

# C4D-4G4USAB\_V6+ - INSTALLATION GUIDE

V 1.0

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# Table of contents

Preface	3
Warnings and notices	
FCC Regulations	3
FCC RF Exposure Information	4
1. Hardware features	5
2. Hardware description	6
2.1. External view	6
2.2. Internal view	6
2.3 OBD connector pin out	7
Please read warnings section at the beginning of the installation guide	7
2.4 OBD adapter wires	
3. Preparing/installing the device	8
3.1. Open the device	8
3.2. Insert/remove the SIM card	9
Once inserted the SIM card looks like this:	
3.3. Properly close the device1	
3.3. Install the OBD Dongle1	2
4. LED sequences	.2
5. Support 1	.2



### Preface

The information contained in this installation guide is subject to changes in order to improve the reliability, design or features without prior notice. Mobile Devices Ingénierie reserves the right to make changes in the content without obligation to notify any person or organisation of such changes or improvements. Mobile Devices Ingénierie can in no event be held liable for technical or editorial errors or omissions herein, nor for incidental, special or consequential damages from the furnishing, performance or use of this installation guide.

Please contact our technical support for current updates and supplemental information concerning the use and operation of this or other Mobile Devices Ingénierie products.

### Warnings and notices



The exclamation point within an equilateral triangle is intended to alert the user to the presence of important operating and maintenance (servicing) instructions in the literature accompanying the product.

Please read the installation guidelines, as well as the safety and operating instructions before operating your device. Follow all instructions and heed all warnings in the installation guide.

There is a risk of explosion if the battery is replaced by a wrong battery type. Please discard empty battery according to local regulations.

Dispose of used batteries according to the instructions.

### FCC Regulations

This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

This device has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiated radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

-Reorient or relocate the receiving antenna.

-Increase the separation between the equipment and receiver.

-Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.

-Consult the dealer or an experienced radio/TV technician for help.

<u>Caution:</u> Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.





### FCC RF Exposure Information

This device is designed and manufactured not to exceed the emission limits for exposure to radio frequency (RF) energy set by the Federal Communications Commission of the United States.

In order to avoid the possibility of exceeding the FCC radio frequency exposure limits, human proximity to the antenna shall not be less than 20 cm (8 inches) during normal operation.

The FCC has granted an Equipment Authorization for this model device with all reported RF exposure levels evaluated as in compliance with the FCC RF exposure guidelines. RF exposure information on this model device is on file with the FCC and can be found under the Display Grant section of <a href="https://www.fcc.gov/oet/ea/fccid">www.fcc.gov/oet/ea/fccid</a> after searching on FCC ID: A6GC4D-4G4USV6.





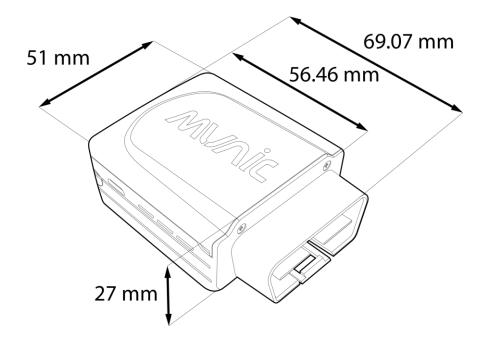
### 1. Hardware features

OBD Dongle			
Performance	Processor	Cortex A5 - 500MHz	
	RAM	128 Mbytes	
	NAND Flash	256 Mbytes	
Power supply	External power supply range	8-18V	
	External voltage measurement	•	
	Li-pol battery	270mA.h	
Communication	Modem	4G Cat.4 ATT module (LE910-NA V2)	
	Modem antenna	Internal	
WLAN	Wifi	WiFi 802.11 b/g/n 2.4G	
	Bluetooth	BT 4.1 LE	
Positioning	GNSS receiver	U-blox M8 (GPS, GLONASS)	
	GNSS antenna	Internal	
Interface & Telematics features	USB (2.0 Host)	powered (100mA on 5V minimum) optional	
	3D Accelerometer	±2g, ±4g, ±6g, ±8g, ±16g	
	OBD protocols	CAN, KWP2000, VPW, PWM	
	CAN interface	Dual CAN coprocessor	
	OBD connector	Multiplexed OBD	
Environmental	Connectors	OBD connector	
		Mini USB	
	Operating temperature	-20°C/+55°C with Battery -20°C/+60°C without battery	
	Dimensions	With OBD connector: 27x69,5x51 mm Without OBD connector: 27x56.5x51 mm	
	SIM card	slot	





### 2. Hardware description



#### 2.1. External view

- 1 : OBD connector
- 2 : USB connector
- 3 : Status led



#### 2.2. Internal view

- 4 : GNSS antenna
- 5 : SIM holder
- 6 : Internal battery\*



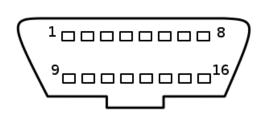
\* Please read warnings section at the beginning of the installation guide





#### 2.3 OBD connector pin out

Pin #	Comment		
2	J1850+ (PWM/VPW)		
4	Chassis ground		
5	Signal ground		
6	CAN High		
7	K line		
10	J1850- (PWM)		
14	CAN low		
15	L line		
16	Battery voltage		



 ${}^{\ast}$  Please read warnings section at the beginning of the installation guide

#### 2.4 OBD adapter wires

This adapter is only used to connect the OBD to a computer (laptop/desktop).

Pin #	Wire color
2	Yellow
4	Black
5	Grey
6	Green
7	Blue
10	Violet
14	Orange
15	White
16	Red

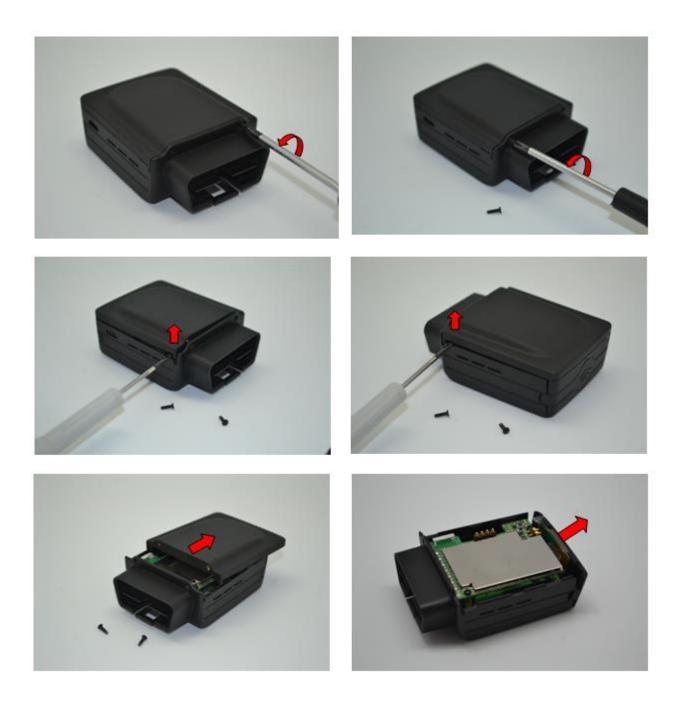






## 3. Preparing/installing the device

#### 3.1. Open the device



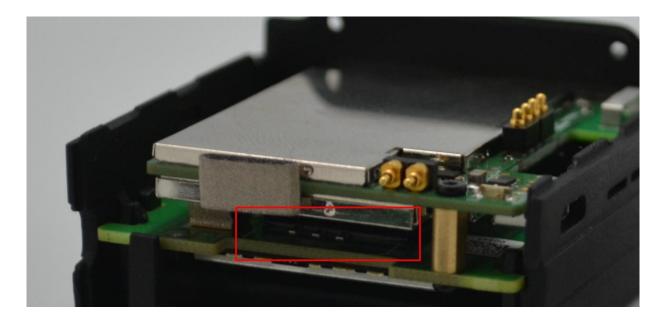


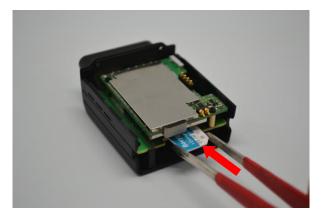
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### 3.2. Insert/remove the SIM card

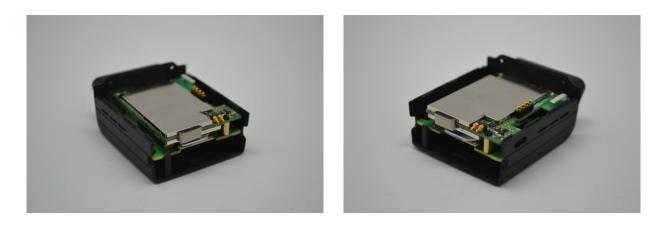
The SIM card slot is located between the two electronic cards.





Insert the card with contact on bottom into the slot and push it as far as it will go.

Once inserted the SIM card looks like this:



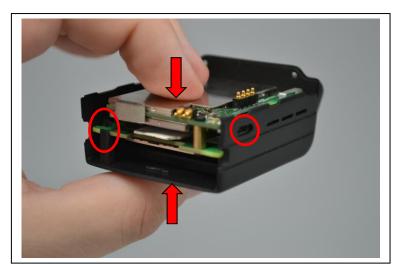




### 3.3. Properly close the device

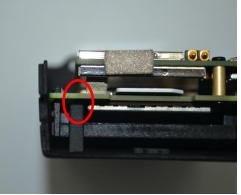
First, check that the electronic card is correctly inserted in the plastic part and that usb port is correctly positioned into the casing.

If it's not inserted proceed as shown below.













GOOD



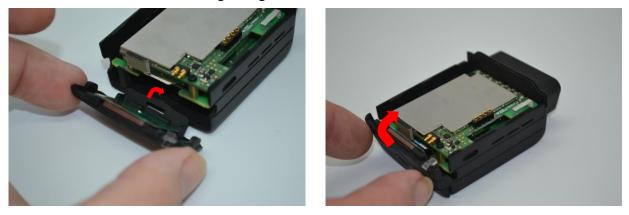
# **NOT GOOD**







Second, insert the back cover beginning with the bottom.



Third, insert the top cover beginning with the back and push on top to clip-on the top cover

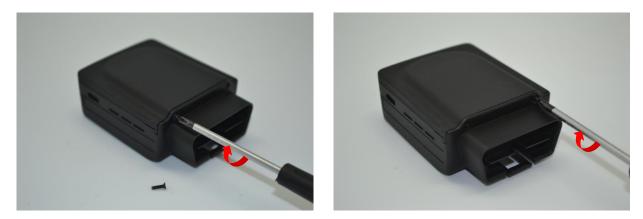








Finally, place the screw.









### 3.3. Install the OBD Dongle

Connect the OBD Dongle on your vehicle OBD connector.

### 4. LED sequences

The Dongle has a two-coloured LED, green and red. When both colours are brightened, you can see an orange light.

Green LED		Red LED	
Sequence	Meaning	Sequence	Meaning
		Dongle OFF	OFF
No Modem /No GNSS	3 times (50ms ON/100ms OFF) 3550ms OFF		
No Modem /Fix GNSS	2 times (50ms ON/100ms OFF) 3700ms OFF		
Modem OK /No GNSS	1 time (50ms ON/100ms OFF) 3850ms OFF	Ext. Power/Run	ON
Modem OK /Fix GNSS	2000ms ON 2000ms OFF		
		Shutdown/Hibern ate	30ms ON / 1 s OFF
		Idle/Sleep	30ms ON / 1 s OFF

### 5. Support

For all questions not related in this installation guide, please contact the support team by email at <a href="support@mobile-devices.fr">support@mobile-devices.fr</a>

