



**avara**

*Thank you for trusting Avara!*

# **User manual for Avara alarm system for motorhomes and caravans**

*- Complete version*

Avara Lite

Avara Basic

Avara Basic Plus

Avara Premium

Avara Temp

Avara Mouse

- This manual covers all the alarm packages as well as optional equipment, except for the Avara Moist ingress detection system, which has its own manual.
- Remember to always visit [www.avara.no](http://www.avara.no) to check if there are newer versions of this manual. The revision date is marked on the front page.
- Avara alarm packages come in different configurations adapted to different uses. All of them are based on the same components and all packages can be upgraded.

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## CONTENTS OF THE ALARM PACKAGES

### Avara Basic Plus

This is ***the standard package*** for motorhomes and caravans that are *travelling*. Remote control, notification and GPS tracking to your mobile phone and PC, etc is included.

*The alarm gives alerts for the following*

- Propane Gas
- CO (Carbon Monoxide)
- Smoke
- Burglary (when you *are not* in the car/caravan)
- Break-in/Night Alarm (when you *are* in the car/caravan)
- External movement
- Alerts locally in the main unit, siren (burglary) and to mobile phone/e-mail



### Avara Basic

This is the same alarm as Avara Basic Plus, but without notification and functions for mobile phone. Local alarm only.



### Avara Lite

The alarm specially designed for caravans in a fixed place. Can be upgraded to all other alarm packages.

*The alarm gives alerts for the following*

- Propane Gas
- CO (Carbon Monoxide)
- Smoke
- Burglary (When you are not in the carriage)
- Notifications locally in the Head Unit and to mobile phone/e-mail (no siren)



### Avara Premium

This is the same alarm as the Avara Basic Plus *with the addition of Avara Moist moisture sensors*. See separate manual for Avara Moist.



## REGISTERING A MODEM AND CREATING A SUBSCRIPTION

Alarm packages that are online for remote control by mobile phone or PC contain a modem that requires a subscription with Avara. A modem can also be retrofitted in alarm packages that came without. With a subscription, you are guaranteed a connection throughout Europe and all data costs are included.

You get access to functions such as remote control of alarms, alarm alerts, tracking in maps, etc.



Many insurance companies offer a discount when a tracking system is installed. Check with your local insurance companies.

With a Modem, you also get the opportunity to extend you alarm with **Avara Temp** temperature sensors and the **Avara Mouse** mouse alert.

You register yourself on [www.avara.no](http://www.avara.no). You will need the *serial number of the modem* that can be found on the top of the modem itself and on a document that came in the package. Register on [www.avara.no](http://www.avara.no), click on "My page" or "Subscribe", then on "Register" and follow the instructions. Note that you have to go all the way down to the bottom of the "Terms and Conditions" page to tick off the box to accept, before you proceed to payment.

The modem requires no operation on a daily basis and is always active.

\* The dealer can also assist with registration if you wish.

## USER MANUAL FOR AVARA BASIC, BASIC PLUS AND PREMIUM

### Notifications and features

- Propane Gas detection
- CO (carbon monoxide) detection
- Smoke detection
- Break-in/Night alarm mode (when you *are* in the car/caravan)
- Burglary mode (when you *are not* in the car/caravan)
- Un-authorized movement of the caravan (G-shock sensor)
- External Motion (with LED light) (Night Alarm feature)
- Alarm alerts, remote control and tracking with mobile phone (not Avara Basic)
- Measures living area battery voltage, interior temperature and humidity (not Avara Basic)

### The alarm has three settings

<b>1</b>	<b>Always-On</b> Smoke, CO and propane detectors <b>are always active</b> and can never be turned off. Applies to all alarm packages.
<b>2</b>	<b>Night alarm mode</b> Turn on if you want extra safety at night when sleeping in the motorhome/caravan. Alerts with audible signal from the Main Unit inside (not siren) in the event of break-in through doors and hatches equipped with burglar detectors. Provides light in external detectors as soon as someone gets close to the motorhome/caravan side. Gives a signal inside after 30-60 seconds if the movement on the outside does not stop. You can move freely indoors without triggering a night alarm. <b><i>No alarm from the siren in the Night Alarm mode.</i></b>
<b>3</b>	<b>Burglar alarm mode</b> <b>Turn on when you are away and</b> no one is inside. Triggered by Burglar detectors in doors and hatches, the motion detector on the Main Unit and the G-shock sensor in the Main Unit (detects if the entire motorhome/caravan is moved). External detectors will flash/illuminate but not give alarm. <b><i>There must be no pets inside the motorhome/caravan when the burglar alarm is active.</i></b>

For motorhomes/caravans in storage without power, the alarm can be equipped with a Backup battery, which makes it independent of a 12V battery or 230V power supply.

## Daily use of the alarm

### ***Always-on***

No operation is required as the most important functions such as the smoke sensor, CO sensor (carbon monoxide) and the propane gas are ***always turned on*** regardless of the alarm package or whether the alarm is on or off.

### ***Night Alarm mode - ON***

- Press ***briefly*** at the bottom of the lid of the Main unit (no matter which side). After 2 sec. the lower left LED starts flashing green quickly. Shortly after, the flashing will change to very short flashes every 10 seconds. Triggered night alarm gives signal only in the main unit inside – not the siren.

### ***Night Alarm mode - OFF***

- Turn off in the same way as you turned on, alternatively just walk out the door or start driving. The night alarm will then automatically turn off. Turning off the Night Alarm is confirmed by a double “beep”.

### ***Burglar Alarm mode - ON***

- Place the key fob *very close* to the bottom part of the main unit (under the unit)
- While holding the key fob still, press ***briefly*** on the bottom part of the lid (no matter which side)
- *Continue to hold the key calmly in place until you get a confirmation beep after approx. 3 seconds* and the LED indicator on the bottom right starts to flash red.
- Now remove the key fob.

There will now be short beeps from the main unit for 3 minutes before the alarm is armed. During this period, you can freely open and close hatches and doors and go in and out without triggering an alarm. *Triggered burglar alarm gives signal in both the main unit, siren and sends a message to the owner on mobile.*

### ***Burglar Alarm mode - OFF***

- Follow the same procedure as turning the alarm on. When the burglar alarm is turned off, this is acknowledged with a "beep-beep" in the Main Unit. Only then can you remove the key fob.
- Upon entering the motorhome or caravan, the Main Unit gives short alerts beeps for 20 sec. which is the time you have to turn off the alarm before the alarm is triggered.

### ***Control the alarm remotely***

All alarm functions can be controlled remotely from the "Dashboard" on *My Account* from your mobile phone, tablet or PC. *Please note that it takes from 30 seconds. to 10 min. before*

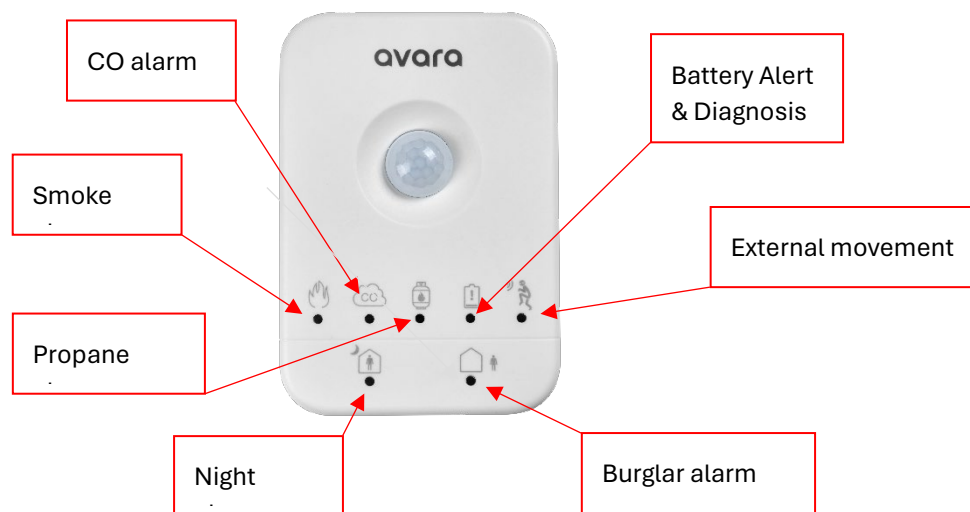
a command from the dashboard is applied locally. You can use your mobile phone to see if you remembered to turn the alarm on or off (both alarm modes). The dashboard will automatically synchronize with the local alarm. You can also easily log into your My Account website from a foreign mobile phone or PC (with your username and password).

### **"Hush" the alarm**

If you trigger the smoke alarm by accident, e.g. during cooking food, you can "hush" the alarm for 10 minutes by pressing the lower part of the lid on the main unit. The alarm comes back on by itself. The alarm gives a signal as long as there is smoke or gas present and ends by itself when the level gets down again. Then the alarm is again ready for new detection without any need for a reset operation.

### **Indicator lights and alarm signals on the Main Unit**

On the main unit you will find two rows of LED indicators. The symbols show what kind of alarm has been turned on or triggered. Look at the main unit while the alarm goes off and you will know what has triggered it. You can also check your "Dashboard" on My Account to see in the "Event Log" what alarm that has been triggered.



During the Night Alarm mode, the External detectors provide *short alert signals* in the Main Unit. The Burglar detectors provide longer alert signals. It is therefore possible to stay in bed and know the difference between outside movements that should be checked, or whether it is a real ongoing burglary.

## USER MANUAL AVARA LITE

Avara Lite works like Avara Basic, but without the Night Alarm functions and it does not have a siren. Avara Lite can be upgraded to get more features by adding desired detectors.

### Notifications and features

- Propane Gas detection
- CO (carbon monoxide) detection
- Smoke detection
- Burglary when you are away *or during storage*
- Un-authorized movement of the caravan (G-shock sensor)
- Alarm notification and remote control to mobile phone and PC
- Measures living area battery voltage, interior temperature and humidity

### The alarm has two settings

<b>1</b>	<b>Always-on</b> Smoke, CO and propane alarm <b>are always on</b> and can never be turned off.
<b>2</b>	<b>Burglar alarm</b> Turn on with the key fob and is used when you leave the motorhome/caravan and want an alarm in the event of burglary or theft.

### **Burglar Alarm mode - ON**

- Place the key fob *very close* to the bottom part of the main unit (under the unit)
- While holding the key fob still, press *briefly* on the bottom part of the lid (no matter which side)
- *Continue to hold the key calmly in place until you get a confirmation beep after approx. 3 seconds* and the LED indicator on the bottom right starts to flash red.
- Now remove the key fob.

There will now be short beeps from the main unit for 3 minutes before the alarm is armed. During this period, you can freely open and close hatches and doors and go in and out without triggering an alarm. *Triggered burglar alarm gives signal in both the main unit, siren and sends a message to the owner on mobile.*

### **Burglar Alarm mode - OFF**

- Follow the same procedure as turning the alarm on. When the burglar alarm is turned off, this is acknowledged with a "beep-beep" in the Main Unit. Only then can you remove the key fob.
- Upon entering the motorhome or caravan, the Main Unit gives short alerts beeps for 20 sec. which is the time you have to turn off the alarm before the alarm is triggered.



### ***Control the alarm remotely***

All alarm functions can be controlled remotely from the "Dashboard" on *My Account* from your mobile phone, tablet or PC. *Please note that it takes from 30 seconds. to 10 min. before a command from the dashboard is applied locally.* You can use your mobile phone to see if you remembered to turn the alarm on or off (both alarm modes). The dashboard will automatically synchronize with the local alarm. You can also easily log into your *My Account* website from a foreign mobile phone or PC (with your username and password).

### ***"Hush" on the alarm***

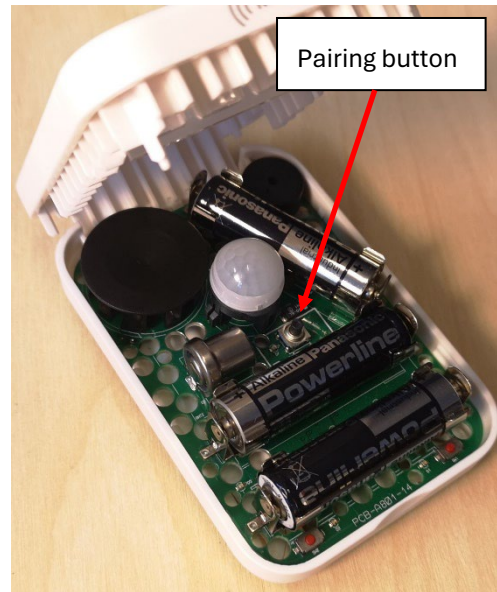
If you trigger the smoke alarm by accident, e.g. during cooking food, you can "hush" the alarm for 10 minutes by pressing the lower part of the lid on the main unit. The alarm comes back on by itself. The alarm gives a signal as long as there is smoke or gas present and ends by itself when the level gets down again. Then the alarm is again ready for new detection without any need for a reset operation.

## PAIRING AND UN-PAIRING DETECTORS AND SENSORS

**PS!** If the Main unit does not respond to the pairing button, it is because it is busy performing other processes, such as pressing the lid when you opened the lid (to press the pairing button) (turning on the alarm), or that the alarm was already on. In these cases, just wait a few minutes and try again.

All Avara alarm packages come *pre-paired*. If you buy several loose detectors in addition, only the new ones must be paired into the system. If a detector is **replaced**, all of the old detectors must be un-paired and re-paired. See below about un-pairing.

Most detectors pair to the main unit, but *some pair to the modem*.



### Pairing of the Intrusion Detector, External Detector, Propane Detector and Siren controller

- Open the lid of the Main Unit by pulling out at the bottom edge of the lid that is hinged at the top edge. In the middle of the circuit card inside the Main Unit there is a black button labelled "**Pairing**". Press *this button briefly* so that it starts to light in amber. Immediately afterwards, it will start **flashing** amber and it is ready for pairing.
- Then briefly **press** the button on the new detector that you want to pair. There will be a tripe beep sound ("beep-beep-beep") from the Main unit confirming successful pairing.
- Take the Main unit out of pairing mode by pressing the pairing button again, or just wait one minute and it will exit the pairing mode on its own.

### Pairing the Main Unit and Modem

- **First** press the pairing button on your Modem, and it will be flashing yellow.
- Then press the pairing button in the Main unit. The Main unit will now beep and flash yellow as a confirmation of successful pairing. Take both the Modem and the Main unit out of pairing mode by pressing the pairing buttons again, or let them exit pairing mode on their own after one minute.

### Pairing the Avara Mouse detector

- **First** press the pairing button on your Modem, and it will be flashing yellow
- Then briefly press the pairing button on the mouse detector.
- PS – a beep from the Main unit confirms successful pairing.
- Take the Modem out of pairing mode by pressing the pairing button again, or let it exit the pairing mode on its own after one minute.

## Pairing Key Fobs

- Open the lid of the Main Unit and press the Pairing button, wait for it to start flashing amber.
- Hold the key fob in place *under and next to* the Main Unit and close the lid (when you close the lid, the alarm on/off button is pressed at the same time, like when you turn on/off the Night Alarm). Successful pairing is acknowledged with a beep.
- As long as the Main Unit is flashing amber, you can pair the next key fob by holding it in the same place as the former and pressing the lower part of lid briefly. Hold the key fob in place until you get the confirmation beep.
- Take the Main Unit out of pairing mode by pressing the button again, or let it exit on its own after one minute.

***PS! If you are unable to pair the key fob, it is most likely because the power button in the Main unit has been pressed when the Main unit was opened. Open the lid of the Main Unit to see if it flashes green as it does when the Night Alarm mode is turned on. If it flashes, the alarm must be turned off before the Key fobs can be paired.***

## Un-pairing detectors in general

The alarm system must be un-paired if a detector is replaced or for other reasons is no longer part of the alarm system. This is to prevent the Main Unit from reporting the missing detector as a fault by lighting the battery indicator. When un-pairing is done, you re-pair all the detectors that should now be included in the system. Remember specifically the Modem, the Propane Detector, the Siren controller and the Key Fobs.

### Un-pairing the system/Main Unit

Press and hold the Main unit pairing button for 10 sec. until it beeps constantly (pairing button under the cover). If there is no beep, it is because the Main Unit is busy with other internal processes. Wait for 1-2 minutes and repeat the process.

### Un-pairing of the Modem

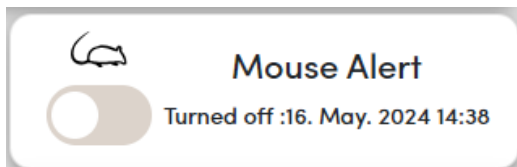
Press and hold the pairing button on the modem for 10 sec. until its LED gives a constant yellow light.

### Special processes for the Avara Premium and Avara Moist

Moist sensors will not be deleted from the Modem when unpaired. Un-pairing must be done by Avara customer service.

## USER MANUAL AVARA MOUSE

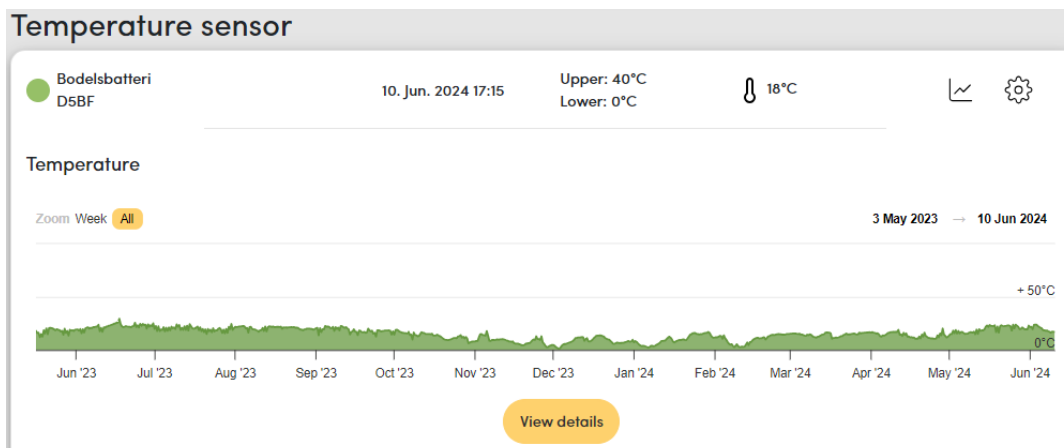
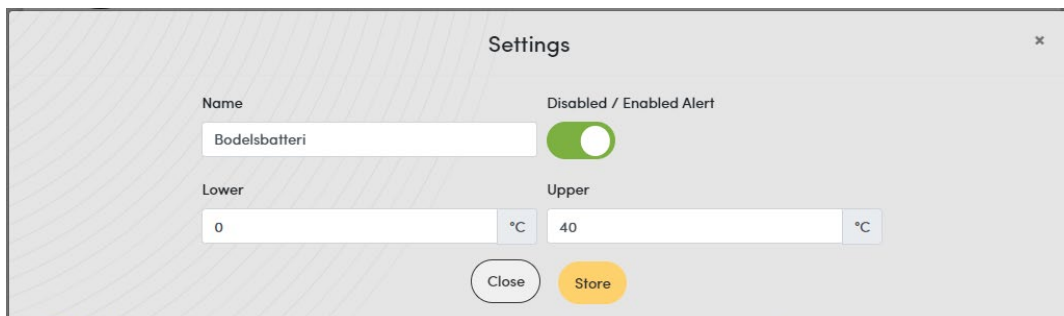
The Avara Mouse detector detects if a mouse comes past the detector at a range of approx. 0.5 - 0.8 meters. An SMS and an email are sent to the selected recipient when a motion is detected. Multiple notification recipients can be registered for this and all other notifications in the system. Once an alert has been sent, no new alerts will be sent until the mouse alarm is turned off and on again. You turn the mouse alarm on and off from your "My Account". Of course, you will also be detected as a "mouse" if you enter the motorhome/caravan when this alarm is on....



## USER MANUAL AVARA TEMP - TEMPERATURE SENSORS

**Avara Temp** are universal temperature sensors that you can place anywhere you want to monitor and log temperatures. Examples are the Water Tank, Grey Water Tank, Battery, Toilet Cassette, Exterior, Refrigerator, Freezer, Dog Crate, etc.

The sensors are attached with the pre-mounted double-sided tape. Inside your "Dashboard" (My Account) you can define upper and lower limits for temperature alerts by SMS notifications. You can also see a graph of how the temperature has developed over time. You can give your sensors their own names that describe where they are located.



## USER MANUAL UNIVERSAL GAS DETECTOR

The Universal gas detector is an **option** and is **not** included in the alarm packages as a standard detector. This is a type of detector that other manufacturers mistakenly call "Anesthetic Gas Detector" or "Knock-out Gas Detector". It is a controversial topic as it is not yet known what kind of gas may have been used during attacks.

"Anesthetic gas detectors" are known to give false alarms as they react to almost anything that smells strongly. So does Avara's Universal Gas Detector. Avara takes safety seriously and does not use the terminology "Anesthetic gas" as it is not very credible. We approach the phenomenon in a more realistic way, first and foremost with the help of the extra expensive **External detectors with LED-lights** that in all cases of any attempts or assaults will provide early warning to both the residents and any unwanted elements on the outside.

### Switching on/off the Universal Gas Detector

If you have the Universal gas detector installed it will automatically turn on and off when the Night Alarm Mode is turned on and off.

## BATTERY ALERTS AND BATTERY REPLACEMENT

You can find a series of photos about battery replacement for all devices [here](#). (QR code).

If any of the devices in the system gets a low battery (low voltage), this will be alerted with a light in the **battery symbol on the main unit**. This is not just for the main unit alone. The alert comes on a little after you turn on/off the Night- or Burglar alarm modes, lighting up/blinking for a short time and then turns off. The same indicator will also show if a detector paired into the system is no longer working.

**Please note that if a detector does not communicate properly with the main unit when you try to turn the alarm ON or OFF, other functions may become slow and unresponsive.** For example, if you try to put the device in pairing mode. Then all you have to do is wait until the battery warning light goes out.

If the alarm system is used during extreme cold temperatures, ordinary alkaline batteries may show low voltage before they are actually empty. It is recommended to use 1.5V *lithium batteries*, e.g. Energizer Ultimate Lithium in these circumstances.

### Which detector has low battery?

When you get a battery alert, you should find out which detector it concerns. Do the following: turn on the Night Alarm mode and have a look at each detector. Detectors with fresh batteries will flash a green *light* every 10 seconds. If it flashes red, it has a weak battery. If it doesn't flash at all, you have found the detector that is either "dead" or that is not paired to the Main unit. If all of the detectors flashes green, only the Main unit is left, and it is the Main unit that has low voltage/low battery.

On the Burglar detectors, it is the button itself that flashes. On the External detectors, the left LED-lens flashes (green or red).

### Battery Replacement in general

Before inserting new batteries, check that the spring contacts/battery clamps at the ends of the battery holders are sufficiently engaged. They should be angled slightly inwards. If necessary, adjust them by gently bending them inwards. Make sure of correct polarity when inserting the batteries and be careful when replacing the batteries so that the components of the circuit board are not damaged.

#### Battery change - Main unit

Open the main unit by pulling out the bottom part of the lid. The lid is hinged at the top. Under the lid you will find 3 pcs AA alkaline batteries.

#### Battery change - Burglar detector and Avara Mouse

Force off the lid from the top. It is ticked at the bottom. It can be done with just your fingers, but it is easier to "jack" the lid off with a screwdriver in the slot at the top of the lid. Each detector holds 3 pcs AA alkaline batteries.



Battery

### **Battery change - External Detector**

Unscrew the four Torx #10 screws on the detector. The housing itself will be left on the motorhome/caravan side. Check extra carefully that the battery clamps are tight enough on the battery row with only two clamps. Each detector holds 6 pcs AA alkaline batteries.

### **Battery change – Siren controller**

Unscrew the lid of the black box (siren controller) with the four Torx #10 screws. Inside the box there is a battery holder with 8 pcs AA alkaline batteries. Make sure that the black foam plate comes up against the lid/electronics when you put the lid back in place. *Be careful not to harm the circuit board when reassembling.*

***NOTE – placement of the Siren: if your Siren was installed in the engine compartment or partially outside, move it to the inside of the living area.*** In retrospect, we have made a new assessment and have concluded that it is most effective against thieves when it is inside. It will also be easier to change the battery the next time it is needed. Make sure the siren is out of sight and is fastened to the construction.

### **Battery change - Avara Temp**

There is a small notch on the side of the sensor where you insert a suitable small flat screwdriver and turn until the lid comes off. Carefully tap the sensor into the table so that the circuit board/internals come out of the enclosure. You will see a CR2032 battery button cell. Pull the old battery out and push in the new one. Make sure of correct polarity, + is up. Also make sure that the round circuit board is in the correct groove when inserted (note the small notch at the edge of the circuit board and the corresponding "key" in the housing).

## **USEFUL TO KNOW ABOUT THE ALARM SYSTEM**

The Avara alarm system has some underlying characteristics that you usually do not need to think about, but which can provide answers if you observe something you do not expect or understand.

- The alarm components must be ***installed*** as shown in the installation instructions before you can judge their complete operation. This is because all the detectors work together to see what is going on and they can detect the difference between burglary and normal activity inside.
- The alarm system cannot be tested by placing all the components on a table. This way the cooperation between the detectors will be misinterpreted by the system and the alarm will usually turn OFF.
- If you try to test the Main unit when holding it in your hand testing functions, either the alarm will turn off (in the Night Alarm mode) or it will trigger an alarm (in the Burglar Alarm mode).

- If someone is inside the motorhome/caravan and you try to test the Night Alarm mode, it will not trigger because the detectors are paused for 3 minutes if someone moves in front of the Main Unit.
- The GPS position is updated *every 5 minutes when driving and once a day when stationary*.
- The living area battery's voltage is updated every 10<sup>th</sup> minute (measures the power source of the Modem).
- The Main unit updates the indoor climate every 2 hours.
- The Propane detector must sense gas above the alarm limit *continuously for one minute before setting off an alarm*. You will therefore not be able to trigger an alarm with a just using gas lighter. See complete test procedure below.
- For motorhomes and caravans in storage without power, the alarm can be equipped with a Backup battery which makes it independent of a 12V battery or 230V.

## TEST PROCEDURES

**Simple test to see if detectors are paired to the system. Have the alarm *off* when testing.**

- Press the button on the detector in question, it will light up in red for 4 seconds. Wait for a short confirmation beep from the Main unit. Applies to all detectors.
- Test if modem is paired: Press the pairing button on the modem, wait a few seconds. and press again. A beep signal should quickly come from the Main unit if these two are paired.
- Test if the Siren controller is paired: On the lid of the siren driver there are two silver coloured squares marked "Pairing". These are contact points that must be shortened. The silver squares may be covered with protective tape. Later editions may have a push-button mounted at these points. ***If the siren driver is installed in the engine compartment or partially outside, it must be moved into the living area.***
- Propane Gas Detector Test: Press the button. There should be a beep from the main unit after 4 seconds. Apply gas from a gas lighter close to the detector. After a short while, it should start flashing red. This confirms that gas is detected and together with the pairing test, the detector is now tested and OK even though there has not been a normal alarm signal from the main unit. For this, you must apply gas continuously for one minute to give a real warning.
- Smoke detectors are tested like other smoke detectors, press and hold the lid at the bottom of the main unit for 10 sec.



- The system must be fully installed if you want to perform a real functional test.

## **Functional test of the system**

### *Night Alarm*

Turn on the night alarm, go outside and close the door (there must be no one left inside). Wait for at least 3 minutes. Walk back and forth under one of the External detectors. When there is daylight, the detector will only flash rapidly twice (units manufactured after 2022). When it is dark outside, it will also turn on outdoor lights for 10 seconds. The process repeats itself as long as there is movement in the detection zone. If you move in the zone for at least 30 seconds, the Main unit will give an alarm signal inside (PS - external detectors never cause an alarm from the siren).

Open a door that has a burglar detector. After approx. 3 sec. it will give an alarm from the main unit, not from the siren.

*If these tests work in the Night Alarm mode, it will also work properly in the Burglar Alarm mode.*

### *Burglar Alarm*

Turn on the burglar alarm with the key fob and *stay inside*. It takes 3 minutes from power-on until the detector is active. Move in front of the main unit. The Main unit will then start giving short beeps for 20 seconds before the siren is triggered. A signal is given in both the main unit and from the siren.

The Burglar detectors will also trigger the alarm, but these do not need to be tested again if they were tested in the Night alarm test described above.

Turn off the alarm in the same way as you turned on the alarm with the code chip.

## **Functional test of single detectors**

### *Burglar Detector*

Press and hold the pairing button on the Burglar Detector for 3 sec until it flashes rapidly green in the button. Wait for the 30 sec. warm-up time and the button will flash green when motion is detected. After a short while, it will exit test mode on its own, or if you press the button again. This test is also useful to be able to see if the detector responds as desired when it is installed.

### *External Detector*

Press and hold the pairing button for 3 sec until one lens flashes faintly red and green. After 30 sec. warm-up time the LED lights will flash when the detector sees motion.

## *Siren*








Short the two blank spots on the siren driver that make up the pairing button for 3 sec. A small LED light will light up red and there are three blasts in the siren.







The Siren exits test mode by itself as soon as the test is done.

## ***Testing in general***

The above tests show when movement is detected, but it is not the same as if the alarm would have been triggered at the first registration. There are delays and logic as well to prevent false alarms.

## AVAILABLE ALARM COMPONENTS

<p><b>AV100 - Avara Main Unit</b> Used for operation of the Burglar- and Night alarm modes, placed inside the motorhome/caravan. Includes a passive infrared motion detector, a CO gas detector and a smoke detector as well as a moisture. and temperature sensor. Normally placed above the habitat door on the wall together with other control panels.</p>	
<p><b>AV108 - Modem</b> The modem communicates with the Avara's cloud solution. Alarm messages and notifications can be forwarded several receivers (mobile phone and e-mail). The modem includes a GPS unit for locating the motorhome/caravan. The modem connects to the 12V constant source or a 6V backup battery box.</p>	
<p><b>AV106 – External detector</b> Installed high up on the outer wall. Built-in passive infrared motion detector that detects movement within approx. 1 - 1.5 meters of the wall. LED lights turns during movement when activated in alarm mode. Alarm function in the Night Alarm mode, information function when in Burglar mode.</p>	
<p><b>AV103 – Burglar detector</b> Motion detector that is placed in doorways/cargo spaces and detects any movement in/out of the motorhome/caravan.</p>	
<p><b>AV101 – Propane gas detector</b> Mounted down by the floor and must be connected to constant 12V. May also be used with the 6V backup battery box during storage.</p>	
<p><b>AV107 – Universal gas detector</b> Mounted at head height and must be connected to constant 12V. 6V backup battery box is not be used. Universal gas detectors react to a wide number of gases, which can lead to false alarms.</p>	
<p><b>AV104 - Siren and siren controller</b> Installed inside the living area, <b>not</b> in the engine compartment. The siren controller contains a battery pack that also powers the siren. Gives a high pitch sound in the event of a break-in, not in the night alarm mode.</p>	

<p><b>AV110 - Sirene</b> Separate siren without electronics controller (siren controller). Spare part for AV104.</p>	
<p><b>AV105 – Key fobs</b> Key fobs to turn on/off the alarm in Burglar Alarm mode (only).</p>	
<p><b>AV109 – Avara Moist sensors</b> Moisture sensors are installed by a trained workshop. The probe is inserted into the structure and measures relative humidity (RH%). The sensors have an internal battery with an expected lifespan of more than 15 years.</p>	
<p><b>AV111 - Backup battery container</b> Used when needed for backup power supply for modem and propane gas detector. Used in storage and as a backup if the 12V power supply is lost.</p>	
<p><b>AV113 – Avara Mouse detector</b> Detects if mice enter the motorhome/caravan. Sends SMS and e-mail to the owner (PS - requires the Avara modem).</p>	
<p><b>AV114 – Avara Temp temperature sensors</b> Universal temperature sensor that can be placed on e.g. dog cages, batteries, fresh water tanks, grey water tanks, toilet cassettes, refrigerators or freezers. Sends notifications to the owner at given limit values (PS - requires the Avara modem).</p>	

## SERVICE AND MAINTENANCE

The integral **CO sensor** in the Main Unit has a service life of approx. 5 years. It may last longer, but to ensure one of the alarm's most important functions, it should be replaced at service by Avara. This is a general recommendation and applies to all types of gas and smoke alarms, regardless of brand.

Your own maintenance should make sure that batteries are replaced in time before they possibly create leaks. If the **battery indicator** on the main unit lights, there is every reason to check the battery status of all the detectors.

During service, the smoke detector is also cleaned, software updated if necessary and all other functions checked. The main unit can be detached from the mounting bracket by pulling it straight out. The bracket stays on the wall so you can easily put the device back by pressing it into place.

The batteries in the detectors are ordinary replaceable AA alkaline battery cells. These can last for many years. Even if the batteries are not empty, they should still be replaced after 3-5 years at the latest, depending on use.

***NB! Do not flush the exterior detectors with a pressure washer. They are waterproof, but high pressure leads to water ingress which is not a warranty issue.***

The Avara components must be delivered to approved recycling stations for e-waste at disposal. You can find contact information on [www.avara.no](http://www.avara.no) for service and support.

## TECHNICAL SPECIFICATIONS

<b>Main unit</b>	
Features	<ul style="list-style-type: none"> <li>• Control panel for operating the burglar alarm and night alarm modes</li> <li>• Optical Smoke Detector</li> <li>• Motion Detector</li> <li>• CO-detector (carbon monoxide)</li> <li>• NFC code chip reader</li> </ul>
Dimensions H, W, D	102x72x31mm
Motion sensor type	Passive infrared. Detects inside movement
G-sensor	Detects movement of the motorhome/caravan
NFC	13,54 MHz
Power consumption	ca. 0,1 mA.
Energy source	3 pcs replaceable AA alkaline batteries
Radio communication	868 MHz

<b>Propane gas detector</b>	
Dimensions H, W, D	45x45x17,5mm
Consumption normal mode	appr. 25 mA
Consumption during <i>Burglar alarm mode</i> and <i>power saving mode</i>	appr. 0,25 mA
Primary power source	External 5,5 - 15 V DC
Secondary power source	External 5,5 - 15 V DC
Sensitivity	appr. 0,4 vol% or 20% LEL
Radio communication	868 MHz

<b>Burglar detector</b>	
Dimensions H, W, D	89x70x24mm

Motion sensor type	Passive infrared
Power consumption	< 0,1 mA
Power supply	3 pcs replaceable AA alkaline batteries
Radio communication	868 MHz

<b>External detector</b>	
Dimensions H, W, D	50x218x45 mm
Motion sensor type	Passive infrared
Power consumption	< 0,1 mA
Power consumption when LED lights in use	350 mA
Power supply	6 pcs replaceable AA alkaline batteries
Degree of protection	IP66
Radio communication	868 MHz

<b>Siren controller</b>	
Dimensions H, W, D	80x80x48mm
Power consumption (standby)	< 0,1 mA
Power consumption (active)	appr. 250 mA, limited at appr. 500 mA
Power supply	8 pcs replaceable AA alkaline batteries
Degree of protection	IP66
Radio communication	868 MHz

<b>Siren</b>	
Dimensions H, W, D	53x50x63mm
Power supply	6 - 16 V
Power consumption (active)	290 mA
Sound level	123 dB at 10 cm.

<b>Universal gas detector</b>	
Dimensions H, W, D	45x45x17,5mm
Power consumption (active)	appr. 25 mA
Power consumption (off)	< 0,1 mA
Primary power supply	External 5,5 - 15 V DC
Secondary power supply	External 5,5 - 15 V DC
Radio communication	868 MHz

<b>Modem</b>	
Dimensions H, W, D	83x83x17mm
Communication modes	2G/4G/5G/NB-IOT/CAT-M1
Positioning (GNSS)	GPS/Galileo/Glonass/Beidou
NFC	13,54 MHz
Power consumption (power saving)	appr. 0,25 mA.
Power consumption 4G/5G active	12,mA.

Power consumption 2G active	Less than 350 mA.
Primary power supply	External 5,5 - 15 V DC
Secondary power supply	External 5,5 - 15 V DC
Radio communication	868 MHz

<b>Backup battery container</b>	
Dimensions H, W, D	39x96x143mm
Voltage	6V
Battery	4 pcs. D-cell alkaline (PS – not included)

**END**