

Interactive comment on “Atmospheric muons: experimental aspects” by S. Cecchini and M. Spurio

Anonymous Referee #2

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This is an excellent review of experimental aspects of atmospheric muons. I enjoyed reading the paper, and I think it is likely to become a standard reference. I have one minor comment and a list of suggested stylistic changes.

In the item at line 110 it is stated that the muon flux has the same power as the primary spectrum for muons with energy greater than the characteristic energy for muon decay but less than the critical energies for pion and kaon decay. I think this is not correct because the effect of muon energy loss in the atmosphere is still important up to 100 GeV.

Stylistic changes suggested: Line 163: should read "...larger than the experimental..." (rather than "larger than") Line 193: should read "...are not performed exactly at sea level." Line 195: should read "...flux on the altitude..." Line 322: In the discussion of
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range straggling it might be useful to refer to the paper of Lipari and Stanev on this subject (Paolo Lipari and Todor Stanev, Phys. Rev. D44 (1991) 3543

Line 325 and line 329. The standard form is "depth-intensity relation" (instead of "deep-intensity relation")

Line 418: should read "in the case of single muon events..." (not "of", not "on") 4 lines later should read "...depends on their distance..."

Line 492 Add Lake Baikal to the list of locations of neutrino telescopes taking data

Line 518: should read "These data were used to obtain..."

Interactive comment on Geosci. Instrum. Method. Data Syst. Discuss., 2, 603, 2012.