

## Grounding

One of the major causes of electronic gauge malfunction is the senders are not grounded properly. Do not use Teflon tape on threads of sender or adapter bushings. Most temperature senders are a brass alloy which is softer than the metal of engine blocks or heads. There should not be any sealing issues if the threads are clean and of the proper size and tread pitch. It is best to use Teflon Sealer in paste form. (\*\***Do not over tighten the sender or reducer bushing trying to stop a leak.**\*\*)  
Be sure the threads are clean and in good shape before installing the sender. Gauge manufactures supply brass alloy or aluminum reducer bushings and not the metal ones sold at hardware stores. The brass or aluminum adapters can be bought at most auto parts stores also. Many are offered with metric threads to the standard NPT threads that most manufactures in the U.S. use.

Be sure all electrical connections are tight and clean. In some instances sender and gauges grounds should be connected together in a common grounding spot. If you are using a manifold to hold your sender and it is in a rubber hose, manifold or adapter must grounded as rubber will not transmit electric. If using a fiberglass body or dash panel the gauges must be grounded properly.

I have seen many fuel tanks not properly grounded, thus the fuel level gauge does not work or gives an erratic reading. Be sure fuel sender is also grounded properly.

If you are having gauge problems not working or giving erratic readings the first thing to check is the grounding of the sender and gauge. VOM meters can be picked up at a small cost from many discount stores and work well in most simple automotive trouble shooting problems.