

Instr. No. 2650-382G

INSTALLATION INSTRUCTIONS

2⁵/₈" ELECTRICAL GAUGES

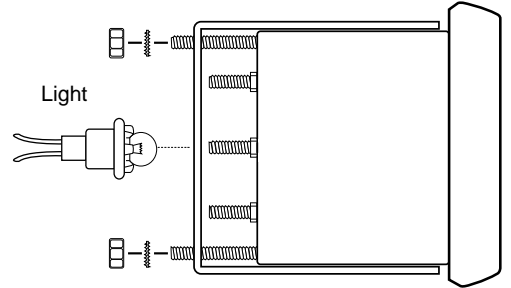


CAUTION! As a safety precaution, the +12 V terminal of this product should be fused before connecting it to the 12V ignition switch. We recommend using a 4 Amp, 3 AG fast-acting type cartridge fuse (Littlefuse® #312 004 or an equivalent).

Mounting

These gauges can be mounted in-dash or in Auto Meter mounting panels (2⁵/₈" dia. hole for 2⁵/₈" gauges). Fasten with brackets supplied as shown. (Hookup wire is required.) To assure this instrument functions properly, please read instructions thoroughly before installing.

NOTE: Some late model vehicles use electronic pressure and temperature sensors for engine control functions. Before removing the original sensor, we recommend that you contact your automotive dealer to be sure no critical functions will be disrupted. With pressure gauges it is beneficial to add a T-fitting to install your new gauge and to keep the warning light operational. This allows you to monitor the pressure and still have a warning light to indicate emergency conditions.

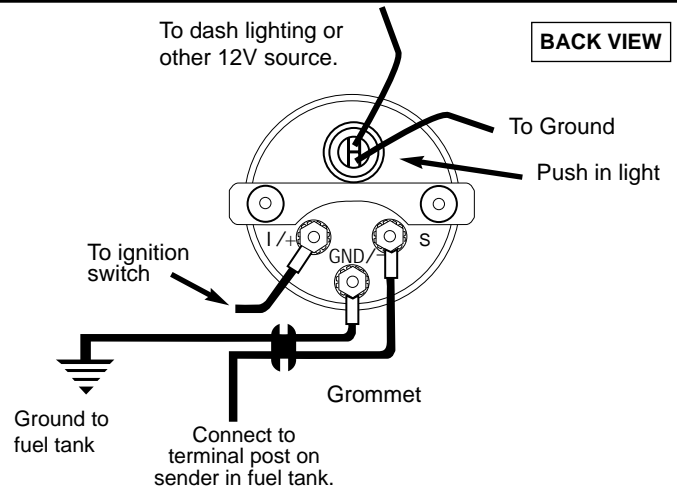


BOTTOM VIEW

Fuel Level

Disconnect negative battery cable when wiring and reconnect to check reading.

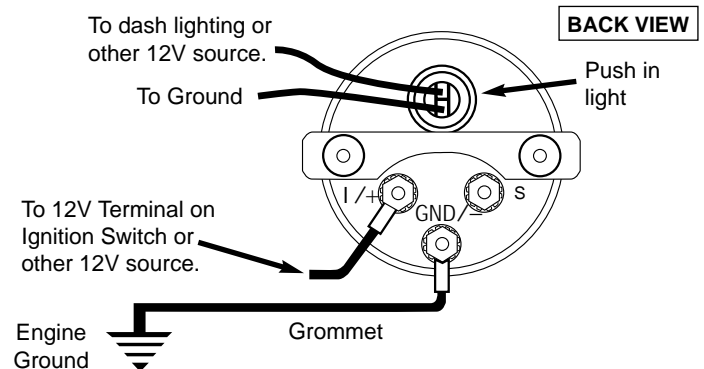
1. Disconnect negative (-) battery cable.
 2. Existing wires may be used, or route proper length of 18 gauge, 2 conductor wire from fuel tank to gauge. Connect one end to terminal post on fuel level sender and opposite end to sender (S) terminal on gauge.
 3. Connect wire from center gauge terminal [GND(-)] to fuel tank ground.
 4. Connect wire from ignition switch to positive I (+) terminal on gauge.
- CAUTION: Be careful not to touch ignition wire to the sender (S) terminal on back of gauge or the sender will be damaged.**
5. Install the light in the socket on the rear of the gauge and connect one wire to the dash lighting circuit or other 12V power source. Connect the other wire to ground.
 6. Reconnect negative (-) battery cable.



For use with:	Sender Resistance (Ohms)	
	Full	Empty
Most GM vehicles 1965 to present	90	0
Most Ford & Chrysler vehicles	10	73
3262 fuel level sender	33	240
Most GM vehicles before 1965	30	0
Most Ford vehicles '87 to present	158	16

Voltmeter

1. Disconnect negative (-) battery cable.
2. Using 18 gauge wire (Auto Meter wire kit no. 2217 is recommended), route one length through firewall using grommet. Attach one end to the [GND(-)] terminal on back of gauge, and the opposite end to a good engine ground.
3. Attach one length of wire to the positive I (+) terminal on back of gauge and opposite end to 12V terminal on ignition switch or other 12V power source.
4. Install the light in the socket on the rear of the gauge and connect one wire to the dash lighting circuit or other 12V power source. Connect the other wire to ground.
5. Reconnect negative (-) battery cable.



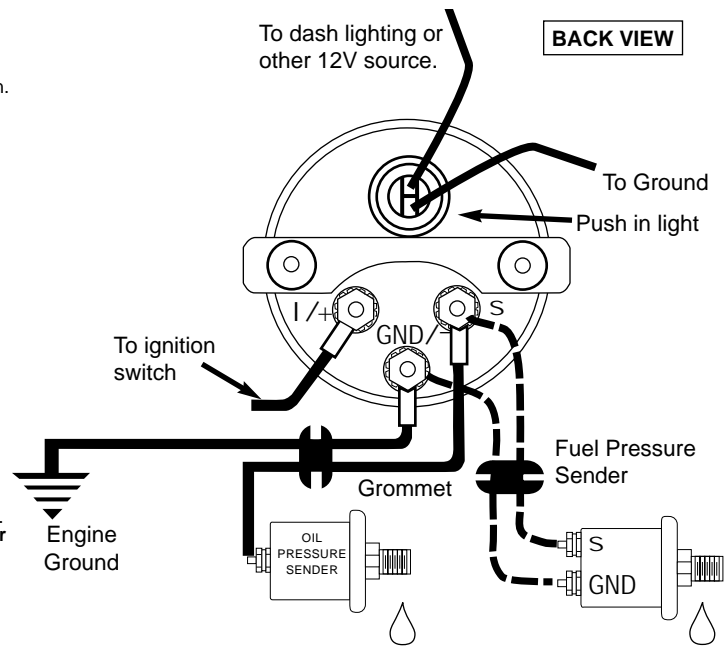
*** NOTE: 4591** does not have a light. The glow in the dark coating on the dial may turn gray if exposed to direct sunlight for extended periods of time. When the car is not being used and will be in direct sunlight for long periods of time, place the provided red plastic cover on the gauge.

See other side for **Pressure & Temperature Gauges**, and Service/Warranty information.

Pressure Gauges

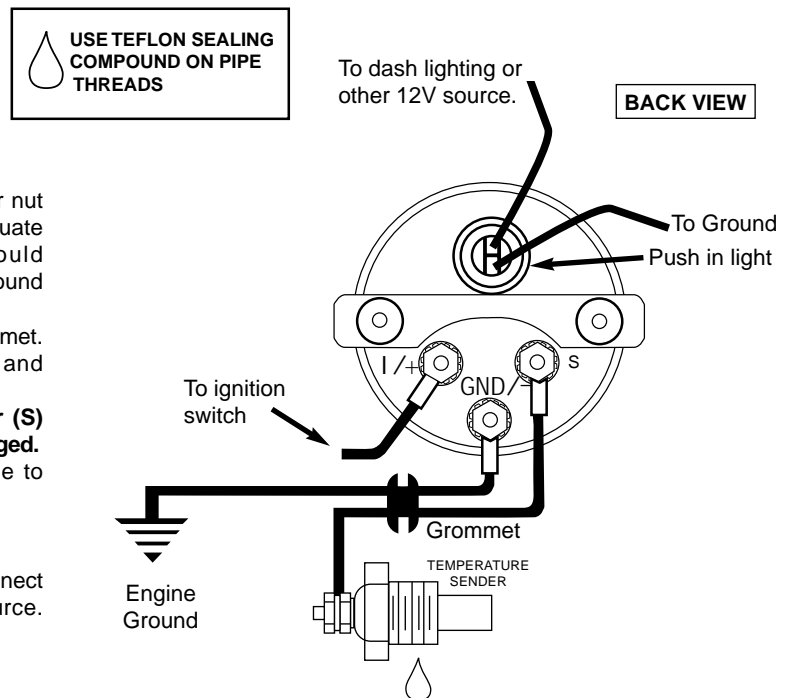
1. Disconnect negative (-) battery cable.
2. When installing fuel pressure sender, an adapter may be required for your specific application. The following pieces are offered from Auto Meter:
 - Model number 2276 (M12 banjo bolt to 1/8" NPT female) - fits most Import app.
 - Model number 3275 (1/16" NPT male to -4 AN male) - fits most Ford app.
 - Model number 3280 (1/16" NPT male to 1/8" NPT female) - fits most Ford app.

NOTE: If your vehicle is not listed here, or you have questions as to what type of connections need to be made, please contact Auto Meter for more information before continuing with installation.
3. Install sender into pressure port of appropriate type. **If unit is to be installed on a high vibration application such as a full race engine or engine capable of high RPM, it is strongly recommended that the sender be remote mounted to either the fenderwell or firewall, to insulate from vibration. Failure to remote-locate pressure senders on such an application could result in gauge failure and potential damage to vehicle and/or operator injury.** Braided stainless steel lines are sold separately by Auto Meter, and can be used to accomplish this. Sender features 1/8" NPT male fitting and comes with 1/4" NPT adapter. Sender should automatically be grounded when installed. If not, or if remote relocation of sender is required, a ground connection to sender "body" may need to be made.
4. Route 18-gauge twin conductor wire through firewall using grommet. Connect one end to terminal post on pressure sender, and opposite end to sender (S) terminal on back of gauge. **CAUTION: Be careful not to touch ignition wire to the sender (S) terminal on back of gauge or the sender may be damaged.**
5. Connect wire from center terminal GND (-) on back of gauge to good engine ground near sender.
6. Connect wire from ignition switch to ignition I (+) terminal on back of gauge.
7. Install the light in the socket on the rear of the gauge and connect one wire to the dash lighting circuit or other 12V power source. Connect the other wire to ground.
8. Reconnect negative (-) battery cable.



Temperature Gauges

1. Disconnect negative (-) battery cable.
2. Install temperature sender.
 - A. Water Temp: Install temperature sender (included.)
 - B. Oil & Trans. Temp: Hole may have to be drilled and adaptor nut (included) welded or brazed in pan. Be sure there is adequate internal clearance for nut and sender. Sender should automatically be grounded when installed. If not, proper ground connections should be made.
3. Route 18-gauge twin conductor wire through firewall using grommet. Connect one end to terminal post on temperature sender, and opposite end to sender (S) terminal on back of gauge. **CAUTION: Be careful not to touch ignition wire to the sender (S) terminal on back of gauge or the sender may be damaged.**
4. Connect wire from center terminal GND (-) on back of gauge to good engine ground near sender.
5. Connect wire from ignition switch to ignition I (+) terminal on back of gauge.
6. Install the light in the socket on the rear of the gauge and connect one wire to the dash lighting circuit or other 12V power source. Connect the other wire to ground.
7. Reconnect negative (-) battery cable.



SERVICE

For service send your product to Auto Meter in a well packed shipping carton. Please include a note explaining what the problem is along with your phone number. Please specify when you need the product back. If you need it back immediately mark the outside of the box "RUSH REPAIR," and Auto Meter will service product within two days after receiving it. (\$10.00 charge will be added to the cost of "RUSH REPAIR.") If you are sending product back for Warranty adjustment, you must include a copy (or original) of your sales receipt from the place of purchase.

12 MONTH LIMITED WARRANTY

The manufacturer warrants to the consumer that this product will be free from defects in materials and workmanship for a period of twelve (12) months from the date of the original purchase. Products that fail within this 12 month warranty period will be repaired or replaced at the manufacturer's option to the consumer, when determined by the manufacturer that the product failed because of defects in material or workmanship. This warranty is limited to the repair or replacement of parts in the instrument and the necessary labor done by the manufacturer to affect the repair or replacement of the instrument. In no event shall this warranty exceed the original purchase price of the instrument, nor shall the manufacturer be responsible for special, incidental or consequential damages or costs incurred due to failure of this product. Warranty claims to the manufacturer must be transportation prepaid and accompanied with dated proof of purchase. This warranty applies only to the original purchaser of product and is non-transferable. All implied warranties shall be limited in duration to the said 12 month warranty period. Breaking the instrument seal, improper use or installation, accident, water damage, abuse, unauthorized repairs or alterations voids this warranty. The manufacturer disclaims any liability for consequential damages due to breach of any written or implied warranty on all products made by the manufacturer.

FOR SERVICE SEND TO: **AUTO METER PRODUCTS, INC.** 413 W. Elm St., Sycamore, IL 60178 (815) 895-8141