

# Your Ultimate Source for OEM Repair Manuals

FactoryManuals.net is a great resource for anyone who wants to save money on repairs by doing their own work. The manuals provide detailed instructions and diagrams that make it easy to understand how to fix a vehicle.

2011 FORD Taurus SHO OEM Service and Repair Workshop Manual

Go to manual page

## Climate Control System - Vehicles With: Dual Automatic Temperature Control (DATC)

412-00 Climate Control System - General Information	2022 F-150
Diagnosis and Testing	Procedure revision date: 11/14/2022

Climate Control System - Vehicles With: Dual Automatic Temperature Control (DATC)

#### Diagnostic Trouble Code (DTC) Chart

Diagnostics in this manual assume a certain skill level and knowledge of Ford-specific diagnostic practices.

REFER to: Diagnostic Methods

(100-00 General Information, Description and Operation).

#### **Diagnostic Trouble Code Chart**

Module	DTC (diagnostic trouble code)	Description	Action
ACCM (air conditioning control module)	B11EE:19	A/C Compressor: Circuit Current Above Threshold	GO to Pinpoint Test X
ACCM (air conditioning control module)	B11EE:41	A/C Compressor: General Checksum Failure	GO to Pinpoint Test AL
ACCM (air conditioning control module)	B11EE:4B	A/C Compressor: Over Temperature	GO to Pinpoint Test X
ACCM (air conditioning control module)	B11EE:92	A/C Compressor: Performance or Incorrect Operation	GO to Pinpoint

ACCM (air conditioning control module)	U3000:49	Control Module: Internal Electronic Failure	GO to Pinpoint Test AL
BCMC (body control module C)	P0EE3:00	A/C Refrigerant Distribution Valve "B" Control Circuit/Open: No Sub Type Information	GO to Pinpoint Test Z
BCMC (body control module C)	P0EE4:00	A/C Refrigerant Distribution Valve "B" Control Circuit Low: No Sub Type Information	GO to Pinpoint Test Z
BCMC (body control module C)	P0EE5:00	A/C Refrigerant Distribution Valve "B" Control Circuit High: No Sub Type Information	GO to Pinpoint Test Z
BCMC (body control module C)	P2611:00	A/C Refrigerant Distribution Valve "A" Control Circuit/Open: No Sub Type Information	GO to Pinpoint Test Y
BCMC (body control module C)	P2612:00	A/C Refrigerant Distribution Valve "A" Control Circuit Low: No Sub Type Information	GO to Pinpoint Test Y
BCMC (body control module C)	P2613:00	A/C Refrigerant Distribution Valve "A" Control Circuit High: No Sub Type Information	GO to Pinpoint Test Y
BCMC (body control module C)	P2CFC:00	A/C Clutch Control Circuit: No Sub Type Information	GO to Pinpoint Test C
BCMC (body control module C)	P2CFD:00	A/C Clutch Control Circuit Low: No Sub Type Information	GO to Pinpoint Test C
BCMC (body control module C)	P2CFE:00	A/C Clutch Control Circuit: No Sub Type Information	GO to Pinpoint Test C
HVAC (heating, ventilation and air conditioning)	B1081:07	Left Temperature Damper Motor: Mechanical Failure	GO to Pinpoint Test N

HVAC (heating, ventilation and air conditioning)	B1086:07	Air Distribution Damper Motor: Mechanical Failure	GO to Pinpoint Test E
HVAC (heating, ventilation and air conditioning)	B1086:11	Air Distribution Damper Motor: Circuit Short To Ground	GO to Pinpoint Test E
HVAC (heating, ventilation and air conditioning)	B1086:12	Air Distribution Damper Motor: Circuit Short To Battery	GO to Pinpoint Test E
HVAC (heating, ventilation and air conditioning)	B1086:13	Air Distribution Damper Motor: Circuit Open	GO to Pinpoint Test E
HVAC (heating, ventilation and air conditioning)	B10AF:11	Blower Fan Relay: Circuit Short To Ground	GO to Pinpoint Test P
HVAC (heating, ventilation and air conditioning)	B10AF:12	Blower Fan Relay: Circuit Short To Battery	GO to Pinpoint Test Q
HVAC (heating, ventilation and air conditioning)	B10AF:13	Blower Fan Relay: Circuit Open	GO to Pinpoint Test P
HVAC (heating, ventilation and air conditioning)	B10B3:11	Right Panel Air Discharge Temperature: Circuit Short To Ground	GO to Pinpoint Test R
HVAC (heating, ventilation and air conditioning)	B10B3:15	Right Panel Air Discharge Temperature: Circuit Short To Battery or Open	GO to Pinpoint Test R
HVAC (heating, ventilation and air conditioning)	B10B4:11	Right Floor Air Discharge Temperature: Circuit Short To Ground	GO to Pinpoint Test R
HVAC (heating, ventilation and air conditioning)	B10B4:15	Right Floor Air Discharge Temperature: Circuit Short To Battery or Open	GO to Pinpoint Test R

HVAC (heating, ventilation and air conditioning)	B11E6:15	Right HVAC Damper Position Sensor: Circuit Short To Battery or Open	GO to Pinpoint Test O
HVAC (heating, ventilation and air conditioning)	B11E7:11	Air Distribution Damper Position Sensor: Circuit Short To Ground	GO to Pinpoint Test E
HVAC (heating, ventilation and air conditioning)	B11E7:15	Air Distribution Damper Position Sensor: Circuit Short To Battery or Open	GO to Pinpoint Test E
HVAC (heating, ventilation and air conditioning)	B11F0:11	Air Intake Damper Position Sensor: Circuit Short To Ground	GO to Pinpoint Test D
HVAC (heating, ventilation and air conditioning)	B11F0:15	Air Intake Damper Position Sensor: Circuit Short To Battery or Open	GO to Pinpoint Test D
HVAC (heating, ventilation and air conditioning)	B1A61:11	Cabin Temperature Sensor: Circuit Short To Ground	GO to Pinpoint Test S
HVAC (heating, ventilation and air conditioning)	B1A61:15	Cabin Temperature Sensor: Circuit Short To Battery or Open	GO to Pinpoint Test S
HVAC (heating, ventilation and air conditioning)	B1A63:11	Right Solar Sensor: No Sub Type Information	GO to Pinpoint Test T
HVAC (heating, ventilation and air conditioning)	B1A63:15	Right Solar Sensor: Circuit Short To Battery or Open	GO to Pinpoint Test T
HVAC (heating, ventilation and air conditioning)	B1A64:11	Left Solar Sensor: No Sub Type Information	GO to Pinpoint Test T
HVAC (heating, ventilation and air conditioning)	B1A64:15	Left Solar Sensor: Circuit Short To Battery or Open	GO to Pinpoint Test T

HVAC (heating, ventilation and air conditioning)	U0253:00	Lost Communication With Accessory Protocol Interface Module: No Sub Type Information	GO to Pinpoint Test AG
HVAC (heating, ventilation and air conditioning)	U0401:00	Invalid Data Received from ECM/PCM A: No Sub-Type Information	GO to Pinpoint Test AH
HVAC (heating, ventilation and air conditioning)	U0401:82	Invalid Data Received from ECM/PCM A: Alive / Sequence Counter Incorrect / Not Updated	GO to Pinpoint Test AH
HVAC (heating, ventilation and air conditioning)	U0422:68	Invalid Data Received from Body Control Module: Event Information	GO to Pinpoint Test AH
HVAC (heating, ventilation and air conditioning)	U0422:81	Invalid Data Received from Body Control Module: Invalid Serial Data Received	GO to Pinpoint Test AH
HVAC (heating, ventilation and air conditioning)	U0452:82	Invalid Data Received From Restraints Control Module: Alive/Sequence Counter Incorrect/Not Updated	GO to Pinpoint Test AH
HVAC (heating, ventilation and air conditioning)	U1000:00	Solid State Driver Protection Active -Driver Disabled: No Sub Type Information	GO to Pinpoint Test Al
HVAC (heating, ventilation and air conditioning)	U2024:51	Control Module Cal-Config Data: Not Programmed	GO to Pinpoint Test AK
HVAC (heating, ventilation and air conditioning)	U2100:00	Initial Configuration Not Complete: No Sub Type Information	GO to Pinpoint Test AK
HVAC (heating, ventilation and air conditioning)	U3000:41	Control Module: General Checksum Failure	GO to Pinpoint Test AL
HVAC (heating, ventilation and air conditioning)	U3000:49	Control Module: Internal Electronic Failure	GO to Pinpoint Test AL

PCM (powertrain control module)	P2601:00	Coolant Pump "A" Control Circuit Performance/Stuck Off: No Sub Type Information	GO to Pinpoint Test AJ
PCM (powertrain control module)	P2602:00	Coolant Pump "A" Control Circuit Low: No Sub Type Information	GO to Pinpoint Test AJ
PCM (powertrain control module)	P2603:00	Coolant Pump "A" Control Circuit High: No Sub Type Information	GO to Pinpoint Test AJ
SOBDMC (secondary on- board diagnostic control module C)	P0D6D:00	A/C Compressor Motor Voltage "A" Low: No Sub Type Information	GO to Pinpoint Test X
SOBDMC (secondary on- board diagnostic control module C)	P0D6F:00	A/C Compressor Motor Current High: No Sub Type Information	GO to Pinpoint Test X
SOBDMC (secondary on- board diagnostic control module C)	P0D71:00	A/C Compressor Control Module Internal Temperature Sensor Performance: No Sub Type Information	GO to Pinpoint Test X
SOBDMC (secondary on- board diagnostic control module C)	P0EE3:00	A/C Refrigerant Distribution Valve "B" Control Circuit/Open: No Sub Type Information	GO to Pinpoint Test Z
SOBDMC (secondary on- board diagnostic control module C)	P0EE4:00	A/C Refrigerant Distribution Valve "B" Control Circuit Low: No Sub Type Information	GO to Pinpoint Test Z
SOBDMC (secondary on- board diagnostic control module C)	P0EE5:00	A/C Refrigerant Distribution Valve "B" Control Circuit High: No Sub Type Information	GO to Pinpoint Test Z
SOBDMC (secondary on- board diagnostic control module C)	P2611:00	A/C Refrigerant Distribution Valve "A" Control Circuit/Open: No Sub Type Information	GO to Pinpoint Test Y
SOBDMC (secondary on- board diagnostic control	P2612:00	A/C Refrigerant Distribution Valve "A" Control Circuit Low: No Sub Type Information	GO to Pinpoint

Comfort & Entertainment > Climate Control > Function/Operation > Blows Warm	GO to Pinpoint Test I
Comfort & Entertainment > Climate Control > Function/Operation > Blows Warm	GO to Pinpoint Test L
Comfort & Entertainment > Climate Control > Function/Operation > Blows Warm	GO to Pinpoint Test X
Comfort & Entertainment > Climate Control > Function/Operation > Blows Warm	GO to Pinpoint Test AO
Comfort & Entertainment > Climate Control > Function/Operation > Inoperative	GO to Pinpoint Test P
Comfort & Entertainment > Noise > Climate Control > Always	GO to Pinpoint Test W
Safe & Secure > Smoke/Odor > Underhood > Hot	GO to Pinpoint Test H

#### **Symptom Charts**

#### **Symptom Chart - Climate Control Systems**

#### NOTE

Some Powertrain Control Module (PCM) Diagnostic Trouble Codes (DTCs) may inhibit Air Conditioning (A/C) operation. If any Powertrain Control Module (PCM) Diagnostic Trouble Codes (DTCs) are retrieved, diagnose those first. Refer to the Master Diagnostic Trouble Code (DTC) Chart.

Diagnostics in this manual assume a certain skill level and knowledge of Ford-specific diagnostic practices.

REFER to: Diagnostic Methods

(100-00 General Information, Description and Operation).

Condition	Actions
Externally Controlled Variable Displacement Compressor (EVDC) Performance Check With Or Without DTC (diagnostic trouble code) P06A0	GO to Pinpoint Test G
A Module Does Not Respond To The Diagnostic Scan Tool	REFER to: Controller Area Network (CAN) Module Communications Network(418-00A Controller Area Network (CAN) Module Communications Network, Diagnosis and Testing).
Insufficient Air Conditioning (A/C) Cooling	GO to Pinpoint Test I

Refer to Wiring Diagrams Cell 55for schematic and connector information.

**Normal Operation and Fault Conditions** The A/C (air conditioning) pressure transducer receives a ground from the PCM (powertrain control module). A 5-volt reference voltage is supplied to the A/C (air conditioning) pressure transducer from the PCM (powertrain control module). The A/C (air conditioning) pressure transducer then sends a voltage to the PCM (powertrain control module) to indicate the A/C (air conditioning) pressure. **DTC Fault Trigger Conditions** 

DTC (diagnostic trouble code)	Description	Fault Trigger Condition
PCM (powertrain control module) P0531:00	A/C Refrigerant Pressure Sensor 'A' Circuit Range/Performance: No Sub Type Information	Sets if the pressure sensor falls below or exceeds a minimum or maximum calibrated value for a calibrated period of time.
PCM (powertrain control module) P0532:00	A/C Refrigerant Pressure Sensor 'A' Circuit Low: No Sub Type Information	Sets if the feedback voltage is less than 0.26 volt for at least 2 seconds and the ambient air temperature is greater than 0°C (32°F).
PCM (powertrain control module) P0533:00	A/C Refrigerant Pressure Sensor 'A' Circuit High: No Sub Type Information	Sets if the feedback voltage is greater than 4.95 volts for at least 2 seconds and the ambient air temperature is greater than 0°C (32°F).
PCM (powertrain control module) P0534:00	A/C Refrigerant System 'A' Charge Loss: No Sub Type Information	Sets if the pressure sensor signal is lower than the calibrated value.

#### **Possible Sources**

- A/C (air conditioning) system discharged or low refrigerant charge
- Wiring, terminals or connectors
- A/C (air conditioning) pressure transducer
- PCM (powertrain control module)

#### **Visual Inspection and Pre-checks**

• Inspect for loose or corroded A/C (air conditioning) pressure transducer connections.

#### NOTICE

Positive Lead	Measurement / Action	Negative Lead
C1260-1	₩	Ground
C1260-2	₩	Ground
C1260-3	₩	Ground

#### Is any voltage present?

Yes	REPAIR the circuit.

No GO to A3

### A3 CHECK THE A/C (AIR CONDITIONING) PRESSURE SENSOR CIRCUITS FOR A SHORT TO GROUND

- Ignition OFF.
- Measure:

Positive Lead	Measurement / Action	Negative Lead
C1260-1	Ω	Ground
C1260-2	Ω	Ground
C1260-3	Ω	Ground