

Engine control unit for Renault SAGEM S2000

Short user manual



June 2024

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ON-THE-BENCH: To enable memory R/W functions, two external resistors must be connected to ECU:

- 470 Ω resistor between pin E2 in the middle connector and pin F4 (or ground)
- 22 k Ω resistor between pin F2 in the middle connector and pin F4 (or ground)

Values of these resistors are critical – use exactly 22 k Ω and 470 Ω resistors only!

Read and reprogramming is not possible without these resistors connected!

OBD II: To enable memory R/W functions, two external resistors must be connected instead of ENGINE COOLANT TEMPERATURE (ECT) and INTAKE AIR TEMPERATURE (IAT) sensors:

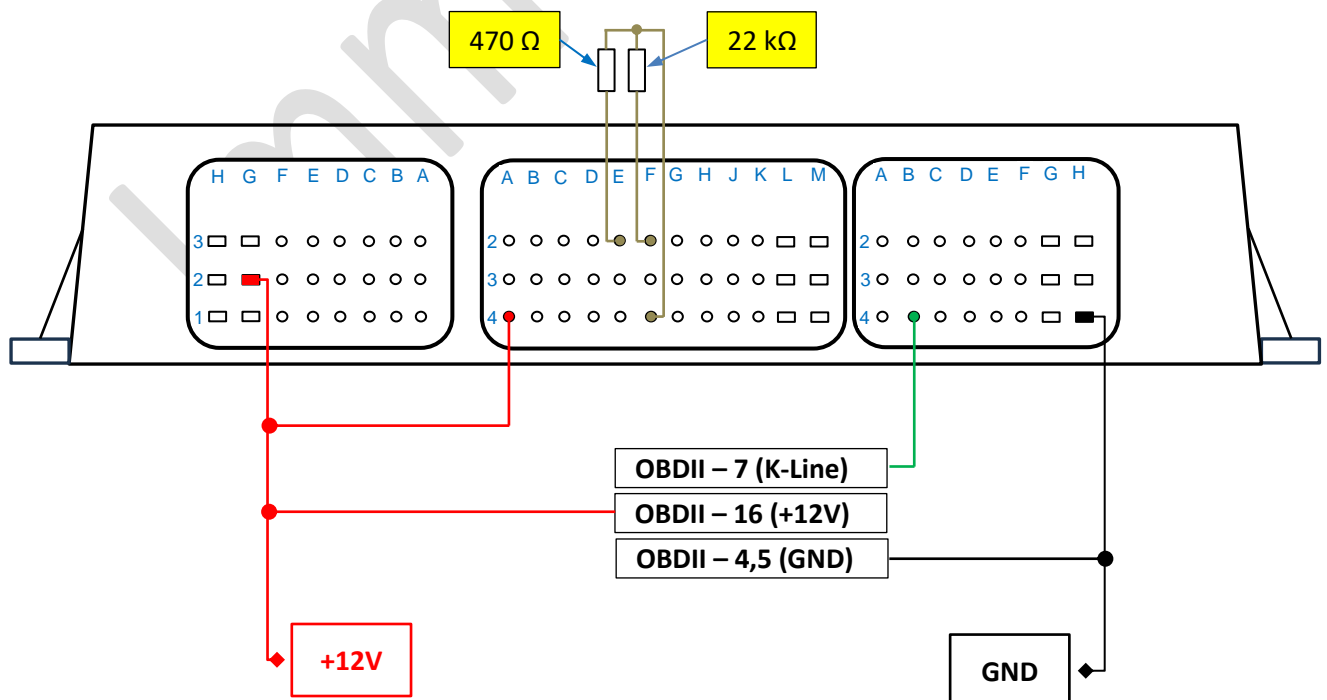
- 470 Ω resistor instead of IAT sensor
- 22 k Ω resistor instead of ECT sensor

Values of these resistors are critical – use exactly 22 k Ω and 470 Ω resistors only!

Read and reprogramming is not possible without these resistors connected!

NOTE: Refer to repair manual of particular vehicle to locate connector of IAT/ECT sensor in the engine compartment

1. How to connect



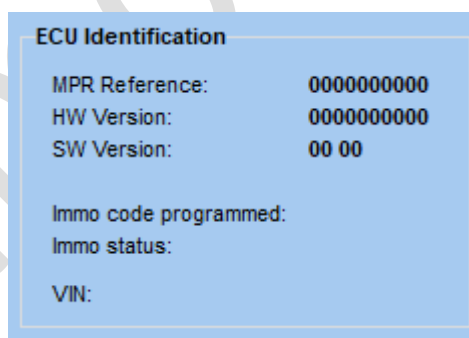
2. Software features

- ✓ Read identification and immobilizer status
- ✓ Read / Write **EEPROM** 95080
- ✓ Read / Write full 256 kB range of **FLASH** AM29F200BB

3. Troubleshooting

- ❖ Diagnostic connection to S2000 cannot be established at all. Read identification fails
 - ☒ On-the-bench wiring connection is incorrect
 - ☒ Voltage of external power supply is too low
 - ☒ ECU faulty (internal SW or HW failure)

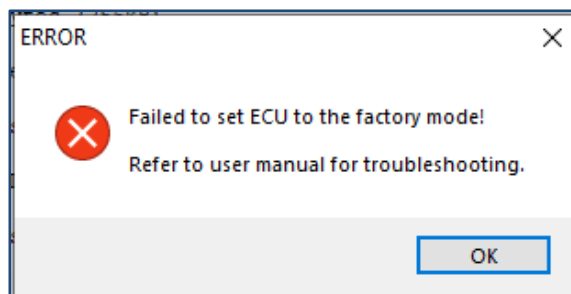
- ❖ Part number and SW/HW version is read as zeros during read identification. Immobilizer status and VIN is not displayed



- ☒ ECU is recovery mode. Main application is erased or corrupted, however boot application is still ok.

Load compatible FLASH file and reprogram AM29F200BB to solve this issue.

- ❖ ECU cannot be set to FACTORY mode. Error message is output during attempt to R/W FLASH or EEPROM.
Identification, immobilizer status and VIN is still displayed correctly



- ☒ No resistors were connected to pins E2 / F2
- ☒ Resistors are connected to wrong ECU pins
- ☒ Value of resistor(s) is incorrect (differ from 470Ω and 22kΩ)

Make sure that 470Ω resistor is connected between pin E2 in the middle connector and ground and 22kΩ resistor is connected between pin F2 in the middle connector and ground. You may use pin F4 as a source of ground signal (see the [connection diagram](#) above).