# HOW SOLENOIDAL IS SUPERNOVA-DRIVEN TURBULENCE IN THE ISM ?

Alice Coucke (ENS), Christian Baczynski (ZAH)
& Mordecai-Mark Mac Low (AMNH)

- SN-driven turbulence balances pressure and gravity and may regulate star formation
- Numerical simulations : cubical box of ISM with randomly located SN explosions
- Decomposition of the resulting turbulence into its compressible and solenoidal parts
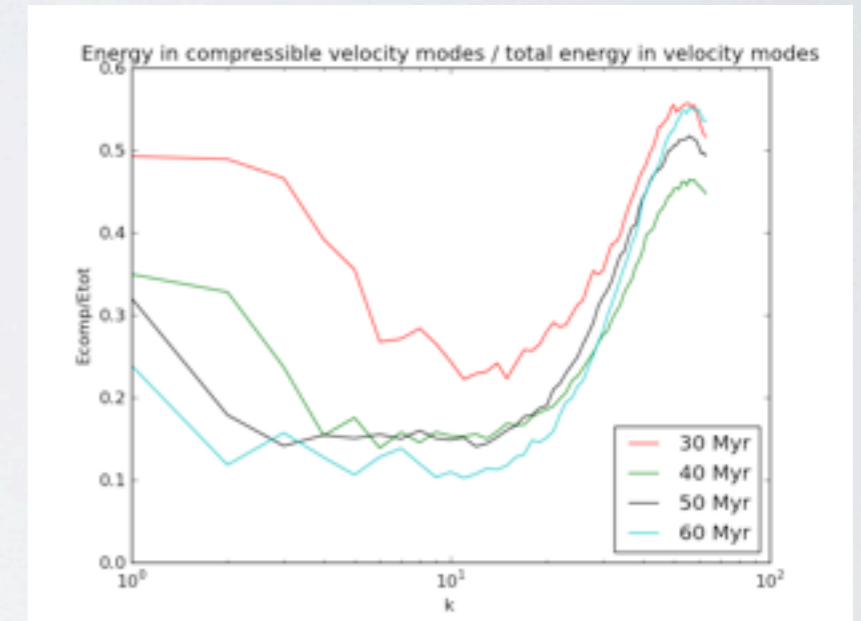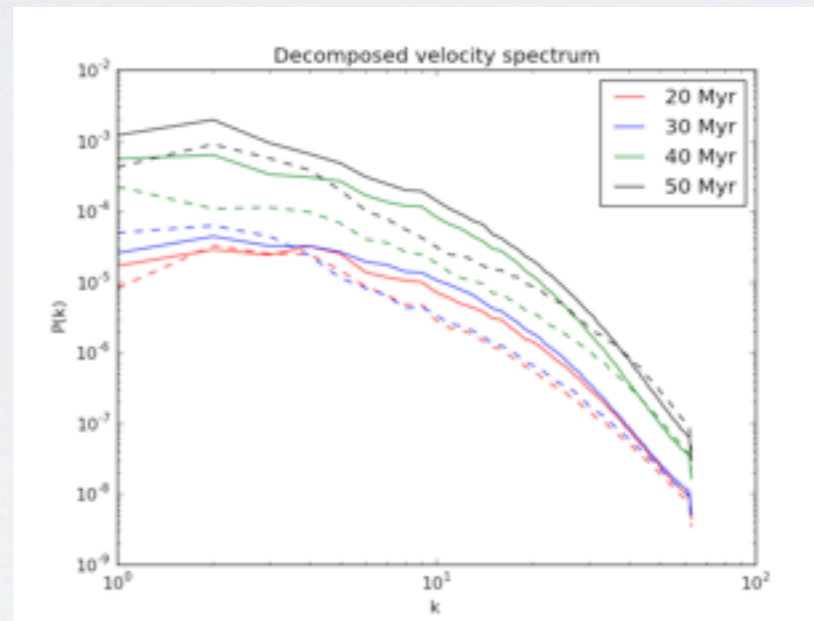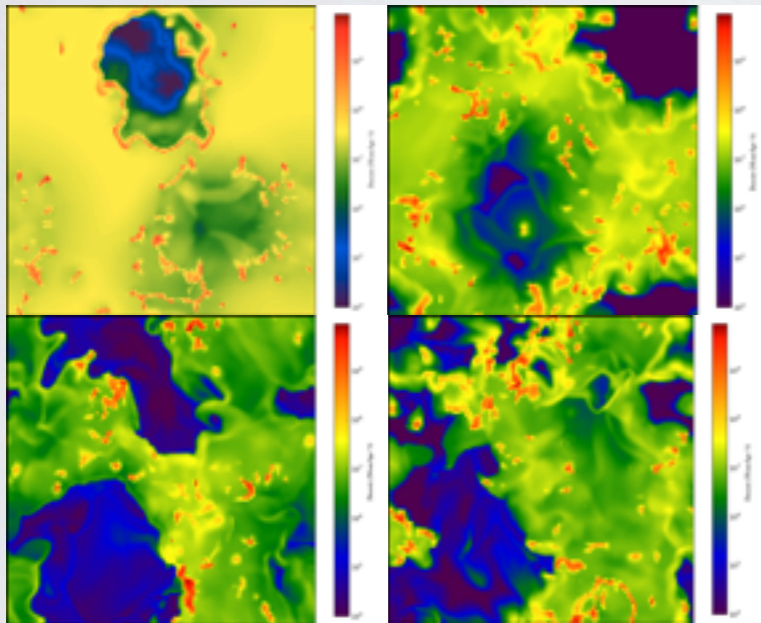
We confirm with a different methode this surprising result of Balsara et al. (2004) :

Even though this turbulence is driven by compressible motions (SN explosions), the resulting kinetic energy is concentrated on solenoidal rather than compressible motions.