

Replacing the Cheap POS Plastic Temp-Sensor Holder

Posted on the Guzzitech.com forum by Greg Field: June 19, 2006:

I've been getting pretty shitty mileage lately, so I decided to see if the temp sensor was actually making contact with the metal base of the plastic sensor holder. (If it doesn't make contact, it will never read the temp accurately.)

So, I put a wrench on the holder and attempted to take it off the head. It just crumbled when I twisted the wrench. What a cheap POS!

Fortunately, I had the solid-brass replacement in waiting.

Pic 01:

This photo shows the crumbled plastic holder, the sensor, and the replacement brass holder.

The next challenge was getting the metal base out of the head. Its hex portion was actually recessed into the head casting. To get it out, I had to grind the tip and side of a 15-mm deep-well socket. It was really in there, glued on with some type of loctite.



Pic 02:

Then, I did a trial fitting after smearing the sensor with anti-seize to leave witness marks as evidence that it had bottomed out in the holder. No surprise, it didn't bottom out, and there was no way to make it bottom out without a lot of milling work. Instead, I cheated, and filled the recess with anti-seize, which should do a good job of transferring heat between the holder and sensor.

It seemed to me that the system would work best if it transferred heat between the holder and sensor, without the holder radiating too much heat away from the sensor, so I decided to insulate the holder with several layer of duct tape, as shown in the next picture.



Pic 03:

Then, I ant-seized the threads of the holder, and cinched it tight into the cylinder head. We'll see if it does anything positive other than getting rid of the cheap POS sensor holder . . .

