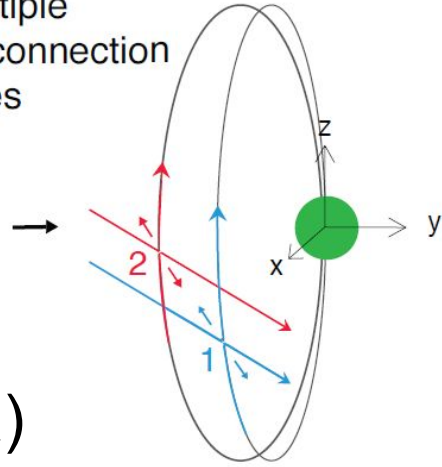


Temporal Evolution of Flux Rope/Tube Entanglement in 3-D Hall MHD Simulations

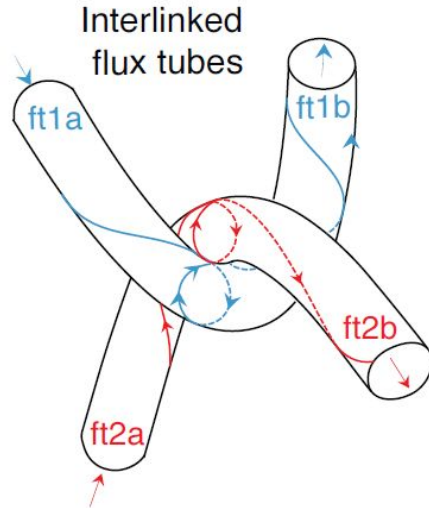
Ying-Dong Jia, Yi Qi, San Lu, C. T. Russell
EPSS, The University of California, Los Angeles

A 3-D Hall-MHD model of step b-c

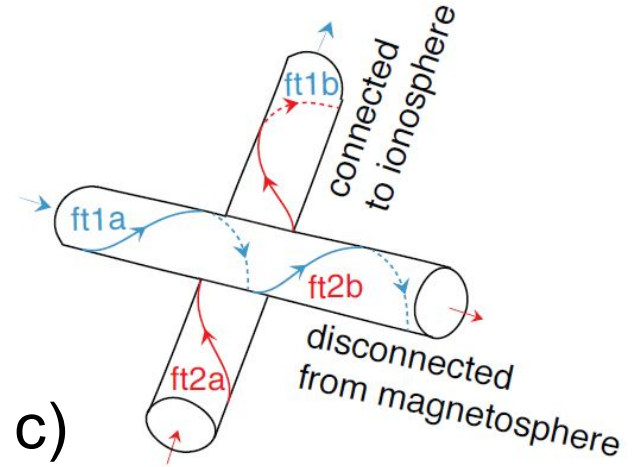
Multiple
Reconnection
Sites



a)

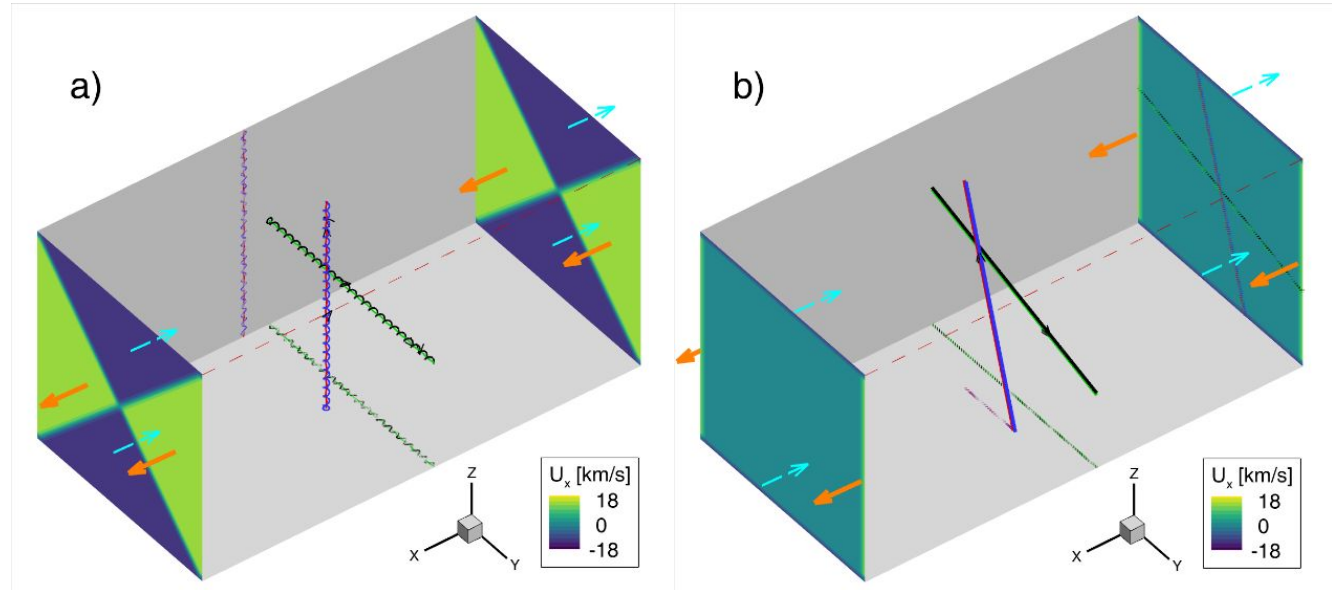
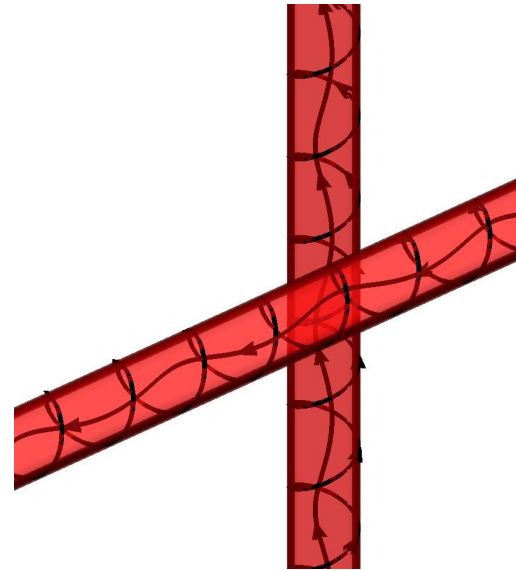


b)

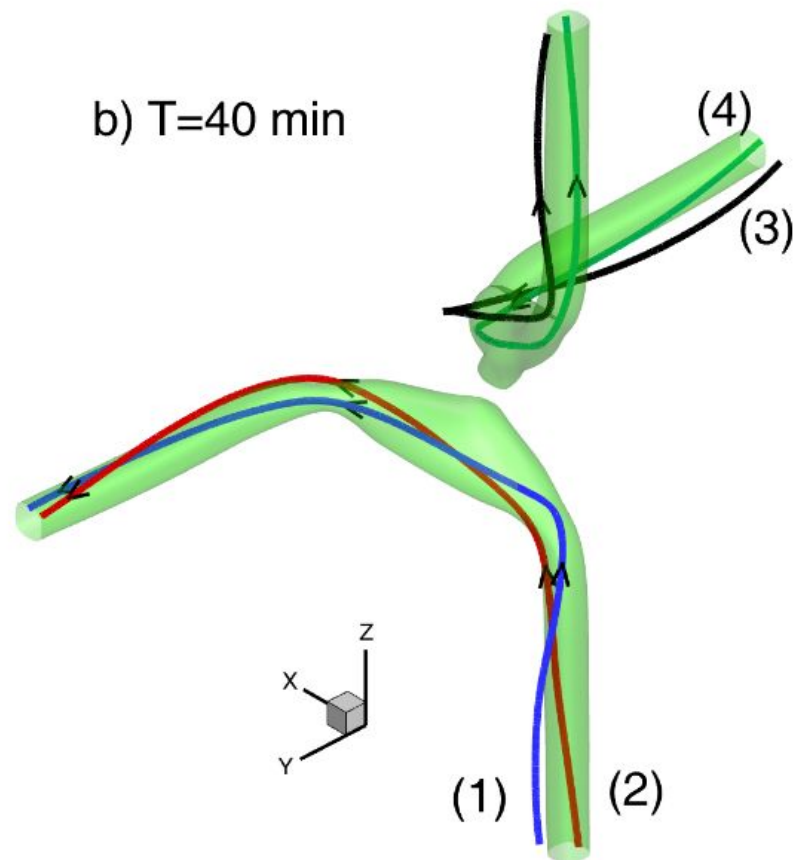
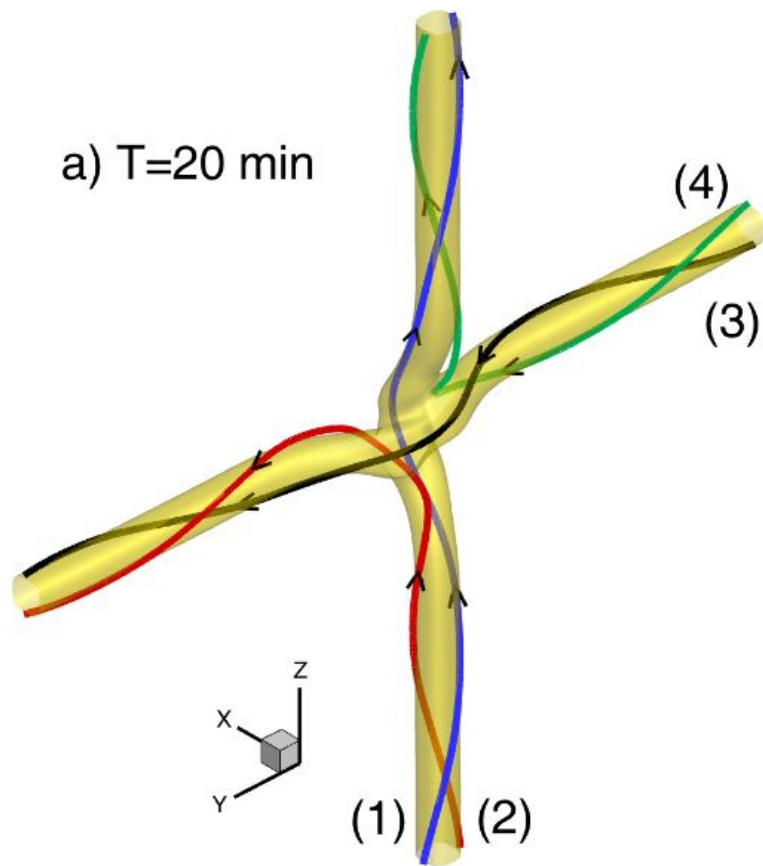


c)

4 different cases



Entangling Flux Ropes



Summary

- Previously entangled flux tubes reconnect into untangled ropes.
- This process is mainly driven by the momentum of converging plasma
- Flux rope reconnection has been modeled at different conditions.

