

The increase of electron energy when they move from the magnetotail to a precipitation point

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Based on riometer measurement results at the meridional chain of stations Maimaga (corrected geomagnetic latitude 57.5°), Kystyem (61.4°), Dzhardzhan (62.8°), Tixie (65.2°) and isl. Kotelny (69.7°) for 2004 a model of electron energy change in the process of increase of their energy in the magnetosphere has been constructed. From the model it follows that to increase the energy from 0.42 keV (in the plasma magnetotail layer) to 43 keV (in the precipitation place) a single passage of electron from the magnetotail from (8-25) Re to L-shell ≈ 5.6 is enough for the average time of ~ 10800 s.