

SiPM-based camera for gamma-ray imaging air Cherenkov telescope

Wednesday, May 26, 2021 5:12 AM (18 minutes)

The current status of the equipment development for the new wide-angle gamma-ray imaging air Cherenkov telescope for TAIGA hybrid installation is presented. A front-end electronic and data acquisition system board based on the Zynq family Xilinx FPGA chips specially designed for this project have been produced and are being tested. A detailed description of the internal structure of the four main subsystems of the board: four 8-channel 100 MHz ADCs, boards control system, internal clock and synchronization system and the power supply. Additionally, the current status of a small scale prototype telescope SIT consisting of 49 SiPM is presented. The telescope includes a digital camera for observing the stars and weather condition. The SIT-HiSCORE synchronization systems and the telemetry information collection had been tested.

TIPP2020 abstract resubmission?

No, this is an entirely new submission.

Funding information

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Session Classification: Posters: Particle Astrophysics and Space

Track Classification: Experiments: Experiments: Space and particle astrophysics