

ANALYSIS OF ATMOSPHERIC MUONS WITH AMANDA

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The detection rate of up-going neutrino induced muons in underground neutrino telescopes is several orders of magnitude lower than the flux of down-going atmospheric muons. This fact can be turned into an advantage, if the down-going muons are used to check the detector capabilities. For this purpose, the atmospheric muon flux has been generated with CORSIKA and, using different muon propagation codes, has been calculated for the South Pole and Frejus underground detectors locations. While the comparison to the Frejus data is used for the estimation of the systematic errors due to propagation codes, the unfolding of the down-going flux measured with AMANDA B10 gives a direct access to the experimental capabilities of this experiment. The results of the analysis are presented.