

STAR ONLINE PUBLICATION

Case Number: S2025000004

Release Date: 04/28/2020

Symptom/Vehicle Issue: Customer complains of the MIL lamp on. Technician observes DTC P0456 EVAP System Small Leak or P0455 EVAP System Large Leak detected set in PCM.

Discussion: When performing the analysis for P0456 and P0455, need to run the wiTECH SLVT. After a confirmation of leakage is detected during the wiTECH SLVT, perform the EVAP Small Leak Verification test using the EELD 8404C smoke/air machine. When performing the wiTECH SLVT or using the EELD smoke/air machine do not remove the original gas cap for determining if an EVAP leakage is occurring. Using the EELD 8404 Accessory Tool shown in figure 1 in place of the gas cap could mask the EVAP leakage due to size of o-ring on the Accessory Tool.



Fig. 1

This document does not authorize warranty repairs. This communication documents a record of past experiences. STAR Online does not provide any conclusions about what is wrong with the vehicle. Rather, it captures all previous cases known that appear to be similar or related to the vehicle symptom / condition. You are the expert, and you are responsible for deciding on the appropriate course of action.

Contact STAR Center, or your Technical Assistance Center Via TechCONNECT or eCONTACT ticket if no solution is found

STAR ONLINE PUBLICATION

By using the EELD 8404 Accessory Tool shown in figure 1, the leakage was not detected from the Fuel Filler Tube with a gouge in the sealing area of the Gas Cap, as shown in Figure 2.



Fig. 2

Follow the Service Diagnostics for P0456 and P0455 to properly analyze the leak. For determining if the leakage is occurring in the gas cap area follow the directions in the *FUEL TANK SIDE EVAPORATIVE EMISSION LEAK DETECTION* section by setting the smoke switch on and connecting to the canister tube.

If leakage is detected in the gas cap – fuel filler tube area, check for proper tightness of the gas cap. If the gas cap was properly tightened, then remove the gas cap and check for a damaged o-ring or misplaced o-ring. Also, check for gouging or paint chips in the sealing area of the fuel filler tube that could lead to EVAP leakage.

This document does not authorize warranty repairs. This communication documents a record of past experiences. STAR Online does not provide any conclusions about what is wrong with the vehicle. Rather, it captures all previous cases known that appear to be similar or related to the vehicle symptom / condition. You are the expert, and you are responsible for deciding on the appropriate course of action.

Contact STAR Center, or your Technical Assistance Center Via TechCONNECT or eCONTACT ticket if no solution is found