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Development of compact particle detectors for space based instruments¹ LINDSEY BARNER, ANDREW GROVE, JACOB MOHLER, CALEB SISSON, ALEX ROTH, ABAZ KRYEMADHI, Messiah College — The Silicon Photomultipliers (SiPMs) are new photon-detectors which have been increasingly used in particle physics. Their small size, good single photon resolution, simple readout, and immunity to magnetic fields offers benefits compared to traditional photomultipliers. LYSO and CeBr3 crystals are relatively new scintillators with high stopping power, very good light yield and fast decay time. The response of these detectors to low energy gamma rays will be presented.

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