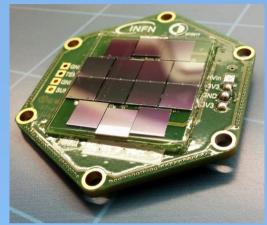
A. Berti^{1,2}, A. Chiavassa^{1,2}, D. Corti³, A. De Angelis^{3,4}, D. Depaoli^{1,2}, F. Di Pierro², L. Lessio⁵, M. Mallamaci^{3,4}, M. Mariotti^{3,4}, C. Perennes^{3,4}, <u>R. Rando^{3,4}</u>, P. Vallania^{2,6}, C. Vigorito^{1,2}, for the CTA LST project

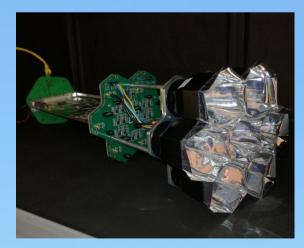
Development and test of a cluster for a SiPM version of the CTA-LST camera

- First LST under construction at CTA North site
- PMT camera: 1855 pixels:
 - → large area (1.5" diameter)
 - Large background from NSB
 - → 3.5 ns FWHM, ns sampling readout
- Feasibility study for a SiPM version of the camera •
- Keep the existing electronics as much as possible
- One cluster demonstrator (7 pixels) •
- SiPM pixel: 14 6x6-mm² FBK NUV SiPM •
- Fast pixel electronics (~2 ns FWHM)
- Interface to slow-control and sampling electronics ٠
- Heat transfer to cooled backplane
- Setup and DAQ being finalized now
- Full performance characterization coming •









¹:University of Torino, ²:INFN Torino, ³:INFN Padova, ⁴:University of Padova, ⁵:Observatory of Padova, INAF, ⁶:Observatory of Torino, INAF. See www.cta-observatory.org