Abstract Submitted
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The Straw Tube Tracker for the MUSE Experiment[1] DAN COHEN, The Hebrew University of Jerusalem, MUSE COLLABORATION — The MUon Proton Scattering Experiment (MUSE) at the Paul Scherrer Institute will measure the muon-proton and electron-proton elastic cross sections in the same experiment. The proton form factors will be determined from these data, and the proton radius will be extracted from the form factors. The Hebrew University together with Temple University is leading the effort to design, build, and operate the scattered particle Straw Tube Tracker detector (STT). The STT determines, in conjunction with beam GEM chambers, the precise scattering angle and interaction vertex of scattered beam particles, needed to determine the cross sections. I will describe the specifications for the STT, detail how they were achieved in the design, and describe the construction and QA processes.

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