

APPLICATION NOTE 700195D IMU MOUNTING OPTIONS

The Integrated Modular Unit (IMU) series of Weld Controls are designed for use in retrofit situations or in new/custom designs. Customers are free to place one or more of these units in existing enclosures or new designs as requirements demand. **To make the IMU even more flexible, the rear chassis can be rotated 180°.** If the IMU as supplied cannot be oriented so that the Terminal Strip/Firing PCB, Voltage Programming Terminal Strip and fuse holder can be accessed directly, the chassis can be inverted (turned upside down) to provide access as shown in Figure 1. Before installing the IMU in an enclosure, determine whether or not the chassis needs to be flipped. If rotation of the chassis is required, follow the instructions below.

1. Unplug the J2, J3, Weld light and Power light terminal connections, mark the wires for reconnection later.
2. Remove and retain the four 6-32 nuts and split lock washers that attach the IMU mounting brackets to the Dial Plate.
3. Rotate the IMU chassis 180° on its long axis and remount the brackets to the studs on the Dial Plate (see Figure 1).
4. Extend the J2 and Power light harnesses from their tied-back positions and reconnect all the connections removed above.

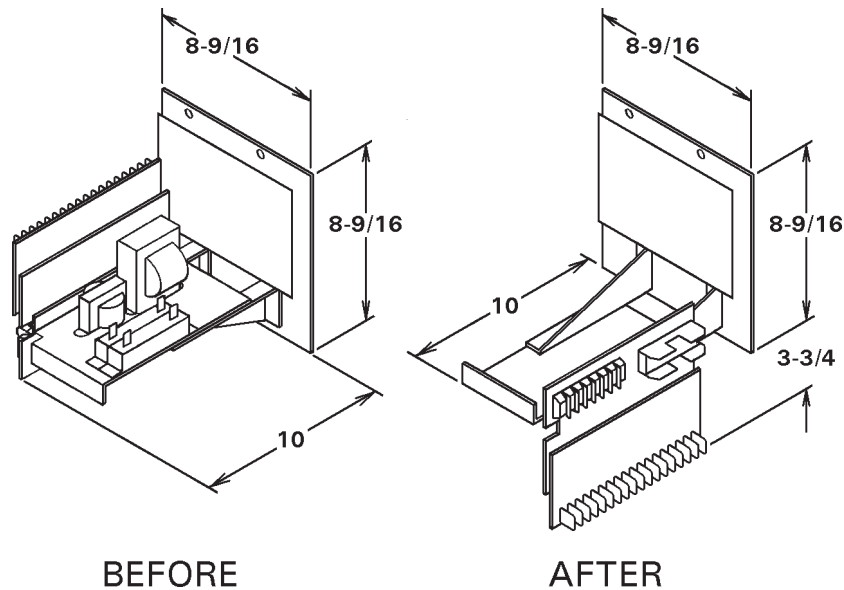


Figure 1.

NOTICE

The standard IMU configuration on the left does not require as much clearance space below the Dial Plate mounting as the new configuration on the right.

To install the IMU Control:

1. Modify enclosure to accept the IMU per Figure 2.
2. Mount the IMU Assembly to the enclosure using the four (4) black 6-32 x 1/4 screws supplied in the poly bag which has been taped to the bottom of the IMU.
3. Place the supplied precautionary labels on the interior or exterior of the enclosure as indicated:
 - a. “Danger, Hazardous Voltage from One or More Sources...” Label (P/N 460142)
Should be placed on the interior of enclosure near points of exposed hazardous voltage.
 - b. “Danger, Voltage and Flash Hazard” Label (P/N 460143)
Should be placed near the fuse.
 - c. “Danger...Earth Ground” Label (P/N 460144)
Should be placed near the customer connection to Earth Ground.
 - d. “Caution, Water Hose Burst Hazard” Label (P/N 460145)
Should be placed on the exterior of the enclosure for water cooled contactors.
 - e. “Warning , Hazardous Voltage from One or More Sources...” Label (P/N 460146)
Should be placed on the exterior of the enclosure.
 - f. “Caution, Do Not Pinch Wires...” Label (P/N 460170)
Should be placed on the interior of the enclosure.
4. Complete hook-up of wiring to control per Wiring Diagram. See the USED ON section below for Wiring Diagram Part Numbers.

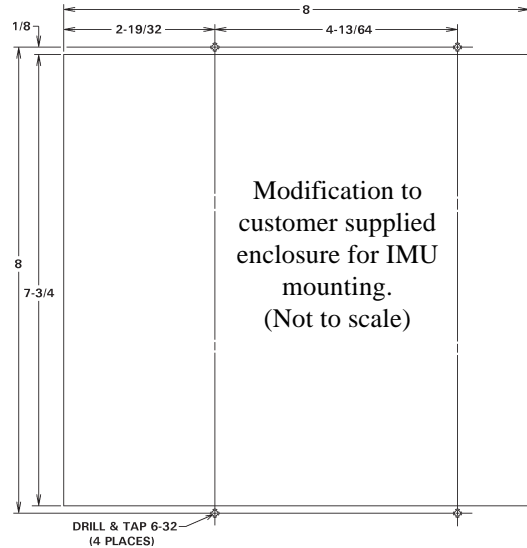


Figure 2.

Poly bag taped to bottom of IMU includes:

- 4 Ea. 6-32 x 1/4 PHSMS, Phil, Black P/N 557004
- 4 Ea. 6-32 x 1/4 AF Hex Nut P/N 557018
- 1 Ea. Label, “Danger, Hazardous Voltage...” P/N 460142
- 1 Ea. Label, “Danger, Voltage and Flash Hazard” P/N 460143
- 1 Ea. Label, “Danger...Earth Ground” P/N 460144
- 1 Ea. Label, “Caution, Water Hose Burst Hazard” P/N 460145
- 1 Ea. Label, “Warning , Hazardous Voltage...” P/N 460146
- 1 Ea. Label, “Caution, Do Not Pinch Wires...” P/N 460170
- 1 Ea, Resistor, Power, 2000 Ohm, 10W (For 575V) P/N 600048
- 1 Ea, Jumper, TS1, 380 VAC Controls P/N 325225

When control is wired for either 230/460/575 VAC Operation, add quantity one (1) TS1 label P/N 460201 for 380 VAC Operation.

When control is wired for 380 VAC Operation, add quantity one (1) TS1 label P/N 460105 for 230/460/575 VAC Operation.

USED ON:

- EN1001-IMU (SCR) Wiring Diagram 421423
- EN1001-IMU/485 (SCR) Wiring Diagram 421423-002
- EN1001/VS-IMU (SCR) Wiring Diagram 421423-003
- EN1000-IMU (SCR) Wiring Diagram 421424