The capture files are included with the names reflected the device, command, sample rate, and tuned frequency.

Ubuntu Version used in the lab:

Linux gh5-desktop 4.8.0-54-generic #57~16.04.1-Ubuntu SMP Wed May 24 16:22:28 UTC 2017 x86\_64 x86\_64 x86\_64 GNU/Linux

Installing Pybombs,GNU Radio, and Hackrf Tools:

You will need to install GNU Radio, hackrf tools, and osmosdr tools. The following commands will install these tools using pybombs. While not likely an issue, pybombs will install from the head of the repositories; therefore, the actual versions will differ from what is used in the book.

echo "Install GNU Radio"

mkdir ~/Documents/sdr

cd ~/Documents/sdr

sudo apt-get update

sudo apt-get install python-pip

sudo pip install --upgrade pip

sudo pip install pybombs

pip install bitstring

sudo pybombs recipes add gr-recipes git+https://github.com/gnuradio/gr-recipes.git

sudo pybombs recipes add gr-etcetra git+https://github.com/gnuradio/gr-etcetera.git

sudo pybombs prefix init ~/Documents/sdr/prefix2 -a myprefix -R gnuradio-default

sudo pybombs install hackrf

sudo pybombs install gr-osmosdr

cd prefix2/

source setup\_env.sh

Versions installed by pybombs for the exercises:

airspy git commit=91aeb2c7a18772b64c8e6a1d9c96b4571a5ec608

apache-thrift git commit=53dd39833a08ce33582e5ff31fa18bb4735d6731

bladeRF git commit=c3eccc6d67a4d4cd6110e81ce29f568d8bd5c636

gnuradio git commit=0e32fcaf928e8f3f9161a619201d3cf253a46ded

gr-iqbal git commit=dcd73fd54992430938ced73872b983bffd770b11

gr-osmosdr git commit=cf9549485af61658eab3e14e0a89db80742eb547

hackrf git commit=9bbbbbfbfb55c60edadebdc274b6a99281f50a21

libosmo-dsp git commit=6561cfa8da6ddba35294ede452c1e5771b56e806

osmo-sdr git commit=ba4fd96622606620ff86141b4d0aa564712a735a

rtl-sdr git commit=e3e6ee23b7f052327bf64c6908f5c09b75029edc

soapysdr git commit=74f890ce73c58c37df08ea518541d3f49ffefadb

uhd git commit=82f0d5a6d23c6b561a17a8fa15187118b7f35f14

Included Files:

remote\_analysis.grc - The flow graph for the capture

Captured Signals:

remote1-2on-4m-316mhz

remote2-1on-4m-316mhz

remote2-3on-4m-316mhz

remote1-1off-4m-316mhz

remote1-3off-4m-316mhz

remote2-2off-4m-316mhz

remote1-1on-4m-316mhz

remote1-3on-4m-316mhz

remote2-2on-4m-316mhz

remote1-2off-4m-316mhz

remote2-1off-4m-316mhz

remote2-3off-4m-316mhz