### SB-10048760-5824

### PORSCHE

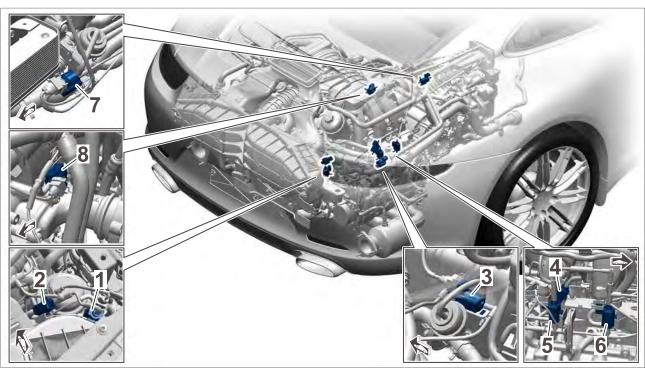
# Technical Information

64/12 ENU WO

Service

### WC43 - Replacing Electric Change-over Valves (Workshop Campaign)

Vehicle Type:	911 Carrera (991)/91	1 Carrera S (991)				
Model Year:	As of 2012 up to 2013					
Revisions:	<b>Revision 1</b> – November 2, 2012; 1. Amends the table on Page 2, i.e., items 7 and 8 have been reversed. 2. Amends text for Items 7 and 8 by reversing their order.					
	Revision 2 – November 2 "Change-over valve new/o	29, 2012 Additional information note added to pa old″.	ge 4 with illustration			
Concerns:	Electric change-over v	alves				
Information:	This is to inform you of a voluntary Workshop Campaign on the above-mentioned vehicles. There is the possibility that electric change-over valves, which may be susceptible to the ingress of moisture due to insufficient sealing, were installed in the affected vehicles. This can cause the change-over valves to malfunction over time.					
	As a result, control over the and manual transmission)	ne closing valves in the clutch cooling system (PD I may be impaired.	K) and gear wheel set (PDK			
	In extreme driving situations (e.g. race starts, high ambient temperature, frequent gear changes), the transmission or clutch could overheat.					
Action Required:	<b>Replace</b> the <b>electric change-over valves</b> for the gear wheel set heat exchanger and the change-over valve for the clutch fluid heat exchanger. Additionally, all thermal management change-over valves of the same design must be replaced in order to ensure that all valves within the vehicle are of the same type.					
Affected Vehicles:	The VIN(s) can be checked by using PIWIS Vehicle Information link to verify if the campaign affects the vehicle. This campaign is scope specific to the VIN! Failure to verify in PIWIS may result in an improper repair. This campaign affects 3,718 vehicles in North America.					
Parts Info:	NOTE: DO NOT ORDER PARTS FOR THIS CAMPAIGN. THEY WILL BE AUTOMATICALLY ALLOCATED TO YOUR DEALERSHIP.					
	000.043.207.99	$\Rightarrow$ Change-over value	Qty. depends on equipment (5 to 8 valves)			



Installation position of change-over valves

The number of change-over valves required depends on the vehicle equipment.

Item	Change-over valve (function)	991 (3.4 l)	991 S (3.8 l)	Note
1	Air cleaner housing flap			
2	Sound symposer			
3	Shut-off valve for heat exchanger			
4	Exhaust flaps			Only for 3.8-liter engine or sports exhaust system (I-no. 176)
5	Coolant shut-off valve on engine			Coolant bypass
6	Resonator flap			
7	Shut-off valve for clutch fluid heat exchanger			Only for PDK transmission (I-no. 250)
8	Shut-off valve for gear wheel set heat exchanger			

= Standard

 $\Box = Optional$ 

#### Special Tools: Nr.89 Pos.5 - Torque screwdriver Part No. PNA 0T6 494 (VAS 6494)

Work See Attachment "A".

Procedure:

Claim See Attachment "B". Submission:

Attachment "A" Work Procedure

- 1 Remove rear spoiler ⇒ Workshop Manual '66581905 Removing and installing rear spoiler section on "Removing".
- 2 Remove DME control unit ⇒ Workshop Manual '247019 Removing and installing DME control unit section on "Removing".
- 3 Remove rear underbody panelling ⇒ Workshop Manual '519419 Removing and installing cover for rear underbody section on "Removing".

### Replace change-over valves

# i Information

The procedure for replacing the change-over valves is described in detail using the change-over valve for the air cleaner flap as an example.

The work must be carried out in the same way for the other change-over valves.

#### i Information

Replace the change-over valves individually so as not to

mix up the connecting lines and plug connections.

- 1 Fresh-air connection
- 2 Vacuum line for the actuator
- **3** Vacuum connection

# i Information



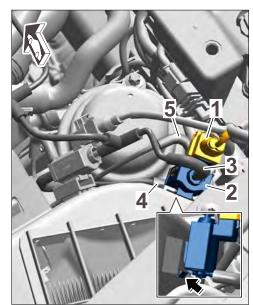
Overview of change-over valve

The new change-over valve **must** have a protection cap, see arrow in illustration "Change-over valve new/old".



Change-over valve, new/old

- 1 Replace change-over valve for air cleaner housing flap.
  - 1.1 Remove change-over valve.
    - 1.1.1 Release electric plug connection ⇒ Change-over valve for air cleaner housing flap -1- and pull it off the change-over valve ⇒ Change-over valve for air cleaner housing flap -2-.
    - 1.1.2 Pull fresh-air line  $\Rightarrow$  Change-over valve for air cleaner housing flap -3off the change-over valve.
    - 1.1.3 Pull vacuum line  $\Rightarrow$  Change-over valve for air cleaner housing flap -4off the change-over valve.
    - 1.1.4 Pull vacuum line for the air cleaner housing flap  $\Rightarrow$  Change-over valve for air cleaner housing flap -5- off the change-over valve.



Change-over valve for air cleaner housing flap

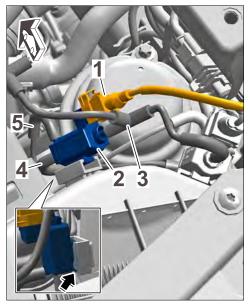
- 1.1.5 Unclip change-over valve from the air cleaner housing using a screwdriver ⇒ *Change-over valve for air cleaner housing flap* -arrow- and pull it off in an upward direction.
- 1.2 Install new change-over valve, part no. **000.043.207.99**.
  - 1.2.1 Press the change-over value  $\Rightarrow$  Change-over value for air cleaner housing flap -2into the guide on the air cleaner housing until it engages securely.
  - 1.2.2 Fit vacuum line for the air cleaner housing flap  $\Rightarrow$  Change-over valve for air cleaner housing flap -5- on the change-over valve.

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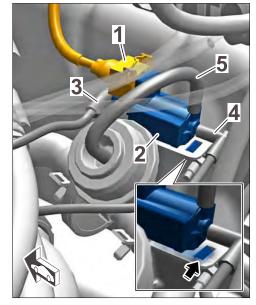
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- 1.2.3 Fit vacuum line (supply)  $\Rightarrow$  Change-over value for air cleaner housing flap -4- on the change-over value.
- 1.2.4 Fit fresh-air line  $\Rightarrow$  Change-over value for air cleaner housing flap -3- on the change-over value.
- 1.2.5 Plug in electric connector  $\Rightarrow$  Change-over valve for air cleaner housing flap-1- on the change-over valve  $\Rightarrow$  Change-over valve for air cleaner housing flap-2- until the connector engages securely.
- 2 Replace change-over valve for sound symposer.
  - **1** Electric plug connection
  - 2 Change-over valve for sound symposer
  - 3 Fresh-air line
  - 4 Vacuum line (supply)
  - 5 Vacuum line for sound symposer

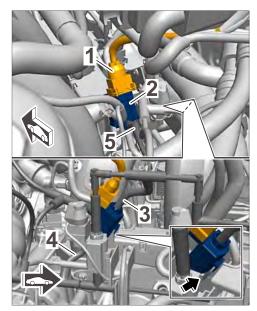


Change-over valve for sound symposer

- 3 Replace change-over valve for heat exchanger shut-off valve.
  - 1 Electric plug connection
  - Change-over valve for heat exchanger shut-off valve
  - 3 Fresh-air line
  - 4 Vacuum line (supply)
  - 5 Vacuum line for heat exchanger shut-off valve



Change-over valve for heat exchanger

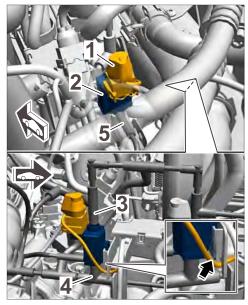


Change-over valve for exhaust flaps

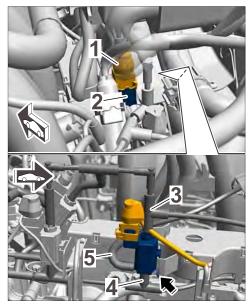
4 Replace change-over valve for exhaust flaps (only for 3.8-liter engine or sports exhaust system, I-no. 176).

- 1 Electric plug connection
- 2 Change-over valve for exhaust flaps
- 3 Fresh-air line
- 4 Vacuum line (supply)
- **5** Vacuum line for the exhaust flaps

- 5 Replace change-over valve for coolant shut-off valve for engine.
  - 1 Electric plug connection
  - 2 Change-over valve for coolant shut-off valve for engine
  - 3 Fresh-air line
  - 4 Vacuum line (supply)
  - 5 Vacuum line for coolant shut-off valve for engine



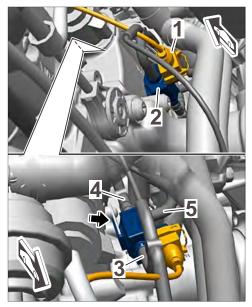
Change-over valve for coolant shut-off valve



Change-over valve for resonator flap

- 6 Replace change-over valve for resonator flap (only for 3.8-liter engine).
  - 1 Electric plug connection
  - 2 Change-over valve for resonator flap
  - **3** Fresh-air line
  - 4 Vacuum line (supply)
  - **5** Vacuum line for resonator flap

- 7 Replace change-over valve for shut-off valve for gear wheel set heat exchanger.
  - 1 Electric plug connection
  - 2 Change-over valve for shut-off valve for gear wheel set heat exchanger
  - **3** Fresh-air line
  - 4 Vacuum line (supply)
  - 5 Vacuum line for shut-off valve for gear wheel set heat exchanger

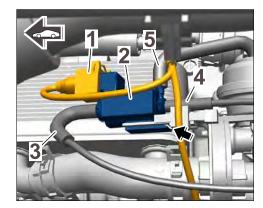


Change-over valve for gear wheel set heat exchanger

8 Replace change-over valve for shut-off valve for clutch fluid heat exchanger **(only for PDK transmission, I-no. 250)**.

- 1 Electric plug connection
- 2 Change-over valve for shut-off valve for clutch fluid heat exchanger
- 3 Fresh-air line
- 4 Vacuum line (supply)
- 5 Vacuum line for shut-off valve for clutch fluid heat exchanger

### Subsequent work



Change-over valve for shut-off valve for clutch fluid heat exchanger

- 1
   Install cover for rear underbody ⇒ Workshop Manual
   For clutch fluid heat ex

   '519419 Removing and installing cover for rear underbody section on "Installing".
- 2 Install DME control unit ⇒ Workshop Manual '247019 Removing and installing DME control unit section on "Installing".
- 3 Install rear spoiler  $\Rightarrow$  Workshop Manual '66581905 Removing and installing rear spoiler section on "Installing".
- 4 Enter the workshop campaign in the Warranty and Maintenance booklet.

### Attachment "B"

Claim Submission - Workshop Campaign WC43

Warranty claims should be submitted via WWS/PQIS.

Open campaigns may be checked by using either the PIWIS Vehicle Information system or through PQIS Job Creation.

Labor, parts, and sublet will be automatically inserted when Technician is selected in WWS/PQIS. If necessary, the required part numbers will need to be manually entered into warranty system by the dealer administrator.

### Scope 1: Valid for:

### • 911 Carrera (991) with manual transmission (I-no. 480) and standard exhaust system

Working ti	me:			
Replacing electric change-over valvesIncludes:Removing and installing cover for rear underbody Removing and installing DME control unit Removing and installing rear spoiler			body	Labor time: <b>155 TU</b>
Parts requ	uired:			
000.043.2	07.99	Change-over valve	5	
⇒ Damag	e code	WC430660002		

#### Scope 2: Valid for:

- 911 Carrera (991) with manual transmission (I-no. 480) and sports exhaust system (I-no. 176)
- 911 Carrera (991) with PDK transmission (I-no. 250) and standard exhaust system

Working tir	ne:					
Replacing el Includes:	lectric change-over valves Removing and installing cover for rear underbody Removing and installing DME control unit Removing and installing rear spoiler	Labor time: 165				
Parts requi	ired:					
000.043.20	07.99 Change-over valve	6				
$\Rightarrow$ Damage code WC43 066 000 2						

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#### Scope 3: Valid for:

- 911 Carrera (991) with PDK transmission (I-no. 250) and sports exhaust system (I-no. 176)
- 911 Carrera (991) with manual transmission (I-no. 480) and standard exhaust system
- 911 Carrera (991) with manual transmission (I-no. 480) and sports exhaust system (I-no. 176)

Working ti	me:		
Replacing e Includes:	electric change-over valves Removing and installing cover for rear underbody Removing and installing DME control unit Removing and installing rear spoiler		Labor time: <b>171 TU</b>
Parts requ	ired:		
000.043.2	07.99 Change-over valve	7	
⇒ Damage	e code WC43 066 000 2		

#### Scope 4: Valid for:

- 911 Carrera (991) with PDK transmission (I-no. 250) and standard exhaust system
- 911 Carrera (991) with PDK transmission (I-no. 250) and sports exhaust system (I-no. 176)

Working time:		
Replacing electric change-over valves Includes: Removing and installing of Removing and installing D Removing and installing re	ME control unit	Labor time: <b>180 TU</b>
Parts required:		
000.043.207.99 Change-over valve	{	8
$\Rightarrow$ Damage code WC43 066 000 2		

References:

 $\Rightarrow$  Workshop Manual '66581905 Removing and installing rear spoiler'  $\Rightarrow$  Workshop Manual '519419 Removing and installing cover for rear underbody'

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⇒ Workshop Manual '247019 Removing and installing DME control unit'

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Dealership	Service Manager	 Shop Foreman	 Service Technician	 	 
Distribution	Aret Manager	Manage to Aslasta	Constant Technisian		
Routing	Asst. Manager	 Warranty Admin.	 Service Technician	 	 

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