



Quick look at 2026 SPS TB calibrated events

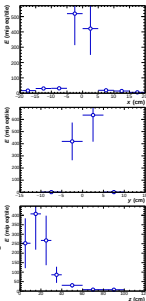
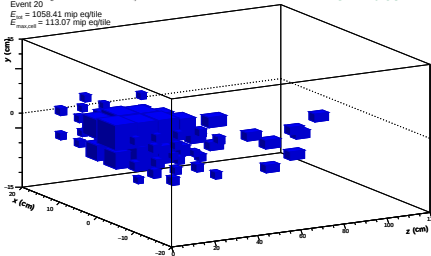
Ewa Glimos, UTK, ORNL
September 22, 2026

Calibrated '26 SPS TB events

- a few example events from the Full Set B dataset from the SPS '26 test beam data
- used calibration provided by Fredi (see Full Set B presentation from the last meeting)
- event display updated to show summing - to be committed

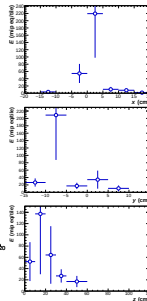
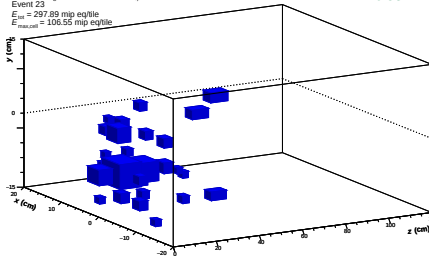
LFHCaI TB: CERN-SPS-H2, 05-2026, HGCROC read-out
e⁻-beam, $E_e = 30$ GeV, Run 86, $V_{op} = 43.0$ V
Event 20
 $E_{tot} = 1058.41$ mip eq/tiler
 $E_{max,cal} = 113.07$ mip eq/tiler

e⁻ beam



LFHCaI TB: CERN-SPS-H2, 05-2026, HGCROC read-out
h⁺-beam, $E_p = 20$ GeV, Run 99, $V_{op} = 43.0$ V
Event 23
 $E_{tot} = 297.89$ mip eq/tiler
 $E_{max,cal} = 106.55$ mip eq/tiler

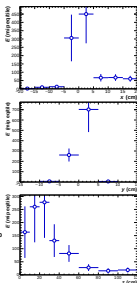
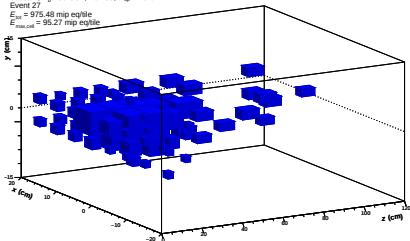
h⁺ beam



Calibrated '26 SPS TB events

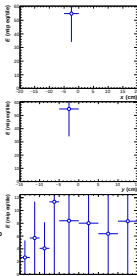
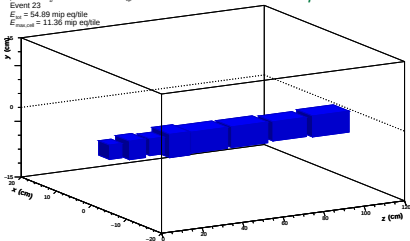
LFHCaI TB: CERN-SPS-H2, 05-2026, HGCROC read-out
e⁻-beam, $E_e = 30$ GeV, Run 86, $V_{\text{up}} = 43.0$ V
Event 27
 $E_{\text{cal}} = 975.48$ mip eq/ite
 $E_{\text{HGCROC}} = 95.27$ mip eq/ite

e⁻ beam



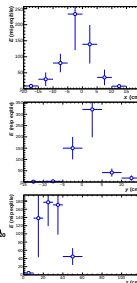
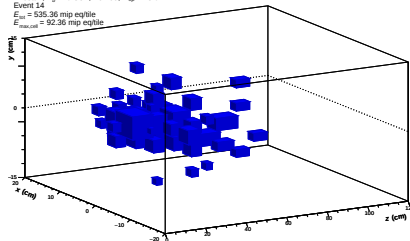
LFHCaI TB: CERN-SPS-H2, 05-2026, HGCROC read-out
 μ^+ -beam, $E_\mu = 50$ GeV, Run 72, $V_{\text{up}} = 43.0$ V
Event 23
 $E_{\text{cal}} = 54.89$ mip eq/ite
 $E_{\text{HGCROC}} = 11.36$ mip eq/ite

μ^+ beam



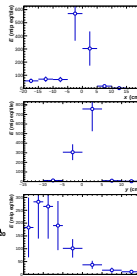
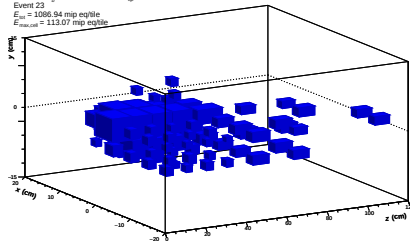
LFHCaI TB: CERN-SPS-H2, 05-2026, HGCROC read-out
h⁺-beam, $E_h = 20$ GeV, Run 99, $V_{\text{up}} = 43.0$ V
Event 14
 $E_{\text{cal}} = 535.36$ mip eq/ite
 $E_{\text{HGCROC}} = 92.36$ mip eq/ite

h⁺ beam



LFHCaI TB: CERN-SPS-H2, 05-2026, HGCROC read-out
e⁻-beam, $E_e = 30$ GeV, Run 86, $V_{\text{up}} = 43.0$ V
Event 23
 $E_{\text{cal}} = 1086.94$ mip eq/ite
 $E_{\text{HGCROC}} = 113.07$ mip eq/ite

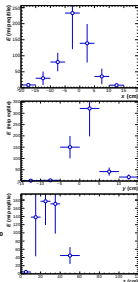
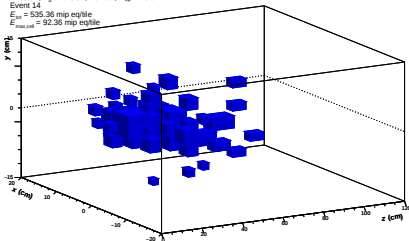
e⁻ beam



Calibrated '26 SPS TB events: h-beam

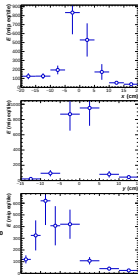
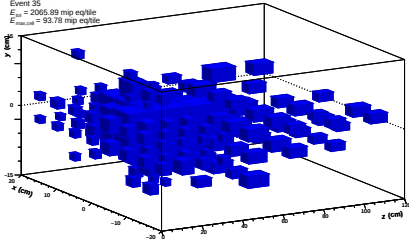
LFHCaI TB: CERN-SPS-H2, 05-2026, HGCROC read-out
h⁺-beam, $E_p = 20$ GeV, Run 99, $V_{up} = 43.0$ V
Event 14
 $E_{cal} = 535.36$ mip eq/ite
 $E_{HGCROC} = 92.36$ mip eq/ite

20 GeV



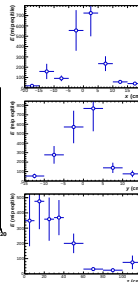
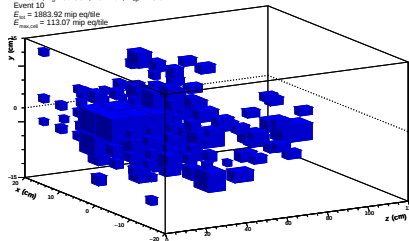
LFHCaI TB: CERN-SPS-H2, 05-2026, HGCROC read-out
h⁺-beam, $E_p = 70$ GeV, Run 104, $V_{up} = 43.0$ V
Event 35
 $E_{cal} = 2065.89$ mip eq/ite
 $E_{HGCROC} = 93.78$ mip eq/ite

70 GeV



LFHCaI TB: CERN-SPS-H2, 05-2026, HGCROC read-out
h⁺-beam, $E_p = 50$ GeV, Run 102, $V_{up} = 43.0$ V
Event 10
 $E_{cal} = 1883.92$ mip eq/ite
 $E_{HGCROC} = 113.07$ mip eq/ite

50 GeV



LFHCaI TB: CERN-SPS-H2, 05-2026, HGCROC read-out
h⁺-beam, $E_p = 100$ GeV, Run 108, $V_{up} = 43.0$ V
Event 47
 $E_{cal} = 2012.91$ mip eq/ite
 $E_{HGCROC} = 123.47$ mip eq/ite

100 GeV

