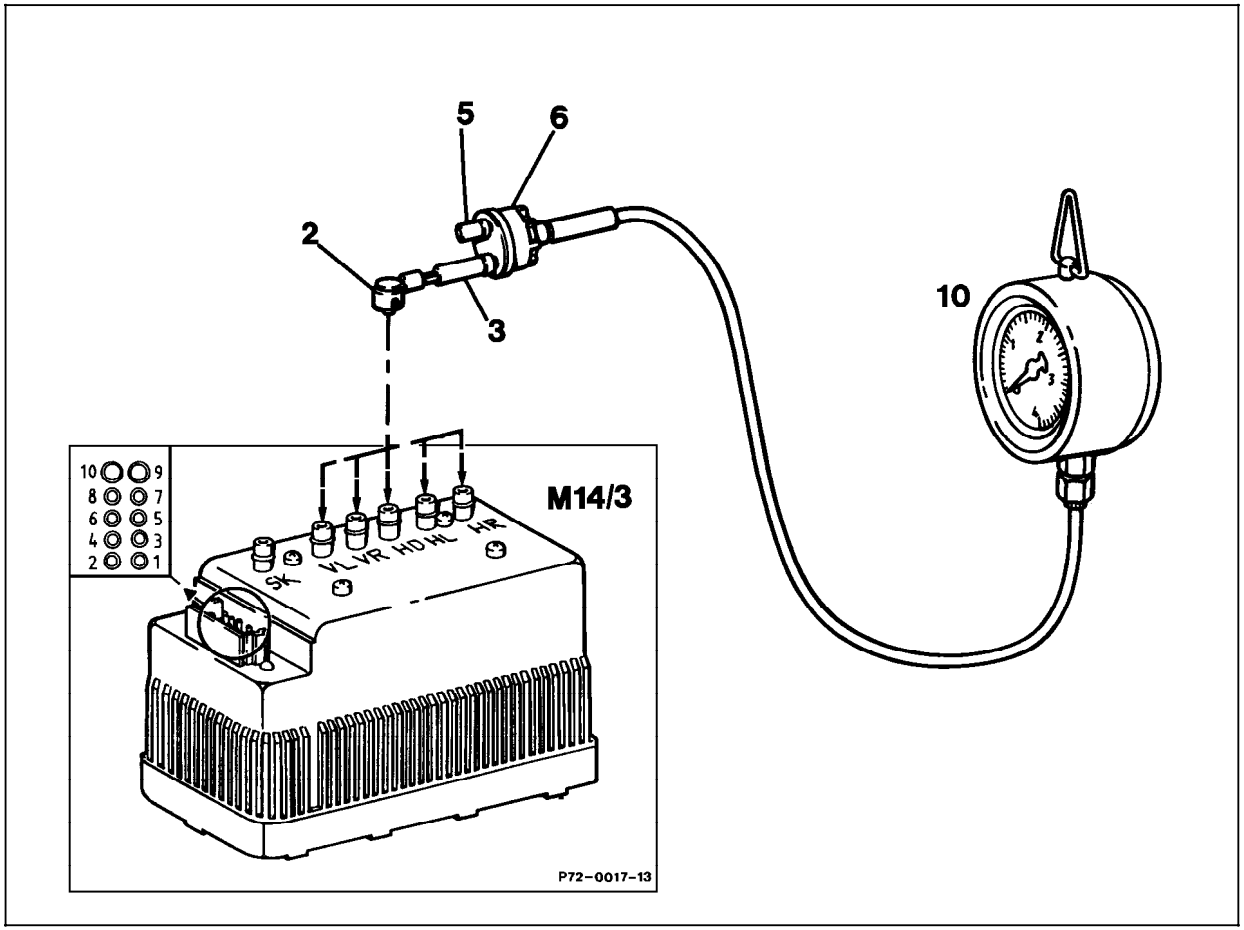
Pneumatic Test Program – Test

CA Supply Pump Test Connections



P72-0019-57

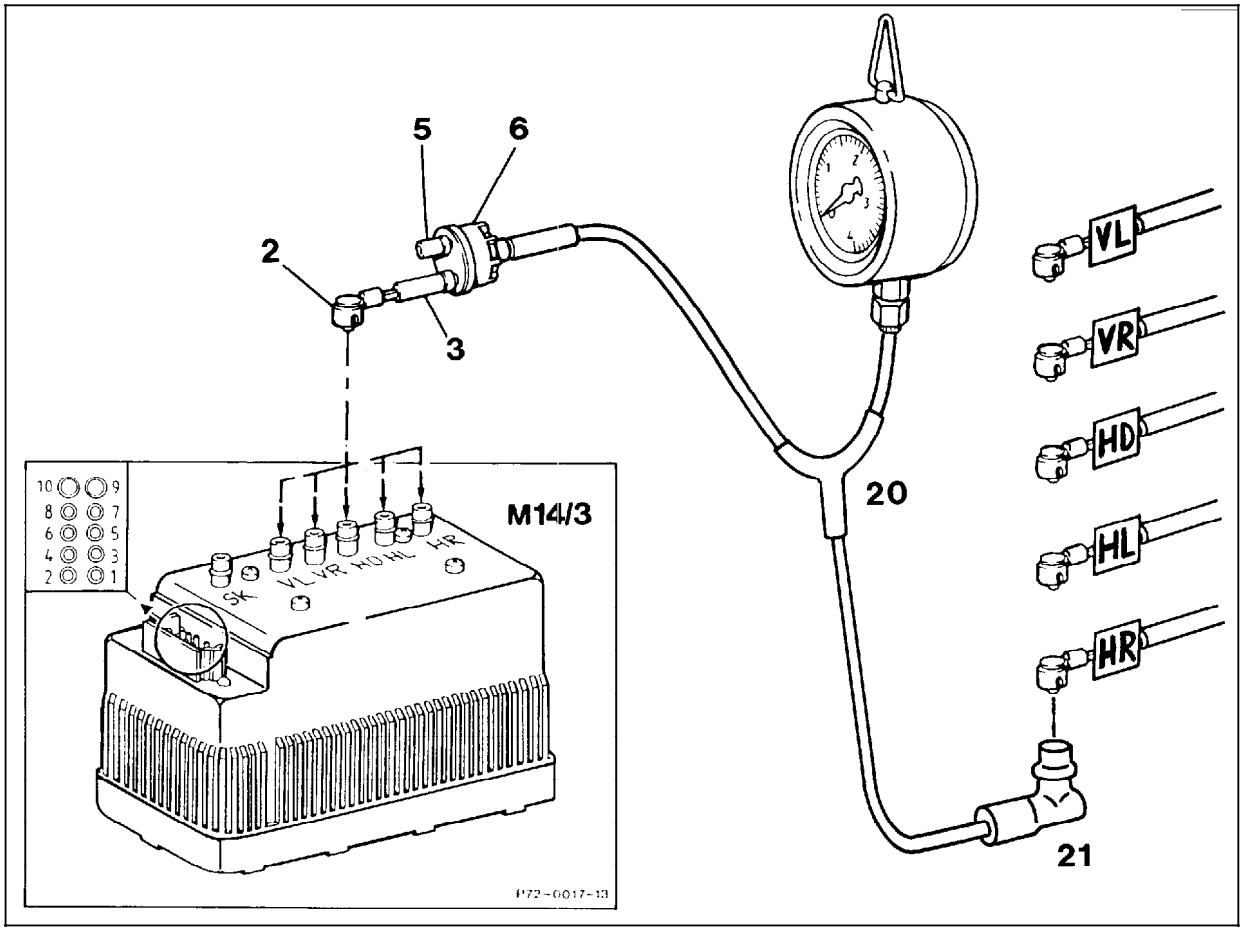
Figure 1

2	End piece cut off from part no. 129 800 09 15
3	End piece cut off from part no. 007 997 61 82
5	Cap, part no. 000 987 11 45
6	Check valve, part no. 126 800 00 78
10	Pressure gauge, part no. 603 589 03 21 00
M14/3	CA supply pump

VL	Left front door
VR	Right front door
HD	Trunk lid
HL	Left rear door
HR	Right rear door
SK	Vacuum vent connection (with screen)

Pneumatic Test Program – Test

Testing Pneumatic Actuators and Pneumatic Lines/Connectors



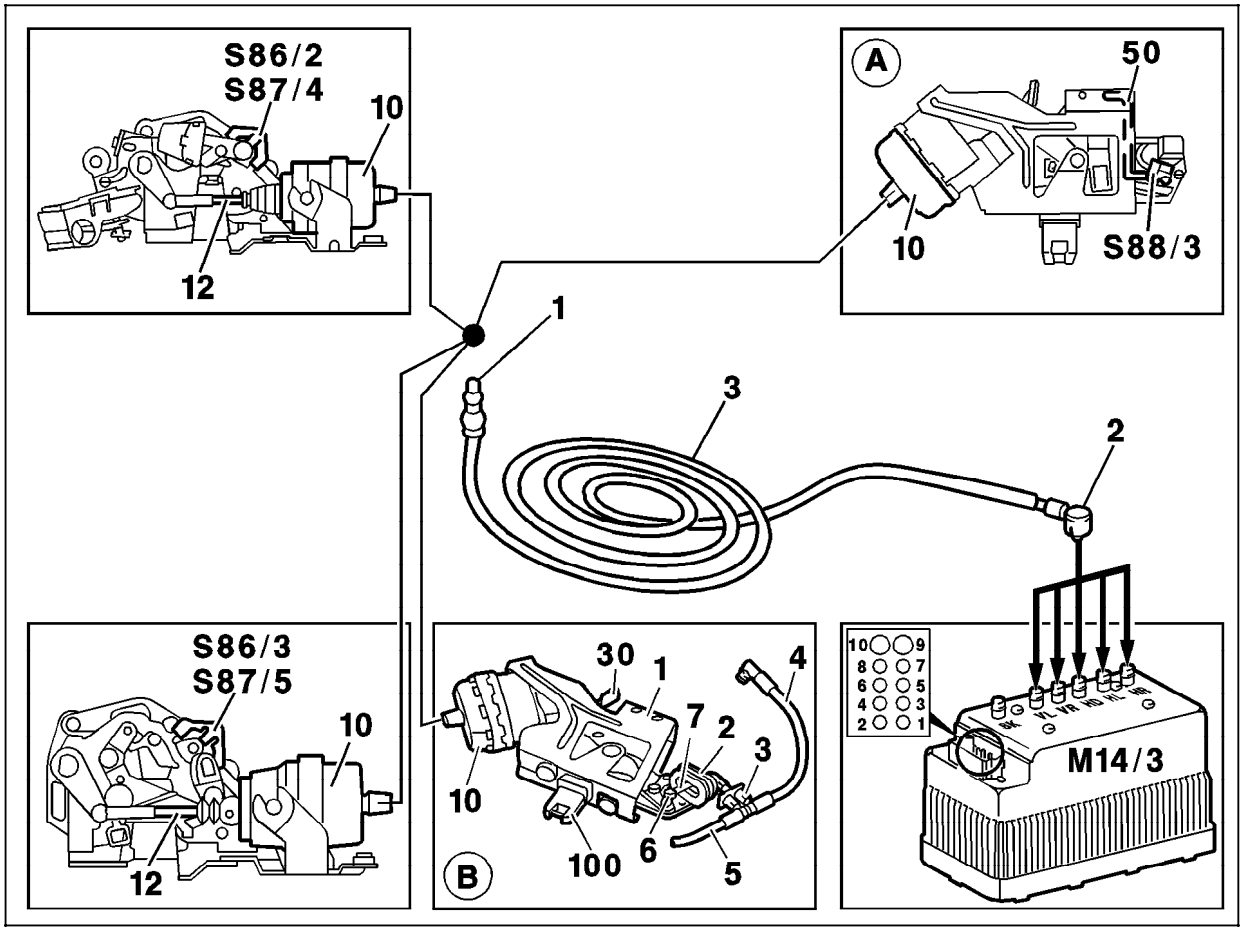
P72-5133-57

Figure 2

2	End piece cut off from part no. 129 800 09 15
3	End piece cut off from part no. 007 997 61 82
5	Cap, part no. 000 987 11 45
6	Check valve, part no. 126 800 00 78
20	Junction connector, part no. 117 078 01 45
21	Line, part no. 140 800 51 81
M14/3	CA supply pump
VL	Left front door
VR	Right front door
HD	Trunk lid
HL	Left rear door
HR	Right rear door
SK	Vacuum vent connection (with screen)

Pneumatic Test Program – Test

Testing Pneumatic Actuators



P72-5364-57

Figure 3

A	Version up to chassis end no. 118120
B	Version as of chassis end no. 118121
1	Pneumatic connector, part no. 129 805 04 44
2	End piece cut off from part no. 129 800 09 15
3	End piece cut off from part no. 007 997 61 82
10	Pneumatic actuators
M14/3	CA supply pump
VL	Left front door
VR	Right front door
HD	Trunk lid
HL	Left rear door
HR	Right rear door
SK	Vacuum vent connection (with screen)

Pneumatic Test Program – Test

⇒	Test scope	Test connection	Test condition	Nominal value	Possible cause/Remedy
1.0	**Left front door (VL)** Pressure supply	CA supply pump (M14/3) connection VL (Figure 1)	Using open end wrench, disconnect connection VL from M14/3. Connect pressure gauge according to connection diagram (Figure 1). Close left front door past the second detent.	>2 bar	M14/3 (SMS, Repair Instructions, Job No. 72-262), Clogged vent line SK)if vent line was left on pump).
2.0	**Left front door (VL)** Pneumatic actuator Pneumatic lines	CA supply pump (M14/3) connection VL (Figure 2)	Connect pneumatic test line according to connection diagram (Figure 2). Close left front door past the second detent.	Door must close by itself, wait 10 seconds >2 bar Pressure drop 100 mbar in 1 minute.	Pneumatic actuator or line leaking or kinked (SMS, Repair Instructions, Job No. 72-266), Clogged vent line SK (if vent line was left on pump).
3.0	**Left front door (VL)** Pneumatic actuator	CA supply pump (M14/3) connection VL (Figure 3)	Pull pneumatic line off actuator. Connect pneumatic test line according to connection diagram (Figure 3). Close left front door past the second detent.	Actuator must latch the door.	Pneumatic actuator leaking.

Pneumatic Test Program – Test

⇒	Test scope	Test connection	Test condition	Nominal value	Possible cause/Remedy
4.0	**Right front door (VR)** Pressure supply	CA supply pump (M14/3) connection VR (Figure 1)	Using open end wrench, disconnect connection VR from M14/3. Connect pressure gauge according to connection diagram (Figure 1). Close right front door past the second detent.	>2 bar	M14/3 (SMS, Repair Instructions, Job No. 72-262), Clogged vent line SK (if vent line was left on pump).
5.0	**Right front door (VR)** Pneumatic actuator Pneumatic lines	CA supply pump (M14/3) connection VR (Figure 2)	Connect pneumatic test line according to connection diagram (Figure 2). Close right front door past the second detent.	Door must close by itself, wait 10 seconds >2 bar Pressure drop 100 mbar in 1 minute.	Pneumatic actuator or line leaking or kinked (SMS, Repair Instructions, Job No. 72-266), Clogged vent line SK (if vent line was left on pump).
6.0	**Right front door (VR)** Pneumatic actuator	CA supply pump (M14/3) connection VR (Figure 3)	Pull pneumatic line off actuator. Connect pneumatic test line according to connection diagram (Figure 3). Close right front door past the second detent.	Actuator must latch the door.	Pneumatic actuator leaking.

Pneumatic Test Program – Test

⇒	Test scope	Test connection	Test condition	Nominal value	Possible cause/Remedy
7.0	**Left rear door (HL)** Pressure supply	CA supply pump (M14/3) connection HL (Figure 1)	Using open end wrench disconnect connection HL from M14/3. Connect pressure gauge according to connection diagram (Figure 1). Close left rear door past the second detent.	>2 bar	M14/3 (SMS, Repair Instructions, Job No. 72–262), Clogged vent line SK (if vent line was left on pump).
8.0	**Left rear door (HL)** Pneumatic actuator Pneumatic lines	CA supply pump (M14/3) connection HL (Figure 2)	Connect pneumatic test line according to connection diagram (Figure 2). Close left rear door past the second detent.	Door must close by itself, wait 10 seconds >2 bar Pressure drop 100 mbar in 1 minute.	Pneumatic actuator or line leaking or kinked (SMS, Repair Instructions, Job No. 72-266), Clogged vent line SK (if vent line was left on pump).
9.0	**Left front door (HL)** Pneumatic actuator	CA supply pump (M14/3) connection HL (Figure 3)	Connect pneumatic line according to connection diagram (Figure 3). Close left rear door past the second detent.	Actuator must latch the door.	Pneumatic actuator leaking.

Pneumatic Test Program – Test

⇒	Test scope	Test connection	Test condition	Nominal value	Possible cause/Remedy
10.0	**Right rear door (HR)** Pressure supply	CA supply pump (M14/3) connection HR (Figure 1)	Using open end wrench, disconnect connection HR from M14/3. Connect pressure gauge according to connection diagram (Figure 1). Close right rear door past the second detent.	>2 bar	M14/3 (SMS, Repair Instructions, Job No. 72-262), Clogged vent line SK (if vent line was left on pump).
11.0	**Right rear door (HR)** Pneumatic actuator Pneumatic lines	CA supply pump (M14/3) connection HR (Figure 2)	Pull pneumatic line off actuator. Connect pneumatic test line (HR) according to connection diagram (Figure 2). Close right rear door past the second detent.	Door must close by itself, wait 10 seconds >2 bar Pressure drop 100 bar in 1 minute.	Pneumatic actuator or line leaking or kinked (SMS, Repair Instructions, Job No. 72-266), Clogged vent line SK (if vent line was left on pump).
12.0	**Right rear door (HR)** Pneumatic actuator	CA supply pump (M14/3) connection HR (Figure 3)	Pull pneumatic line off actuator. Connect pneumatic test line according to connection diagram (Figure 3). Close right rear door past the second detent.	Actuator must latch the door.	Pneumatic actuator leaking.

Pneumatic Test Program – Test

⇒	Test scope	Test connection	Test condition	Nominal value	Possible cause/Remedy
13.0	**Trunk lid (HD)** Pressure supply	CA supply pump (M14/3) connection HD (Figure 1)	Using open end wrench, disconnect connection HD from M14/3. Connect pressure gauge according to connection diagram (Figure 1). Manually close latch (lower part).	>2 bar	M14/3 (SMS, Repair Instructions, Job No. 72-262).
14.0	**Trunk lid (HD)** Pneumatic actuator Pneumatic lines	CA supply pump (M14/3) connection HD (Figure 2)	Pull pneumatic line off trunk lid actuator (upper part). Striker tongue must be extended, if not, pull lever (50, Figure 3) to the outside (striker tongue extends). Starting chassis end no. 118121 the activation was modified, whereby the striker tongue is activated via the retractable trunk lid grip. Connect pneumatic test line according to connection diagram (Figure 2). Manually close latch (lower part).	Wait 10 seconds >2 bar Pressure drop 100 bar in 1 minute.	Pneumatic actuator or line leaking or kinked (SMS, Repair Instructions, Job No. 72-266).

Pneumatic Test Program – Test

⇒	Test scope	Test connection	Test condition	Nominal value	Possible cause/Remedy
15.0	**Trunk lid (HD)** Pneumatic actuator	CA supply pump (M14/3) connection HD (Figure 3)	Pull pneumatic line off actuator. Connect pneumatic test line according to connection diagram (Figure 3). Manually close latch (lower part).	Striker tongue retracts.	Pneumatic actuator leaking.

Note:
AS of chassis end number 118121, pressure or vacuum for the lock striker actuator is applied in parallel with the retractable trunk lid grip actuator. If during diagnosis, the retractable trunk lid grip actuator and pneumatic line are determined to be leak-free, be certain to check the multiple connector (3) and lock striker actuator (2) for possible leakage as well.

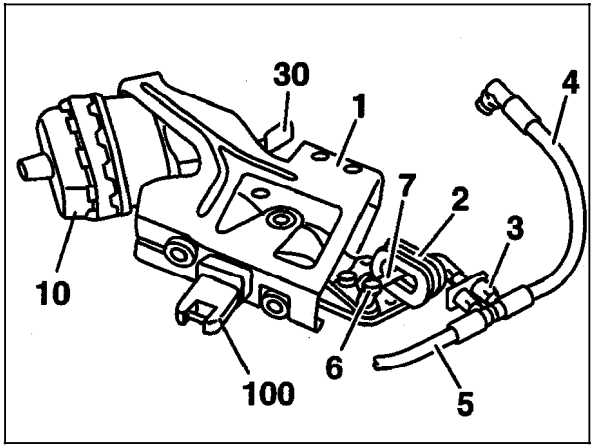
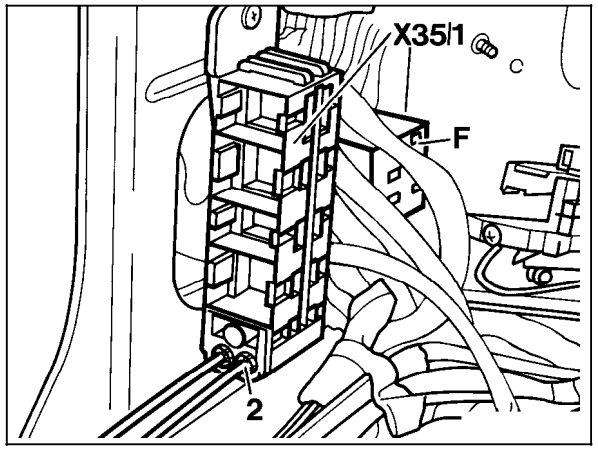


Figure 4 P88-5310-13

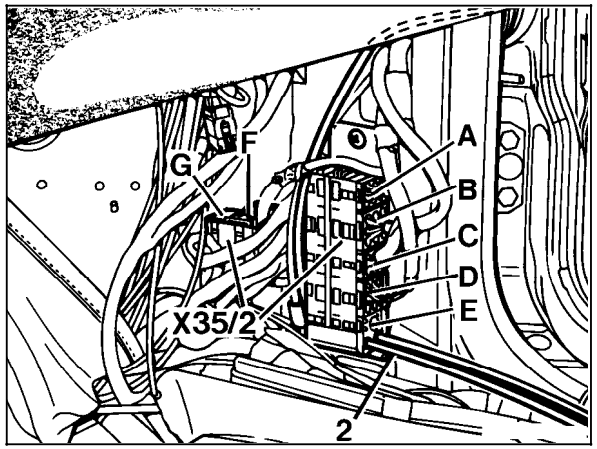
Pneumatic Test Program – Test



P80-2211-13A

Figure 5

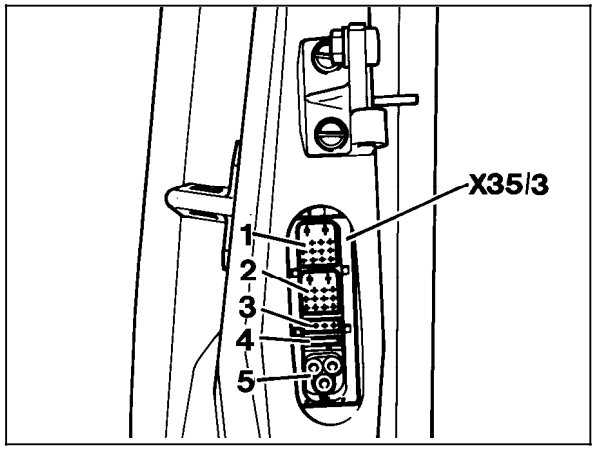
X35/1 Left front door separation point



P80-2229-13

Figure 6

X35/2 Right front door separation point



P54-2808-13

Figure 7

X35/3 Left rear door separation point
X35/4 Right rear door separation point
(mirror image of left shown)