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## Definition of the snow thickness from the absorption of cosmic ray neutron component

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### Abstract content

An application of absorption effect of the CR neutron component to the estimation of snow-water equivalent is considered in this work. The primary CR variations, changes of the atmospheric pressure and humidity concentration in bedding surface are discussed as influence on the accuracy of the obtained results. Monitoring of the snow-cover during several seasons demonstrated an efficiency of this method even for snow thickness of several meters. The accuracy of this thickness estimation is about several percentages. Described method was approved for several cosmic ray stations where the accumulation of large snow thickness is possible, and for some French hydrometeorological stations which were opened directly for the estimation of snow-water equivalent.

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

Academy of Russia

### Summary

### Reference

Proceedings of the 30th International Cosmic Ray Conference; Rogelio Caballero, Juan Carlos D'Olivo, Gustavo Medina-Tanco, Lukas Nellen, Federico A. Sánchez, José F. Valdés-Galicia (eds.); Universidad Nacional Autónoma de México, Mexico City, Mexico, 2008; Vol. 1 (SH), pages 761-764

**Primary author(s) :** Dr. YANKE, Viktor (IZMIRAN)

**Co-author(s) :** Dr. PAQUET, Emmanuel (EDF-DTG – Water Resources Department); Dr. LAVAL, Marie-therese (EDF-DTG – Water Resources Department); Dr. BELOV, Anatoly (IZMIRAN); Dr. EROSHENKO, Evgrny (IZMIRAN); Dr. STRUMINSKY, Aleksey (IZMIRAN); Mr. KARTYSHOV, Valery (IZMIRAN)

**Presenter(s) :** Dr. YANKE, Viktor (IZMIRAN)

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