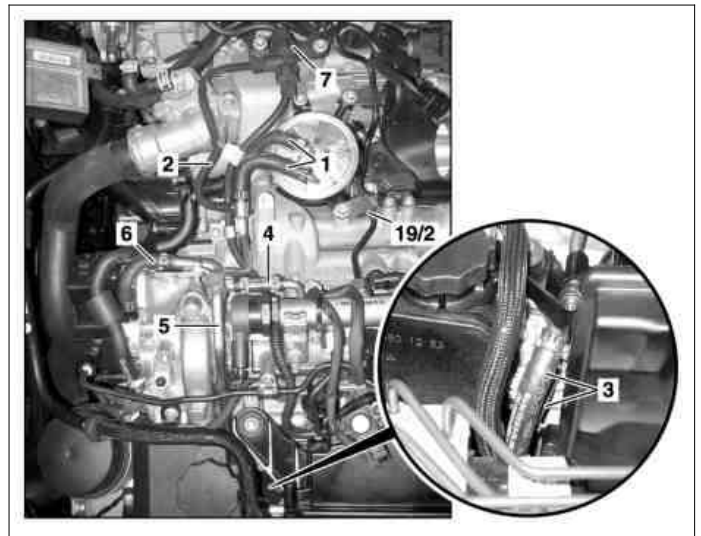
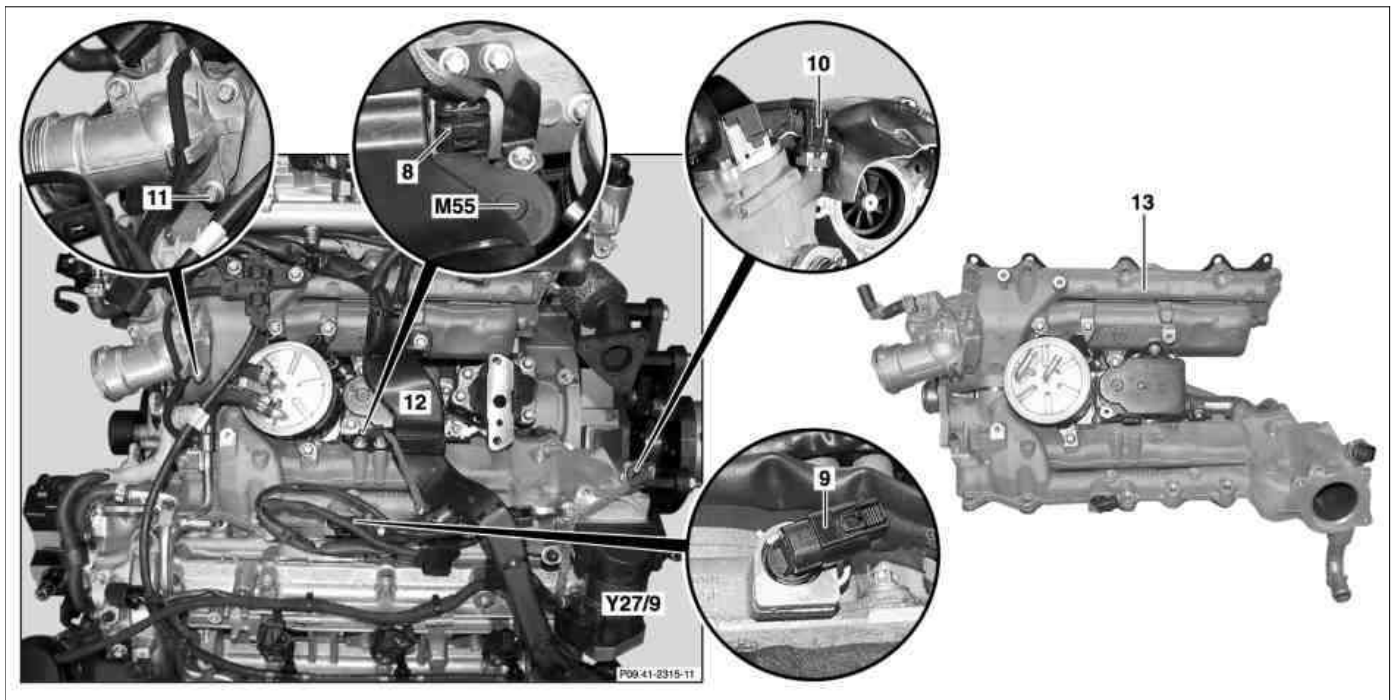


Engine 642 in model 164, 251

- 1 Fuel lines
- 2 Leak oil line
- 3 Fuel lines
- 4 Rail leak oil line
- 5 Fuel pipe
- 6 Fuel supply line
- 7 Distributor leak oil line
- 19/2 Connecting line
















P09.41-2316-11



P09.41-2314-09

- |    |        |    |                       |       |   |
|----|--------|----|-----------------------|-------|---|
| 8  | Clutch | 11 | Screw/bolt            | M55   | Intake port shutoff motor                 |
| 9  | Clutch | 12 | Engine wiring harness | Y27/9 | Left exhaust gas recirculation positioner |
| 10 | Clutch | 13 | Charge air manifold   |       |   |

⚠	<b>Remove/install</b>		
<b>⚠ Danger!</b>	<b>Risk of explosion</b> caused by fuel igniting. <b>Risk of injury</b> to skin and eyes caused by fuel spraying out at high pressure	Remove all ignition sources from hazard area. Do not carry out any work on system when it is pressurized.	AS07.16-Z-0001-01A

 <b>Danger!</b>	<b>Risk of injury</b> to skin and eyes suffering scalding from contact with hot coolantspray. <b>Risk of poisoning</b> from swallowing coolant.	Do not open cooling system unless coolant temperature is below 90 °C. Open cap slowly and release the pressure. Do not pour coolant into beverage containers. Wear protective gloves, protective clothing and safety glasses.	AS20.00-Z-0001-01A
 <b>Danger!</b>	<b>Risk of explosion</b> caused by fuel igniting, risk of poisoning caused by inhaling and swallowing fuel as well as risk of injury to eyes and skin caused by contactwith fuel.	No fires, sparks, open flames or smoking. Pour fuels into suitable and appropriately marked containers only. Wear protective clothing when handling fuel.	AS47.00-Z-0001-01A
1 	Drain off coolant Notes on coolant	Drain/pour in coolant	AR20.00-P-1142GZB AH20.00-N-2080-01A
2	Remove coolant line from thermostat housing		
3	Remove mixing chamber		AR09.20-P-1320GZB
4	Remove exhaust gas ATL	Model 164 with engine 642 Model 251 with engine 642	AR09.40-P-6020GZB AR09.40-P-6020RTB
5	Remove oil supply connection fittings for ATL		AR09.40-P-6023GZB
6	Remove left rail		AR07.03-P-1010GZB
7	Unscrew union nuts on connecting line (19/2)	 Close off connections for connecting line (19/2) immediately after removal as a protection against contamination. Do not crush or deform connecting line (19/2).  Fuel line between left and right tail  Record plug	*BA07.16-P-1024-01C *129589009100
8	Remove fuel lines (1) on fuel filter		
9	Remove leak oil line (2) from fuel line		
10	Detach fuel lines (3)		
11	Pull out fuel supply line (6) for high-pressure pump		
12	Remove screw/bolts on coolant pipe (5)		
13	Remove fuel pipe (5)		
14	Remove fuel filter with cage	 Bolt, fuel filter cage to charge air manifold	*BA47.20-P-1001-02D
15	Unscrew distributor leak oil line (7)	 Leak oil line to charge air distribution line	*BA07.16-P-1023-01C
16	Disconnect engine wiring harness (12) at control unit		
17	Remove glow plug connector	At left cylinder head only	
18	Remove connector for injectors	At left cylinder head only	
19	Remove connector (8) from engine intake port shutoff (M55)		
20	Remove connector (10) from exhaust back pressure sensor	Engine 642 in model 164, 251 with code 474 (Diesel particulate filter)	
21	Remove left exhaust gas recirculation positioner (Y27/9)		AR14.20-P-1020GZB
22	Remove bottom screw/bolt (11) at thermostat housing	 Bolt, coolant thermostat housing to charge air manifold	*BA20.10-P-1002-01S
23	Place engine wiring harness (12) to one side		
24	Remove screw/bolts (13) at charge air manifold	To remove screw/bolts on charge air manifold (13):  ↓  Bolt plan for charge air manifold   Bolt, charge air distributor to cylinder head	AR09.41-P-1310-01PI *BA09.41-P-1009-01J
25	Remove charge air manifold (13)	 <b>Installation:</b> Replace seal. Leakage can occur otherwise.  <b>Installation:</b> Install the cage for the fuel filter to secure the charge air manifold (13).	
26	Install in the reverse order		
 <b>Danger!</b>	<b>Risk of accident</b> from vehicle starting off by itself when engine running. <b>Risk of injury</b> (bruises and burns) resulting from working on the engine while it is being started or when it is running.	Secure vehicle to prevent it from starting off by itself. Wear closed and snug-fitting work clothes. Do not touch hot or rotating parts.	AS00.00-Z-0005-01A
27	Check oil leaktightness and leaktightness of the fuel system for a run engine		

 Common rail diesel injection system (CDI)

Number	Designation			Engine 642
BA07.16-P-1023-01C	Leak oil line to charge air distribution line	M6 × 23	Nm	12

**Nm** Common rail diesel injection system (CDI)

Number	Designation	Engine 642
BA07.16-P-1024-01C	Fuel line between left and right tail M15	Nm 27

**Nm** Charge air pipe/charge air cooling

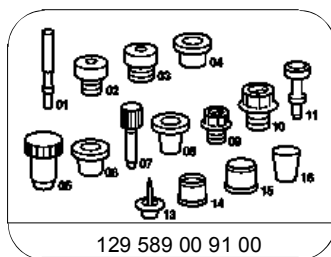
Number	Designation	Engine 642
BA09.41-P-1009-01J	Bolt, charge air distributor to cylinder head	Nm 18

**Nm** Coolant pump, coolant thermostat

Number	Designation	Engine 642
BA20.10-P-1002-01S	Bolt, coolant thermostat housing to charge air manifold	Nm 9

**Nm** Fuel filter

Number	Designation	Engine 642
BA47.20-P-1001-02D	Bolt, fuel filter cage to charge air manifold	Nm 12



Record plug