



# Installing the i-Lite™ Sensor Intended for Installation by Qualified Personnel Part # BSVA1000

Battery Watering Technologies

## This Package Contains:

- 1 - i-Lite™ BSVA1000 Sensor
- 1 - Grommet
- 2 - Self tapping screws
- 3 - Cable ties

## Tools required for installation:

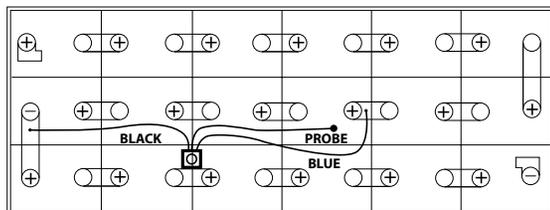
- Towel to wipe down the top of the battery
- Drill
- Phillips screwdriver bit
- 1/2" (12 mm) drill bit
- Insulated wire cutters



- Always wear personal protective equipment (goggles, gloves, etc.) to protect yourself from sulfuric acid.
- Be sure the battery is disconnected from the charger to ensure the cells are not gassing before proceeding.
- Not recommended for use with battery additives.
- Read instructions in entirety before beginning the installation.

## STEP 1: PLAN

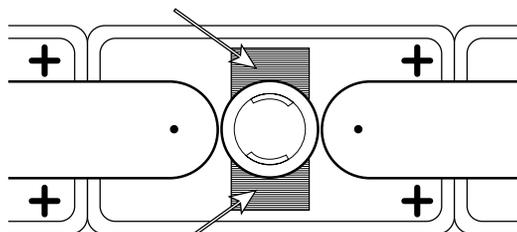
The electrolyte probe must be at least 4 cells to the positive side of the negative (black) wire connection. Take this into consideration when planning your installation. The sensor needs 8-12 volts to function properly.



Example of 18 Cell Installation

## STEP 2: DRILL

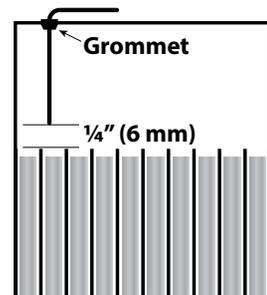
Choose a cell where the level probe will be inserted. **(Reminder: you must have at least 4 cells to the positive from the black (negative) wire.)** Drill a 1/2" hole in the cover of the level probe cell. The hole should be drilled between the vent opening and the edge of the cell to avoid cell internals. Do not drill into the battery plates. Make sure the probe does not touch the internal straps.



Example of Drill Zone

## STEP 3: TRIM PROBE

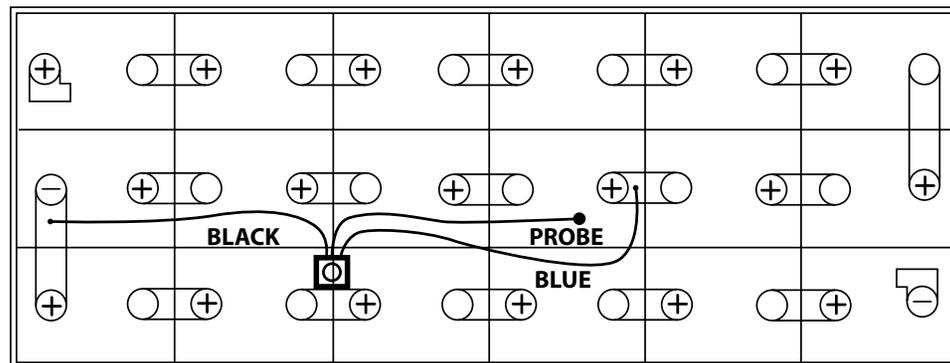
Cut the probe to length. When fully inserted, the tip of the probe should be approximately 1/4" above the plates or moss shield. Insert the grommet into the hole and then insert the probe through the hole in the grommet.



Trim end of probe 1/4" above plates or moss shield

## STEP 4: CONNECT

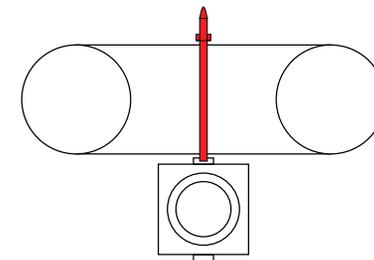
Connect the BLUE wire to the POSITIVE side of the cell that the probe is installed into. Count four (4) cells in the direction of the main negative post, including the cell the probe is installed in and connect the BLACK wire to the NEGATIVE side of the fourth cell.



Example of where to make connections on an 18 cell battery

## STEP 5: SECURE HOUSING

Secure the sensor light housing using cable ties supplied. The example shows a method of attaching the housing to an intercell connector using the supplied cable tie. Make sure wires are secured so they cannot be snagged or pulled.



Tie down example for electronic housing

## LED COLOR CODES

**Solid Green LED** - Battery is OK

**Solid Red LED** - Add water only after the next full charge

**Blinking Red LED** - Electrolyte level has been below the probe for more than ten (10) days

To find out the number of days the system has been low on water, simply disconnect the (BLUE-POWER) wire for five (5) SECONDS and then reconnect. The device will go into RESET MODE. Count the number of blinks to determine how many days / months the battery was low on water. A fast blink indicates how many days it was without water. A slow blink indicates how many months.

## Reset Mode:

**Fast blink** - days

**Slow blink** - months

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BSVA1-INSES\_0316

U.S. Patent No's: 5,936,382; 7,812,613; 8,330,467



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