

Non-linear diffusion of cosmic rays

A. Georgieva, **V. Ptuskin**, V. Zirakashvili

IZMIRAN, Troitsk, Moscow region 142190, Russia

The propagation of cosmic rays in the interstellar medium after their release from the sources (SNRs) can be attended by the development of streaming instability. The instability creates the MHD turbulence that changes the conditions of particle transport and leads to the non-linear diffusion of cosmic rays. We study possible regimes of non-linear diffusion.