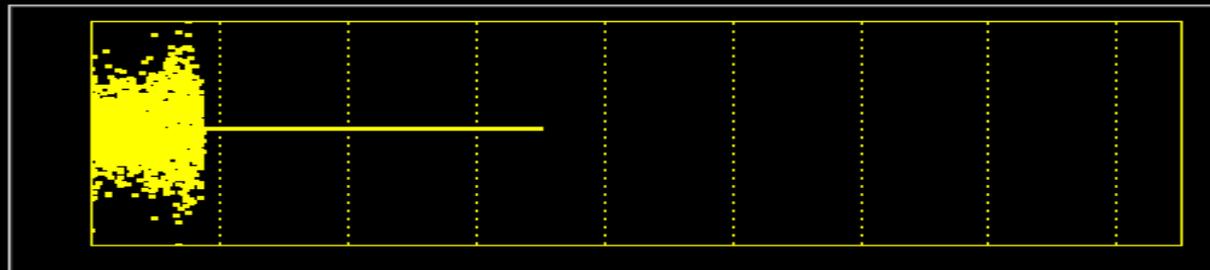# SDR in ORBIT: LTE-U
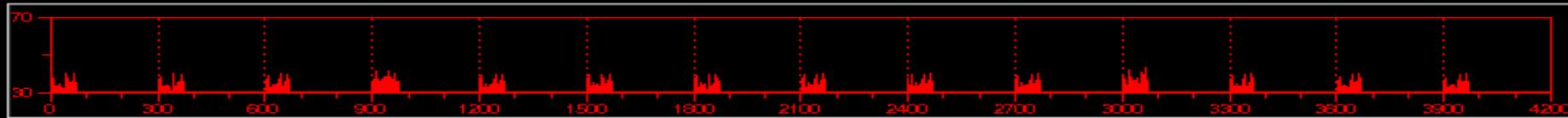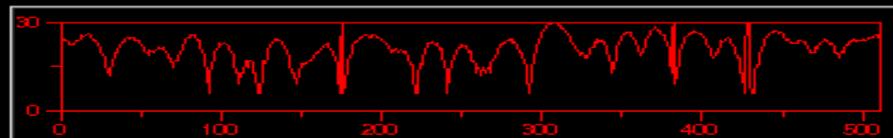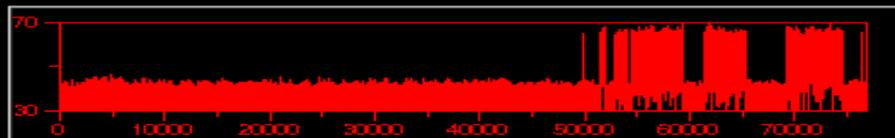
Demetrios Lambropoulos, Cat Le, Steven Cheng

August 6, 2015

eNB LTE Scope
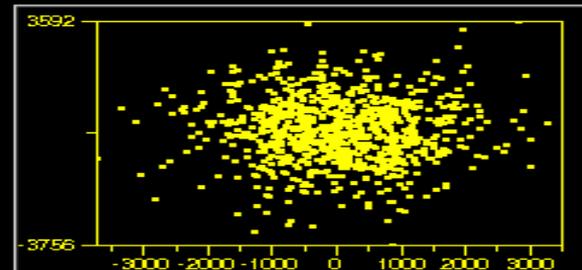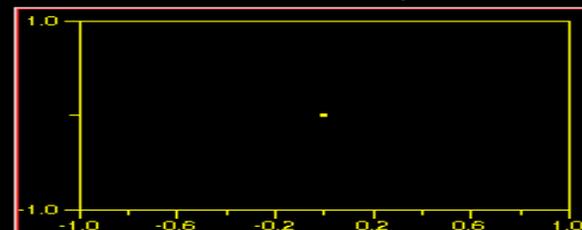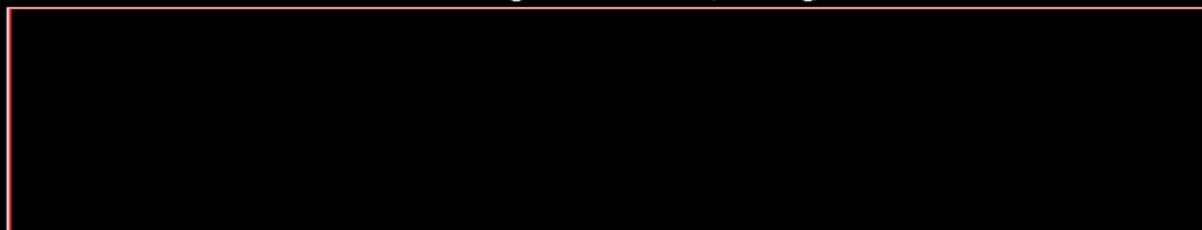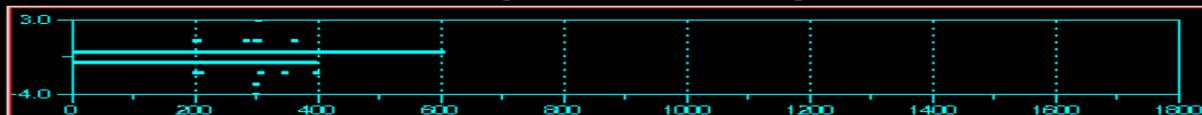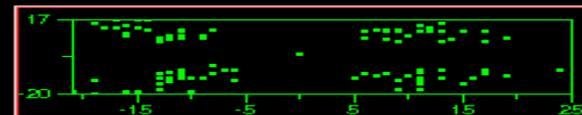
UE LTE Scope
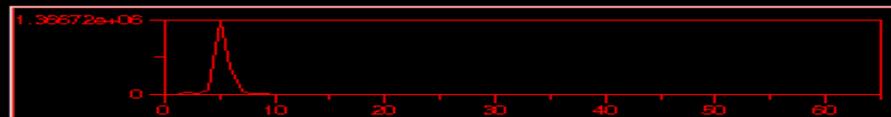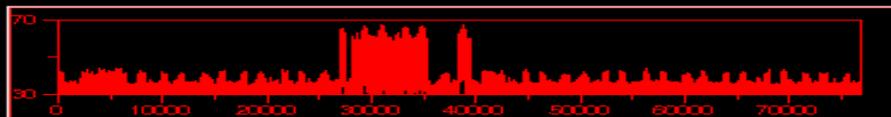
Modify Antenna

Place transmitting antennas separately from each others.

SNR vs. Gain

LTE PHY Layer

- OFDM Size = 512
- Frame Length Samples = 153600
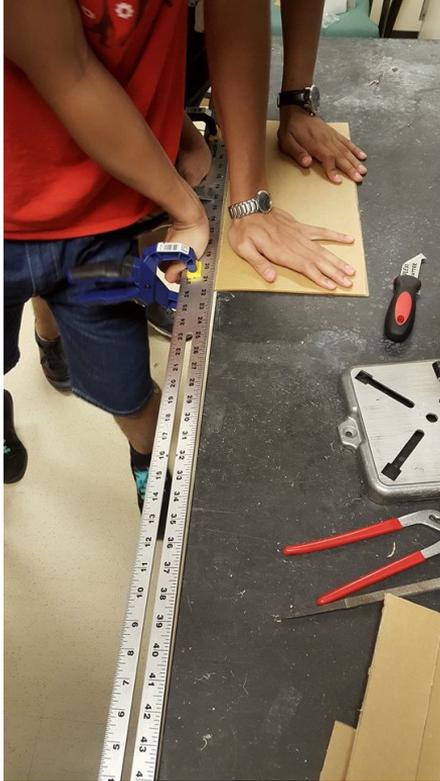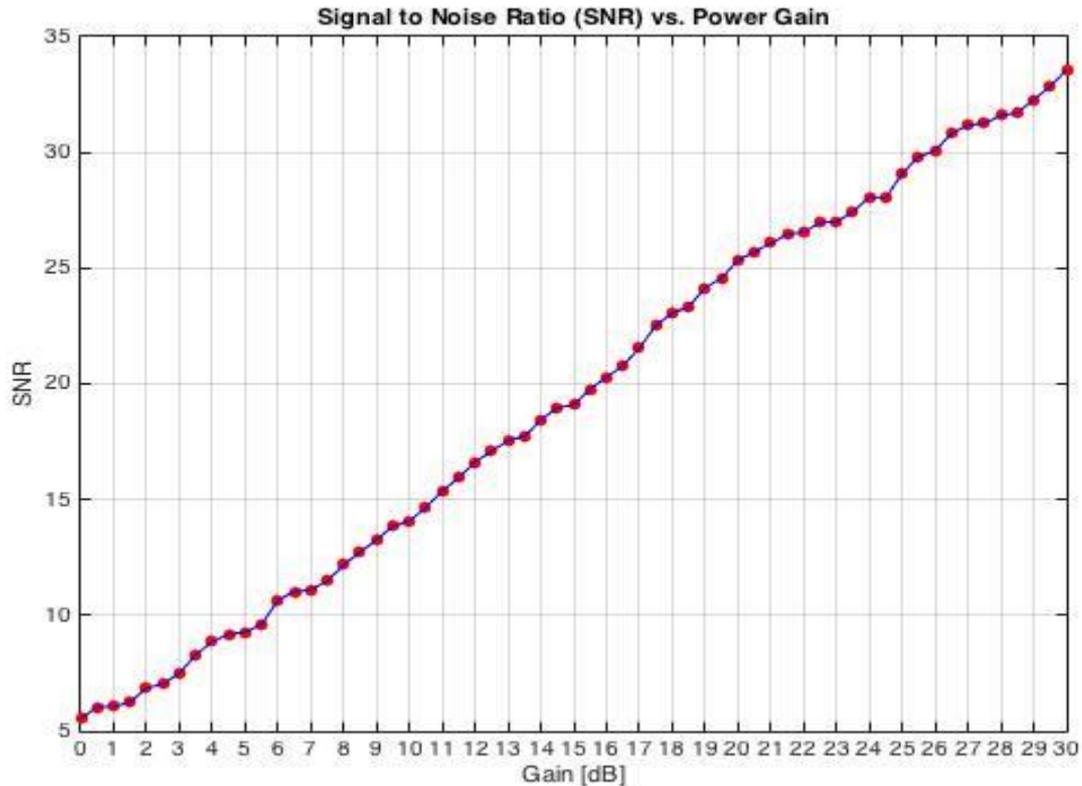- Number of symbols per frame = 140
- FFT = 512 point

Next Week

- LTE PHY Layer Block Diagram

- Redo previous weeks experiment in Time-Division Duplex (TDD) with varying bandwidths