4T40/45E, 4T65E

New PSM Code P0843

P0843 has been introduced as a new TCC pressure switch code. P0843 will set if the following criteria are met:

- No MAP, TCC Slip, ISS, or TCC electrical DTC's are set
- TFT is between 68-266°F (20-130°C)
- Engine torque is greater than 37 lb ft. (50 Nm)
- TCC is commanded "ON"
- TCC slip indicates the TCC is applied
- The TCC release switch indicates the TCC is "Released"
- The following conditions are present for longer than 6 seconds

If a P0843 is set the PCM will,

- command the TCC OFF.
- freeze the shift adapts.
- inhibited 4th gear in Hot Mode.

To identify the cause of the concern, clear the DTC. Operate the vehicle in 4th gear with the TCC applied and observe the TCC Release Switch status with your scan tool. The release switch should indicate the TCC is applied by displaying "NO" for the TCC release switch parameter on your scan tool. If the release switch displays "YES" on your scan tool when TCC is commanded on, you will need to check the switch and its electrical circuit for proper operation.

4T40/45E, 4T65E New PSM Code P0843 (continued)

TCC release switch indicates "YES" when the TCC is commanded "ON"

- 1. Key ON, Engine OFF, monitor the TCC release switch with your scan tool. The TCC release switch should now read "NO".
- 2. If it continues to read "YES" proceed to step 3. If the TCC release switch now reads "NO", proceed to step 4.
- 3. Unplug the transmission electrical connector with the key "ON", engine "OFF". Jump the TCC release switch circuit to ground on the engine harness side of the transmission connector (pin "U" CKT 657). If the scanner continues to display YES you will need to check for an open between the TCM pin "9" (CKT 657) and pin "U" (CKT 657) of the engine side of the transmission electrical connector. With circuit 657 grounded, if the TCC release switch displays NO, check for an open with an ohm meter between the TCC release switch pin "D" (CKT 1804) (Located in the PSM) and the transmission case connector pin "U" (CKT 1804). If the wiring tests good, with your ohm meter check from pin "D" of the PSM to the metal body of the PSM. You should have full continuity. If the resistance does not indicate continuity replace the switch. This process will help isolate if the problem exists in the wiring for the TCC release switch or in the switch itself.
- 4. If the switch and its circuits indicate that a problem is not present inspect the following:
- TCC Seal
- Debris blocking the channel plate TCC release passage
- · Leak in the oil pump seal or the seal/bearing was installed backwards
- Misaligned or restricted valve body or channel plate gasket
- Turbine shaft or sprocket seal damaged
- #1 Check ball (4T65E Only)

NOTE: As noted above some failures may result in a TCC partial applying with some of the apply oil venting into the TCC release switch passage resulting in the DTC being set.

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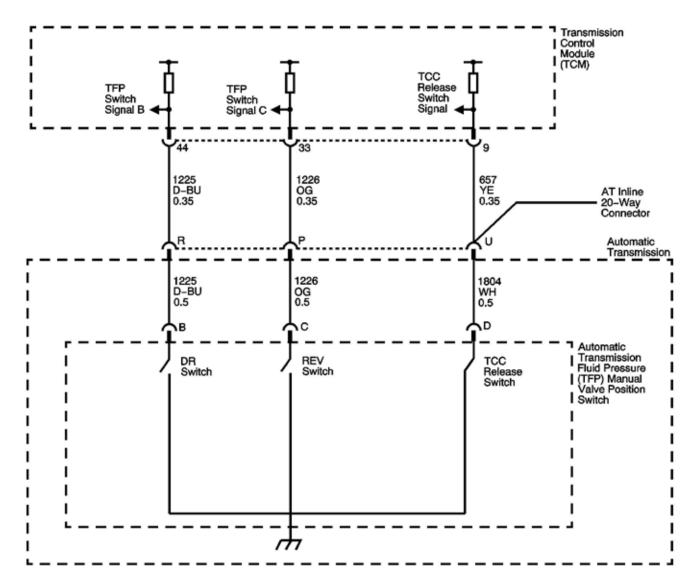
New PSM Code P0843 (continued)

When testing the systems, note the 4T40/45E has a three switch PSM and the 4T65E has only one. The wiring below is an example of a 4T40/45E PSM.

When you jumper the TCC release switch circuit to ground on the engine harness side of the transmission connector, the locations are always pin "9" at the TCM and pin "U" at the transmission.

Pin "9" to Pin "U" Yellow 4T40/45E Pin "9" to Pin "U" White 4T65E

NOTE: Wire colors may vary always go by pin location.



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