Taurus 3.7L, Transit 3.7L, Transit Connect 2.5L			
E-Series 5.4L	190-PIN	B30, B67, B68 B38	VPWR PCMRC
Edge 3.5L, F-150 TiVCT 3.5L, F-150 5.0L, Mustang 3.7L, Mustang 5.0L	198 PIN	B97, B99 B20	VPWR PCMRC
Explorer 2.0L	154 PIN	B5, B6 B27	VPWR PCMRC
Fiesta TiVCT 1.6L	128 PIN	B11, B12, E13, E37 B1	VPWR PCMRC
All other vehicles	198 PIN	B101, B102, B103 B58	VPWR PCMRC

PINPOINT TEST QE: ELECTRONIC THROTTLE CONTROL (ETC) SYSTEM > TEST PROCEDURE

QE1 CHECK FOR DTCS

NOTE: For DTC P061B, make sure the air cleaner and air inlet are correctly seated and correctly installed before continuing diagnosis.

Are any DTCs present other than the following: P0600, P060A, P060B, P060C, P060D, P061A, P061B, P061C, P061D, P061F, P062B, P062C, P1674, P2105, or U0300?

Yes	No
RETURN to SYMPTOM CHARTS for further direction.	For DTCs P0600, P060A or U0300, GO to **QE2** . For DTC P060B, GO to QE4. For DTC P061B, GO to QE11. For DTC P061C, GO to QE6. For DTC P061F, GO to QE8. For DTC P062B, GO to QE5. For DTCs P062C or P2105, GO to QE9. For all others, GO to QE3.

QE2 CHECK THE PCM VOLTAGE CIRCUITS FOR AN OPEN

Ignition OFF.

PCM connector disconnected.

Connect a 5 amp fused jumper wire between the following:

Point A PCM Connector, Harness Side	Point B
PCMRC	Ground

Ignition ON, engine OFF.

Measure the voltage between:

(+) PCM Connector, Harness Side	(-)
VPWR	Ground

Is the voltage greater than 10.5 V?

Yes	No
GO to **QE3** .	REPAIR the open circuit. Clear the PCM DTCs. REPEAT the self-test.

QE3 CHECK THE PCM FOR THE LATEST CALIBRATION

Ignition OFF.

Remove the jumper wire(s).

PCM connector connected.

Program the PCM to the latest calibration.

Ignition OFF.

Ignition ON, engine OFF.

Ignition OFF.

Ignition ON, engine running.

Use the customer information to recreate the concern.

Carry out the PCM self-test.

Are DTCs P0600, P060A, P060C, P060D, P061A, P061D, P1674 or U0300 present?

Yes	No
GO to QE15.	The concern is not present at this time.

QE4 CHECK FOR REFERENCE VOLTAGE CONCERNS

Inspect the PCM harness for damage.

Verify the correct operation of the sensors using ETCREF, VREF and related circuits.
GO to PINPOINT TEST C and follow the pinpoint test direction.

Is a concern present?

Yes	No
REPAIR as necessary. Clear the PCM DTCs. REPEAT the self-test.	GO to **QE5** .

QE5 CHECK FOR AN INTERMITTENT CONCERN

Clear the PCM DTCs.

Carry out the PCM KOER self-test.

Are DTCs P060B or P062B present?

Yes	No
GO to QE15.	The concern is not present at this time.

QE6 CHECK THE CRANKSHAFT POSITION (CKP) SENSOR FOR CORRECT OPERATION

Verify correct operation of the CKP sensor and related circuits. GO to PINPOINT TEST JD and follow the pinpoint test direction.

Is a concern present?

Yes	No
REPAIR as necessary. Clear the PCM DTCs. REPEAT the self-test.	GO to **QE7** .

QE7 CHECK THE CAMSHAFT POSITION (CMP) SENSOR FOR CORRECT OPERATION

Verify correct operation of the CMP sensor and related circuits. GO to PINPOINT TEST DR and follow the pinpoint test direction.

Is a concern present?

Yes	No
REPAIR as necessary. Clear the PCM DTCs. REPEAT the self-test.	GO to **QE8** .

QE8 VERIFY THE CUSTOMER CONCERN

Clear the PCM DTCs.

Use the customer information to recreate the concern.

Carry out the PCM self-test.

Are DTCs P061C or P061F present?

Yes	No

GO to QE15.	The concern is not present at this time.

QE9 CHECK FOR DTCS IN OTHER VEHICLE MODULES

Check for self-test DTCs in all of the vehicle modules.

Are any DTCs present?

Yes	No
REFER to the applicable service information to DIAGNOSE the DTC.	GO to **QE10** .

QE10 CHECK FOR THE PRESENCE OF ANY MODULE COMMUNICATION CONCERNS

Check for self-test DTCs in all of the vehicle modules.

Are any communication concerns or communication DTCs present?

Yes	No
For communication concerns in the PCM, DISREGARD the current diagnostic trouble code (DTC) at this time. DIAGNOSE the next DTC. GO to DIAGNOSTIC TROUBLE CODE (DTC) CHARTS AND DESCRIPTIONS . For communication concerns in other modules, REFER to the applicable service information to DIAGNOSE the communication DTC.	For DTC P062C, GO to QE14. For all others, GO to **QE11** .

QE11 CHECK FOR THE PRESENCE OF PCM DTCS

NOTE: An intermittent CKP sensor or harness concern may cause DTC P061B to set. Check for intermittent CKP sensor and harness concerns.

NOTE: P2105 may be set in combination with other DTCs.

Clear the PCM DTCs.

Check for self-test DTCs.

Are any DTCs present other than P061B or P2105?

Yes	No
DISREGARD the current diagnostic trouble code (DTC) at this time. DIAGNOSE the next DTC. GO to DIAGNOSTIC TROUBLE CODE (DTC) CHARTS AND DESCRIPTIONS .	For DTC P061B, GO to QE13. For all others, GO to **QE12** .

QE12 CARRY OUT A VISUAL INSPECTION

Ignition OFF.

Visually inspect the following for obvious signs of damage:

ETB

PCM

Check the harness for routing, alterations, incorrect shielding, or electrical interference from other systems. Make sure aftermarket wiring is not routed near the PCM.

Verify aftermarket equipment does not generate radio frequency interference or electromagnetic interference.

Is a concern present?

Yes	No
ISOLATE the concern and REPAIR as necessary. Clear the PCM DTCs. REPEAT the self-test.	GO to QE15.

QE13 CHECK FOR MASS AIRFLOW (MAF) AND THROTTLE POSITION (TP) SENSOR CORRELATION CONCERNS

NOTE: For a MAF and TP sensor correlation concern DTC P061B may set before DTC P0068 sets.

Check for a MAF and TP sensor correlation concern. GO to PINPOINT TEST DV and follow the pinpoint test direction for DTC P0068.

Is a concern present?

Yes	No
REPAIR as necessary. Clear the PCM DTCs. REPEAT the self-test.	CHECK for an intermittent concern with an ETC related harness or sensor. GO to PINPOINT TEST Z .

QE14 CHECK FOR ANTILOCK BRAKING SYSTEM (ABS) AND WHEEL SPEED SENSOR CONCERNS

Ignition ON, engine running.

Access the PCM and monitor the VSS (SPD) PID.

Access the ABS and monitor the LF_WSPD (SPD), LR_WSPD (SPD), RF_WSPD (SPD) and RR_WSPD (SPD) PIDs.

Road test the vehicle under various load conditions while comparing the PIDs. Check for signals that are intermittent or do not correspond.

Do the PID values correspond with the vehicle operating conditions?

Yes	No