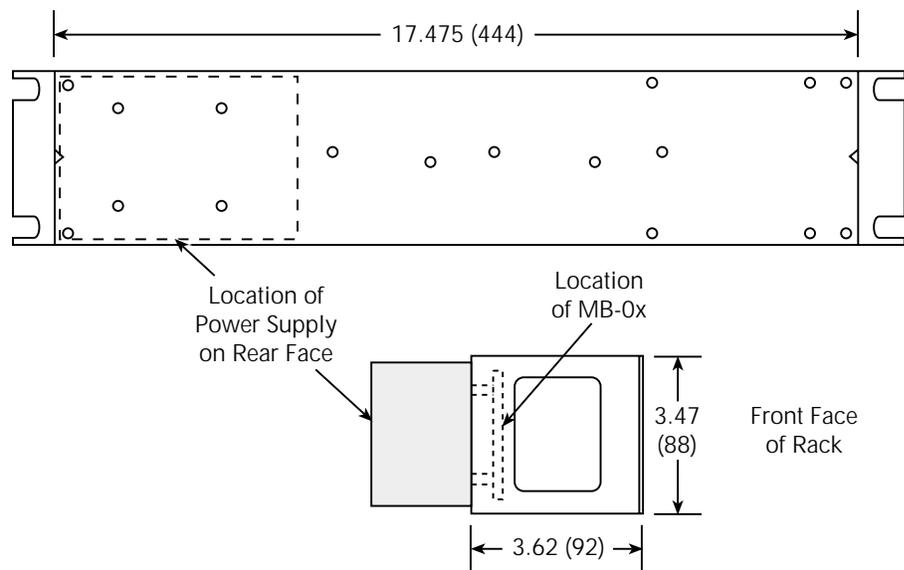


The PWR-55B is a Volt linear regulated supply intended for use with one MB-01, MB-02, or MB-05 series backplane. Compared to the PWR-55A (a switching power supply), it provides lower noise and ripple on its output and is suitable for more sensitive measurement requirements.

## Installation

The recommended method of installation follows. Alternate methods of installation may provide equally acceptable results, but are at the user's own risk.

1. The power supply can only be used in dry areas. The supply is designed to be integrated into a larger device that prevents access to the main power connection terminals so that users are unlikely to contact them during use. The preferred method is to mount the MB backplane in a 19 inch equipment rack using the RMT-MBBP adapter, with the supply mounted on the back face of the RMT-MBBP.



**NOTE** The power supply mounting holes are threaded for 8-32 machine screws. Maximum incursion of screws into mounting holes is 5/16 in. (0.312 in.). It may be necessary to drill additional mounting holes in the RMT-MBBP.

2. Make the following connections to the power supply, running the wires so that they will not be pinched or chafed during equipment use:

#### Connections to the MB-0x backplane

Minimum wire specifications: 14 AWG, 150v insulation.

OUT+	to +5 VDC terminal	Preferred color: Red
OUT-	to PWR COM or - terminal	Preferred color: Black

#### Connections to power source (105-125 VAC, 50-400Hz)

Minimum wire specifications: 18 AWG, 600v insulation.

L AC	LINE (live) side of the AC power	Black
N AC	NEUTRAL (grounded) side of the AC power	White
(GRND) ⊕	PROTECTIVE GROUND of the AC power	Green with yellow tracer

**NOTE** *Use of a switched source of power is recommended so that the power supply can be electrically disconnected when not in use.*

3. Ensure that there is sufficient airflow for the supply not to become overheated. Space at least one inch away from surrounding objects and allow at least 3/16 in. clearance around perforated ventilation openings.

**NOTE** *The supply is rated to drive up to 16 of the MB modules with the highest current draw even at maximum operating temperature, so typical users will have no problems as long as air can circulate.*

4. Use the supply with only one MB rack and no additional 5 volt loads. Doing so may exceed the power supply's rating or introduce additional noise into your measurements.

## Usage

The AC power to the supply may be turned on either simultaneously with or subsequently to the power of the computer system containing the device that the MB modules are connected to.

**WARNING** **To prevent electric shock, mains connections must be arranged to prevent operator access. The panels and doors of the rack must be closed and locked. The power supply must be mounted in locations free from the chance of liquid spill or splash; the unit must be kept dry. Protective ground of the power supply must be connected to a safety ground capable of carrying entire fault current.**

**Installations should follow the requirements of the "National Electric Code (NFPA-70) or other applicable national standards.**

**It is the responsibility of the installer to make sure the installation is safe and all codes are followed.**