

Advective and conservative semi-Lagrangian schemes on uniform and non uniform grids

Michel Mehrenberger

July 22, 2013

In this talk, we will present and discuss some possible choices that are adopted in semi-Lagrangian schemes. Focus is on advective/conservative form, uniform/non uniform grids, 1D/2D, cartesian/polar geometry, constant/non constant advection. Applications are given on the numerical simulation of the guiding center model and of KEEN waves.