

FCC Compliance Notice:

This device complies with Part 15 of the FCC Rules [and with Industry Canada licence-exempt RSS standard(s)].

Operation is subject to the following two conditions:

- (1) this device may not cause harmful interference, and
- (2) this device must accept any interference received, including interference that may cause undesired operation.

Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.



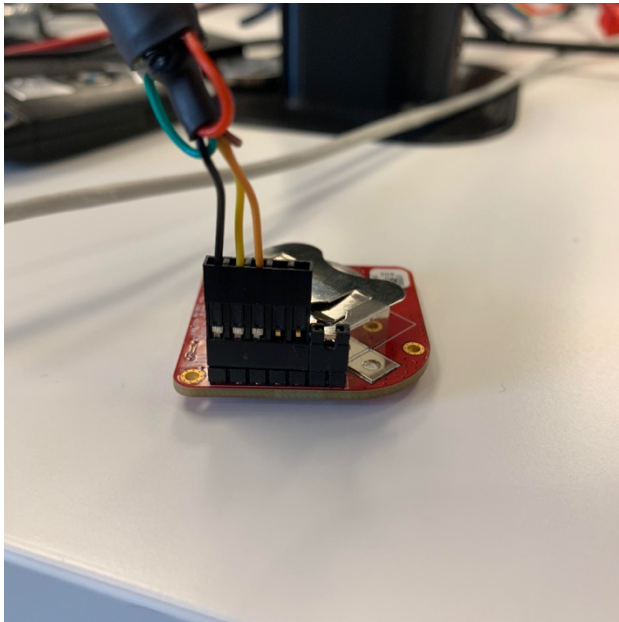
FCC ID: 2AR2K-0002016

IC ID: TBD

This device is for internal use only and is not expected to be transported to any third parties, hence no packaging label is necessary. Notwithstanding, in the event any devices are provided to any third parties, they must be accompanied by a packaging label including the information on this page.

Sprinkles RF testing SOP

1. Connect FTDI cable to your computer and to the board following the attached picture for orientation.
2. Setup your favorite serial terminal to access the FTDI cable using the following settings:
baud = 115200, bytes = 8, parity = None, stop bits = 1.
3. Apply power by inserting jumper in the last two free pins in the header. The complete setup should appear as in the picture bellow:



4. you should see something like the following in your terminal:

```
Sprinkles
FW ver: 0.2. Built on: Oct 15 2018 at 10:16:42
RF Test Image
Chip: nRF52840 (0x52840)
Flash Size: 1024 KB
Dev Address Type: random
Reset reason: 4
Shell: on
```

5. After that, if you hit enter, you should see a prompt that looks like this:

```
0405:ffff|.]
```

[Note: The prompt doesn't really mean much for the RF test itself. But FYI, 0405 is the PAN id used. ffff means that there is no PAN address associated with this device. Again, it's got nothing to do with the RF test.]

Here are the available commands:

r+ [channel] [power]

the 'r+' command takes two optional arguments: the first one is the channel in the range [11-26] and the second one is Tx power in dBm. Default channel: 20. Default power +8dBm.

[Note the standard Sprinkles firmware during defaults to -8dBm but allows setting the power higher]

rc

the 'rc' command sets the radio in CW mode. To stop this mode of operation you need to power cycle the board.

rt [# of packets] [# of bytes per packet] [inter packet delay]

The 'rt' command sends modulated packets. You can optionally specify: number of packets, number of bytes per packet and inter packet delay, in that order. The packets are filled with random bytes.

r?

print stats on the rx packets.

rr

Set the device into constant receive mode.