

ASTROPHYSICS SEMINAR SERIES

"Cold Gas Content and Star Formation in Galaxies"

Min Yun University of Massachusetts

Monday, November 18, 2013
Refreshments at 3:15pm in CAS 500
Talk begins at 3:30pm in CAS 502

Abstract:

Cosmological simulations of large scale structures and mass assembly have shown that the gas accretion rate onto DM halos broadly tracks the observationally established cosmic star formation density evolution, and semi-analytic incorporation of baryon physics has been applied to these simulations to model the build up of ISM and stellar mass in galaxies. I will examine the current data on cold gas content in present day galaxies and their relation to other physical properties such as stellar mass, color, and star formation rate, in the context of understanding the limitations and utilities of such modeling as a tool for studying the mass assembly history of galaxies.