

**WH24 - Re-programming Control Units for PDCC (Workshop Campaign)**

**Important:** **CRITICAL WARNING** - This campaign includes steps where control unit(s) in the vehicle will be programmed with the PIWIS Tester. The vehicle voltage must be maintained between 13.5 volts and 14.5 volts during this programming. Failure to maintain this voltage could result in damaged control unit(s). Damage caused by inadequate voltage during programming is not a warrantable defect. The technician must verify the actual vehicle voltage in the PIWIS Tester before starting the campaign and also document the actual voltage on the repair order. Please refer to Equipment Information EQ1401 for a list of suitable battery chargers/power supplies which should be used to maintain vehicle voltage.

**Model Year:** As of 2017 up to 2018

**Vehicle Type:** Panamera 4S (971)/Panamera Turbo (971)/Panamera Turbo S Hybrid (971)

**Subject:** Control units for PDCC

**Information:** Due to an incorrect parameter set for both control units for PDCC, the PASM control unit can detect non-existent swaying of the chassis under certain driving conditions. As a result, the PDCC system is deactivated and the chassis is switched to Sport mode.

If this happens, the yellow warning message "Chassis system fault - Visit workshop, Adapted driving permitted" will be displayed in the instrument cluster and the vehicle then permanently behaves like a chassis in Sport mode.

**Remedial Action:** Re-program control units for PDCC using the PIWIS Tester with software version **36.000** (or higher) installed.



**Information**

During the campaign, the control units for PDCC are re-programmed and then re-coded **automatically**. It takes **about 15 minutes** to **program and code** the control units.

**Affected Vehicles:** Only the vehicles assigned to the campaign (see also PIWIS Vehicle information). This campaign affects 80 vehicles in North America.

**Required tools**

**NOTICE**

**Use of a PIWIS Tester software version that is older than the prescribed version**

- Measure is ineffective
- ⇒ Always use the prescribed version or a higher version of the PIWIS Tester software for control unit programming.

- Tools:
- **9900 - PIWIS Tester 3** with PIWIS Tester software version **36.000** (or higher) installed
  - **Battery Charger/Power Supply** - Suitable for AGM Type batteries, recommended current rating of 70A fixed voltage 13.5V to 14.5V.

### Preparatory work

#### NOTICE

Fault entry in the fault memory and control unit programming aborted due to low-voltage.

- Increased current draw during diagnosis or control unit programming can cause a drop in voltage, which can result in one or more fault entries and the abnormal termination of the programming process.
- ⇒ Before starting control unit programming, connect a suitable battery charger or power supply, suitable for AGM type batteries, recommended current rating of 70A fixed voltage 13.5V to 14.5V.

#### NOTICE

Completely flat vehicle battery

- The break in communication in the vehicle system during programming causes safety-relevant functions, e.g. driving light and brake light, to be switched on automatically. This results in an increased current draw, which will run down the vehicle battery.
- ⇒ Before starting control unit programming, connect a suitable battery charger or power supply, suitable for AGM type batteries, recommended current rating of 70A fixed voltage 13.5V to 14.5V.

#### NOTICE

Control unit programming will be aborted if the Internet connection is unstable.

- An unstable Internet connection can interrupt communication between PIWIS Tester and the vehicle communication module (VCI). As a result, control unit programming may be aborted.
- ⇒ During control unit programming, always connect PIWIS Tester to the vehicle communication module (VCI) via the USB cable.

Work Procedure: 1 Carry out general preliminary work for control unit programming as described in ⇒ *Workshop Manual '9X00IN Basic instructions and procedure for control unit programming using the PIWIS Tester'*.

### Re-programming control units for PDCC

#### NOTICE

Use of a PIWIS Tester software version that is older than the prescribed version

- Measure is ineffective

⇒ **Always use the prescribed version or a higher version of the PIWIS Tester software for control unit programming.**



**Information**

The procedure described here is based on the PIWIS Tester 3 software version **36.000**.

The PIWIS Tester instructions take precedence and in the event of a discrepancy, these are the instructions that must be followed.

A discrepancy may arise with later software versions for example.



**Information**

During the campaign, the control units for PDCC are re-programmed and then re-coded **automatically**. It takes **about 15 minutes** to **program and code** the control units.

Work Procedure: 1 **Re-program control units for PDCC.**

The basic procedure for control unit programming is described in the Workshop Manual ⇒ *Workshop Manual '9X00IN Basic instructions and procedure for control unit programming using the PIWIS Tester'*.

**For specific information on control unit programming during this campaign, see the table below:**

Required PIWIS Tester software version:	<b>36.000</b> (or higher)
Type of control unit programming:	Control unit programming using the " <b>Campaign</b> " <b>function in the Additional menu</b> on the PIWIS Tester by entering a programming code.
Programming code:	<b>Z4M3T</b>
Programming sequence:	Read and follow the <b>information and instructions on the PIWIS Tester</b> during the guided programming sequence. The <b>control units for PDCC</b> are <b>re-programmed</b> and then <b>re-coded automatically</b> during the programming sequence. <b>Do not interrupt programming and coding.</b>
Programming time (approx):	<b>15 minutes</b>

Software version programmed during this campaign:	<b>0212</b> Following control unit programming, the software version can be read out of the control unit for front anti-roll stabilisation (PDCC) or rear anti-roll stabilisation (PDCC) in the 'Extended identifications' menu using the PIWIS Tester.
Procedure in the event of abnormal termination of control unit programming:	<ul style="list-style-type: none"> <li>• Switch ignition off and then on again.</li> <li>• Read out and erase fault memories ⇒ <i>Workshop Manual '9X00IN Basic instructions and procedure for control unit programming using the PIWIS Tester - section on "Subsequent work"</i>.</li> <li>• Repeat control unit programming by entering the programming code again.</li> </ul>
Procedure in the event of error messages appearing during the programming sequence:	⇒ <i>Workshop Manual '9X00IN Basic instructions and procedure for control unit programming using the PIWIS Tester - section on "Fault finding"</i> .

## Reading out and erasing fault memory



### Information

Brief breaks in communication between the control units during programming and coding can result in fault memory entries in all control units in the vehicle system, which might **not be deleted automatically**.

**In addition** to the automatic deletion of the fault memories during programming, the fault memories of all control units must therefore be **read out and deleted again** as described below **after each programming and coding process**.

Work Procedure: 1 Press •F7" in the control unit selection screen ('Overview' menu) to call up the Additional menu.

- 2 Select the function "Read all fault memories and erase if required" and press •F12" ('Next') to confirm your selection ⇒ *Erasing fault memories*.

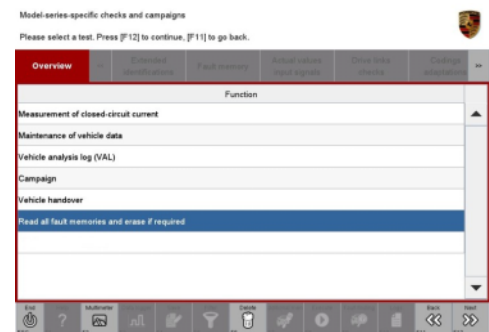
The fault memories of the control units are read out.

- 3 Once you have read out the fault memories, check the fault memory entries.



### Information

If control units are found to have faults that are **not** caused by control unit programming, these must first be **found** and **corrected**. This work **cannot** be invoiced under the workshop campaign number.



*Erasing fault memories*

- 4 Press •F8“ to delete fault memory entries.
- 5 Press •F12“ ('Yes') in response to the question as to whether you really want to delete all fault memory entries.

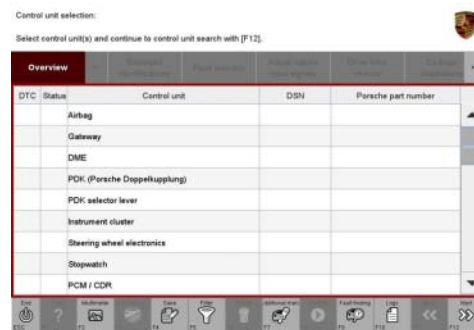
The faults stored in the fault memories of the various control units are deleted.



**Information**

If fault memory entries for individual control units cannot be deleted, proceed as follows:

- Switch off the ignition.
  - Disconnect the PIWIS Tester diagnostic connector from the diagnostic socket.
  - Lock the vehicle using the driver's key.
  - Wait approx. 1 minute before unlocking the vehicle again.
  - Start the engine, leave it running for a short time and then stop it again.
  - Switch off the ignition and wait approx. 10 seconds before switching it back on again.
  - Plug the PIWIS Tester diagnostic connector into the diagnostic socket again and restore communication with the vehicle.
  - Read out the fault memory again and delete any fault memory entries that are stored.
- 6 Once you have erased the fault memories, select the '**Overview**' menu to return to the control unit selection screen ⇒ *Control unit selection*.

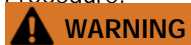


*Control unit selection*

**Calibrating the levelling system**

Work

Procedure:



**Automatic lifting and lowering of the vehicle**

- **Danger of limbs being trapped when working on the vehicle during the adjustment procedure.**
- ⇒ **The vehicle must stand freely and must not be jacked up.**
- ⇒ **Do not work on the vehicle.**

⇒ Stay a safe distance away from the vehicle.

- 1 Calibrate the levelling system ⇒ *Workshop Manual '430115 Calibrating the levelling system'*.

### Concluding work

- Work Procedure: 1 Carry out general concluding work for control unit programming as described in ⇒ *Workshop Manual '9X00IN Basic instructions and procedure for control unit programming using the PIWIS Tester'*.
- 2 Enter the campaign in the Warranty and Maintenance booklet.

### Warranty processing



#### Information

The specified working time was determined specifically for carrying out this campaign and may differ from the working times published in the Labor Operation List in PIWIS.

Scope:

#### Working time:

Re-programming control units for PDCC

Labor time: **97 TU**

Includes: Connecting and disconnecting battery charger  
Connecting and disconnecting PIWIS Tester  
Reading out and erasing fault memories  
Calibrating the levelling system

⇒ **Damage Code WH24 066 000 1**

**Important Notice:** Technical Bulletins issued by Porsche Cars North America, Inc. are intended only for use by professional automotive technicians who have attended Porsche service training courses. They are written to inform those technicians of conditions that may occur on some Porsche vehicles, or to provide information that could assist in the proper servicing of a vehicle. Porsche special tools may be necessary in order to perform certain operations identified in these bulletins. Use of tools and procedures other than those Porsche recommends in these bulletins may be detrimental to the safe operation of your vehicle, and may endanger the people working on it. Properly trained Porsche technicians have the equipment, tools, safety instructions, and know-how to do the job properly and safely. If a particular condition is described, do not assume that the bulletin applies to your vehicle, or that your vehicle will have that condition. See your authorized Porsche Dealer for the latest information about whether a particular technical bulletin applies to your vehicle. Part numbers listed in these bulletins are for reference only. Always check with your authorized Porsche dealer to verify the current and correct part numbers. The work procedures updated electronically in the Porsche PIWIS diagnostic and testing device take precedence and, in the event of a discrepancy, the work procedures in the PIWIS Tester are the ones that must be followed.

© Porsche Cars North America, Inc.

Dealership	Service Manager	Shop Foreman	Service Technician
Distribution			
Routing	Asst. Manager	Warranty Admin.	Service Technician

Dr. Ing. h.c. F. Porsche AG is the owner of numerous trademarks, both registered and unregistered, including without limitation the Porsche Crest®, Porsche®, Boxster®, Carrera®, Cayenne®, Cayman®, Macan®, Panamera®, Speedster®, Spyder®, Tiptronic®, VarioCam®, PCM®, PDK®, 911®, RS®, 4S®, 718®, 918 Spyder®, FOUR UNCOMPROMISED®, and the model numbers and distinctive shapes of the Porsche automobiles such as, the federally registered 911 and Boxster automobiles. The third party trademarks contained herein are the properties of their respective owners. Porsche Cars North America, Inc. believes the specifications to be correct at the time of printing. However, specifications, standard equipment and options are subject to change without notice. Some options may be unavailable when a car is built. Some vehicles may be shown with non-U.S. equipment. Please ask your authorized Porsche dealer for advice concerning the current availability of options and verify the optional equipment that you ordered. Porsche recommends seat belt usage and observance of traffic laws at all times.

Printed in the USA