

Chapter 2

Lab 2

Multiple-input-multiple-output (MIMO systems) allow multiple users (in close range) to simultaneously send streams of data in the same frequency band. You have seen this in technologies like bluetooth and IoT in your own home! The size of a MIMO system is written in the following format *# of transmitters x # of receivers*.

Goal: Implement several MIMO detection algorithms in differently sized systems.

There will be two distinct parts of this lab. The implementations and reports for these lab assignments may overlap, but will not build on each other.

- Lab 2A: MIMO detection algorithms for a simulated 2x2 MIMO system
- Lab 2B: MIMO detection algorithms for a simulated 4x4 MIMO system