

## **CMD modelling with LEGUS: recent SFH of dwarf galaxies between 3 and 12 Mpc**

*Wednesday, 20 September 2017 12:30 (15 minutes)*

I will present the detailed recent star formation history (SFH) of dwarf galaxies between 3 and 12 Mpc from the Legacy ExtraGalactic UV Survey (LEGUS). This sample includes a variety of morphologies and densities, such as the diffuse and low density Holmberg II, the Magellanic irregular NGC4449 and the Blue Compact NGC1705. The SFHs are derived by comparing deep UV color-magnitude diagrams (CMDs) with state-of-the-art synthetic CMDs generated with the latest stellar evolution isochrones. I will discuss how these SFHs relate to previous optical studies and I will provide new insights into the evolution of two independent stellar chronometers, massive main-sequence and helium-burning stars. Systematics are evaluated using two independent sets of models: the MESA-MIST and PADOVA-PARSEC.

**Primary author:** CIGNONI, Michele (Università di Pisa/INFN)

**Presenter:** CIGNONI, Michele (Università di Pisa/INFN)

**Session Classification:** High- and intermediate-mass stars and the connection to clusters