Chromatic homotopy theory.

Chromatic homotopy theory is a powerful and a flexible way to study topological spaces (or, more precisely, spectra) using algebraic geometry and number theory. In our course, we will try to cover some of the most fundamental parts of this theory: Landweber’s exact functor theorem, Nilpotence theorem, Thick Subcategory theorem, Chromatic Convergence theorem.

This is a semester course, oriented for 3-4 year undergraduate students and masters. The prerequisites include 2 years of topology and basic algebraic geometry.