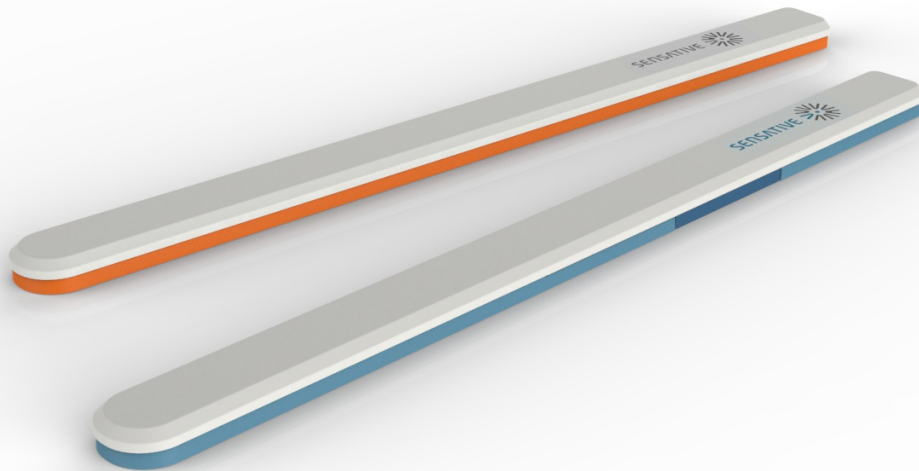


2.15 Related Posts

Sensitive

Strips-Multi-sensor

SKU: 11 02 016



Quickstart

This is a

Alarm Sensor
for
Russia.

Please make sure the internal battery is fully charged.

To add this device to your network execute the following action:

Set your controller to add mode (see your controllers manual). Follow the instruction for Wake up. A long LED blink indicates that the add/remove was successful.

Please refer to the

[Manufacturers Manual](#) for more information.

Important safety information

Please read this manual carefully. Failure to follow the recommendations in this manual may be dangerous or may violate the law.

The manufacturer, importer, distributor and seller shall not be liable for any loss or damage resulting from failure to comply with the instructions in this manual or any other material.

Use this equipment only for its intended purpose. Follow the disposal instructions.

Do not dispose of electronic equipment or batteries in a fire or near open heat sources.

What is Z-Wave?

Z-Wave is the international wireless protocol for communication in the Smart Home. This device is suited for use in the region mentioned in the Quickstart section.

Z-Wave ensures a reliable communication by reconfirming every message (**two-way communication**) and every mains powered node can act as a repeater for other nodes (**meshed network**) in case the receiver is not in direct wireless range of the transmitter.



This device and every other certified Z-Wave device can be **used together with any other certified Z-Wave device regardless of brand and origin** as long as both are suited for the same frequency range.

If a device supports **secure communication** it will communicate with other devices secure as long as this device provides the same or a higher level of security. Otherwise it will automatically turn into a lower level of security to maintain backward compatibility.

For more information about Z-Wave technology, devices, white papers etc. please refer to www.z-wave.info.

Product Description

Strips, the ultra-thin multi sensor is now available in two new sensor models, Strips Drip and Strips Comfort. Drip and Comfort join Strips Guard, the thinnest magnet sensor in the world detecting if your windows are open and closed invisibly since 2015. Strip Drip sends an alarm signal if it detects a water leak. Its unique design allows it to be easily placed almost everywhere, including most places other sensors simply cant fit. With soaking pads integrated in the mounting plate even small amounts of water will be detected. The built-in temperature sensor gives the possibility to combine the leakage alarm with a freeze alarm. There is also a built-in ambient light sensor that may be useful in special applications. Strips Comfort is a very accurate temperature and ambient light sensor. The unique design and mounting plate makes it easy to place almost invisibly in your home to measure temperature or control heating, air conditioning and even windows blinds which are connected to your Z-Wave smart home system. All Strips products can be used both in-doors and out-doors and the integrated custom battery gives Strips an expected lifetime of up to 10 years. For you, this means no hassle needing to change or

charge batteries in your Strips sensors for the lifetime of the products!

Prepare for Installation / Reset

Please read the user manual before installing the product.

In order to include (add) a Z-Wave device to a network it **must be in factory default state**. Please make sure to reset the device into factory default. You can do this by performing an Exclusion operation as described below in the manual. Every Z-Wave controller is able to perform this operation however it is recommended to use the primary controller of the previous network to make sure the very device is excluded properly from this network.

Reset to factory default

This device also allows to be reset without any involvement of a Z-Wave controller. This procedure should only be used when the primary controller is inoperable.

You may need to reset Strips if your Z-Wave controller is missing or not responding. Follow the instructions for Wake up, but on the 3rd repetition, leave the magnet at the rounded edge for 10 seconds. A long LED signal indicates success.

Inclusion/Exclusion

On factory default the device does not belong to any Z-Wave network. The device needs to be **added to an existing wireless network** to communicate with the devices of this network. This process is called **Inclusion**.

Devices can also be removed from a network. This process is called **Exclusion**. Both processes are initiated by the primary controller of the Z-Wave network. This controller is turned into exclusion respective inclusion mode. Inclusion and Exclusion is then performed doing a special manual action right on the device.

Inclusion

Set your controller to add mode (see your controllers manual). Follow the instruction for Wake up. A long LED blink indicates that the add/remove was successful.

Exclusion

Set your controller to remove mode (see your controllers manual). Follow the instruction for Wake up. A long LED blink indicates that the add/remove was successful.

Communication to a Sleeping device (Wakeup)

This device is battery operated and turned into deep sleep state most of the time to save battery life time. Communication with the device is limited. In order to communicate with the device, a static controller **C** is needed in the network. This controller will maintain a mailbox for the battery operated devices and store commands that can not be received during deep sleep state. Without such a controller, communication may become impossible and/or the battery life time is significantly decreased.

This device will wakeup regularly and announce the wakeup state by sending out a so called Wakeup Notification. The controller can then empty the mailbox. Therefore, the device needs to be configured with the desired wakeup interval and the node ID of the controller. If the device was included by a static controller this controller will usually perform all necessary configurations. The wakeup interval is a tradeoff between maximal battery

life time and the desired responses of the device. To wakeup the device please perform the following action:

Wake up Strips manually for Z-Wave communication. Place the magnet at the rounded edge. When the LED blinks, move the magnet away. Repeat twice within 10 seconds.

Quick trouble shooting

Here are a few hints for network installation if things dont work as expected.

1. Make sure a device is in factory reset state before including. In doubt exclude before include.
2. If inclusion still fails, check if both devices use the same frequency.
3. Remove all dead devices from associations. Otherwise you will see severe delays.
4. Never use sleeping battery devices without a central controller.
5. Dont poll FLIRS devices.
6. Make sure to have enough mains powered device to benefit from the meshing

Association – one device controls an other device

Z-Wave devices control other Z-Wave devices. The relationship between one device controlling another device is called association. In order to control a different device, the controlling device needs to maintain a list of devices that will receive controlling commands. These lists are called association groups and they are always related to certain events (e.g. button pressed, sensor triggers, ...). In case the event happens all devices stored in the respective association group will receive the same wireless command wireless command, typically a 'Basic Set' Command.

Association Groups:

Group NumberMaximum NodesDescription

1	1	Z-Wave Plus Lifeline
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Configuration Parameters

Z-Wave products are supposed to work out of the box after inclusion, however certain configuration can adapt the function better to user needs or unlock further enhanced features.

IMPORTANT: Controllers may only allow configuring signed values. In order to set values in the range 128 ... 255 the value sent in the application shall be the desired value minus 256. For example: To set a parameter to 200 it may be needed to set a value of 200 minus 256 = minus 56. In case of a two byte value the same logic applies: Values greater than 32768 may needed to be given as negative values too.

Parameter 10: High ambient light report level

3 – 64000

Size: 4 Byte, Default Value: 40000

SettingDescription

3 – 64000	High ambient light report level(4 bytes)
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Parameter 11: Low ambient light report level

1 – 42000(Must be significantly lower than parameter 10)

Size: 4 Byte, Default Value: 5000

SettingDescription

1 – 42000	(Must be significantly lower than parameter 10)
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Parameter 12: Leakage alarm

0: Off1: On

Size: 1 Byte, Default Value: 1

SettingDescription

0	Off
1	On

Parameter 13: Leakage alarm level

1 to 100(1= almost dry, 100= soaking wet)

Size: 1 Byte, Default Value: 10

SettingDescription

1 – 100	(1= almost dry, 100= soaking wet)
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Parameter 14: Moisture reporting period

0-120: Number of hours between moisture reports

Size: 1 Byte, Default Value: 0

SettingDescription

0 – 120	Number of hours between moisture reports
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Parameter 2: LED alarm event reporting

0: Off1: On

Size: 1 Byte, Default Value: 1

SettingDescription

0	Off
1	On

Parameter 3: Temperature &&&&&&&&& Light reporting frequency

1: Normal2: Frequent

Size: 1 Byte, Default Value: 1

SettingDescription

1	Normal reporting
2	Frequent reporting

Parameter 4: Temperature reporting

0: Off 1: On

Size: 1 Byte, Default Value: 1

SettingDescription

0	Off
1	On

Parameter 5: Temperature reporting unit

0: Celcius 1: Fahrenheit

Size: 1 Byte, Default Value: 0

SettingDescription

0	Celcius
1	Fahrenheit

Parameter 6: Temperature alarms

0: Off 1: On

Size: 1 Byte, Default Value: 0

SettingDescription

0	Off
1	On

Parameter 7: High Temperature alarm level

-20 to + 60 (degree C)

Size: 1 Byte, Default Value: 60

SettingDescription

-20 – 60	Temperature alarm level
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Parameter 8: Low Temperature alarm level

-20 to + 60 (degree C)

Size: 1 Byte, Default Value: -20

SettingDescription

-20 – 60	Temperature alarm level
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Parameter 9: Ambient light reporting

0: Off1: On2: Report only when levels defined in parameter 10 & 11 are passed

Size: 1 Byte, Default Value: 1

SettingDescription

0	Off
1	On
2	Report only when levels defined in parameter 10 & 11 are passed

Technical Data

Hardware Platform	ZM5101
Device Type	Notification Sensor
Network Operation	Reporting Sleeping Slave
Firmware Version	HW: 3 FW: 0.07:00.07
Z-Wave Version	6.51.10
Certification ID	ZC10-19066541
Z-Wave Product Id	0x019A.0x0003.0x000A
Supported Notification Types	
Outdoor Use	ok
Sensors	
Frequency	Russia – 868.4MHz, 869.85MHz
Maximum transmission power	5 mW

Supported Command Classes

- Association Grp Info
- Association V2
- Battery
- Configuration
- Device Reset Locally
- Manufacturer Specific
- Notification V4
- Powerlevel
- Sensor Multilevel V5
- Version V2
- Wake Up V2
- Zwaveplus Info V2

Explanation of Z-Wave specific terms

- **Controller** — is a Z-Wave device with capabilities to manage the network.

Controllers are typically Gateways, Remote Controls or battery operated wall controllers.

- **Slave** — is a Z-Wave device without capabilities to manage the network.
Slaves can be sensors, actuators and even remote controls.
- **Primary Controller** — is the central organizer of the network. It must be a controller. There can be only one primary controller in a Z-Wave network.
- **Inclusion** — is the process of adding new Z-Wave devices into a network.
- **Exclusion** — is the process of removing Z-Wave devices from the network.
- **Association** — is a control relationship between a controlling device and a controlled device.
- **Wakeup Notification** — is a special wireless message issued by a Z-Wave device to announce that it is able to communicate.
- **Node Information Frame** — is a special wireless message issued by a Z-Wave device to announce its capabilities and functions.