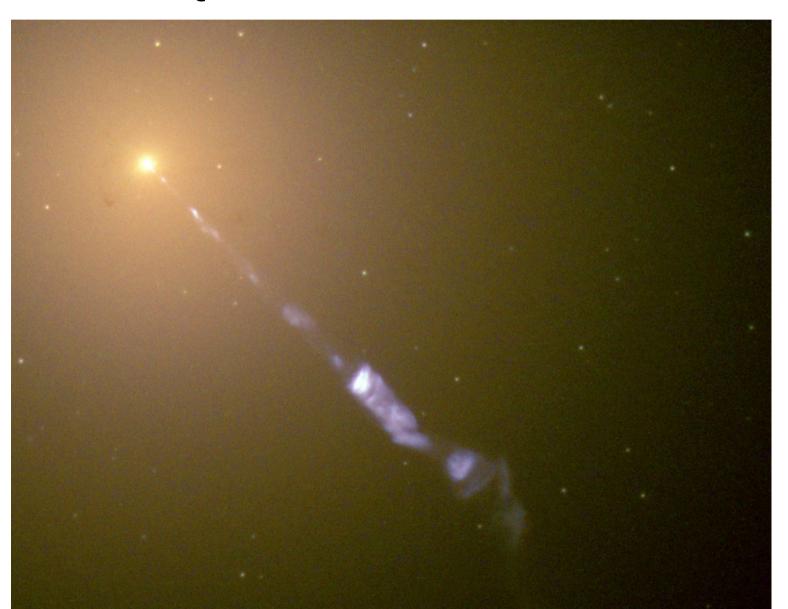
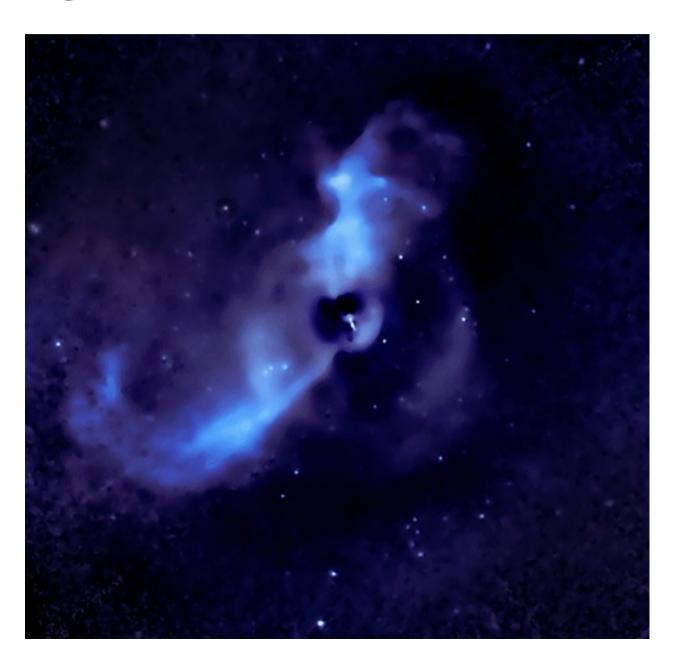
Super-massive Black Holes and Galaxy Properties

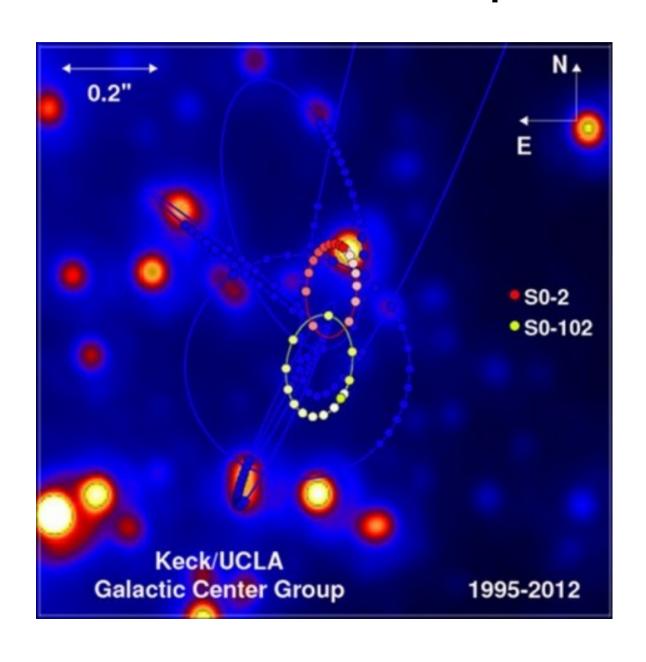
Tom Quinn & Michael Tremmel



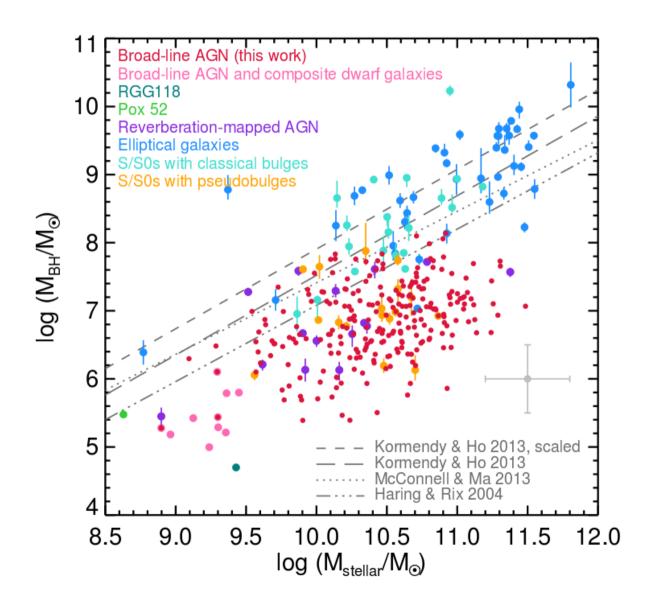
Large Scale Effects of AGN



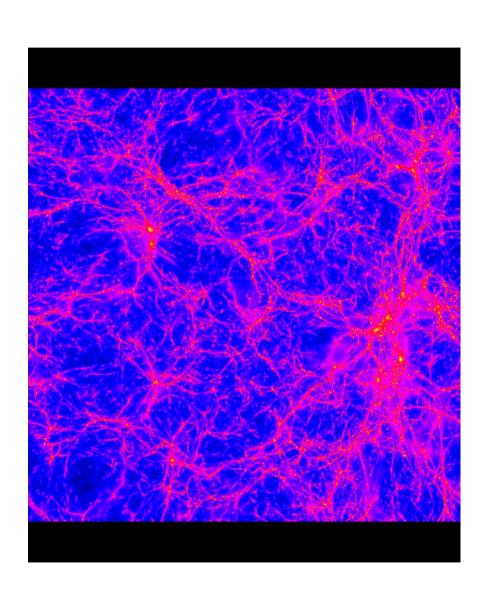
Black Holes are Ubiquitous



Galaxy Properties vs. BH size?



Galaxy Formation Simulations



- Follow the physics of:
 - Gravity
 - Gas dynamics
 - Star/BH formation
- Simulate observations
 - Morphology
 - Colors

Your task: explore/analyze

- Find Galaxies with similar Black Holes but different properties (shapes/ages)
- Explore their histories
- Compare their differences:
 - Star formation history
 - Merger history
 - Recent interactions
 - Black hole growth history