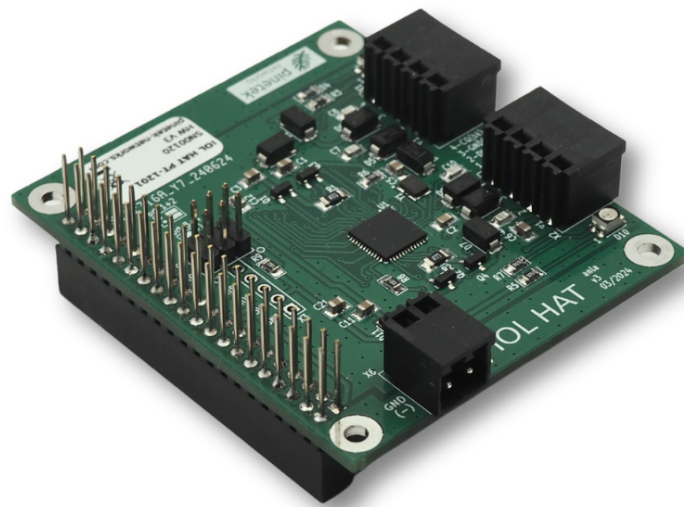


# 5 Node-RED

## Application Manual

[www.pinetek-networks.com](http://www.pinetek-networks.com)





## Table of Contents

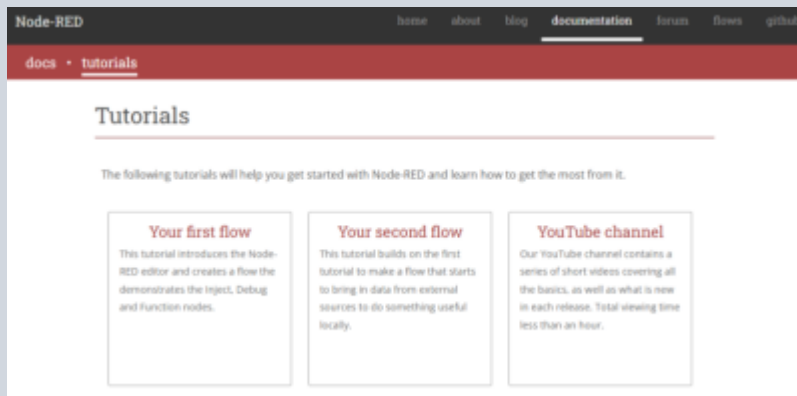
5 Node-RED .....	5
<i>Node-RED Workspace</i> .....	5
<i>Node-RED Dashboards</i> .....	6
Default dashboards .....	6
Node-RED Update .....	7



## 5 Node-RED

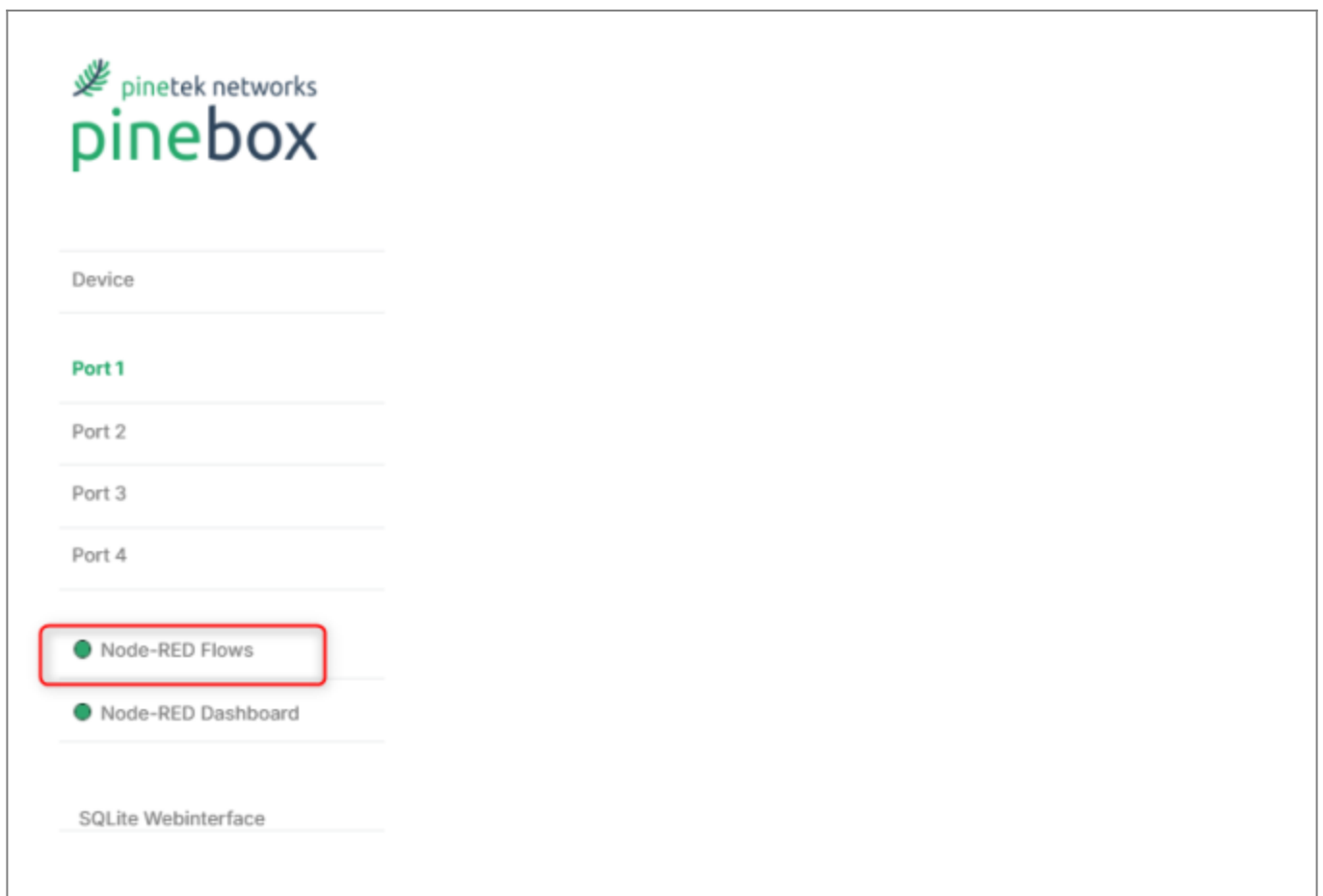
This section describes how the SDCI data can be processed in Node-RED and vice versa. The Pinebox's web interface creates data to import nodes into Node-RED specific to the connected device based on the IODD file.

There are many introduction tutorials available for Node-RED. We recommend you to get familiar with the principles e.g., by starting with the official Node-RED documentation:  
<https://nodered.org/docs/tutorials/>



### Node-RED Workspace

The Node-RED Flows workspace can be accessed over the menu in the Pinebox web interface:

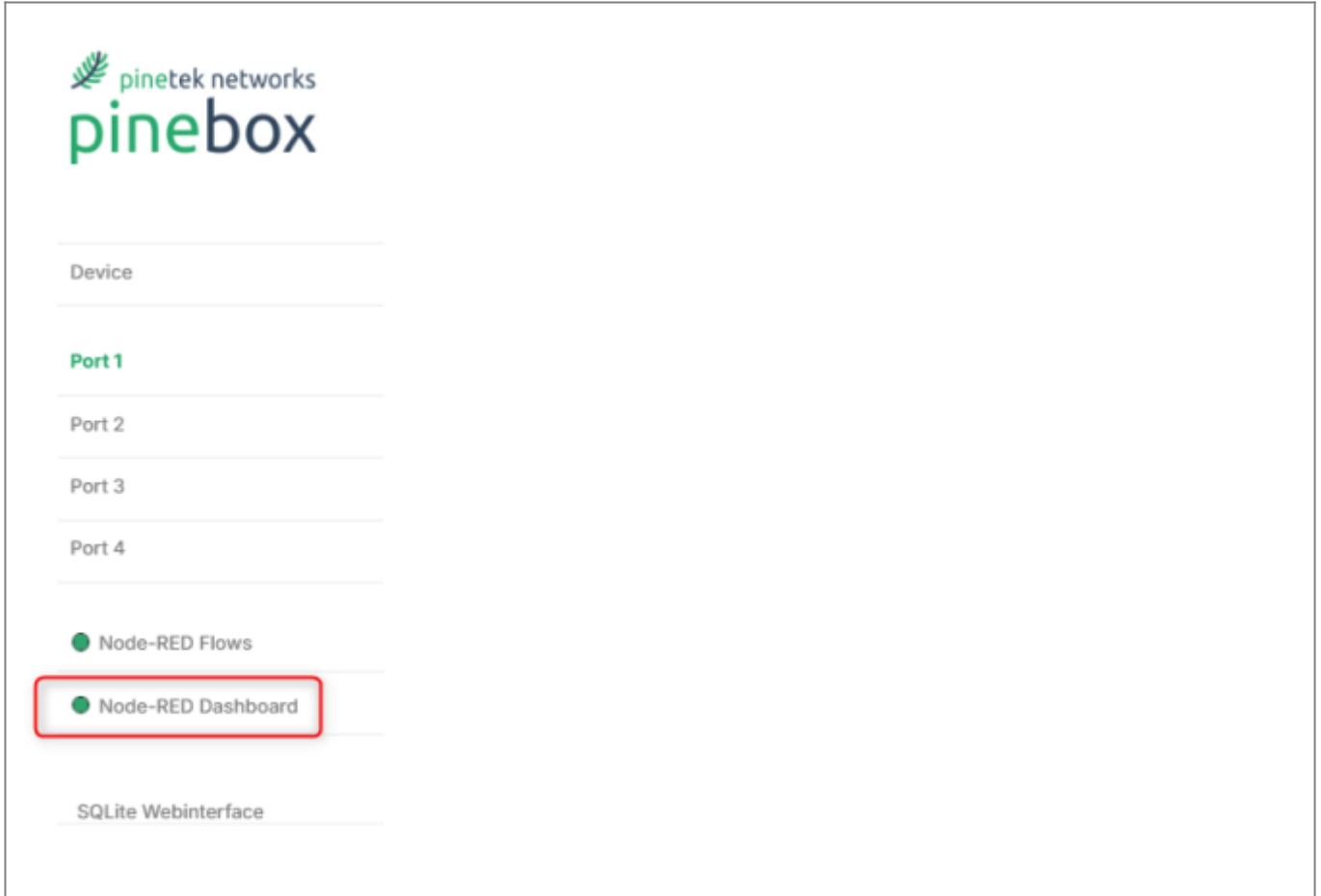


Alternatively, the Flows workspace is available over port :1880 (with IP-address or hostname). If you perform changes in the Node-RED Flows, you need to perform a “Deploy” action to submit the changes:



## Node-RED Dashboards

The Node-RED dashboards can be accessed over the menu Pinebox web interface:



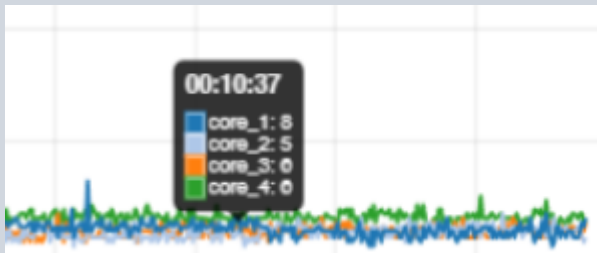
Alternatively, the Flows workspace is available over port :1880/ui (with IP-address or hostname).

Please note that on deploy, the current view is being reset to the first tab.

### Default dashboards

There are several tabs in the dashboard. Per default, the first two tabs are the “Node-RED System Info” with current CPU load and CPU load history to determine if the Pinebox is overloaded.

CPU core 3 and core 4 are for SDCI functionality and cannot be utilized for user application.



The second tab is “the port control “Power/Status” to control the port power and receive the status from Node-RED. If not needed, the first two tabs can be deleted. They will be re-created on factory reset.

## Node-RED Update

Node-RED can be updated to the latest version. The device needs to be connected to the internet for this operation.

### Node-RED

Node-RED status	Node-RED is running	Start Node-RED	Stop Node-RED
Node-RED service	Node-RED service is started on device start	Enable service	Remove service
Installed version	4.1.1		
Latest version	4.1.8	Update	



Please note that the updater does not check the compatibility of the existing nodes and palette. Downgrade of Node-RED is currently not supported.