

GRASPA 2026

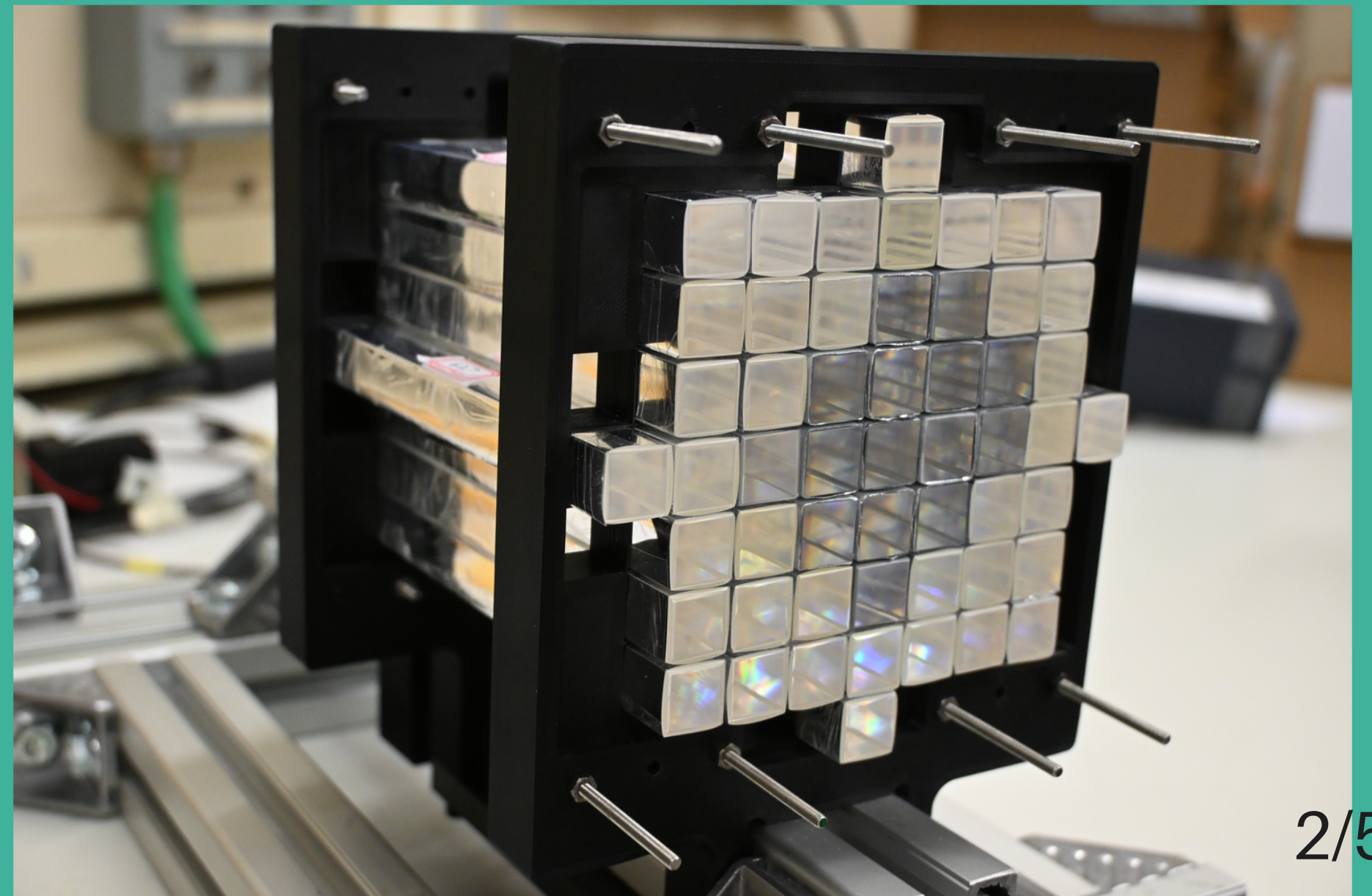
DUAL- READOUT CALORIMETRY

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WHAT DOES DUAL-READOUT CALORIMETRY MEAN?

- Measure both Scintillator and Cherenkov light at the same time
- Get a better energy resolution

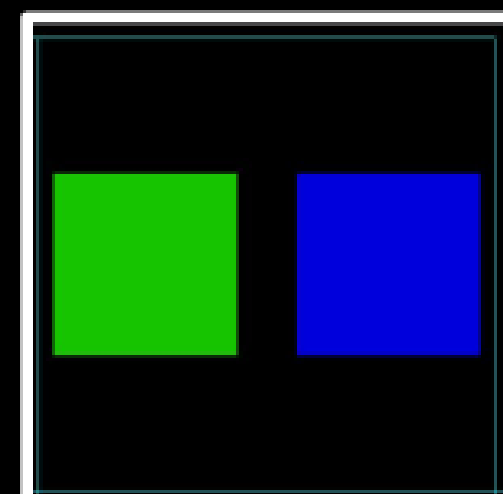


Towards a **full-containment** prototype

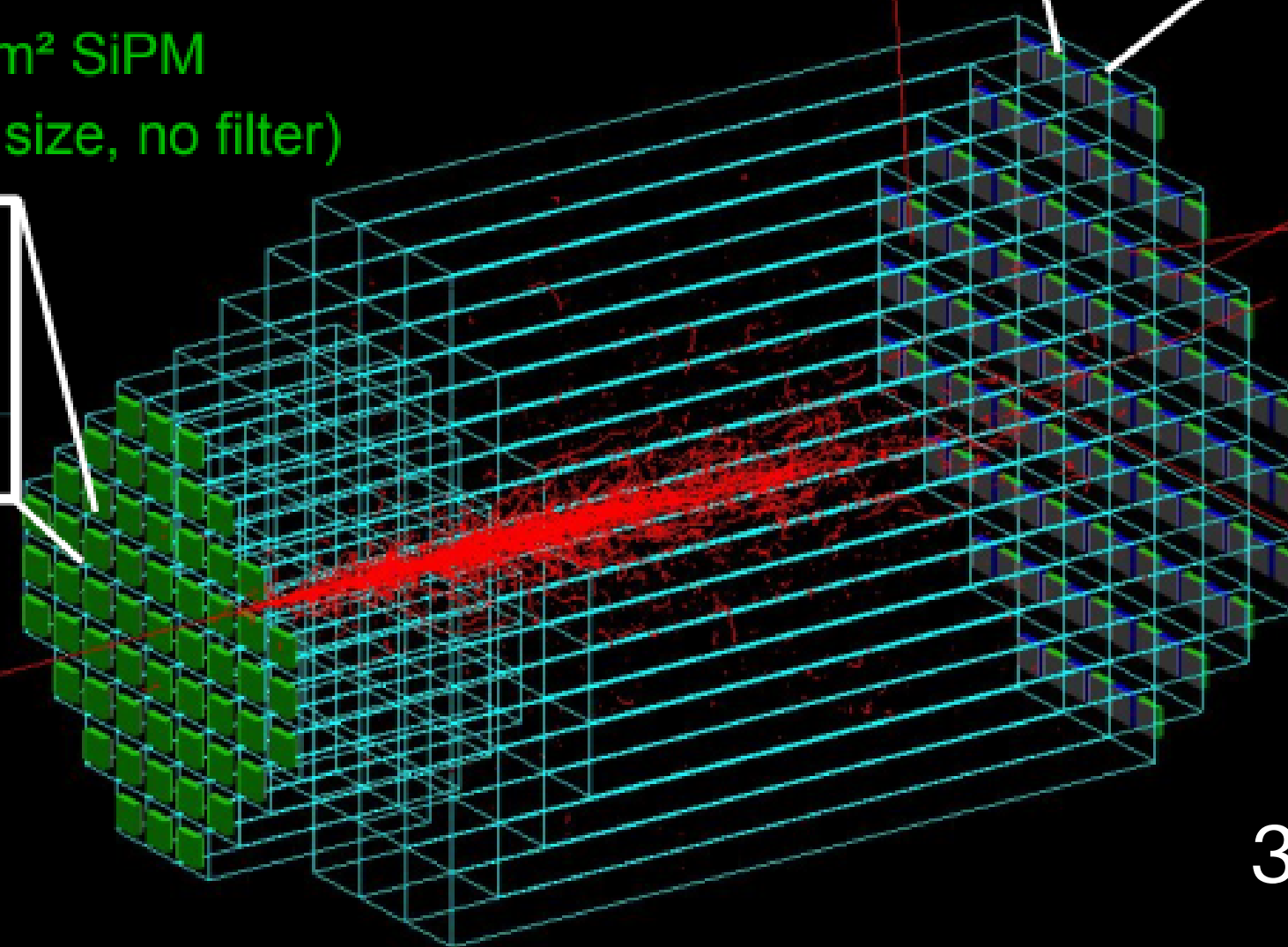
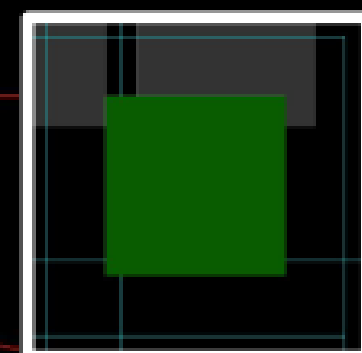
- Informed by single crystal beam test results the construction of a $\sim 9 \times 9$ PWO matrix has started
 - Readout electronics based on FERS-5200 (Citiroc1A)
 - Mechanical design enables the exchange of the central 3×3 core with BSO crystals

One 6×6 mm² SiPM
(15 μ m cell size, no filter)

One 6×6 mm² SiPM
(50 μ m cell size, w/ K25 filter)



One 6×6 mm² SiPM
(15 μ m cell size, no filter)



10x10x50 mm³ crystals

14x14x160 mm³ crystals

WHAT I AM WORKING ON

Using data from a beam test done in June

- Calibration using muon runs
- Study linearity using electron runs

