Cadi.Sense Quick Help (v3.21.0)

Note: To view the latest help file, please go to www.cadisense.com/help

A. Cadi.Sense Icons – What They Mean

	Go to Home Page (Temperature Monitoring Page): View a single sensor temperature in large font size.
	Refresh: Manually refresh the current page to get the latest temperature. (Note: page will actually refresh automatically every 5 minutes.)
	Advanced Settings: View a list of all advanced settings, including connecting to your WiFi router.
	Set Timezone, Date & Time: Manually set the timezone, date and time if necessary.
	Add ThermoSensor: Add a new sensor. (Note: concurrent monitoring of several persons at the same time is possible, so long as each person wears a sensor and they are within wireless reception range (3 to 5m) of SmartNode.)
	Remove ThermoSensor: Remove a sensor. (Note: all data associated with the sensor will be deleted. So before deleting, you may want to export the data using the "Export Temperature History Data" icon that will be available only in laptop's web browser.)
	Go to Main Page (Sensor Selection Page): View a list of all registered sensors.
	Sensor Settings: 1) Key in the name/nickname of the person wearing the sensor (default: empty); 2) Set the temperature scale to degrees Celsius or Fahrenheit (default: Celsius); 3) Change the high temperature threshold (default: 37.8 degree Celsius); 4) Turn on/off the alert message that will appear whenever temperature exceeds the threshold.
	Temperature Chart: View the temperature graph. (Note: the chart will appear only after 15 minutes when the first record is stored.)
	Temperature History: View a list of temperature records. (Note: the records will appear in about every 15-minute interval. Readings below 32.1 degree Celsius will be shown as "Lo", and readings above 42.0 degree Celsius will be shown as "Hi".)
	Export Temperature History Data: Export data (temperature and date-time) in .csv format for your further analysis on spreadsheets. (Note: this feature is available only in laptop's web browsers.)
	Shift Forward 12 Hours: Shift the temperature chart/history forward 12 hours. (Note: the temperature chart/history will show a 24-hour period, with the default period being the current day from 00:00 to 23:59 hrs.)
	Shift Backward 12 Hours: Shift the temperature chart/history backward 12 hours.
	Jump To Date: Shift the temperature chart/history to a date of your choice.

B. Setup I – Quick Setup

Pre-Requisites:
Get ready a mobile device (iPhone, Android phone, tablet or laptop). Write down the information shown on your SmartNode plug here:
    SSID (e.g., CADI_XXXX): _____
    PWD (8 chars): _____
    SmartNode ID: _____

Step 1:
Plug in the SmartNode to a power socket in the **same room where the patient will be resting**. Then switch it on. *(Note: SmartNode takes about 30 secs to start up.)*

Step 2:
Turn on WiFi on your mobile device. Then connect it to SmartNode using the above SSID and password (PWD 8 chars).

Step 3:
Go to web browser and enter:
    http://10.10.10.10
If Figure 1 appears, select your timezone and click "Save". Otherwise Figure 2 shall appear. Quick setup is done!
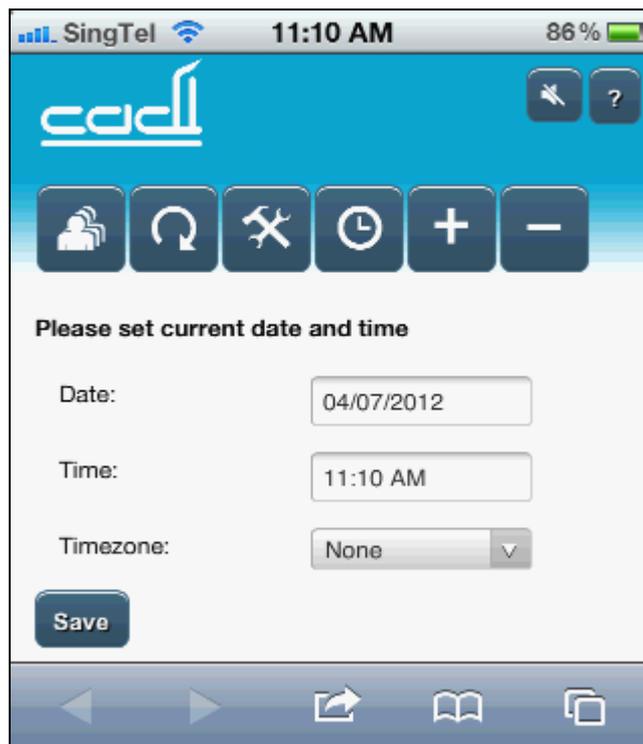

Figure 1. Setting timezone, date and time.

Note: After setting the timezone, date and time, Figure 2 shall appear. The pre-registered sensor will be shown, with temperature displayed as "--" or "Lo". If the sensor is still in the casing, the reading will be shown as "--". Otherwise if the sensor has been taken out from its casing for more than 30 seconds, you may see "Lo" after clicking the Refresh icon. If you have warm up the sensor by rubbing it in you hands for more than a minute, click the Refresh icon and you may see numerical temperature value displayed. Please refer to the section on "How to Paste ThermoSensor" to know more about the correct pasting method.

Click the "Home Page" icon *and Figure 3 shall appear.*
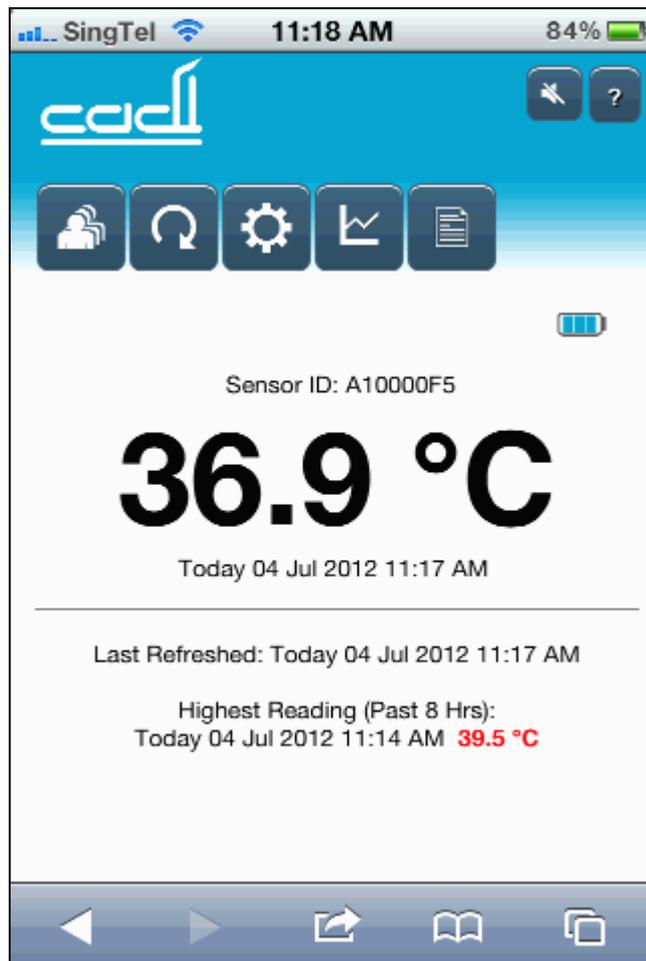
Figure 2. Main Page (Sensor Selection Page).

Figure 3. Home Page (Temperature Monitoring Page).

C. Setup II – Access Cadi.Sense Outside Home

Pre-Requisites:

Note: Please go through Section B before proceeding further.

You need to have a WiFi router which is already setup and connected to the internet. You also need to know **your WiFi router's SSID and password**. Please check with your internet service provider if you do not remember the SSID and/or password.

Step 1:

Click the "Advanced Settings" icon ![icon], then the "Connect to WiFi Router" icon (if you cannot see the "Advanced Settings" icon, please click the "Main Page" icon ![icon] first). When a screen (see Figure 4) appears and asks "Please select your WiFi router", click on your router's SSID, key in your router's password, then click "Apply".

Note (a): Now please be patient as SmartNode needs about a minute to connect to your WiFi router and another minute to reboot.
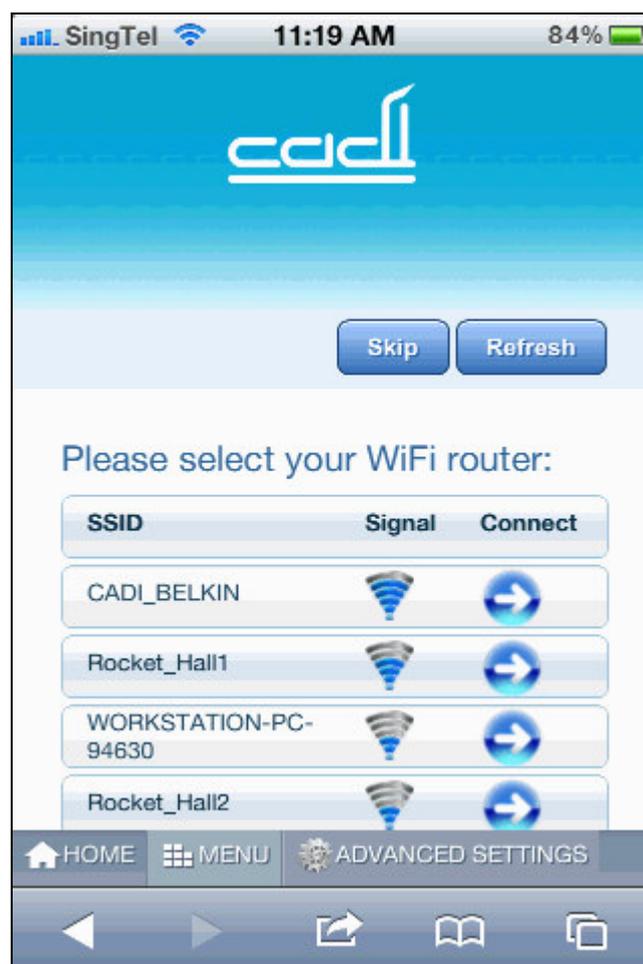

Figure 4. Connecting to your WiFi router.

*Note (b): If the connection is **successful**, the following text will appear: "SmartNode is now connected to xxxxxx. To access SmartNode, please go to www.cadisense.com or use the LAN URL. Please be patient as SmartNode needs about a minute to reboot." Figure 5 shall then appear. However if the connection is **not successful**, the following text will appear: "Connection failed – please try again, or switch off and on SmartNode then try again."*

Note (c): After successful connection to your WiFi router, SmartNode will remember the router's SSID and password (unless you have intentionally unmarked the default "Remember Settings" during connection). So if you were to switch off and on SmartNode, it will automatically re-connect to your WiFi router, taking about 2 minutes.

Step 2:

After successful connection to your WiFi router, you may not be able to use "http://10.10.10.10" to access your SmartNode anymore. Nonetheless you can still access it using the **LAN URL** (in the example shown in Figure 5, the LAN URL is http://10.0.0.84).
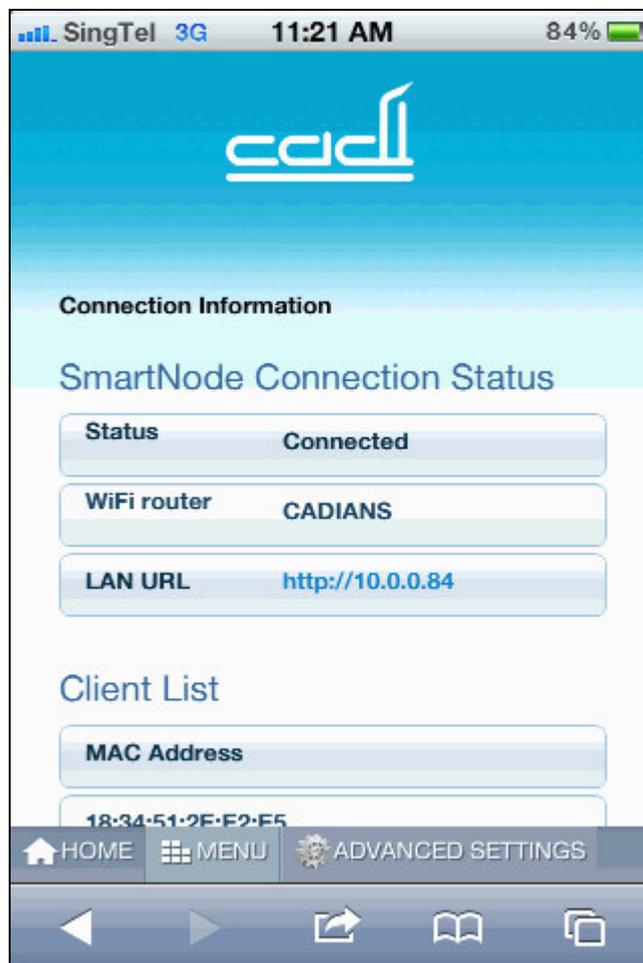

Figure 5. Successful connection to your WiFi router.

Step 3:
You may now use a mobile device (iPhone, Android phone, tablet or laptop) to access your Cadi.Sense anywhere in the world! Go to "**www.cadisense.com**", then click "Access Cadi.Sense". Key in your SmartNode ID (which can be found on your SmartNode, and you should have written it down in the beginning of Section B), password is "**cadi**", default port is "**50000**", then click "Login". If your router has UPNP enabled or if you have setup port forwarding (for details please refer to "Advanced Setup – Port Forwarding for Your WiFi Router"), then Figure 7 shall appear, otherwise Figure 6 shall appear.
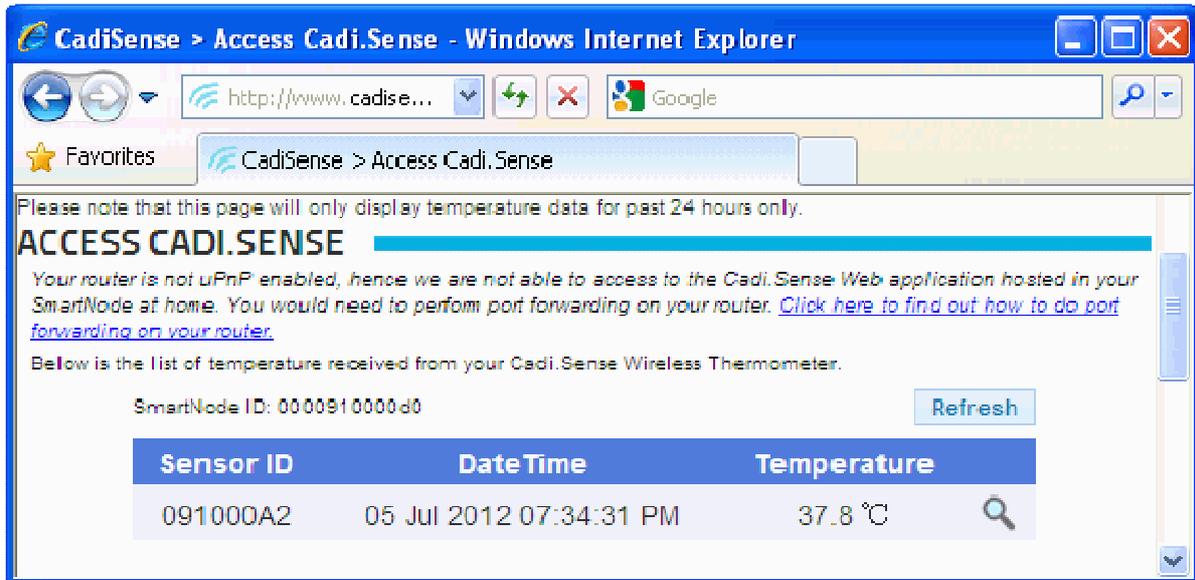

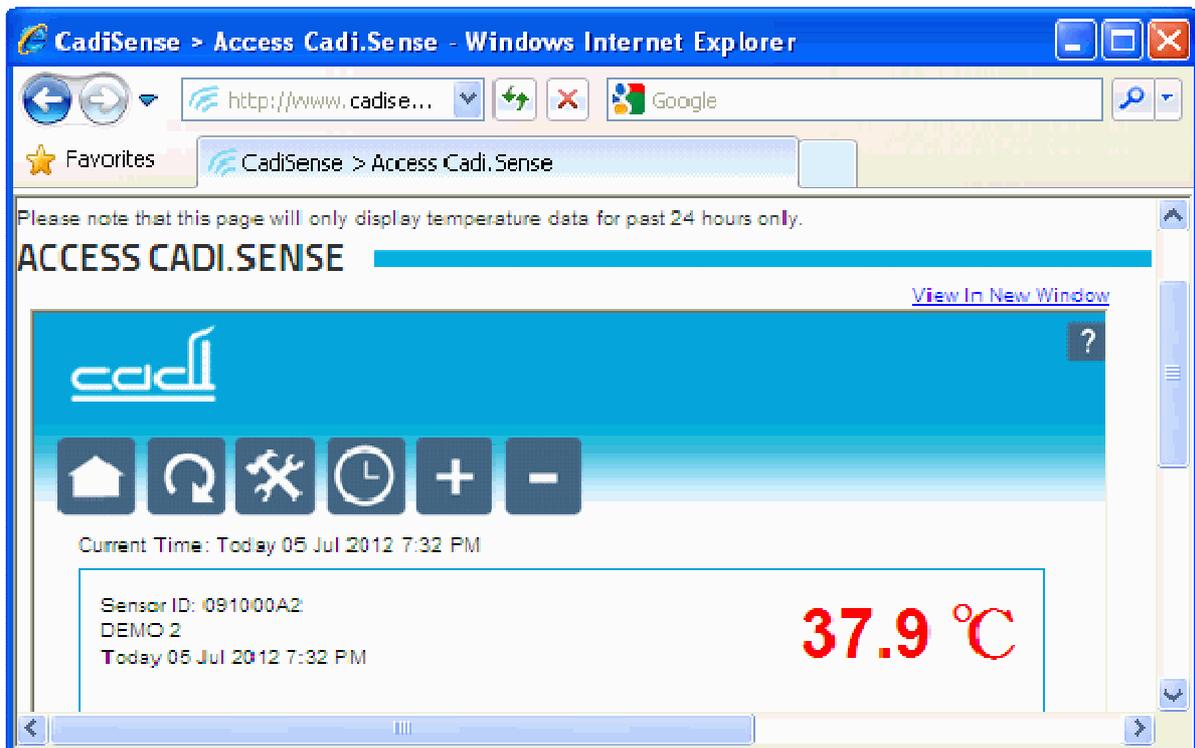*Figure 6. Cadi.Sense page without UPNP / Port Forwarding setup.*

Figure 7. Cadi.Sense page with UPNP / Port Forwarding setup.

7

D. Setup III (Advanced) – Port Forwarding for Your WiFi Router

Pre-Requisites:

Note (a): **This section is for advanced users only. DO NOT PROCEED IF YOU ARE NOT FAMILIAR WITH PORT FORWARDING.**

Note (b): Please go through Sections B and C before proceeding further.

You need to be physically at the place where your WiFi router is, and you also need to know **your WiFi router's admin password** (if any). Please check with your internet service provider if you do not remember the password.

Step 1:
(You may skip this step if you already know the LAN IP address of your WiFi router.) Go to your device's web browser and enter the LAN URL (please refer to Section C Step 2).

Click the "Advanced Settings" icon , then "MENU", "More Settings - IP". Write down the following information shown on the screen:

> **Gateway:** _____
> (this is the LAN IP address of your WiFi router)

Step 2:
Go to your device's web browser and enter the LAN IP address of your WiFi router, then key in your WiFi router's admin password (if any).

Step 3:
Find the UPNP setting and enable it (note: some router may not have this feature). You may have to reboot your WiFi router for the setting to take effect (please check with your WiFi router's manual). You may have to reboot SmartNode (taking about 2 minutes) by switching it off and on again.

Step 4:
If UPNP feature is not available or not working, then you have to carry out manual port forwarding. Basically, the objective of manual port forwarding is to instruct your WiFi router to allow external (outside home) access of your SmartNode. Different routers may have different ways and names for carrying out port forwarding (also called virtual server), but the main information to be keyed into your WiFi router are similar:

(1) **Device IP Address** (also called Local IP): the LAN URL (please refer to Section C Step 2), which is the LAN IP address of SmartNode

(2) **Public Port** (also called external port): **50000**

(3) **Private Port** (also called internal port, local port, or host port): **80**

(4) **Protocol: TCP**

(5) **Enable: Yes**

Note: You may have to reboot your WiFi router for the settings to take effect (please check with your WiFi router's manual). You may have to reboot SmartNode (taking about 2 minutes) by switching it off and on again.

E. Using iPhone or Android App to Access Cadi.Sense

Pre-Requisites:
Download the **Cadi.Sense app** from iPhone App Store or Android Market. It is an electronic health journal that helps keep track of your children's health throughout their growth. In addition, it also allows wireless monitoring of your children's temperature anytime and anywhere.

Step 1:
After installing and setting up the Cadi.Sense app, on the home tab, click "+" and enter the necessary information to create a new profile for your child.

Step 2:
On the home tab, select your child, click another "+" sign and select "Cadi.Sense Monitoring". Key in your **ThermoSensor ID** (you may find it from the sensor as an 8-digit hexadecimal number).
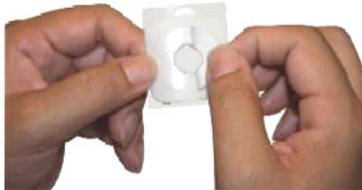
Step 3:
Select the monitoring tab and you are done!

F. How to Paste ThermoSensor

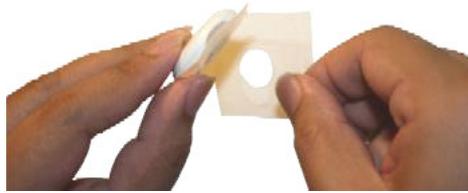**Step 1:** Apply a small amount of body lotion onto the lower abdomen area.

Step 2: Take a Stick On and peel off the round paper liner to expose the adhesive.

Step 3: Paste the ThermoSensor on the adhesive, with the metal part facing outward and away from the adhesive.

Step 4: Remove the rectangular backing liner.

Step 5: Paste the ThermoSensor by sticking the adhesive part to the inside of the diaper/undergarment, so that the sensor's metal part will touch the lower abdomen (left or right) when the diaper/undergarment is properly worn (as shown in the picture).

Note (a): Please note that the ThermoSensor may take about 10 minutes to heat up from room temperature to the body temperature. A temperature reading is wirelessly sent every 30 seconds to your SmartNode, and this temperature reading will appear on the Cadi.Sense application.

Note (b): To remove the sensor after usage, first peel off the Stick-On from the diaper/undergarment, then remove the sticky residue from the sensor.

G. How to Keep ThermoSensor

After every usage, please remember to keep your sensor back into the storage case properly to switch off the sensor. The metal part of the sensor should face down and the barcode side facing up. Make sure that the sensor fits nicely into the storage case and you are able to close the cap of the case. This will ensure that the sensor switches off completely, thus saving battery power and making your sensor last longer!

H. SmartNode LEDs – What They Mean

1) **Power LED**: lights up when power is on.

2) **Sensor LED**: lights up when sensor is transmitting readings and within wireless reception range (3 – 5 m) for the past 5 minutes.

3) **WiFi LED**: lights up when SmartNode WiFi is ready for connection to mobile devices.

4) **WPS / CadiSense.com LED**: lights up when SmartNode is connected to the internet and www.cadisense.com for the past 5 minutes.

Note: The WPS / CadiSense.com LED is also a button. Once you press and hold the button for 5 seconds and release, WPS (WiFi Protected Setup) is initiated and the LED will start blinking. If the WPS button on your WiFi router (if available) is also pressed within 2 minutes, then the wireless connection between SmartNode and your WiFi router will be setup automatically, taking about 3 minutes. However please note that your SmartNode SSID and password will be changed to your WiFi router's SSID and password, and so it is NOT ADVISABLE to do WPS connection.

I. Advanced Feature: How to Change SmartNode Password

Step 1:
Go to your device's web browser and enter the LAN URL (please refer to Section C Step2). Click the "Advanced Settings" icon, then "MENU", "More WiFi Settings – Security". Change the password shown in "WPA Passphrase". Then click "Apply".

Note: After changing the SmartNode's Password, your WiFi connection with SmartNode will be disconnected. You have to reconnect to your SmartNode using its SSID (please refer to Section B) and your new password.

J. Advanced Feature: Resetting SmartNode

Warning: All data will be deleted after this hardware reset. *So before resetting, you may want to export the data using the "Export Temperature History Data" icon that will be available only in laptop's web browser.*

Step 1:
Make sure SmartNode is switched on for at least 1 minute. Take a paperclip and bend the tip outwards. Use the tip to press down and **hold for 10 seconds** the small round "hole" situated just next to the LAN socket on the SmartNode. Then release it and SmartNode will reset and reboot in 1 minute.

Note: Resetting SmartNode will restore all settings and configuration to the factory defaults, except that:
i)   Upgraded firmware will stay and not revert back to the older version;
*ii) **Pre-registered sensor will be deleted**. So you need to manually add sensor after performing this hardware reset.*

K. Advanced Feature: Upgrading SmartNode Firmware

Note: ***This section is for advanced users only. DO NOT PROCEED IF YOU ARE NOT FAMILIAR WITH FIRMWARE UPGRADING.***

Warning: All data may be deleted after this firmware upgrade. *So before upgrading, you may want to export the data using the "Export Temperature History Data" icon that will be available only in laptop's web browser.*

Pre-Requisites:
You need a laptop which is connected to the internet.

Step 1:
Download the latest firmware from www.cadisense.com into your laptop. Note that the firmware typically appears as a file with extension "img".

Step 2:
Connect your laptop to SmartNode physically using a LAN cable. Note that a LAN cable is provided in your Cadi.Sense package box.

Step 3:
Go to your laptop's web browser and enter "http://10.10.10.10/main.asp". Click the "Device Settings" icon. In the second row of the menu bar, scroll to the forth icon named "Firmware Upgrade" and click it. Click the "Browse" button and select the filename of the firmware that you have downloaded in Step 1. Then click "Apply".

Step 4:
Reset SmartNode (please refer to Section J).

Note: SmartNode takes about 3 – 5 minutes to upgrade the firmware. After firmware upgrade, you may have to reboot SmartNode (taking about 2 minutes) by switching it off and on again.

– END –