

# Energy harvesting wireless sensor

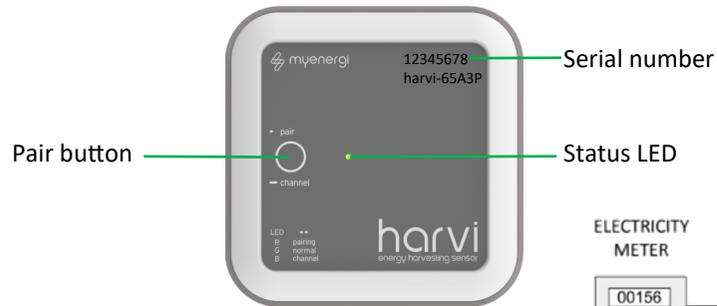
harvi is a clever little device that enables the zappi and eddi products to be installed without using a wired current transformer (CT) for measuring the grid or generation power - instead the CT is connected to harvi. No power source is needed for harvi - the energy from the CT is harvested and used to transmit the measurement signal to the zappi or eddi. This means batteries or electrical wiring are eliminated

## 1. Installation

- Can be wall mounted
  - Up to 3 CT's can be connected
  - Multiple harvi devices can be used on one site
  - Batteries or power supply not required!
1. The CT should be clipped around the cable to be monitored - make sure the arrow on the bottom of the CT is pointing in the direction of normal current flow. (normally towards the consumer unit).
  2. There is a cable grip installed on the back of the harvi. Simply push the CT wire through the top hole and then push down to lock into place.



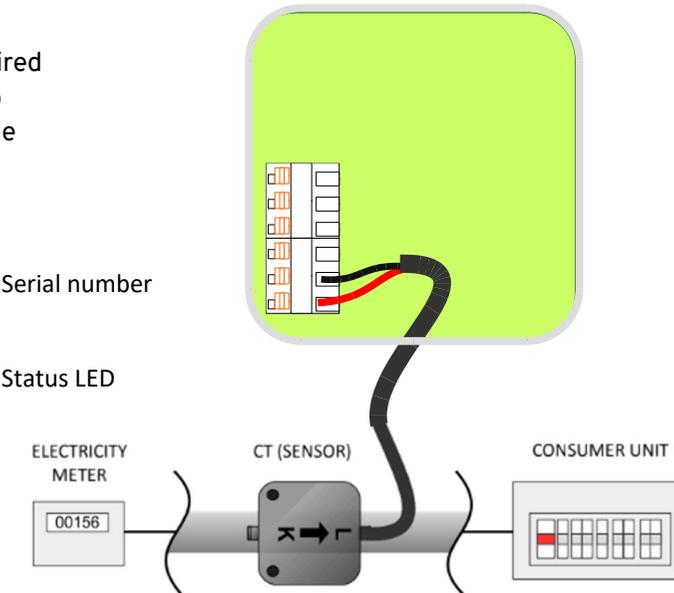
3. Connect 1, 2 or 3 CT's to the CT input(s), the red wire should be connected to the (+) terminal and the black wire to the (-) terminal of the harvi device.
4. **Allow up to two minutes for the status LED to start flashing green**



## 2. Pairing with eddi or zappi

1. Press the pair button briefly.
2. The LED will flash **blue** a number of times to indicate the channel number. Channel doesn't usually need to be changed but see "changing channel" box adjacent if it does.
3. Then the LED will flash **red** to indicate the harvi is in pairing mode.
4. On the eddi or zappi unit, select "settings>advanced>0000>linked devices>pairing mode"
5. The harvi should appear on the screen within a few seconds.
6. Check the serial number on the screen matches the number on the front of the harvi device and press '✓' or '+' to add the harvi device

**Note: If pairing the harvi to a network of already paired devices, the harvi should only be paired with the Master.**



## Changing channel (optional)

The default channel is no.1 and normally this will not need to be changed, however, there may be a situation where there is some other device causing interference on a particular channel.

To change channel:

1. Press and hold the pair button until the LED flashes **blue**, the LED will flash rapidly to indicate the channel number from 1 to 8.
2. Release the button when the chosen channel is shown.
3. Make sure the eddi or zappi unit is also set to the same channel. (settings>advanced>0000>linked devices>channel)

**Note: Early versions of eddi or zappi only have 4 selectable channels.**

### 3. Configuration

After pairing the harvi, the eddi or zappi device will need to be configured to use the harvi. The function of the CT's connected to the harvi are also configured via the eddi or zappi unit.

1. On the eddi or zappi device, go to the “Advanced Settings” menu and then “CT Inputs” or “CT Config”
2. Disable the relevant CT input(s) for that device – this ensures the unit uses the harvi CT instead of the wired CT.
3. Next go to the “Linked Devices/Devices” menu option which is also in the “Advanced Settings” menu.
4. Highlight the harvi device and press ‘✓’ or ‘+’
5. Configure the CT's according to the installation. Refer to eddi/zappi manuals.
6. If harvi is to be used on a 3 phase installation then ensure you set harvi to “three phase”. This will automatically set all 3 CT inputs to the same input source e.g. grid, generation etc

**Note: Please ensure you refer to our GOLDEN CT RULES, which can be found in eddi/zappi manuals when connecting the CT's.**

If you experience any issues during or after installation, please contact our technical support team in the first instance.

**support@myenergi.uk**

**0333 300 1303**

**Monday-Thursday: 9am-5pm**

**Friday: 9.30am-5pm**

#### Technical Specifications

|                          |  |
|--------------------------|--|
| CT Inputs:               | 3 inputs enable 3-phase or multi-point power measurement           |
| Measurement Range:       | 25W to 15kW (50Hz AC, import and export)                           |
| Energy Harvesting Range: | 0.2A to 65A (including reactive current)                           |
| Accuracy:                | 2.0% typical   |
| Transmission Rate:       | 1s @ 1A+, <10s @ 0.5-1A, <30s @ <0.5A                              |
| Wireless Interface:      | 868 MHz (proprietary protocol)                                     |
| Mounting Location:       | Indoor only (can be housed in an IP rated plastic box if required) |
| Operating Temperature:   | -30°C to +50°C   |
| Dimensions:              | 98 x 98 x 36   |



harvi

## Installation guide

Product code: harvi-65A3P

3 year warranty – register at <https://myenergi.com/product-registration/>