

1. Follow this:

<http://docs.openhab.org/installation/openhabian.html#first-steps>

2. Use “Etcher” to write to SD card

3. Wait . . .

4. ssh into “raspberrypi.local” or “raspberrypi” or 192.168.1.201:

```
ssh openhabian@192.168.1.201
```

```
P/W = openhabian
```

5. sudo openhabian-config

6. Option 13 Samba

```
Username: openhabian
```

```
Password: openhabian
```

7. Set Timezone:

```
timedatectl list-timezones
```

```
sudo timedatectl set-timezone Australia/Perth
```

```
Check: timedatectl
```

8. sudo openhabian-config

9. Option 22 Install Mosquitto

```
(no authentication for now)
```

```
See http://docs.openhab.org/addons/bindings/mqtt1/readme.html
```

```
Use Chrome to run MQTTLens
```

```
Disconnected
```

```
Use terminal to run tail -f /var/log/mosquitto/mosquitto.log
```

```
1493783662: mosquitto version 1.4.11 (build date Mon, 20 Feb 2017 22:47:27 +0000) starting
1493783662: Config loaded from /etc/mosquitto/mosquitto.conf.
1493783662: Opening ipv4 listen socket on port 1883.
1493783662: Opening ipv6 listen socket on port 1883.
1493783716: Error in poll: Interrupted system call.
1493783716: mosquitto version 1.4.11 terminating
1493783717: mosquitto version 1.4.11 (build date Mon, 20 Feb 2017 22:47:27 +0000) starting
1493783717: Config loaded from /etc/mosquitto/mosquitto.conf.
1493783717: Opening ipv4 listen socket on port 1883.
1493783717: Error: Address already in use
```

Some troubleshooting required here including stopping and restarting the Mosquitto service.

See: <http://www.switchdoc.com/2016/02/tutorial-installing-and-testing-mosquitto-mqtt-on-raspberry-pi/>

10. Visit site: <http://192.168.1.201:8080>

Chose "Expert" Installation as MQTT is a 1.x binding

11. Tested using iOS app and ClassicUI. Confirmed sitemap called Home with no items.

12. Used PaperUI to install MQTT binding and Network Binding

13. Edited /volumes/openhab-conf-3/services/mqtt.cfg to:

```
mqttloc.url=tcp://localhost:1883
mqttloc.clientId=openhab2
```

DON'T use non alpha-numeric characters in the broker name.

Get:

1. mosquitto.log

```
1493849816: New connection from 127.0.0.1 on port 1883.
```

```
1493849816: New client connected from 127.0.0.1 as openhab2 (c1, k60).
```

2. openhab.log

```
2017-05-03 14:06:02.340 [INFO ] [penhab.io.transport.mqtt.MqttService] - MQTT
Service initialization completed.
```

```
2017-05-03 14:06:02.346 [INFO ] [t.mqtt.internal.MqttBrokerConnection] - Starting
MQTT broker connection 'mqtt-loc'
```

14. Created test.sitemap as follows:

Refer to <http://docs.openhab.org/features/sitemap.html>

sitemaps/Test.sitemap looks like:

```
sitemap Test label="My Home Automation Testing" {
```

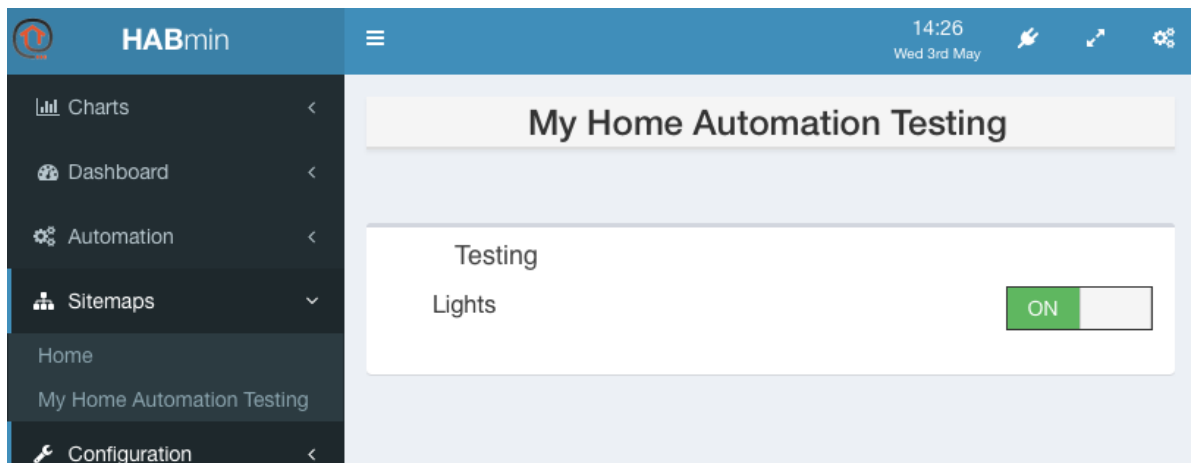
```
    Frame label="Testing" {
        Switch item=Lights icon="big_bulb"
    }
}
```

See this in openhab.log:

```
2017-05-03 14:16:19.584 [INFO ] [el.core.internal.ModelRepositoryImpl] - Loading model
'Test.sitemap'
```

```
2017-05-03 14:16:19.629 [INFO ] [el.core.internal.ModelRepositoryImpl] - Refreshing
model 'Test.sitemap'
```

Habmin Looks like:



## 15. Created test.items

Refer to:

<http://docs.openhab.org/configuration/items.html> and

<https://community.openhab.org/t/itead-sonoff-switches-and-sockets-cheap-esp8266-wifi-mqtt-hardware/15024>

items/test.items looks like:

```
Switch Lights "It's a light" <light> (LR,gLight)
{ mqtt=">[broker:cmnd/FrontLoungeMedia/power:command:*.default],
  <[broker:stat/FrontLoungeMedia/POWER:state:default]" }
```

See this in openhab.log:

```
2017-05-03 14:38:33.506 [INFO ] [el.core.internal.ModelRepositoryImpl] - Refreshing
model 'test.items'
```

## 16. Successful configuration:

mqtt.conf:

```
mqttloc.url=tcp://192.168.1.201:1883
mqttloc.clientId=openhab2
```

sitemap file, Test.sitemap:

```
sitemap Test label="My Home Automation Testing"
{
    Switch item=FLM
}
```

items file, Test.items:

```
Switch FLM
{ mqtt=">[mqttloc:cmd/FLM/power:command:*.default], <[mqtt-
loc:stat/FLM/POWER:state:default]" }
```

## 17. Works in iOS app, not on browser – BasicUI, ClassicUI (nothing shows at all) or in Habmin.

To set the default sitemap for the BasicUI (and the ClassicUI), navigate to:

PaperUI->Configuration->Services->UI->Basic UI->Configure and set the default sitemap (change from "default" to "Test")