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Type : **Poster**

Balloon direct measurements of the PCR charge

Abstract content

The project CROSS (Cosmic Rays Over Spectrum Steepening) is intended for direct measurements of mass and energy of PCR in energy range 1013-1015 eV including the region of knee in PCR energy spectrum. The experimental technique is balloon-borne generators of transit X-ray radiation interposed with proportional counters. Each of four generators consists of 125 Dacron films, total thickness of generators is 5 g/cm². Total number of proportional counters with Xe gaseous mixture is 1800 and 1000 counters with Ar mixture. Area of the experimental setup is 4 m² and total number of PCR nuclei recorded during one balloon flight from the peninsula Kamchatka to the river Volga (5-6 days) at the atmosphere boundary (5-10g/cm²) is estimated as 90. The setup prototype for testing in the electron beams is under construction now.

If this papers is presented for a collaboration, please specify the collaboration

Summary

Reference

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