Options
Output Language: Python
Generate Options: QT GUI

Variable
ID: rx_samp_rate
Value: 8M

Variable
ID: samp_rate
Value: 1M

Variable
ID: squelch_threshold
Value: -55

Variable
ID: tx_samp_rate
Value: 8M

Variable
ID: baud_rate
Value: 50k

Variable
ID: rx_gain
Value: 10

Variable
ID: samp_per_sym
Value: 20

Variable
ID: fsk_deviation_hz
Value: 100k

Variable
ID: freq
Value: 868.46M

Variable
ID: packet_len
Value: 18

Soapy Source
Device Type: lime
Sample Rate: 8M
Ch0: Center Freq (Hz): ...46M
Ch0: Overall Gain Value: 0
Ch0: Automatic DC Removal: True
Ch0: DC Offset: 0
Ch0: Frequency Correction: 0
Ch0: IQ Balance Correction: 0

Low Pass Filter
Decimation: 8
Gain: 1
Sample Rate: 8M
Cutoff Freq: 200k
Transition Width: 10k
Window: Hamming
Beta: 6.76

QT GUI Waterfall Sink
Name: RX
FFT Size: 1.024k
Center Frequency (Hz): ...46M
Bandwidth (Hz): 1M

Power Squelch
Threshold (dB): -55
Alpha: 900m
Ramp: 0
Gate: No

Virtual Sink
Stream ID: RX

Virtual Source
Stream ID: RX

Quadrature Demod
Gain: 1.59236

Low Pass Filter
Decimation: 1
Gain: 1
Sample Rate: 1M
Cutoff Freq: 50k
Transition Width: 50k
Window: Hamming
Beta: 6.76

Virtual Sink
Stream ID: demod

Virtual Source
Stream ID: demod

Symbol Sync
Timing Error Detector: Mueller and Müller
Samples per Symbol: 20
Expected TED Gain: 500m
Loop Bandwidth: 45m
Damping Factor: 1
Maximum Deviation: 1.5
Output Samples/Symbol: 1
Interpolating Resampler: MMSE, 8 tap FIR

Binary Slicer

Sync and create packed PDU
Packet length (bytes): 18
Syncword: 101010...1011101101
Syncword threshold: 1

Socket PDU
Type: UDP Client
Host: 127.0.0.1
Port: 7000
MTU: 18

Socket PDU
Type: UDP Server
Host: 127.0.0.1
Port: 7001
MTU: 24

PDU to Tagged Stream
Length tag name: packet_len

Unpack K Bits
K: 8

Repeat
Interpolation: 20

UChar To Float

Multiply Const
Constant: 2

Add Const
Constant: -1

Virtual Sink
Stream ID: TXdata

Virtual Source
Stream ID: TXdata

VCO (complex)
Sample Rate: 1M
Sensitivity: 628k
Amplitude: 700m

Band Pass Filter
Decimation: 1
Gain: 1
Sample Rate: 1M
Low Cutoff Freq: 80k
High Cutoff Freq: 120k
Transition Width: 20k
Window: Hamming
Beta: 6.76

Rational Resampler
Interpolation: 8M
Decimation: 1M
Taps:
Fractional BW: 0

Soapy Sink
Device Type: lime
Args:
Sampling Rate: 8M
Length tag name:
Ch0: Center Freq (Hz): ...46M
Ch0: Overall Gain Value: 32

QT GUI Waterfall Sink
Name: TX out
FFT Size: 1.024k
Center Frequency (Hz): 866M
Bandwidth (Hz): 8M