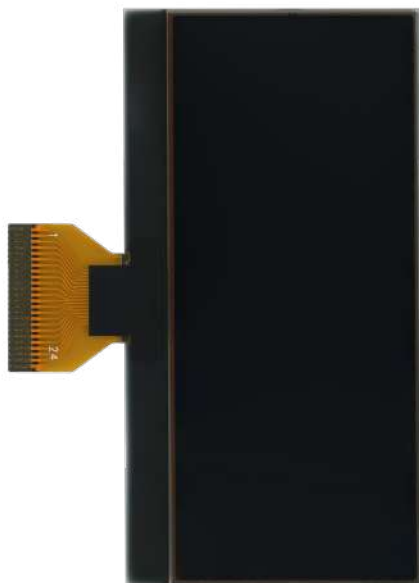


minitools



SEPDISP08-7V

Modification instructions

Ver. 5.0





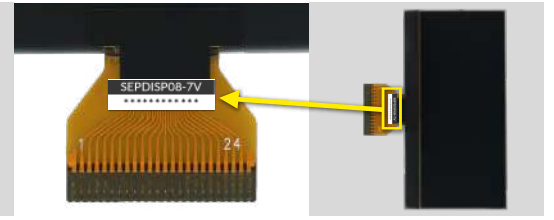
WARNING: THIS PROCESS IS RECOMMENDED ONLY TO EXPERT AND QUALIFIED STAFF.

NOTE:

The following instructions are **only** for SEPDISP08-7V displays with the **warranty code** printed on a label attached on the FPC (see the picture beside).

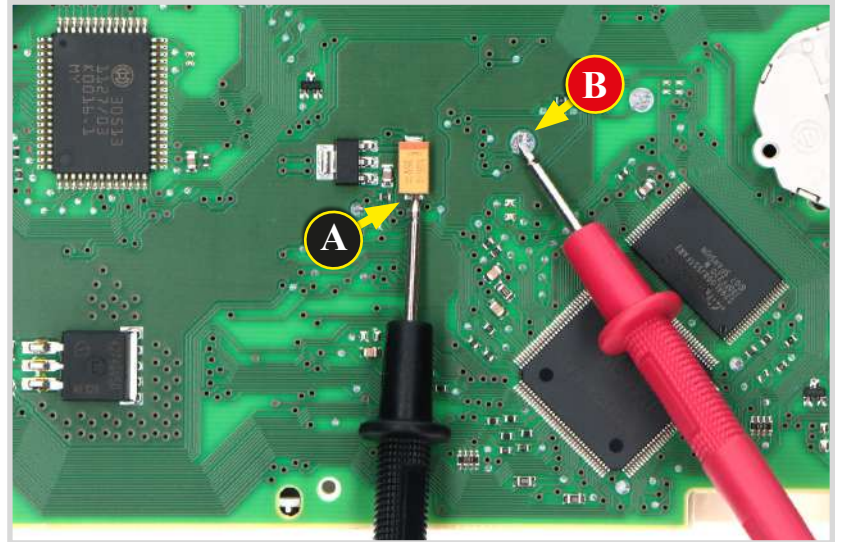
ATTENTION!

If the code is, instead, marked directly on the FPC, please **contact us**.



THE FOLLOWING MODIFICATION IS NECESSARY FOR THE CORRECT FUNCTIONING OF SEPDISP08-7V DISPLAY.

- Replace the display in an ambient temperature of 25 °C.
- After replacing the LCD, switch on the cluster with our **CONNECTOR SEP-PA011** and measure the voltage between A and B points as in picture 1.
- If the **voltage** measured is **between 6.45V and 6.55V** no modification is necessary;
- If the **voltage** detected is instead **lower than 6.45V or higher than 6.55V**, it is necessary to do the **modification** described in the following paragraph "EEPROM MODIFICATION".



Picture 1

EEPROM MODIFICATION

NOTE: For this modification it is necessary to use an EEPROM programmer.
We recommend our **SEP-EECLIP**.

PROCEDURE

- First, set the programmer reading in **8 bit hexadecimal (HEX)**;
- Desolder and make a backup of the **EEPROM (24C04 or 24C32)** highlighted in picture 2, located on the PCB.
- To reach a voltage between 6.45V and 6.55V, identify the **01BF** and **01CF** locations and modify their values.

Please note that increasing or decreasing the 2 values by 1 HEX unit, the **variation** will be **+/- 0.09V**.

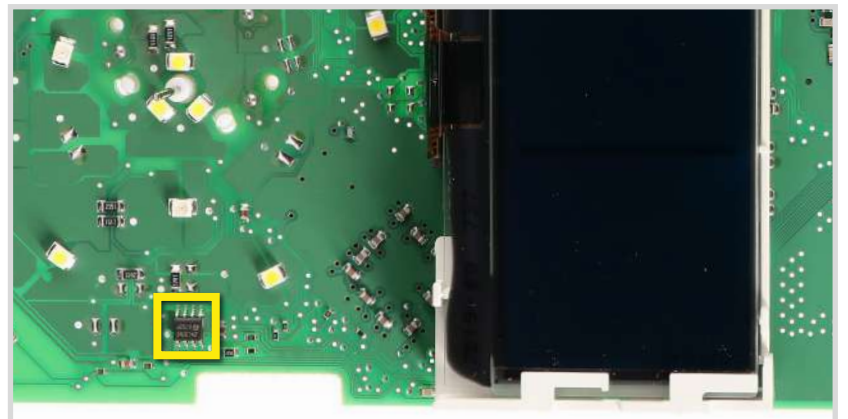
NOTE: If not familiar with hexadecimal calculation, it is possible to use the **calculation tool** in the box beside, simply typing in the values.

VERIFICATION

Once these operations have been done, **solder back the EEPROM** on the PCB, switch on the instrument cluster and **check again the tension between points A and B** (see picture 1).

Verify, then, if a **voltage between 6.45V and 6.55V** has actually been reached.

If not, decrease or increase the values of the locations until the voltage is between that range.



Picture 2

CALCULATION OF THE NEW VALUES OF THE LOCATIONS

(The tool works correctly only on computers. For the mobile version, [click here](#))

• Type in the value of the voltage measured between point A and B (pic. 1)
(use a period as decimal separator, e.g. 7.4)

01BF LOCATION

• Type in the HEX value of 01BF location*

• new value to type in 01BF location

01CF LOCATION

• Type in the HEX value of 01CF location*

• new value to type in 01CF location

*How to identify 01BF and 01CF locations values on the EEPROM

Offset(h)	00	01	02	03	04	05	06	07	08	09	0A	0B	0C	0D	0E	0F
000001A0	28	44	32	80	00	00	00	00	00	00	00	00	00	00	00	00
000001B0	FF	FF	FF	FF	FF	FF	FF	FF	FF	FF	FF	FF	FF	FF	FF	FF
000001C0	81	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00
000001D0	18	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00