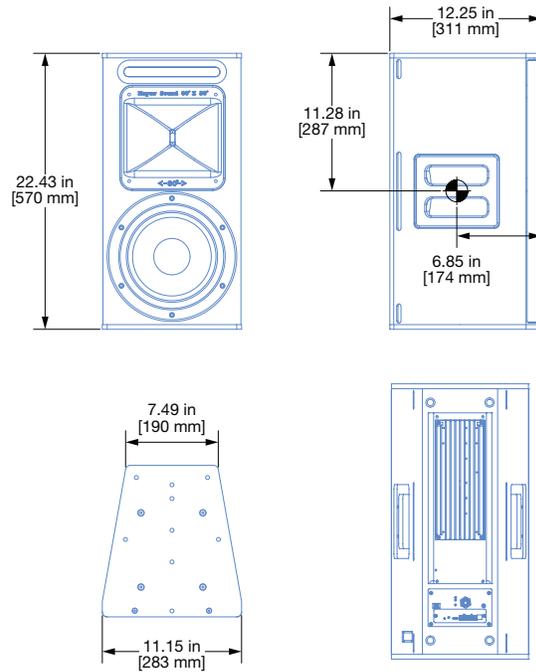


UPJ-1XP Compact VariO™ Loudspeaker



Meyer Sound designed the UPJ-1XP for flexibility. The UPJ-1XP (with IntelligentDC technology) offers the same sonic signature, robust peak power output, and rotatable VariO horn as the UPJ-1P but with external DC power and support for lengthy cable runs without AC conduits. Its extraordinary size-to-power ratio and generous rigging options make the compact UPJ-1XP well suited for use as a single, primary loudspeaker or as part of multi-cabinet horizontal or vertical clusters.

Applications include AV presentations, small- to medium-sized sound reinforcement systems, fill, delay, effects, and distributed systems. With its ability to rotate, the loudspeaker's 80° by 50° VariO horn facilitates optimum horizontal or vertical coverage for any installation.

Designed and manufactured at Meyer Sound's factory in Berkeley, California, the UPJ-1XP's transducers include one 10-inch cone driver and one 3-inch diaphragm compression driver. An onboard two-channel, class D amplifier delivers 300 W peak power to the proprietary drivers.

With IntelligentDC technology, the UPJ-1XP receives DC power and balanced audio from a single loudspeaker connector, available as Phoenix™ 5-pin male, sealed SwitchCraft® EN3™ 5-pin male, or sealed ECO-M 7-pin male. Powering the unit from an external source eliminates the need for wiring conduits while still preserving the advantages of self-powered systems. The UPJ-1XP's amplifier and signal-processing circuits store DC power and tolerate voltage drops, thereby accommodating light-gauge cables and lengthy cable runs.

The UPJ-1XP requires an external Meyer Sound IntelligentDC power supply. The MPS-488HP single-space rack unit distributes DC power and balanced audio to up to eight UPJ-1XP loudspeakers, or other Meyer Sound IntelligentDC loudspeakers. For systems requiring fewer speakers, the two channel MPS-482HP is also available.

Composite multi-conductor cables, such as Belden® 1502 or equivalent, can deliver both DC power and balanced audio to loudspeakers at cable lengths up to 150 feet with just 1 dB of loss in peak SPL using 18 AWG wire. Longer cable runs are possible with heavier gauge wires.

Meyer Sound's RMS™ remote monitoring system, which offers monitoring of parameters from a host computer running Compass® control software, is optionally available for the MPS-488HP.

Meyer Sound coats the UPJ-1XP cabinet with a slightly textured black finish and includes heavy-duty, corrosion-resistant 6061-T6 aluminum end plates with threaded M8 attachment points for basic eye bolt rigging and third-party pole assemblies. QuickFly® rigging options include the MAAM-UPJ array adapter (also made from 6061-T6 aluminum), MUB-UPJ U-bracket, and MYA-UPJ mounting yoke assembly. Cabinets without handles are also available from the factory. Other options include weather protection and custom colors for fixed installations and installations with specific cosmetic requirements.

FEATURES AND BENEFITS

- IntelligentDC technology affords the flexibility of lengthy cable runs without AC conduits
- Exceptional fidelity and extended high-frequency enhance performance
- Extraordinarily flat amplitude and phase response provide tonal accuracy and precise imaging
- Constant-Q horn affords uniform response throughout the coverage area
- VariO horn enables versatile coverage options, whether orienting loudspeakers horizontally or vertically
- QuickFly rigging enables single cabinet mounting or flown, multi-cabinet horizontal and vertical arrays

APPLICATIONS

- Portable and installed audio-visual systems
- Theatrical sound reinforcement
- Compact voice reinforcement systems
- Conference centers, presentations, ballrooms, and houses of worship

ACCESSORIES AND ASSOCIATED PRODUCTS

MAAM-UPJ Array Adapter: Facilitates installation of multiple UPJ-1XPs in both horizontal and vertical arrays.

MYA-UPJ Mounting Yoke Assembly: Cradle-style mounting yoke that suspends a single UPJ-1XP loudspeaker and supports a wide range of horizontal and vertical adjustments.

MUB-UPJ U-Bracket: Allows the UPJ-1XP to be mounted on any flat surface at adjustable angles.

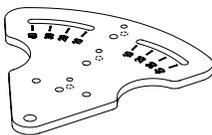
35MM Pole Stand Adapter: This large base stand adapter mounts the loudspeaker on a 35 mm pole. In addition, this adapter can be used to mount the MYA-UPJ yoke on a pole to allow easy panning and tilting.

MSA-STAND Adapter Cup 35MM: This compact cup-type adapter mounts the UPJ-1XP loudspeaker on a 35 mm pole. In addition, this adapter can be used to mount the MYA-UPJ yoke on a pole to allow easy panning and tilting of the UPJ-1XP.

Galileo GALAXY Network Platform: The Galileo GALAXY Network Platform provides state-of-the-art audio control technology for loudspeaker systems with multiple zones. With immaculate sonic performance, it provides a powerful tool set for corrective room equalization and creative fine-tuning for a full range of applications.

MPS-488HP External Power Supply: Rack-mount unit that delivers balanced audio and high-current DC power to up to eight loudspeakers; versions available with either Phoenix or EN3 channel output connectors.

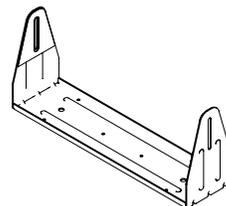
MPS-482HP External Power Supply: 1RU 1/2 width rack unit that delivers balanced audio and high-current DC power to up to two audio channels; rack mount or use available options to mount on ceiling, wall, pole or truss configurations.



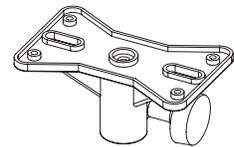
MAAM-UPJ Array Adapter



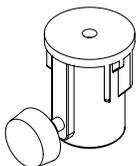
MYA-UPJ Mounting Yoke Assembly



MUB-UPJ U-Bracket



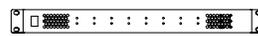
35MM Pole Stand Adapter



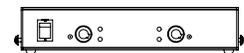
MSA-STAND Adapter Cup 35MM



Galileo GALAXY Network Platform



MPS-488HP External Power Supply



MPS-482HP External Power Supply

SPECIFICATIONS

ACOUSTICAL ¹			
Operating Frequency Range ²	55 Hz – 20 kHz		
Frequency Response ³	66 Hz – 18 kHz \pm 4 dB		
Phase Response	750 Hz – 18 kHz \pm 45 degrees		
Linear Peak SPL ⁴	125 dB with 18 dB crest factor (M-noise) , 122.5 dB (Pink noise), 125 dB (B-noise)		
COVERAGE ⁵			
	50° x 80° or 80° x 50° (rotatable horn)		
TRANSDUCERS			
Low Frequency	One 10-inch cone driver; 4 Ω nominal impedance		
High Frequency	One 3-inch diaphragm compression driver; 16 Ω nominal impedance		
AUDIO INPUT			
Type	Differential, electronically balanced		
Maximum Common Mode Range	\pm 15 V DC, clamped to earth for voltage transient protection		
Connectors	Phoenix 5-pin Male; SwitchCraft 5-pin Male; ECO-M 7-pin Male		
Input Impedance	10 k Ω differential between Audio (+) and Audio (–) pins		
Wiring ⁶	Phoenix 5-pin Male Pin 1: DC Power (–) Pin 2: DC Power (+) Pin 3: Chassis/earth through 1 k Ω , 1000 pF, 15 V clamp network to provide virtual ground lift at audio frequencies Pin 4: Audio (–) Pin 5: Audio (+)	SwitchCraft EN3 5-pin Male Pin 1: DC Power (–) Pin 2: DC Power (+) Pin 3: Chassis/earth through 1 k Ω , 1000 pF, 15 V clamp network to provide virtual ground lift at audio frequencies Pin 4: Audio (–) Pin 5: Audio (+)	ECO-M 7-pin Male Pin 1: DC Power (–) Pin 2: DC Power (+) Pin 5: Chassis/earth through 1 k Ω , 1000 pF, 15 V clamp network to provide virtual ground lift at audio frequencies Pin 5: Audio (–) Pin 6: Audio (+)
Nominal Input Sensitivity	0 dBV (1.0 V rms) continuous is typically the onset of limiting for noise and music		
Input Level	Audio source must be capable of producing of +20 dBV (10 V rms) into 600 Ω to produce the maximum peak SPL over the operating bandwidth of the loudspeaker.		
AMPLIFIER			
Type	2-channel, Class-D		
Total Output Power ⁷	300 W peak		
THD, IM, TIM	< 0.02%		
Cooling	Convection		
DC POWER			
Connector	Phoenix 5-pin Male; SwitchCraft 5-pin Male; ECO-M 7-pin Male (see Wiring above)		
Safety Rated Voltage Range	48 V DC		
RMS NETWORK (OPTIONAL ON REQUIRED MPS-488HP POWER SUPPLY)			
	Two-conductor, twisted-pair network that reports the voltage and current readings for each output channel of the MPS-488HP.		

SPECIFICATIONS, CONT'D.

PHYSICAL	
Dimensions	W: 11.15 in (283 mm) x H: 22.43 in (570 mm) x D: 12.25 in (311 mm)
Weight	43 lb (19.5 kg)
Enclosure	Premium multi-ply birch with slightly textured black finish
Protective Grille	Powder-coated, hex-stamped steel with black mesh
Rigging	Aluminum end plates with M8 threaded attachment points for mounting and flying with QuickFly and standard rigging options

NOTES

- Loudspeaker system predictions for coverage and SPL are available in Meyer Sound's MAPP System Design Tool.
- Recommended maximum operating frequency range. Response depends on loading conditions and room acoustics.
- Free-field, measured with 1/3-octave frequency resolution at 4 m.
- Linear Peak SPL** is measured in free-field at 4 m referred to 1 m. Loudspeaker SPL compression measured with M-noise at the onset of limiting, 2-hour duration, and 50-degree C ambient temperature is <2 dB.
M-noise is a full bandwidth (10 Hz–22.5 kHz) test signal developed by Meyer Sound to better measure the loudspeaker's music performance. It has a constant instantaneous peak level in octave bands, a crest factor that increases with frequency, and a full bandwidth Peak to RMS ratio of 18 dB.
Pinknoise is a full bandwidth test signal with Peak to RMS ratio of 12.5 dB.
B-noise is a Meyer Sound test signal used to ensure measurements reflect system behavior when reproducing the most common input spectrum, and to verify there is still headroom over pink noise.
- The UPJ horn can be rotated to provide an 80° x 50° coverage pattern in either the horizontal or vertical plane.
- Pins 3 and 4 not used in ECO-M connector.
- Amplifier wattage rating based on the maximum unclipped burst sine wave rms voltage the amplifier will produce for at least 0.5 seconds into the nominal load impedance: low and high channels, 30 V rms.

ARCHITECTURAL SPECIFICATIONS

The loudspeaker shall be a self-powered, full-range system. Its transducers shall include one 10-inch cone driver and one 3-inch diaphragm compression driver.

The loudspeaker system shall incorporate internal processing and a two-channel amplifier, one channel for each driver. Processing functions shall include equalization, phase correction, signal division, and driver protection. Amplifier burst output power shall be 300 W total. Distortion (THD, IM, TIM) shall not exceed 0.02%.

Performance specifications for a typical production unit shall be as follows: operating frequency range shall be 55 Hz – 20 kHz; phase response shall be 750 Hz – 18 kHz ±45°; linear Peak SPL shall be 125 dB with 18 dB crest factor, measured with M-noise, free-field at 4 m referred to 1 m; coverage (-6 dB points) shall be 80° x 50°, horizontal or vertical dependent on horn orientation.

The loudspeaker shall receive DC power and balanced audio from a single input connector, available as Phoenix 5-pin male, sealed EN3 5-pin

male, or sealed ECO-M 7-pin male (two pins for DC power, three pins for balanced audio). The audio input shall be electronically balanced with a 10 kΩ impedance and accept a nominal 0.0 dBV (1.0 V rms) input signal.

Power requirements for the loudspeaker shall be a Meyer Sound Intelligent DC power supply capable of delivering 48 V DC.

All components shall be mounted in an acoustically vented trapezoidal enclosure constructed of premium multi-ply birch with a slightly textured black finish. The protective grille shall be powder-coated, hex-stamped steel with black mesh. Integral high-strength, 6061-T6 aluminum end plates with threaded M8 metric holes shall accommodate Meyer Sound proprietary rigging hardware and third-party accessories. Dimensions shall be W: 11.15 in (283 mm) x H: 22.43 in (570 mm) x D: 12.25 in (311 mm). Weight shall be 43 lb (19.5 kg).

The loudspeaker shall be the Meyer Sound UPJ-1XP.