303-01C-2

Intake Manifold

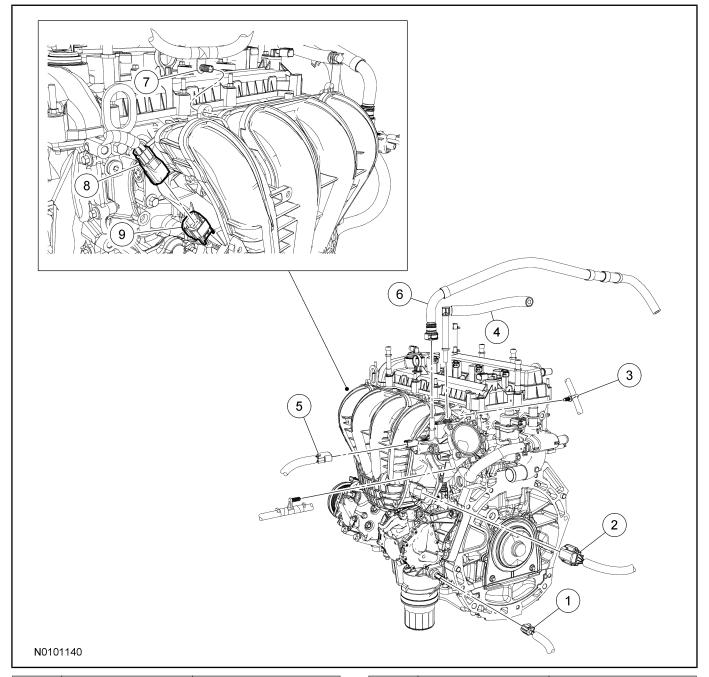
SECTION 303-01C Engine — 2.5L Hybrid

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IN-VEHICLE REPAIR

IN-VEHICLE REPAIR

Intake Manifold

Intake Manifold (View 1 of 2)



| Item | Part Number | Description |
|------|-------------|---------------------------------------------------------------------------------|
| 1 | 14A464 | Engine Oil Pressure (EOP) switch electrical connector (part of 12A581) |
| 2 | 14A464 | Manifold Absolute Pressure (MAP) sensor |

| Item | Part Number | Description |
|------|-------------|---------------------------------------|
| | | electrical connector (part of 12A581) |
| 3 | _ | Wiring harness retainer (2 required) |
| 4 | 9C482 | Brake booster vacuum tube |

IN-VEHICLE REPAIR(Continued)

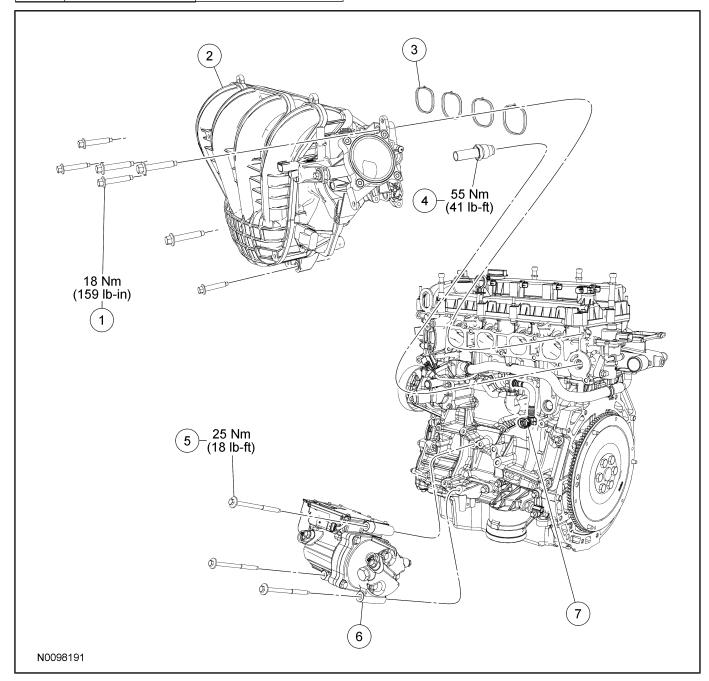
| Item | Part Number | Description |
|------|-------------|-----------------------------------------------------------------------|
| 5 | _ | Evaporative Emission (EVAP) canister purge valve electrical connector |
| 6 | 6C324 | EVAP tube-to-EVAP canister purge valve quick connect coupling |

| Item | Part Number | Description |
|------|-------------|-----------------------------------------------------------------------------|
| 7 | _ | Block heater wiring harness retainer (if equipped) |
| 8 | 14A464 | Knock Sensor (KS) electrical connector (male side, part of 12A581) |

IN-VEHICLE REPAIR(Continued)

| Item | Part Number | Description |
|------|-------------|-------------------------------------------------------------|
| 9 | 14A464 | KS electrical connector (female side, part of 12A581) |

Intake Manifold (View 2 of 2)



| Item | Part Number | Description |
|------|-------------|-----------------------------------|
| 1 | W500311 | Intake manifold bolt (7 required) |
| 2 | 9424 | Intake manifold |

| Item | Part Number | Description |
|------|-------------|-------------------------------------|
| 3 | 9441 | Intake manifold gasket (4 required) |
| 4 | 9E470 | EGR tube |

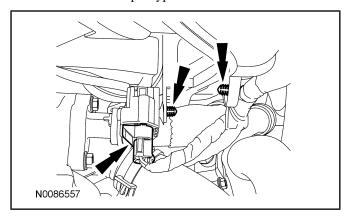
IN-VEHICLE REPAIR(Continued)

| Item | Part Number | Description |
|------|-------------|----------------------------------|
| 5 | W500326 | A/C compressor bolt (3 required) |
| 6 | 19703 | A/C compressor |
| 7 | 6758 | PCV hose connector |

Removal and Installation

303-01C-5

- With vehicle in NEUTRAL, position it on a hoist. For additional information, refer to Section 100-02.
- 2. Remove the fuel rail. For additional information, refer to Section 303-04A.
- Remove the cooling fan motor and shroud. For additional information, refer to Section 303-03B.
- 4. Remove the Throttle Body (TB). For additional information, refer to Section 303-04C.
- 5. Remove the accessory drive belt tensioner. For additional information, refer to Section 303-05C.
- 6. Disconnect the Engine Oil Pressure (EOP) switch electrical connector.
- 7. Disconnect the Manifold Absolute Pressure (MAP) sensor electrical connector.
- 8. Disconnect the Evaporative Emission (EVAP) canister purge valve electrical connector.
- 9. Disconnect the EVAP tube-to-EVAP canister purge valve quick connect coupling and the brake booster vacuum tube from the intake manifold.
- 10. Disconnect the Knock Sensor (KS) electrical connector and detach the 2 pin-type retainers.

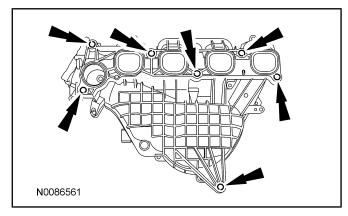


- 11. Detach the 2 wiring retainers from the intake manifold near the TB mounting area.
- 12. Detach the engine wiring harness retainer from the intake manifold.

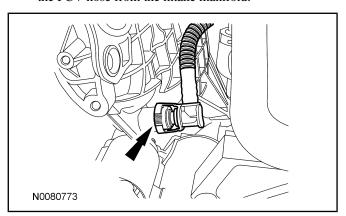
- 13. Remove the 3 electric A/C compressor bolts and position aside.
 - To install, tighten to 25 Nm (18 lb-ft).
- 14. **NOTE:** The cylinder head side of the intake manifold is showing the location of the 7 bolts.

Remove the 7 bolts and position the intake manifold aside to access the PCV hose connector.

• To install, tighten to 18 Nm (159 lb-in).



15. Squeeze the 2 PCV hose connector tabs and disconnect the PCV hose from the intake manifold.



- 16. Remove the intake manifold and gaskets.
- 17. NOTICE: If the engine is repaired or replaced because of upper engine failure, typically including valve or piston damage, check the intake manifold for metal debris. If metal debris is found, install a new intake manifold. Failure to follow these instructions can result in engine damage.

To install, reverse the removal procedure.

 Inspect and install new intake manifold gaskets if necessary.