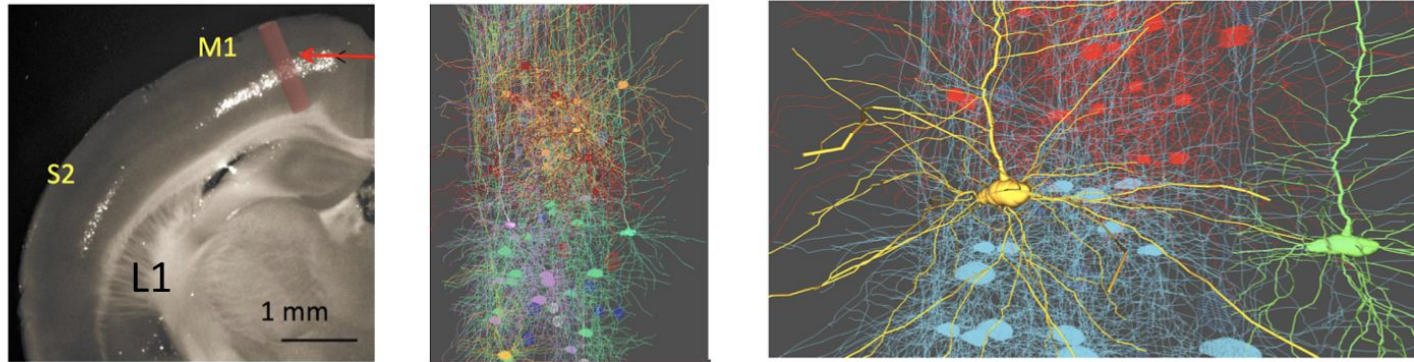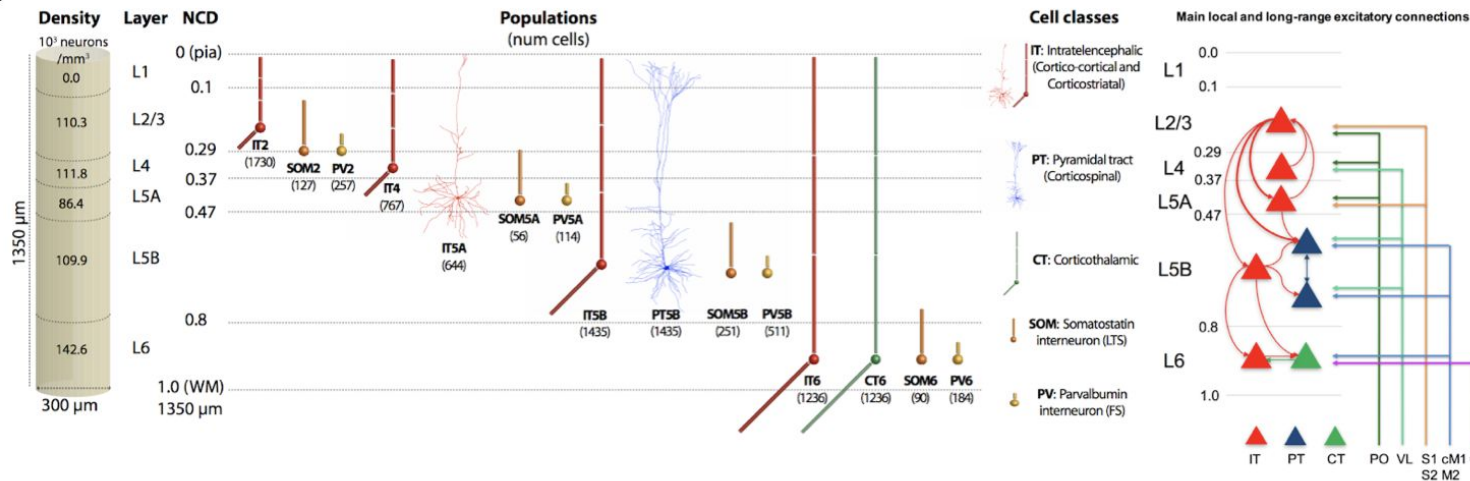# Detailed model of primary motor cortex William Lytton, SUNY Downstate U01EB017695
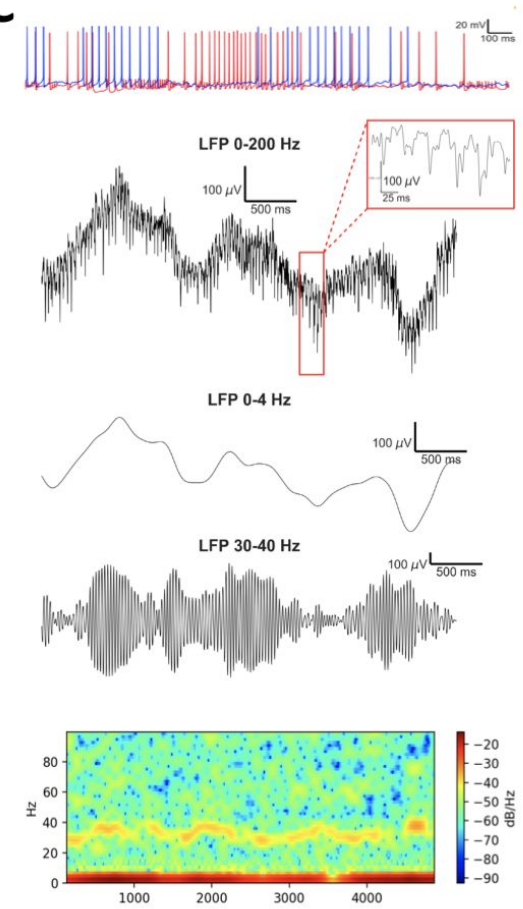

- **Coupled ODE and event driven simulation defined in a novel high-level declarative language using *NetPyNE***
- ***Gradient descent* and *genetic algorithms* were used to determine parameters for particular cell types. Project won the *2017 HPCwire Readers' Choice Award for Best Use of Artificial Intelligence using HPC.***
- **End Users: Growing interest in multiscale modeling: Human Brain Project, Blue Brain Project, Allen Brain Institute, many individual research labs contributing to ModelDB.**