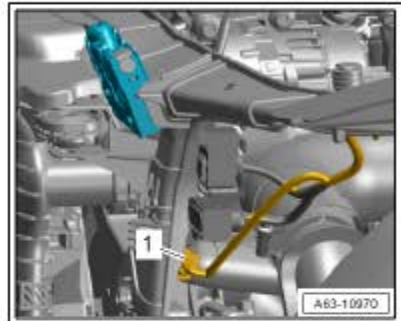


# Service & Repair Manuals



- Remove headlight housing ⇒ Electrical system; Rep. gr. 94 ; Headlights; Removing and installing headlights .
- Right-side: Remove air cleaner housing ⇒ Rep. gr. 23 ; Air cleaner; Removing and installing air cleaner housing or ⇒ Rep. gr. 24 ; Air cleaner; Removing and installing air cleaner housing .
- Audi S7/RS 7, left-side: Remove secondary air pump motor with bracket ⇒ Rep. gr. 26 ; Secondary air system; Removing and installing secondary air pump motor - V101- .
- Unplug electrical connector -1- and move clear.
- If fitted, unplug electrical connector for control unit for NOx sender - J583- .



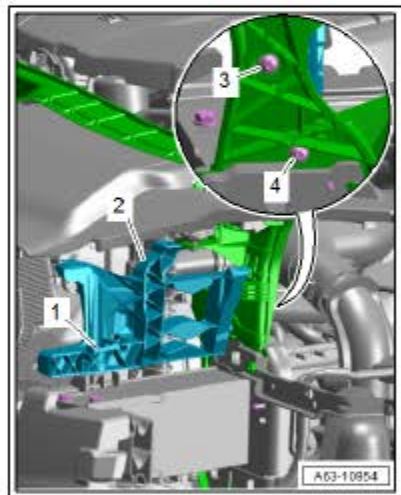
- Remove bolts -1, 3, 4-.
- Detach mounting -2-.

#### Installing

Install in reverse order of removal.

#### Tightening torques

- ◆ ⇒ ["1.1.2 Exploded view - lock carrier, vehicles from model year 2015 onwards", page 4](#)



## 1.2.6 Removing and installing retainer for bumper cover mounting

### Special tools and workshop equipment required

- ◆ Drill

- ◆ Drill bit 2,4 mm

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Move aside the door harness sleeve (4) ; Using tool [1327].

Disconnect the connectors (at "a").

Remove the front door (1) ; Using the door support,

### 3. Adjustments

#### 3.1. Door hinges

N.B. : The lower door hinge is indexed on the door side, However, it is possible to remove the indexing "b" if additional adjustment is necessary ; Using a pin drift.

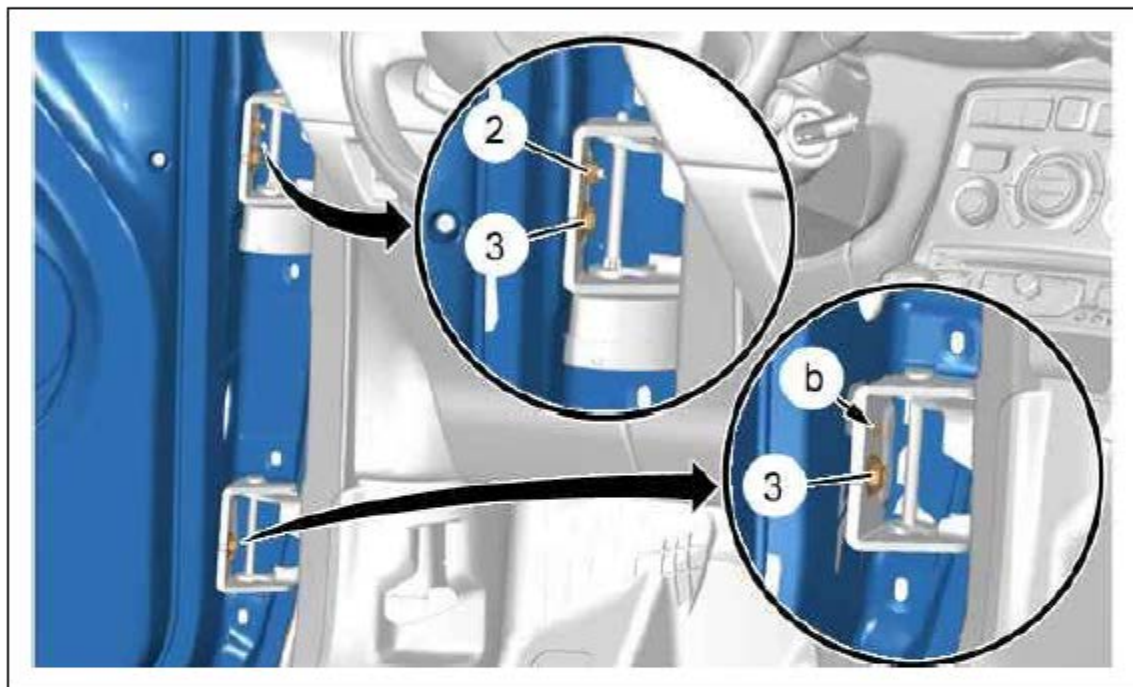


Figure : C4CG0P7D

Remove the hinges .

**CAUTION** : Carry out the anticorrosion treatments in the indexing pins zone .

Refit the hinges (without tightening).

The front door clearances are adjusted on the fixed hinges retained by the bolts (3) and the nut (2).

N.B. : The lower door hinge is indexed on the door side, However, it is possible to remove the indexing "c" if additional adjustment is necessary ; Using a pin drift.

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## Removing and installing the door handle

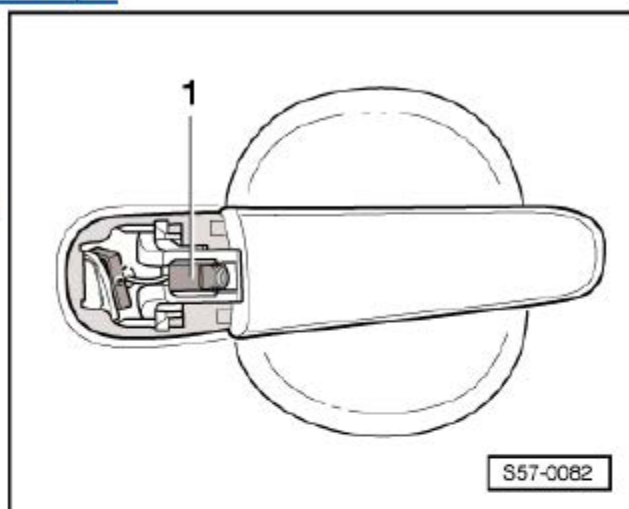
### Removing:

- Removing the lock cylinder housing → [Chapter](#).

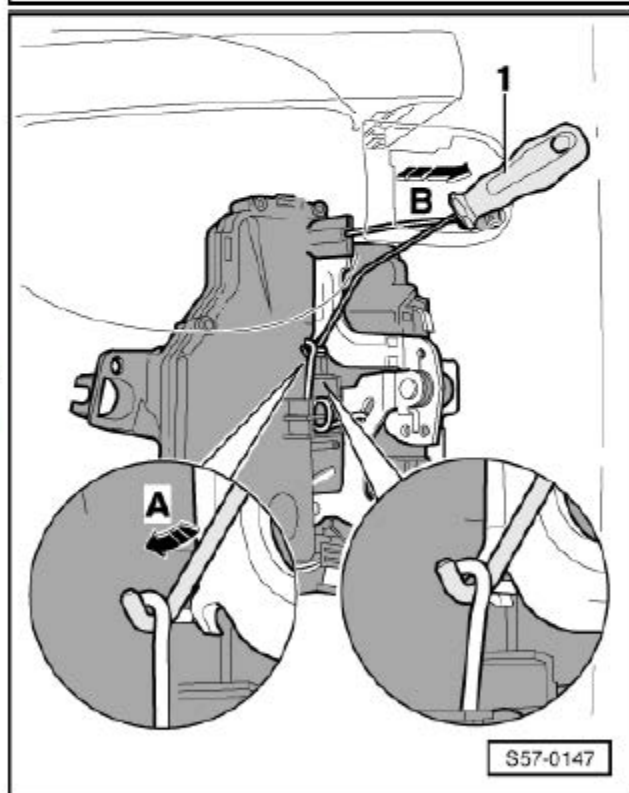
- Unclip clip -1- from the door handle.
- Swivel door handle out of the door.

### Installing:

- Swivel door handle into the door.



- Hang assembly device -T10118- pos.
- -1- in the spring fixed -arrow A- to the door lock and hang the spring in the lock lever -arrow B-.



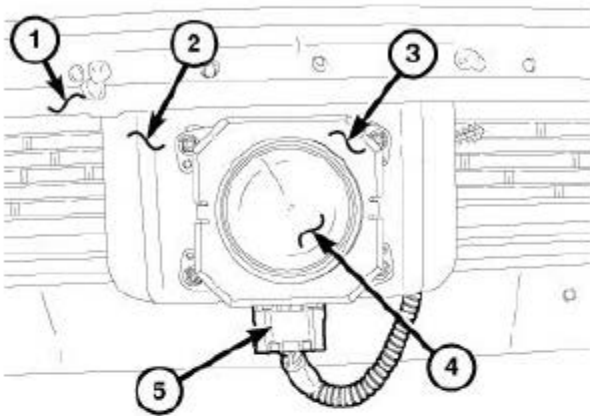
Draw clip -1- in the plate opening  
and allow to clip into door handle 2-

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- Remove the three molded plastic ball socket clips (5) from the back side of the ACC sensor mounting bracket and discard. The clips are removed by rotating them counterclockwise.

#### SENSOR



2863582

**Fig. 88: Sensor Bezel (Mirror Cover) & Front Bumper Support Bar**  
 Courtesy of CHRYSLER GROUP, LLC

- Disconnect and isolate the battery negative cable.
- Raise and support the vehicle.
- Unsnap and remove the plastic bezel from the opening in the center of the grille texture insert of the lower air intake opening in the front fascia.
- If equipped, unsnap and remove the sensor bezel (mirror cover) (3) from the face of the adaptive speed control (also known as Adaptive Cruise Control/ACC) sensor (4) located below the center of the front bumper support bar (1).
- Disconnect the Front End Module (FEM) wire harness connector (5) from the ACC sensor connector receptacle.
- Firmly grasp the ACC sensor housing and pull it sharply forward from the sensor mounting bracket (2) until the one fixed and the two adjustable ball studs of the sensor unsnap from the three molded plastic ball socket clips in the bracket.
- Remove the ACC sensor from the vehicle.

**NOTE:** The three molded plastic ball socket clips in the ACC sensor mounting bracket **MUST** be removed, discarded and replaced with new ball socket clips any time the sensor is removed from the bracket.

**PICTURES ARE SAMPLES FROM  
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- Remove the three molded plastic ball socket clips (5) from the back side of the ACC sensor mounting bracket and discard. The clips are removed by rotating them counterclockwise.

INSTALLATION

between the inflator bracket by the bracket bolts.

- Make sure that the side curtain airbag inflator retainer is installed properly. Otherwise the side curtain airbag could incorrectly deploy and cause damage or injuries.
- If there is any damage to the side curtain airbag, do not try to repair it. Replace any damaged side curtain airbag.
- Do not install the headliner yet.

6. Battery Terminal - Connect - Refer to: [Battery Terminal Disconnection and Reconnection \(2014 - 2015\)](#), [Battery Terminal Disconnection and Reconnection \(2016\)](#)

7. DTC - Clear

Clear any DTCs with the HDS.

8. SRS Operation - Confirm

Turn the vehicle to the ON mode, and check that the SRS indicator comes on for about 6 seconds and then goes off.

9. [Headliner/Pillar Trim Overlap - Confirm](#)

10. [Headliner - Install](#)

## **SIDE IMPACT SENSOR (FIRST) REMOVAL AND INSTALLATION**

### **Removal & Installation**

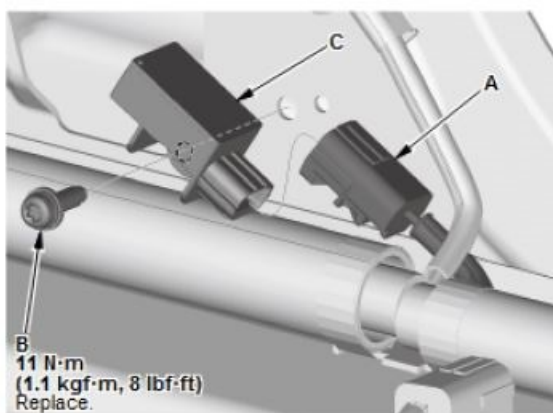
SRS components are located in this area. Review the [SRS component locations](#) and the [precautions and procedures](#) before doing repairs or service.

1. Battery Terminal - Disconnect - Refer to: [Battery Terminal Disconnection and Reconnection \(2014 - 2015\)](#), [Battery Terminal Disconnection and Reconnection \(2016\)](#)

**NOTE:** Wait at least 3 minutes before starting work.

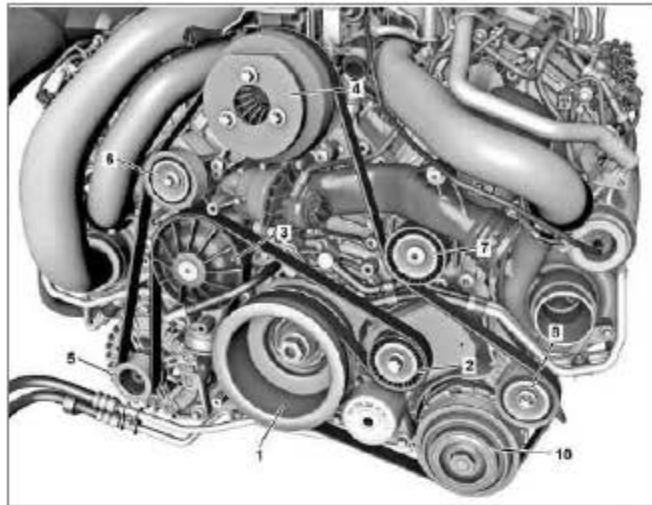
2. B-Pillar Lower Trim - Remove - Refer to: [Interior Trim Removal and Installation - Door Areas\(NA\)](#), [Interior Trim Removal and Installation - Tailgate Areas\(NA\)](#), [Interior Trim Removal and Installation - Pillar Areas\(NA\)](#), [Interior Trim Removal and Installation - Rear Side Area\(NA\)](#), [Interior Trim Removal and Installation - Cargo Areas\(NA\)](#)

3. Side Impact Sensor (First) - Remove



# **SAMPLE**

- 1 Belt pulley/vibration damper
- 2 Tensioner pulley
- 3 Coolant pump belt pulley
- 4 Active Body Control (ABC) belt pulley
- 5 Alternator belt pulley
- 6 Guide pulley
- 7 Guide pulley
- 8 Guide pulley
- 10 A/C compressor belt pulley



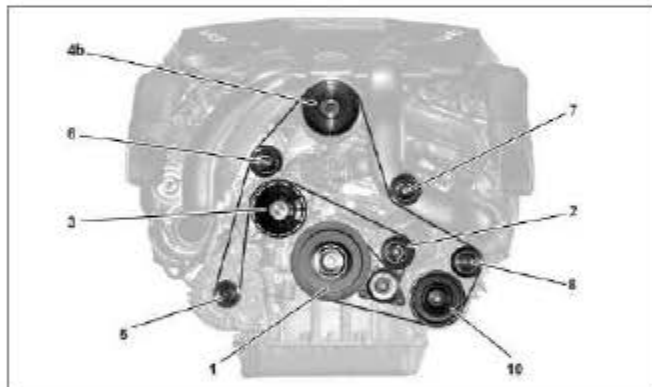
P13.20-2154-08

**Fig. 4: Poly-V Belt Routing Diagram - Engine 157, 278 With Code 487**

Courtesy of MERCEDES-BENZ USA

**ENGINE 157, 278 without CODE 487 (Active Body Control (ABC))**

- 1 Belt pulley/vibration damper
- 2 Tensioner pulley
- 3 Coolant pump belt pulley
- 4b Belt pulley for upper guide pulley/  
power steering pump
- 5 Alternator belt pulley
- 6 Guide pulley
- 7 Guide pulley
- 8 Guide pulley
- 10 A/C compressor belt pulley



P13.20-2084-05

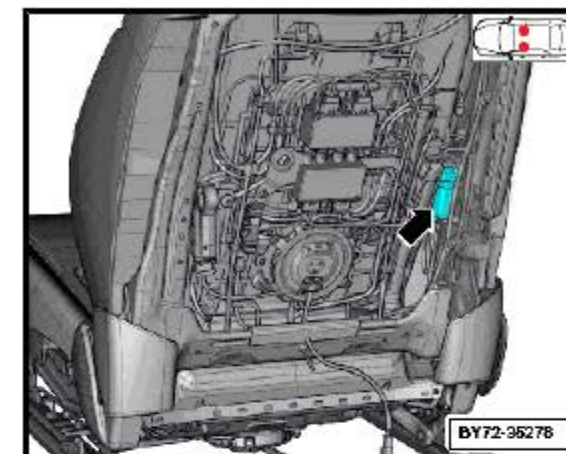
**Fig. 5: Poly-V Belt Routing Diagram - Engine 157, 278 Without Code 487**

Courtesy of MERCEDES-BENZ USA

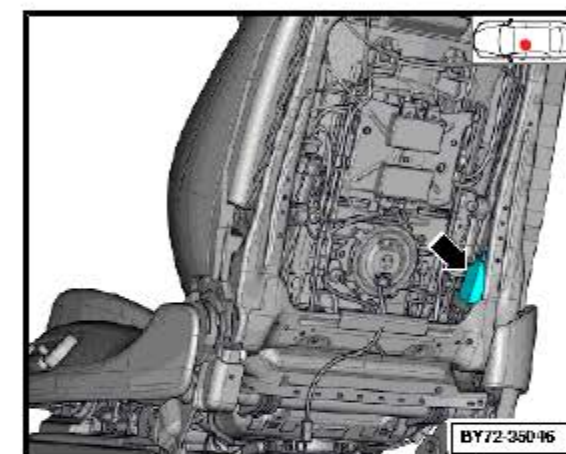
**Engine 157, 278 with code ME05 (HYBRID DRIVE 80KW VARIANT (INCLUDING PLUG-IN)):**

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- 1.57 Compressor for multicontour front passenger seat -V440-



- 1.58 Driver seat backrest adjustment motor -V45-

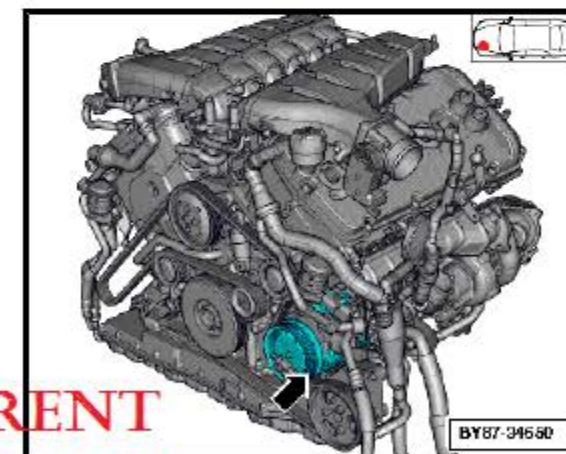


# BENTLEY

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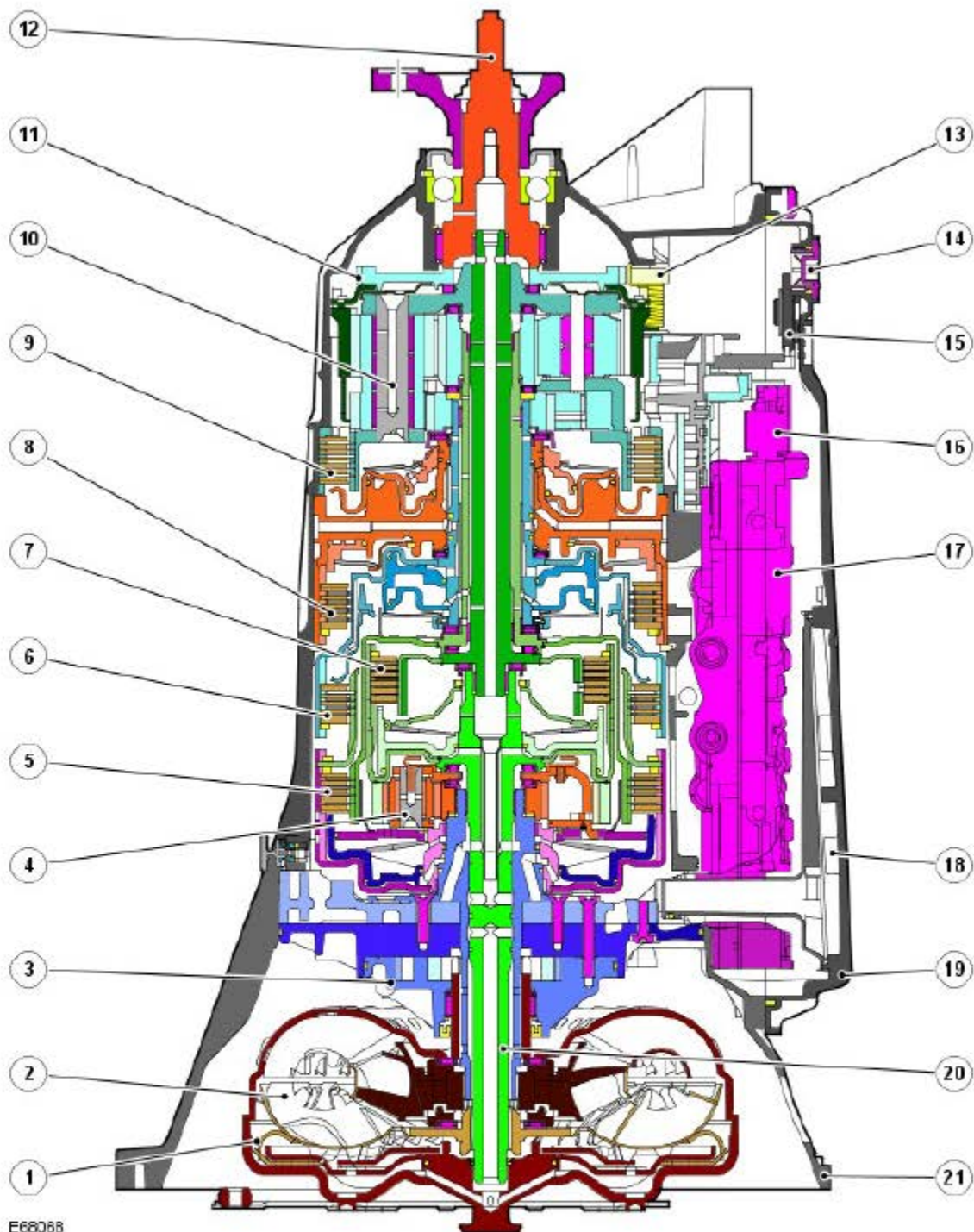
- 1.59 Air conditioner compressor -V454-

T46



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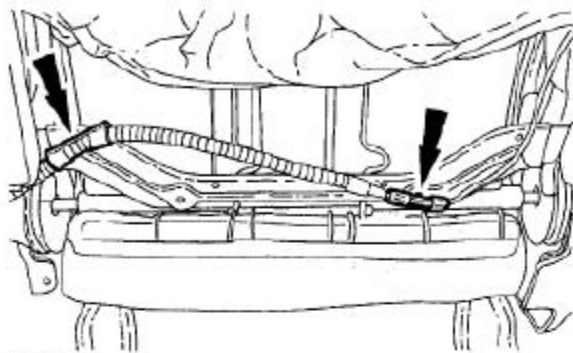




E68068

Item	Description
1	Torque converter lock up clutch
2	Torque converter
3	Fluid pump
4	Single planetary gearset
5	Clutch A
6	Clutch B
7	Clutch E

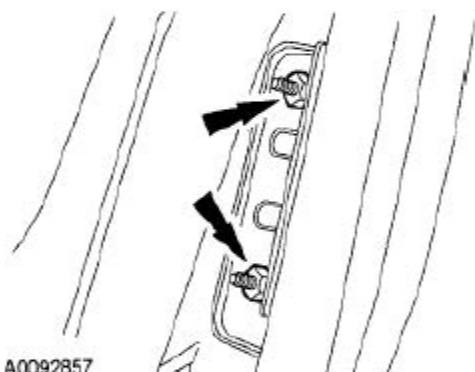
**PICTURES ARE SAMPLES FROM DIFFERENT MANUALS, MAY NOT APPLY TO YOUR VEHICLE**



N0061459

**Fig. 106: Locating Side Air Bag Module Wiring Harness Retainers From Seat Backrest Frame**  
 Courtesy of MAZDA MOTORS CORP.

13. Through the back of the seat backrest, position out the seat backrest foam pad. Then remove the 2 side air bag module nuts and remove the side air bag module.



A0092857

**Fig. 107: Locating Side Air Bag Module Nuts**  
 Courtesy of MAZDA MOTORS CORP.

## INSTALLATION

### WARNING:

- Inspect the seat side air bag module and mounting surfaces for any damage or foreign material before installing the seat side air bag module. If any damage is found, install new components. If any foreign material is found, remove it. Failure to follow these instructions may result in the seat side air bag module deploying incorrectly and increase the risk of serious personal injury or death in a crash.

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### WARNING:

- Before installing the seat side air bag module/deployment chute assembly:

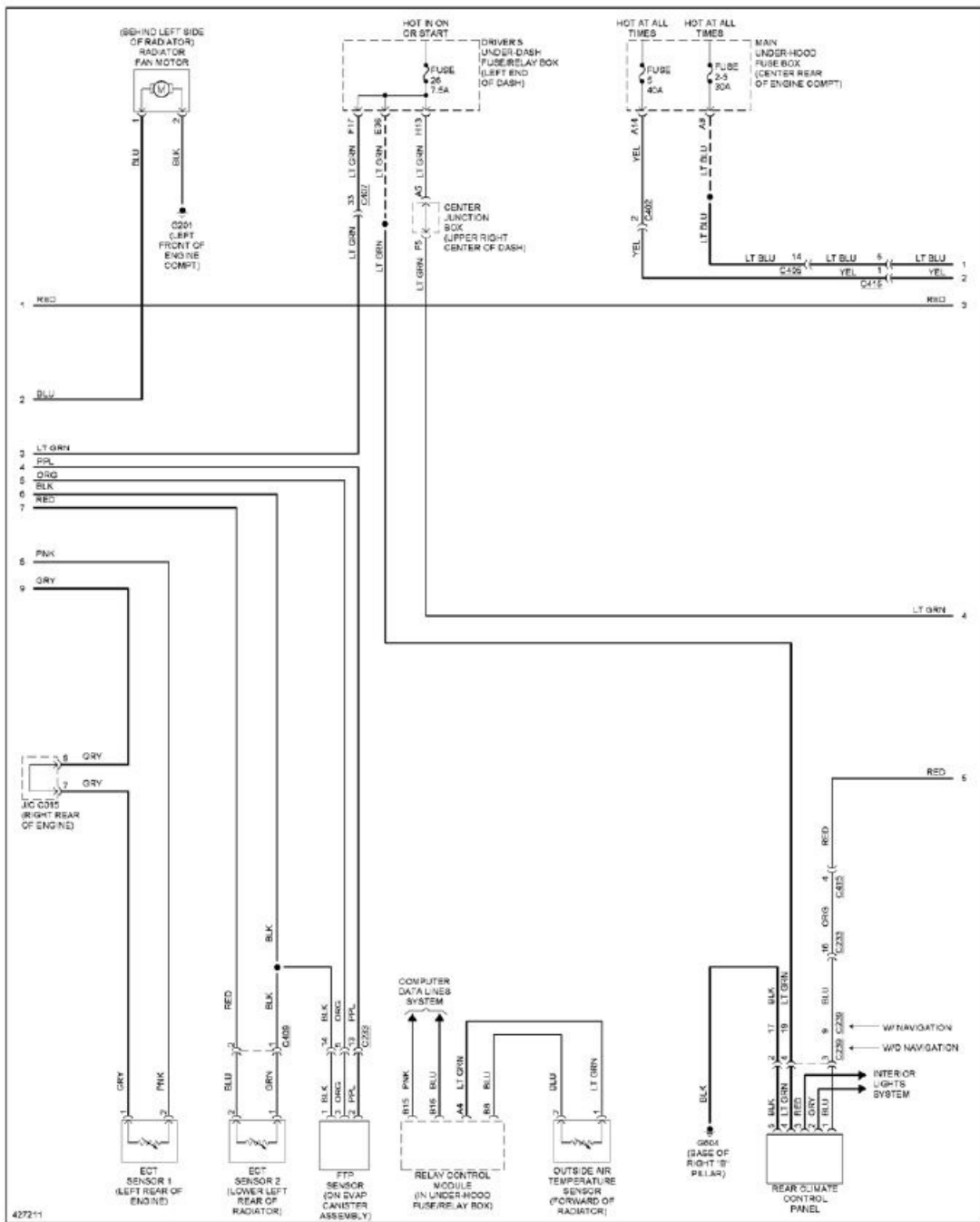
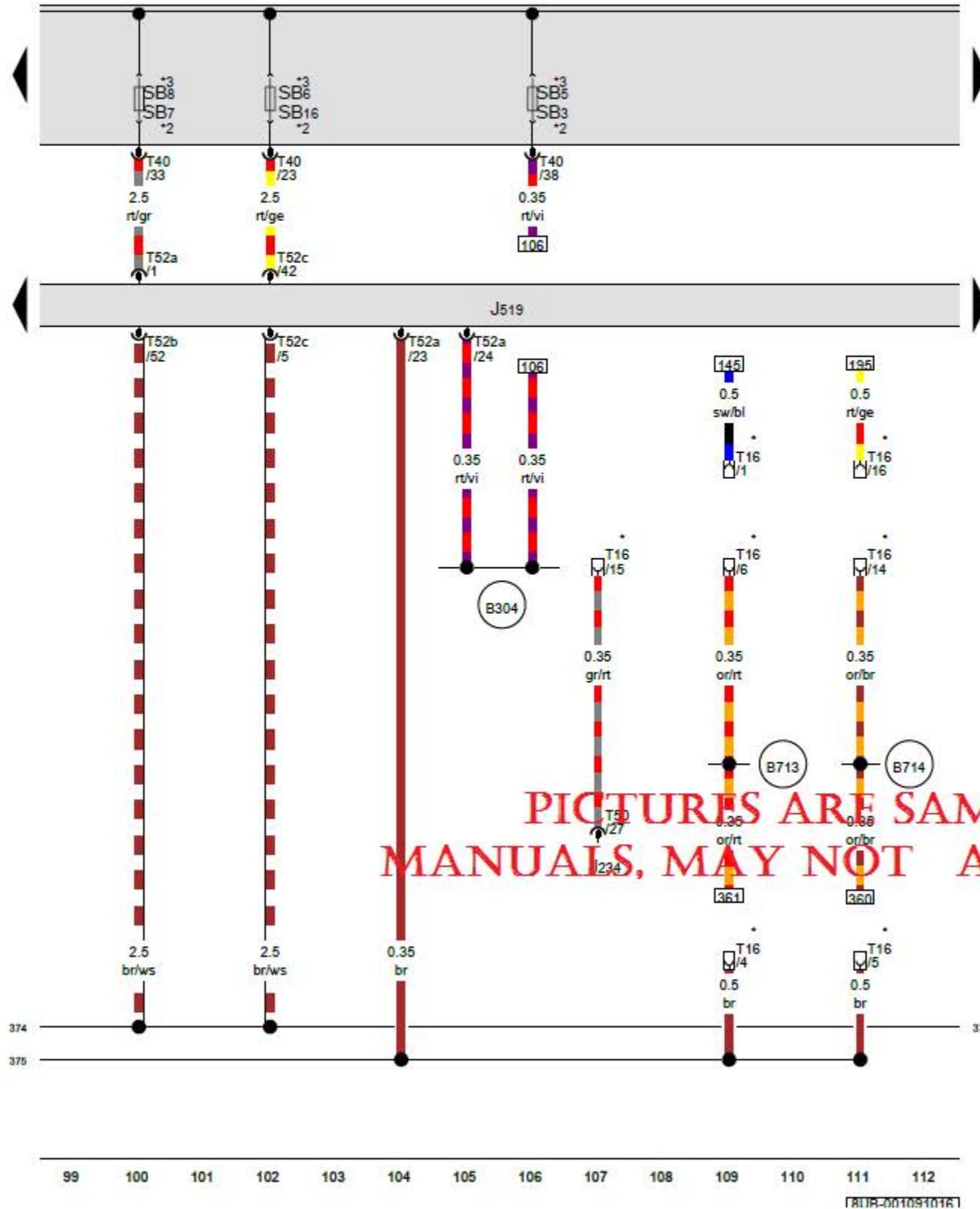


Fig. 4: Automatic A/C Circuit (4 of 5)

SAMPLE



Onboard supply control unit

- J234 Airbag control unit
- J519 Onboard supply control unit
- SB3 Fuse 3 on fuse holder B
- SB5 Fuse 5 on fuse holder B
- SB6 Fuse 6 on fuse holder B
- SB7 Fuse 7 on fuse holder B
- SB8 Fuse 8 on fuse holder B
- SB16 Fuse 16 on fuse holder B
- T16 16-pin connector, black
- T40 40-pin connector, black
- T50 50-pin connector
- T52a 52-pin connector, black
- T52b 52-pin connector, colourless
- T52c 52-pin connector, brown

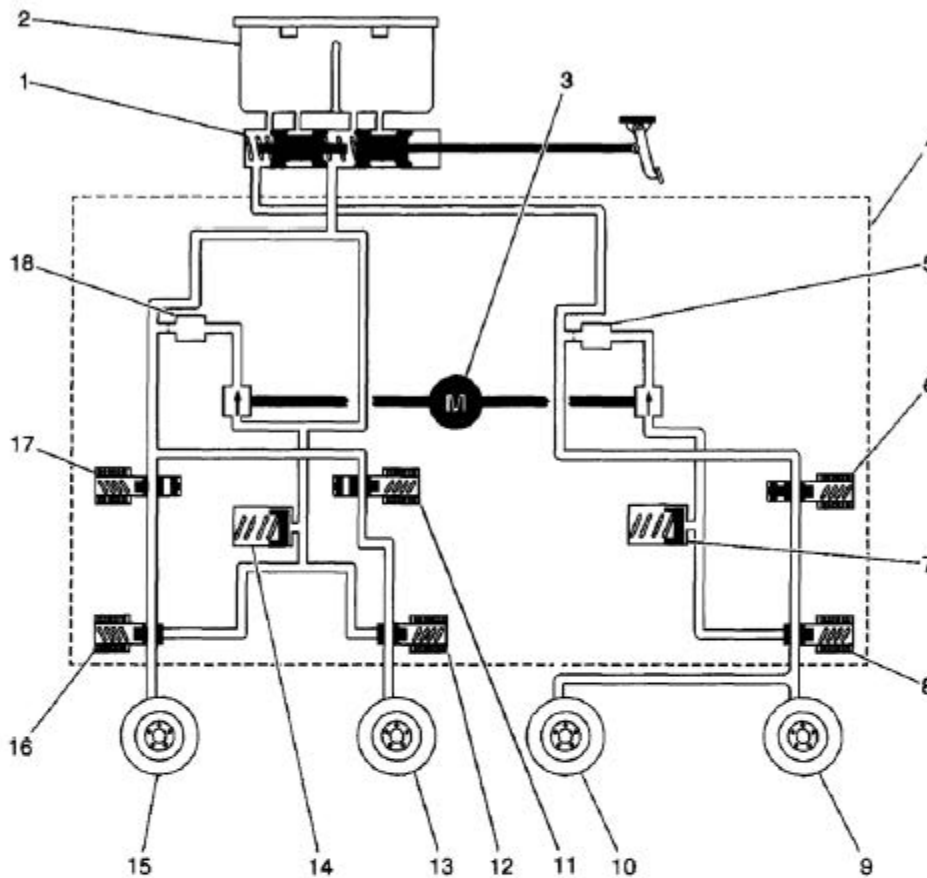
- 374 Earth connection 9, in main wiring harness
- 375 Earth connection 10, in main wiring harness
- B304 Positive connection 8 (30), in main wiring harness
- B713 Connection 1 (CAN bus diagnosis, high), in main wiring harness
- B714 Connection 1 (CAN bus diagnosis, low), in main wiring harness

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Diagnostic connection  
 \*2 Up to October 2012  
 \*3 From November 2012

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- ws = white
- sw = black
- ro = red
- rt = red
- br = brown
- gn = green
- bl = blue
- gr = grey
- li = purple
- vi = purple
- ge = yellow
- or = orange
- rs = pink



- |   |                                  |
|---|----------------------------------|
| (1) Master Cylinder                       | (10) Left Rear Brake             |
| (2) Master Cylinder Reservoir             | (11) Left Front Isolation Valve  |
| (3) Pump                                  | (12) Left Front Dump Valve       |
| (4) Brake Pressure Modulator Valve (BPMV) | (13) Left Front Brake            |
| (5) Damper                                | (14) Accumulator                 |
| (6) Rear Isolation Valve                  | (15) Right Front Brake           |
| (7) Accumulator                           | (16) Right Front Dump Valve      |
| (8) Rear Dump Valve                       | (17) Right Front Isolation Valve |
| (9) Right Rear Brake                      | (18) Damper                      |

001465801

**Fig. 44: BPMV Hydraulic Flow Diagram**  
 Courtesy of GENERAL MOTOR CORP.

This vehicle is equipped with the Kelsey-Hayes EBC32 antilock braking system.

The vehicle is equipped with the following braking enhancement systems:

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