

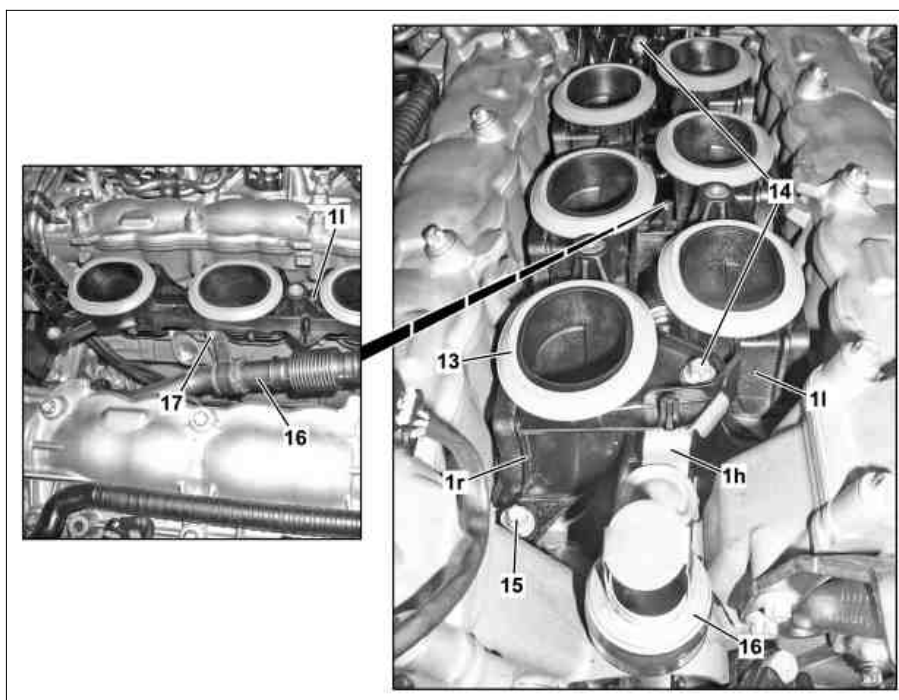
P09.20-2290-09

- 1 Resonance intake manifold
- 1a Cover
- 1s Bolts
- 2 Suction hose
- 3 Clip
- 4 Purge line
- 5 Crankcase breather line
- 6 Vacuum line
- 7 Vacuum line

- 8 Vacuum hose
- 9 Vacuum hose
- 10 Vacuum line
- 11 Crankcase breather line
- B2/5 Hot film mass air flow sensor
- B17/1 Intake manifold intake air temperature sensor

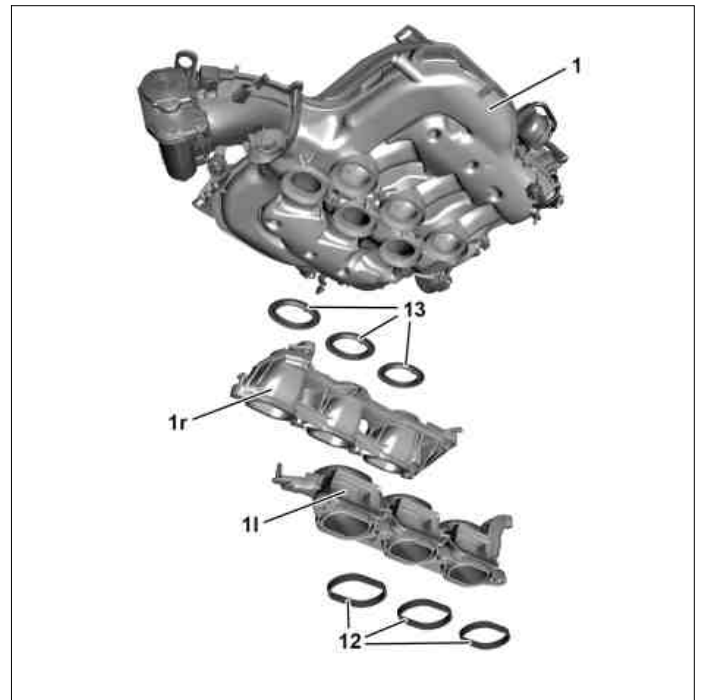
- B28/7 Pressure sensor downstream of throttle valve
- M16/6 Throttle valve actuator
- Y77/2 Intake manifold resonance flap switchover valve
- Y77/3 Intake manifold selector drum switchover valve

- 1h Bracket
- 1l Left intermediate flange
- 1r Right intermediate flange
- 14 Bolts
- 15 Bolts
- 16 Exhaust gas recirculation line
- 17 Bolt



P09.20-2286-06

- 1 Resonance intake manifold
- 1l Left intermediate flange
- 1r Right intermediate flange
- 12 Seals
- 13 Seals



P09.20-2287-12

Modification notes

29.3.11	Value changed: bolt, EGR line to bracket	*BA14.20-P-1005-01M
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	Remove/install		
Danger!	Risk of injury caused by fingers being pinched or crushed when removing, installing or aligning hoods, doors, trunk lids, liftgates or sliding roof	Keep body parts and limbs well clear of moving parts.	AS00.00-Z-0011-01A
	Notes on avoiding damage through contamination and foreign objects		AH00.00-P-5000-01A
1	Switch off ignition		
2	Remove front engine cover		
3	Remove air filter housing	 	*BA09.10-P-1001-01M *BA09.10-P-1002-01M
4	Loosen clamp (3) for intake hose (2) on hot film MAF sensor (B2/5)	Installation: Replace clamp (3).	
5	Pull off purge line (4) from resonance intake manifold (1)		
6	Detach crankcase breather line (5) on intake hose (2) and unclip on resonance intake manifold (1)		
7	Detach crankcase breather line (11) on resonance intake manifold (1)	Installation: Install new seal.	
8	Disconnect electrical connector at pressure sensor downstream of throttle valve (B28/7)		
9	Disconnect electrical plug connector on throttle valve actuator (M16/6)		
10	Unclip electrical line on throttle valve actuator (M16/6)	The retaining clip for electrical line is located under the throttle valve actuator (M16/6).	
11	Remove vacuum line (7) for brake booster to vacuum line (6)		
12	Remove vacuum line (6) to vacuum pump		
13	Unclip vacuum hose (8) on resonance intake manifold (1)		
14	Detach vacuum hose (9) on vacuum line (10)		
15	Disconnect electrical connection on intake manifold intake air temperature sensor (B17/1)		
16	Disconnect electrical connection on selector drum switchover valve (Y77/3) and intake manifold resonance flap switchover valve (Y77/2)		

17	Remove cover (1a) on resonance intake manifold (1)	Nm	*BA09.20-P-1008-01T
18	Remove bolts (1s) on resonance intake manifold (1)	Nm	*BA09.20-P-1001-01T
19	Remove resonance intake manifold (1)	<p>i Cover intermediate flange (1l, 1r) with rags.</p> <p>i Installation: Replace seals (13).</p>	
	Only perform operation steps 20 to 25 when removing the intermediate flange (1l, 1r) for the resonance intake manifold (1)		
20	Remove bolts (14, 15) on right intermediate flange (1r)	<p>Nm</p> <p>Nm</p>	<p>*BA09.20-P-1002-01T</p> <p>*BA09.20-P-1003-01T</p>
21	Remove right intermediate flange (1r)	i Installation: Replace seals (12).	
22	Remove bracket (1) from EGR line (16)	<p>i Turn bracket (1h) to the left to remove.</p> <p>i Installation: Ensure correct seating of bracket (1h).</p>	
23	Remove screw (17)	Nm	*BA14.20-P-1005-01M
24	Remove bolts on left intermediate flange (1l)	Nm	*BA09.20-P-1002-01T
25	Remove left intermediate flange (1l)	<p>i Cover intake ports with a rag.</p> <p>i Installation: Replace seals (12).</p>	
26	Install in the reverse order		
⚠ Danger!	Risk of accident caused by vehicle starting off by itself when engine is running. Risk of injury caused by contusions and burns during starting procedure or when working near the engine as it is running	Secure vehicle to prevent it from moving by itself. Wear closed and snug-fitting work clothes. Do not touch hot or rotating parts.	AS00.00-Z-0005-01A
27	Carry out an engine test run and check resonance intake manifold (1) for leaks		

Nm Intake manifold

Number	Designation		Engine 276
BA09.20-P-1001-01T	Bolt, air intake pipe to intermediate flange	Nm	9
BA09.20-P-1002-01T	Bolt, intermediate flange to cylinder head	Nm	9
BA09.20-P-1003-01T	Bolt, intermediate flange to intermediate flange	Nm	9
BA09.20-P-1008-01T	Bolt, model plate cover to air intake pipe	Nm	2

Nm Exhaust gas recirculation

Number	Designation		Engine 276
BA14.20-P-1005-01M	Bolt, EGR line to bracket	Nm	12

Nm Air filter

Number	Designation		Engine 276
BA09.10-P-1001-01M	Bolt, air filter to cylinder head cover	Nm	9

BA09.10-P-1002-01M	Bolt, air filter to air intake pipe support brace	Nm	9
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