

# Fixed Installations Guide

## Introduction

Since April 1st 2016, every heavy goods vehicle (HGV) of over 3,5 tons have to be equipped with an On Board Unit (OBU) when driving on Belgian roads. By positioning the OBU to the windscreen and switching it on, it detects the vehicle's position based on satellite signals, and matches this position with a digital map stored in the OBU. By doing so, each journey on Belgian roads is registered in the OBU.

OBUs can be ordered via the Road User Portal (RUP) on [www.satellic.be](http://www.satellic.be), in which case the OBUs are shipped to the Road User. Alternatively, OBUs can be obtained at Service Points, which you can find across Belgium and close to the border crossings in the neighbouring countries.

OBUs come with a Quick Start Guide and can easily be installed by the Road User by the means of 4 suction cups to the windscreen, and by powering it on via the cigarette-lighter plug.

**It is also possible to wire your On Board Unit permanently with a fixed cable to the vehicle's electric network.**

A fixed wired installation has **several benefits**:

- Convenience by automatic turning on/off the OBU when ignition is on/off;
- Safety due to less handling and no wires in the driver cabin;
- Reliability of power connection.

## Fixed Installation in practise



### How does it work?

**First make sure to register and to couple the OBU to a vehicle via the Road User Portal on [www.satellic.be](http://www.satellic.be) before executing the fixed installation.**

Then there are two options to install the fixed wired installation:

#### a) Do it yourself or have it done at a garage / workplace of your choice

There are **three wires** to be connected: Plus, Ground, Ignition. Due to the ignition connection, the OBU will automatically switch on when the engine is started. In order to perform the installation, you have to open the lid of the battery of the OBU, remove the battery and cable, attach the new cable and also install the battery again (n.a. for ADR/ATEX vehicles) and close the lid of the battery again.

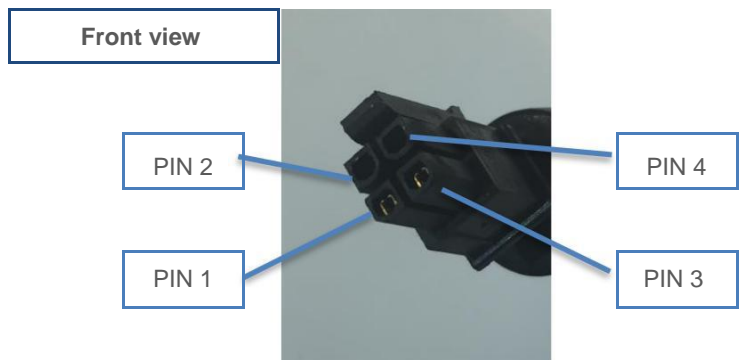
Fixed installation kits can be obtained at VDO or Phelect in order to perform the fixed installation. Alternatively, the fixed install is performed without an installation kit.

**Satellic recommends to always leave the battery in the OBU and not to remove it unless you carry out ADR/ATEX transports.**

#### b) Connection diagram

To permanently install the OBU to the power grid of the vehicle, you need a cable (with socket Micro-Fit 3.0 & 4 circuit receptacle) and a connector (Molex 43025-0400). You must replace the cable.

PIN 1	Terminal_30 Plus <i>Red wire</i>
PIN 2	Terminal_15 Ignition <i>Black wire</i>
PIN 3	Terminal_31 Ground <i>Brown wire</i>
PIN 4	Not connected



c) **Work with VDO or Phelect**

VDO and Phelect have a network of professional installers offering the installation service. For more information about the VDO/Phelect installers: [www.vdo-services.com](http://www.vdo-services.com), [www.phelect.be](http://www.phelect.be).

For ADR/ATEX (transport of hazardous goods) vehicles, any service installing tachographs in such vehicles is also capable of installing the OBU. For these vehicles, please make sure to remove the battery from the OBU; for all non-ADR/ATEX vehicles the battery can remain.



**Liabilities and certification**

In all cases, Satellic is not liable for any costs, liabilities, intellectual property matters, penalties, loss of toll revenue, loss of time, consequential damages etc. due to any works performed, materials used, or other damages caused by the fixed installation activity.

All liabilities remain with the user within his obligation to support the proper functioning of the toll collection system and OBU.



**Return of the OBU after a fixed installation**

If you have decided to have a fixed installation for your OBU, you may return the OBU without the external power cable (and rechargeable battery in case of ADR/ATEX vehicles). You are not allowed to open the seals of the OBU in any circumstances other than for replacing the external power cable and removing the battery. In concrete, this means that the seal of the battery compartment can be broken but the other seal can't.



This seal may be broken in case of fixed installation This seal may never be broken