MPS-482HP Power Supply

Meyer Sound®
THINKING SOUND

8.50 in
[216 mm]

1.85 in   1.66 in
[47 mm]   [42 mm]

7.75 in
[197 mm]

6.75 in
[171 mm]

Rubber Feet

8.62 in
[219 mm]
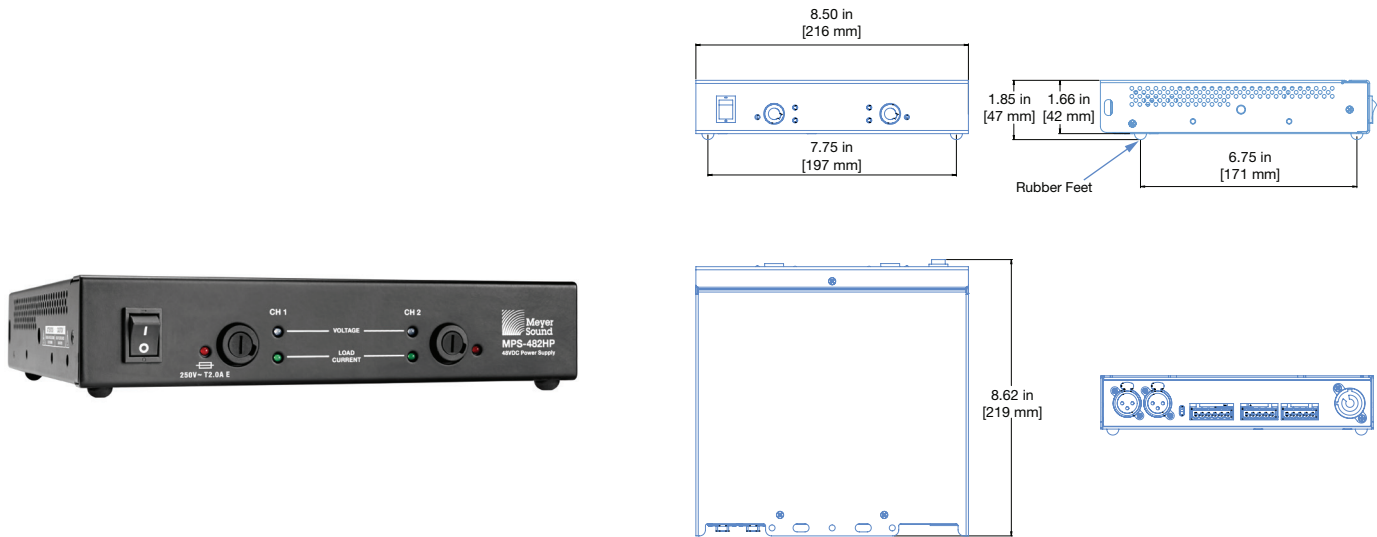
The two-channel MPS-482HP Power Supply with audio and 48 V DC greatly expands the flexibility and cost-effectiveness of Meyer Sound's exclusive IntelligentDC™ remotely self-powered systems. Housed in a rugged, compact, 1RU, half-rack-width enclosure, the MPS-482HP is ideal for applications requiring a small channel count or the capability for mounting remotely on a wall or ceiling (using the MPS-482HP Wall Bracket). Rack mounting one or two MPS-482HPs in one standard 19-inch, 2RU rack space is also possible with the optional MPS-482HP 2RU Tray.

Designed to power Meyer Sound loudspeakers that feature IntelligentDC technology, the MPS-482HP is particularly advantageous when creating two-channel systems with compact loudspeakers, such as the MM-4XP, UP-4XP, UP-4slim, ULTRA-X20XP and USW-112XP. Additionally, it can power up to six Ashby-5C or four Ashby-8C ceiling loudspeakers and is also ideal for powering surrounds in immersive configurations.

Meyer Sound's externally powered loudspeakers include on-board amplification and signal-processing circuits that store DC power and tolerate voltage drops to accommodate light-gauge cables and lengthy cable runs. Powering loudspeakers from an external source eliminates the need for wiring conduits while still preserving the advantages of self-powered systems.

The MPS-482HP receives two channels of balanced audio from its two XLR 3-pin female input connectors or one 6-pin Phoenix male connector and routes the audio, along with DC power, to its two Phoenix 5-pin male output connectors. Front panel user-replaceable fuses protect the MPS-482HP's two channel outputs from short circuits and wiring errors.

The use of composite multi-conductor cables (such as Belden® 1502) allows a single cable to carry both audio and DC power from the MPS-482HP to the loudspeakers. Outputs can deliver DC power to loudspeakers at cable lengths up to 150 feet or 300 feet (depending on the loudspeaker model) with just 1 dB of loss in peak SPL using 18 AWG wire. Longer cable lengths are possible for moderate applications that do not drive the loudspeakers to maximum output, as well as for installations with heavier gauge wires.

The MPS-482HP rear panel features a toggle switch that routes the signal from input channel 1 to both outputs. This linking capability is convenient for sending the same signal to both outputs without the need for additional cabling.

The unit's front panel has three LEDs per channel output to provide useful feedback on the status of the system. The blue voltage LEDs indicate when voltage is present for each channel output. The green load current LEDs indicate when a loudspeaker is connected to a channel output and glow brighter as the signal level increases. The red LEDs indicate a blown or open fuse on that channel.

Two optional accessories provide additional flexibility. The MPS-482HP 2RU Tray supports mounting of one or two power supplies in a standard EIA 19-inch wide, 2RU rack. The MPS482HP Wall Bracket enables mounting of one MPS-482HP Power Supply remotely on a ceiling, wall or pole (using a third-party pole mount).

FEATURES AND BENEFITS

- Offers two channels to power Meyer Sound IntelligentDC loudspeakers that require an external power supply

- Efficiently delivers power to installations requiring smaller channel counts

- Works as a supplemental power supply to the MPS-488HP Power Supply for applications requiring more than eight and less than sixteen channels

- Enables remote mounting of power supply and routing of DC power and balanced audio to loudspeakers with composite cables

- Fanless design operates quietly in acoustically sensitive environments

- Enclosure includes threads for mounting into accessories as well as cable-routing, strain-relief tabs

- Front panel LEDs provide system feedback on voltage status, load current levels, and fuse status
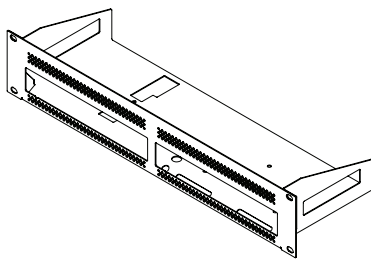
APPLICATIONS

- Conference rooms

- Theaters (public and high-end private)

- Constellation systems

- Cinema and television post-production facilities

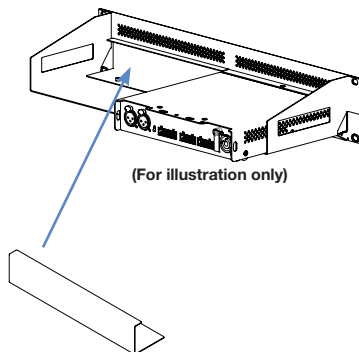- Supplemental power supply for any IntelligentDC loudspeaker system

ACCESSORIES

MPS-482HP 2RU Tray Kit (PN 40.285.013.01): enables mounting of one or two power supplies on a standard EIA 19-inch wide rack. The 2RU tray height facilitates cooling of the MPS-482HP Power Supply, as the area above the unit is empty. The rack mount tray comes with a face tray cover to use if one side is empty.
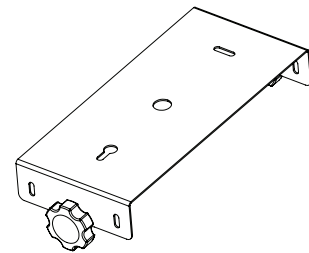
MPS-482HP Wall Bracket Kit (PN 40.285.015.01): enables mounting of one MPS-482HP Power Supply remotely on a ceiling, wall, or pole (using a third-party pole mount). Hang the power supply below the bracket, or mount the power supply on top. The bracket-above-power-supply orientation provides space for cable routing. (The power supply enclosure design includes cable routing strain relief tabs.) The bracket accommodates M6 fasteners.

(For illustration only)

MPS-482HP 2RU Tray

MPS-482HP 2RU Tray with MPS-482HP and tray face cover installed

MPS-482HP Wall Bracket

SPECIFICATIONS

FRONT PANEL	
LEDs per channel	Two blue LEDs to indicate presence of output voltage
	Two green LEDs to indicate load current status
	Two red LEDs to indicate blown or open fuse
Fuse	Use only Meyer Sound PN 420.041 when replacing

REAR PANEL	
Audio Input	Two XLR 3-pin female connectors OR one 6-pin male Phoenix connector (not summing to the XLR inputs)
	One Link Switch. Sends signal from channel 1 input to both output channels
Channel Output	Two Phoenix 5-pin male connectors
Output Wiring	Two pins for DC power, three pins for balanced audio
	Pin 1: 48 V DC - (chassis/earth ground)
	Pin 2: 48 V DC +
	Pin 3: Audio shield/chassis/earth ground
	Pin 4: Audio -
	Pin 5: Audio +
Output Voltage[1]	48 V DC per channel

AC POWER	
AC Connector	powerCON 20
Voltage Selection	Automatic
Safety Rated Voltage Range	100–240 V AC; 50–60 Hz; 220 W maximum

CURRENT DRAW	
Idle Current	0.14 A (115 V AC, 60 Hz); 0.07 A (230 V AC, 50 Hz); 0.15 A rms (100 V AC, 60 Hz)

PHYSICAL	
Dimensions[2]	1RU in height, 1/2 width rack mount
	W: 8.5 in (216 mm) x H: 1.85 in (47 mm) x D: 8.62 in (219 mm)
Weight	4.4 lb (2 kg)
Rigging	M6 threads on sides and bottom to support mounting; optional MPS-482HP Wall Bracket for flat surface mounting; optional MPS-482HP 2RU Tray for mounting two MPS-482HPs in a standard 19-inch wide, 2 RU rack slot

ENVIRONMENTAL	
Operating Temperature	0° C to +45° C
Non-operating Temperature	-40° C to +75° C
Humidity	To 95% at 35° C
Operating Altitude	To 5,000 m (16,404 ft)
Non-operating Altitude	To 6,300 m (25,000 ft)
Shock	30 g 11 msec half-sine on each of 6 sides
Vibration	10–55 Hz (0.010 m peak-to-peak excursion)

NOTES

1. Supports NEC Class 2 wiring.

2. Height dimension includes rubber feet. Height without feet is 1.66 in (42 mm).

ARCHITECTURAL SPECIFICATIONS

The 48 V DC external power supply shall power a maximum of two loudspeakers. The switched mode, regulated power supply shall also route up to two channels of balanced audio to the loudspeakers. Balanced audio shall be received from two XLR 3-pin female connectors or one 6-pin male Phoenix connector (not summing to the XLR inputs). Channel outputs shall be Phoenix 5-pin male and shall deliver both DC power and balanced audio to the loudspeakers on a single composite cable. Audio inputs shall be routed to corresponding channel outputs. Channel 1 may also be routed to both outputs selectable via a rear panel link switch.

Idle current draw for the unit shall be 0.14 A (115 V AC, 60 Hz); 0.07 A (230 V AC, 50 Hz); 0.15 A rms (100 V AC, 60 Hz)

Front panel LEDs shall provide feedback on output voltage, load current, and fuse status for each channel.

The unit shall be housed in an enclosure 1 RU in height, and half the width of standard 19-inch rack; dimensions shall be W: 8.5 in (216 mm) x H: 1.85 in (47 mm) x D: 8.62 in (219 mm). Height includes rubber feet. Height without feet shall be 1.66 in (42 mm). Weight shall be 4.4 lb (2 kg). The AC inlet shall be a powerCON 20 locking connector to prevent unwanted power disconnections.

The external power supply shall be the Meyer Sound MPS-482HP.