

ASSIGNMENT
CLASS
PROFESSOR

Matthew Bowden
Date: April 19, 2017

On Effective Field Theory in Cosmology - Leonardo Senatore (Stanford)

- Identifying signatures of inflation (of the universe)
- 2 parts of physics - discovering not-yet-known physics, and building simple models/understanding for complex/collective phenomena
- Status of high energy physics
 - Can't put quantum + general relativity at high energies
 - What controls hierarchy between planck scale and cosmological constant
- Trying to look into the cosmological past is like trying to look at a cloud - we can only see the photons that come from the last reflection
- Basic picture of big bang
 - Universe was hot, then cooled down
 - Past universe was very simple, complex structures formed later

Some other title