



## **TVS Personal Flasher Instruction Manual**

Congratulations on the purchase of your TVS Personal Flasher. This compact OBDII dongle gives you the possibility to flash TVS software files to your vehicle's TCU and ECU.

The instructions in this manual are based on the TVS Flash Gearbox software for programming your DSG Gearbox. However, these instructions will also apply on the TVS Flash Engine software. In short, the following steps have to be followed and will be described in more detail in this manual:

- 1) Installation of TVS Flash software
- 2) Requesting your TVS tune file
- Reading your ECU or TCU \*
- 4) Programming your ECU or TCU

\* Only necessary when the tune file is not available in the TVS software database

#### 1) Installation of the TVS Flash software

- a) Plug the TVS Personal Flasher into a USB port on your computer.
- b) Download the TVS Flash software from <a href="http://www.tvsengineering.nl/TVSFlash">http://www.tvsengineering.nl/TVSFlash</a>
- c) Run the TVS\_Flash\_Gearbox\_Installation.exe file on your computer.
- d) Follow the instructions throughout the Setup Wizard \*



e) After a few minutes the setup will finish and display the final screen confirming the installation is complete.

\* During the installation you will receive a security message for installing the needed USB drivers. You have to select the option "*Install this driver software anyway*". If you do not receive this message, you will need to follow the steps I until VII on the next page. If this is not the case, continue to step 2.









**NOTE:** Some Windows 8, 8.1 and 10 users will need to follow these instructions for installing the needed USB drivers.

I. <u>Hold down</u> the Shift key on your keyboard while you click the 'Restart' option in Windows. Your computer will restart into the menu displayed in steps II until VI.

Sleep	
Shut down	~
Restart	
Calculator	

II. Select 'Troubleshoot' within the Choose an option screen that appears.



III. Next select 'Advanced options'.







IV. Thereafter select 'Startup Settings' within the advanced options menu.



V. Finally click the 'Restart' button to restart your computer into the Startup Settings screen.

Startup Settings
Restart to change Windows options such as:
Enable low-resolution video mode
Enable debugging mode
Enable boot logging
Enable Safe Mode
Disable driver signature enforcement
Disable early-launch anti-malware protection
Disable automatic restart on system failure
Restart

VI. Hold down the F7 key at the *Startup Settings* screen to 'Disable driver signature enforcement'.



Your computer will boot with driver signature enforcement disabled. Now you will be able to install the unsigned drivers. For deactivating this option, follow the same steps again.





### 2) <u>Requesting your TVS Tune file</u>

Before you are able to read or write your TCU/ECU it is necessary to connect your personal flasher in the right way to your vehicle and request your TVS Tune file. Therefore, follow the next important steps exactly as described below:

- a) Plug the TVS Personal Flasher into a USB port on your computer and the other end into the OBDII port of your vehicle.
- b) Turn the ignition to the **ON** position but **DO NOT** start the vehicle.
- c) Launch the installed TVS Flash software by double clicking on the desktop icon. To continue the program you have to **agree** with the legal notes and be aware of the risks.

,,,,,,	~
Attention!!! The use of TVS Flash is at your own risk and TVS Engineering is not esponsible for any problems, damage or adverse effects occurred during or after the use of this personal flasher. For all support, questions and problems related to TVS Flash hardware or software please contact your VS flash supplier. You must read the information below and the End-User icense Agreement described in the disclaimer. Both are legal agreements between you and TVS Engineering which confirms your acknowledgement of our terms and conditions by clicking the 'I Agree' button. If you do not inderstand or not agree, please click the 'I Do Not Agree' button and contact our program vendor immediately.	^
Vehicle conditions VS Engineering offers unique software solutions for almost any VAG engine or earbox application. Due to our years of experience and unique technical knowledge ve know that checking the vehicle's condition is a crucial first step when performing any erformance enhancing modification to the engine or gearbox of a vehicle. Therefore we lways perform extensive diagnostics on the engine and gearbox hardware before doing ny modification to the vehicle. This way we have maximum possible guarantee that our oftware modifications work correctly and don't cause any issues due malfunctioning ardware. With using the personal flasher, you are aware of the fact that your car did not ave a full vehicle diagnostics performed by a TVS trained engineer and therefore you ake full responsibility for any hardware related problems occurring.	
Deservesion	

d) Click 'Next >' to continue.







e) Please click 'Next >' again.



f) Please click 'Next' one more time.



After this the TVS Flash software will attempt to detect your TCU or ECU type.







g) Click 'Copy Screen Text' and paste this text in an email to your flashtool supplier.

Welcome to	Vehicle information : Detected ECU Type : Vehicle Ident. No. : USB Device information :
GEARE	Data has been copied to the clipboard.
TVSengineering.nl	Please click "Next' to proceed        < Vorige      Volgende >      Close      Help ++

# From here you have to wait until the flashtool supplier provides you the instructions to continue. <u>DO NOT</u> proceed and do not choose any TCU/ECU Type. Otherwise your TVS Personal Flasher could be locked to the wrong protocol and is useless anymore.

After this there are two possible next steps:

- I. TVS sends you the tuned file and the instructions for correctly programming your vehicle. If this is the case, skip step 3 and go directly to **step 4**.
- II. TVS sends you instructions to read out your vehicle (only if no software is available in database). If this is the case, follow first the instructions described in **step 3**.

After you received a mail from your flashtool supplier it is possible to finish **step 2** on the next page. However, before you can read or write software (as instructed in the mail from your flashtool supplier) it is very important to select the right TCU/ECU type and protocol. Otherwise your TVS Personal Flasher will be locked to the wrong protocol and is useless anymore. For this follow the next critical steps described on the next page.





 h) Select the corresponding protocol you received from your flashtool supplier by mail from the pull-down bar beside 'Detected ECU Type' and then click "Yes" to confirm your selection. Only click "Yes" if you are 100% sure you selected the right protocol!

Welcomete		[]
welcome to	Detected ECU Type :	•
TVS FLASH	Vehicle Ident. No. :	Haldex GEN #2 Haldex GEN #4 Haldex GEN #5
	USB Device information	Temic DQ200 Temic DQ200 MQB Gen #1
A STATE OF STATE	USB Device SN :	Temic DQ200 MQB Gen #2 Temic DQ250 Cox
SET 11 Sin	Coded ECU Type :	Temic DQ250 Exx Temic DQ250 Exx
ANTICKES	Coded Ident. No. :	Temic DQ380 Temic DQ400
GEARBOX		Temic DQ500 MQB
<b>USA</b>	The system was not able t with this vehicle. Please c	Temic DL382 Temic DL382 Temic DL501 Old Temic DL501 Gen #1 Temic DL501 Gen #2 Temic DL800
		Bosch VL300
		Bosch AL420 (GS19.11.4) Bosch AL600 (GS19.11.7) Marelli SL600
TVSengineering.nl	Please click 'Next' to proce	eed

Are you sure you know better ? Click 'Yes' to keep your new selection. Click 'No' to restore previous selection.
Ja Nee

i) Click 'Next' to continue where your Personal Flasher will be locked to your vehicle and then click "Yes" for further confirmation of your selection.

	Vehicle information :	
Welcome to	Detected ECU Type : Temic DQ200	
	Vehicle Ident. No. :	
	USB Device information :	
North Contraction	USB Device SN : 25067 - End User	
Sector De San	Coded ECU Type : No ECU type coded	
GEARBOX	Coded Ident. No. : No identification coded	Are you sure you like to code your hardware device with the following information :
1.03	Clicking the 'Next' button will code your hardware device with the following information :	ECU Type : Temic DQ200 Identification number :
C. Contraction	ECU Type : Temic DQ200 Identification number :	la Nee
	Please verify these details are correct	
TVSengineering.nl	Please click 'Next' to proceed	
Copy Screen Text	< Vorige Volgende > Close Help ++	

j) Finally click 'Next' to continue to the menu where it is possible to read and write your TCU/ECU. From here you could follow step 3 and/or 4 as instructed in the mail from your flashtool supplier.





## 3) <u>Reading your TCU or ECU</u>

Reading the software from any ECU or TCU is normally only needed in case your flashtool supplier instructs to. If this is not the case, skip these steps and go directly to step 4 for programming your TCU or ECU.

TCU reading must always be done at the mechatronic. For this start at step 3 a).

ECU reading, in case possible, must be done at the OBDII port. When you successfully completed the previous steps in this manual and the personal flasher is connected to your vehicle, skip the TCU reading preparation procedure and start at step 3 e).

#### TCU Reading preparation procedure

- a) At the screen where you have the option to 'Read ECU Memory', turn OFF the ignition and remove your personal flasher from the OBDII port. DO NOT close the TVS Flash program or disconnect the USB cable from the laptop or dongle.
- b) Connect your adapter cable to the TCU. The TCU connector location depends on the type of gearbox, but is often visible beneath the intake air box. So first remove the original cable and connect the adapter cable. Some examples are displayed below.



- c) Connect the TVS Personal Flasher to the OBDII port on the adapter cable.
- d) Connect the power cables from the adapter cable to the battery of the vehicle.

When everything is successfully connected the general reading procedure {step e) until i)} which starts on the next page have to be followed.





#### **General Reading procedure**

e) Click 'Read ECU Memory' for reading the software from your TCU or ECU. If you are for any reason not on the screen below, please follow step 2 again.

	Identification details :			
Welcome to	ECU Type : Temic DQ200	ECU Type : Temic DQ200		
FLASH	System Supplier Ecu Hardware Nun	nber:v0695x993AM getriebe DSG cl		
	System Supplier Ecu Software Numb	System Supplier Ecu Software Number : C96S		
a later	Vehicle Manufacturer Ecu Hardware Number: 0AM300043T			
Sec. me	Vehicle Manufacturer Ecu Software Version Number: 9699			
Contractor	System Name Or Engine Type : GSG DSG AG7 431			
GEARBOX	Ecu Serial Number :			
2800.5	Vehicle Identification Number :			
and the second	Calibration options :	Diagnostic options :		
-√s →	Read ECU Memory	Read Trouble Codes		
ENGINEERING TVSengineering.nl	Program ECU Memory	Clear Trouble Codes		
		Extra options :		
	Recover ECU Memory	Software options		
Copy Screen Text	< Vorige Volgende >	Close Help ++		

f) Save the file to a location on your computer. Please do not change the file name.

Select Filenam	e for Read file	College Service 12	X
Opslaan in: 🧕 [	Documenten	<b>-</b> © 🕫	⊳ م
Naam			Gewijzigd op
	Geen zoekre	sultaten.	
•	III		P.
Bestandsnaam:	501803205669		Opslaan
Opslaan als:	Original Files (*.full.dsg.org)	•	Annuleren

g) This process can take up 2 – 20 minutes depending on the TCU/ECU type and protocol.

DSG-DOKTER.NL
99% - Time remaining : 00:15:38

- h) After reading is successfully finished please turn OFF the ignition.
  For TCU reading remove the clips from your vehicle's battery.
  For ECU reading switch the vehicle ignition OFF.
- i) Disconnect all cables.
- j) Email the just extracted file as a response on the instruction email you received earlier from your flashtool supplier.





### 4) **Programming your TCU or ECU**

**NOTE:** During programming your TCU or ECU make sure both your laptop battery and car **<u>battery are fully charged</u>**. We recommend you to hook your vehicle as well as your laptop up to a battery charger if available. Beside this, make sure you **DO NOT** touch or move your laptop and Personal Flasher during programming.

- a) Plug the TVS Personal Flasher into a USB port on your computer and the other end into the OBDII port of your vehicle.
- b) Turn the ignition to the **ON** position but **DO NOT** start the vehicle.
- c) Click 'Program ECU Memory' for writing the TVS Tune file to your TCU or ECU. If you are for any reason not on the screen below, please follow step 2 again.

	Identification details :			
Welcome to	ECU Type : Temic DQ200	ECU Type : Temic DQ200		
	System Supplier Ecu Hardware Nu	mber:v0695x993AM getriebe DSG cl		
	System Supplier Ecu Software Nun	System Supplier Ecu Software Number : C96S		
a Jack	Vehicle Manufacturer Ecu Hardwar	Vehicle Manufacturer Ecu Hardware Number : 0AM300043T		
1 - m	Vehicle Manufacturer Ecu Software	Vehicle Manufacturer Ecu Software Version Number : 9699		
	System Name Or Engine Type : GS	System Name Or Engine Type : GSG DSG AG7 431		
GEARBOX	Ecu Serial Number:	Ecu Serial Number :		
N N N N N N N	Vehicle Identification Number:			
	Calibration options :	Diagnostic options :		
tys	Read ECU Memory	Read Trouble Codes		
	Program ECU Memory	Clear Trouble Codes		
	Recover ECI I Memory	Extra options :		
		Software options		
Copy Screen Text	< Vorige Volgende >	Close Help ++		

- d) Select the TVS Tune file you received from your flashtool supplier by mail.
- e) This process can take up 2 20 minutes depending on the TCU/ECU type and protocol.



f) When programming is finished turn the ignition OFF and click 'Ignition is OFF'.

Toggle ignition	
Please switch the ignition to the OFF position	
1	Ignition is OFF





g) After the green bar is expired your ECU has been successfully programmed. Click 'OK'.



- h) Remove the key and disconnect the cable from the OBDII port.
- i) Start your car and your TVS Tune file will work. Enjoy driving!