

Raspberry Pi2 RTL_TCP Server

The Raspberry Pi2 makes a nice RTL_TCP server. You can place it anywhere on the network close to a good antenna. The sample rate requires good throughput on the Network and generally Ethernet has more throughput than WiFi and Ethernet is preferred for connectivity on the LAN. Fast WiFi will work however. So to setup the RPi2 for this service, you will first install Raspbian Jessie on the SanDisk card and boot the Pi with it. Once you have logged in to the Pi, open a terminal and do the following:

1. Passwd
2. sudo raspi-config
3. sudo apt-get update
4. sudo apt-get upgrade
5. sudo rpi-update
6. reboot

log back into the Raspberry Pi

7. cd /etc/modprobe.d
8. sudo nano rasp-blacklist.conf #and add the following, then save the file:

```
blacklist dvb_usb_rtl28xxu
blacklist rtl2832
blacklist rtl2830
```

9. sudo update-initramfs -u
10. cd
11. sudo apt-get install git
12. sudo apt-get install cmake
13. sudo apt-get install libusb-1.0-0-dev
14. sudo apt-get install build-essential
15. sudo apt-get autoremove
16. git clone git://git.osmocom.org/rtl-sdr.git
17. cd rtl-sdr

```
18. mkdir build  
19. cd build  
20. cmake ../  
21. make  
22. sudo make install  
23. sudo ldconfig  
24. cd /etc/udev  
25. sudo cp ~/rtl-sdr/rtl-sdr.rules ./  
26. sudo reboot
```

Log back into the Pi and start the RTL_TCP Service with:

rtl_tcp -a <the Pi's IP address>

Then using SDR# or HDSDR or whatever receiver you use on your local computer, configure the TCP interface for the server's IP address and set the sample rate and other parameters as appropriate to start receiving from the RTL-DVB USB receiver served by the Raspberry Pi.

<https://www.youtube.com/watch?v=pSq39ydjlQU>

<https://www.youtube.com/watch?v=MQ2N2wZe03A>

Ron – KA7U

March 4, 2016