

WSG WIRELESS ZONE WATER DETECTION SENSOR

INTRODUCTION

The WSG Wireless Zone Water Detection sensor provides remote leak detection without running wires. Contact data is sent from the sensor to the WSG30 via an integrated 2.4GHz Wireless radio. The device can transmit its signal up to 300' indoors and even greater distances when it has line-of-site. The WSG30 series of Wireless sensors also feature mesh networking technology, which allows each sensor to be used as either a Wireless sensor/router or as a low-power battery operated sensor (also referred to as an end point). When used as a router, greater distances can be realized because each sensor/router adds another 300' of range to the system. The sensor comes with 3 AA alkaline batteries which will power the sensor for up to 2 years (end point mode). An optional plug-in power supply is also available, in which case the batteries function as backup power if main AC power fails (power supply required for router mode).



NOTE: Do not install the sensor in a dirty, humid, or corrosive environment. Do not install the sensor in close proximity to other 2.4GHz devices (WiFi, etc). Do not install the device inside of a metallic enclosure as this will impede it's ability to Wirelessly communicate with the WSG30 .

PACKAGE CONTENTS

(1) Wireless Zone Water Detection Sensor (3) AA Alkaline batteries (1) 10' Water Rope
(5) Adhesive clamps (2) Plastic drywall anchors (2) #6 Metal tapping screws

INSTALLATION SUMMARY

- 1) Locate the sensor serial number on the small white label inside the sensor enclosure .
- 2) Enter the serial number into the WSG30 using the web page or keypad.
- 3) Mount the sensor.
- 4) Attach power supply if using as a router and install the batteries.
- 5) Watch the LCD or web page to confirm that the sensor has connected with the WSG30.

SENSOR REGISTRATION

Before you power-up the sensor you must enter the serial number, located on the small white label inside the sensor enclosure, into the WSG30. You can do this with the WSG30 web page or you can enter it using the WSG30 keypad (see Sensor Registration earlier in this manual). Just be sure to jot down the serial number before you attach the sensor to the wall.

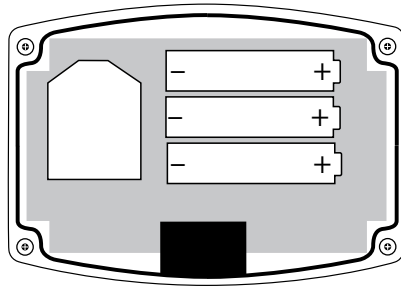
BATTERY INFORMATION

The Wireless Zone Water Detection Sensor can be used with or without the internal 24VDC supply. When the internal supply is used to power the transducer the device must be powered by an external power supply, in which case the batteries are used as a backup in the event of a power failure. In this scenario the batteries will last approximately 15 hours.

BATTERY INSTALLATION

Remove the four screws on the bottom of the enclosure. Carefully separate the top of the enclosure from the bottom. Locate the three battery clips on the circuit board. Take note of the polarity markings iden-

tifying the positive and negative ends of the batteries. Install the batteries in the clips. Re-attach the top and bottom cover with the four screws.



Proper battery installation

POWER SUPPLY WIRING (ROUTER MODE)

When using your wireless sensor in Router mode, you must use an external power supply (Sensaphone Part #XFR-0041). This is required because router mode uses more power than can be supplied by batteries alone for an extended period of time. You can also use a power supply when the sensor is configured as an End Point, which will greatly extend the life of the batteries and minimize the need to change them.

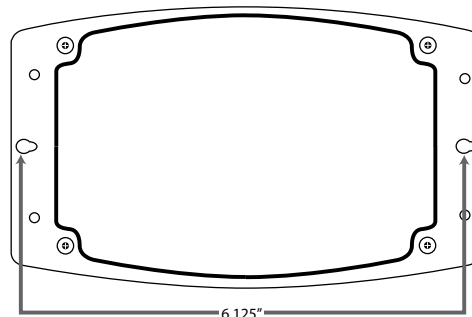
To connect the power supply, remove the sensor cover and locate the screw terminals labeled “5V DC”. connect the positive wire from the power supply to the “+” terminal. Plug the power supply into an appropriate outlet.

MOUNTING

The sensor can be mounted on a wall close to the area to be monitored or it can sit directly on a flat surface. Consideration should be given as to whether or not an electrical outlet will be required if using the optional power supply. When installed within a building where the Wireless signal must travel through several obstructions, the sensor should be located within 300’ of the WSG30 or within 300’ of a sensor/repeater.

Use a pencil to mark the hole locations at the top and bottom of the housing. Install the drywall anchors (if necessary) to the wall. Attach the housing to the wall using #6 tapping screws.

Connect the Water Rope to the connector on the side of the enclosure. Route the Water Rope in the area to be monitored. Secure it using the self-adhesive cable clamps.



SPECIFICATIONS

Operating Temperature Range: 32° to 122° F (0° to 50° C)

Operating Humidity: 5- 90% RH non-condensing

Range (Indoor/Urban): Up to 250' (76m)

Transmit Power Output: 100mW (20dBm)

Operating Frequency: ISM 2.4 GHz

Power: (3) AA alkaline batteries and/or 5VDC (300mA) plug-in adapter

Battery Life: Up to 2 years @ sampling interval = 3 seconds

Dimensions: 6.8" x 3.5" x 1.5"

Housing: White plastic

*Specifications subject to change without notice