

Group Project 7 :

Disk Flare Model

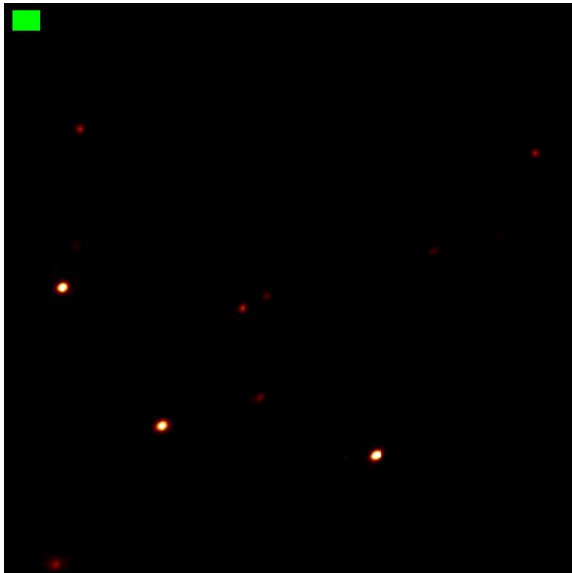
2.5D MHD Simulation with Heat Conduction

K. Nakamura

(Matsue College of Technology)

X-ray Observation (Chandra) Birth of Stars

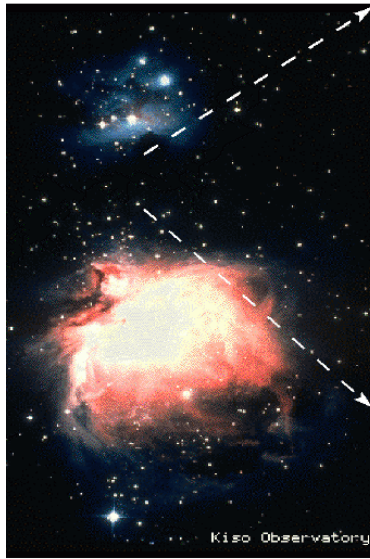
Rho Ophiuchi Cloud



Imanishi et al. 2001

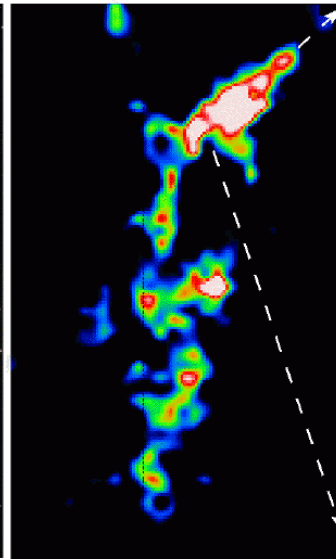
OMC-3

図 1 (光)



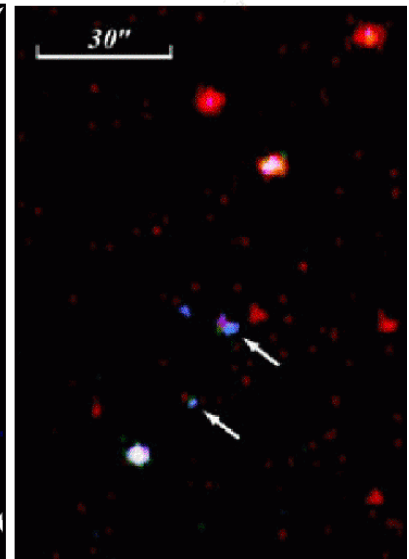
オリオン領域の光学写真
(木曾のシュミットカメラ撮影)

図 2 (電波)



オリオン分子雲の電波写真
H¹³CO 分子の分布を示している

図 3 (X線)

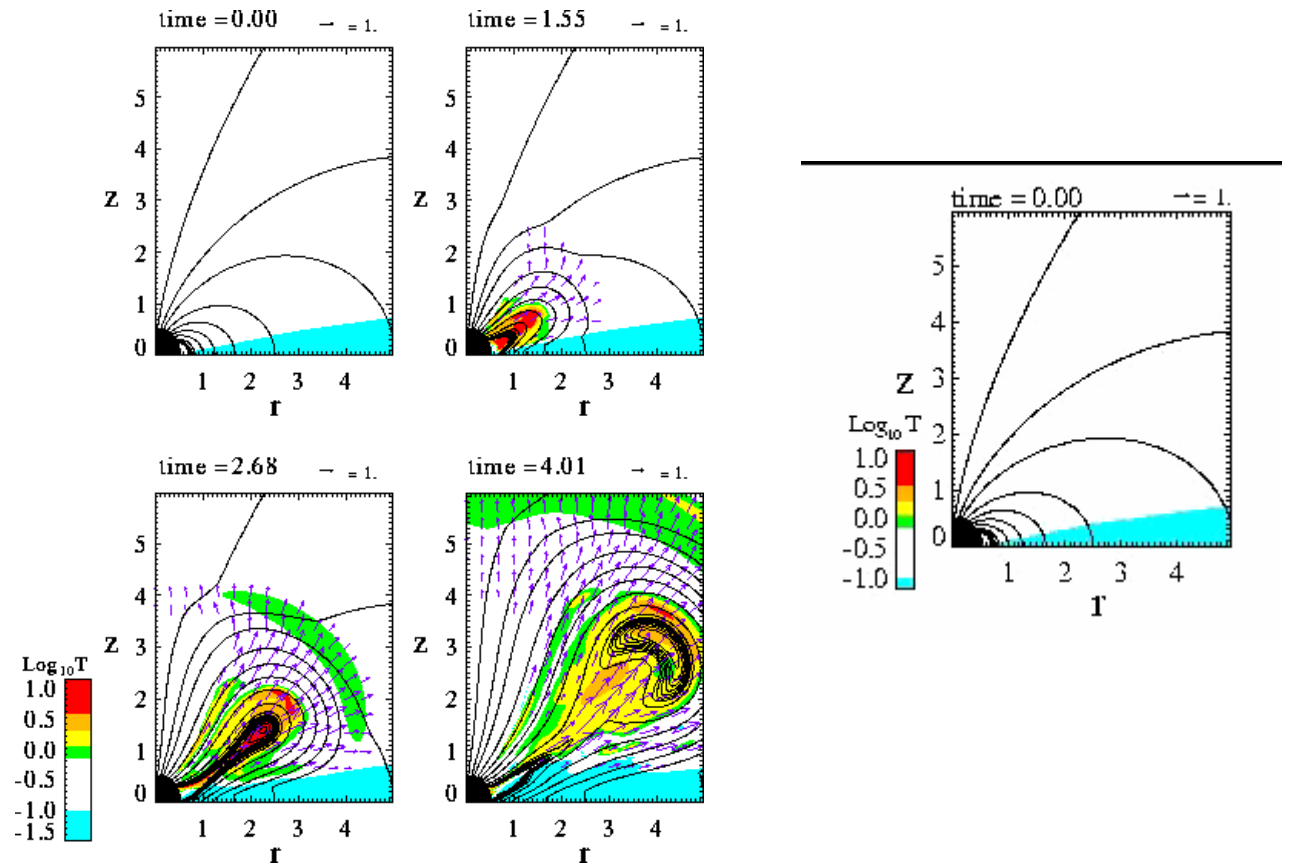


X線カラー写真
青いX線源が原始星である

Tsuboi et al. 2001

Magnetic Reconnection Model

2.5D MHD Simulation



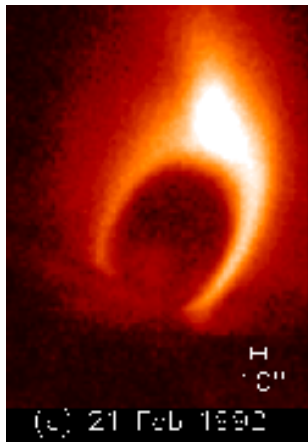
Hayashi, Shibata, Matsumoto 1996

Solar Flare Observation & Model

Soft X-ray Observation

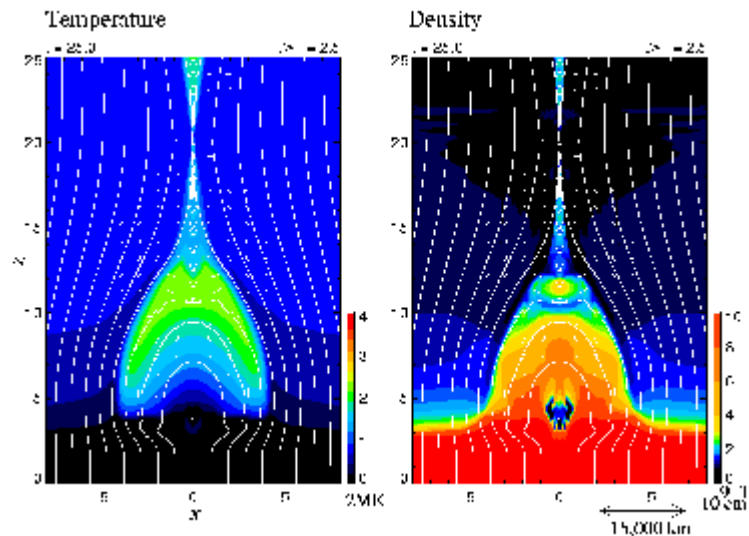
Yohkoh satellite

Tsuneta et al. 1992

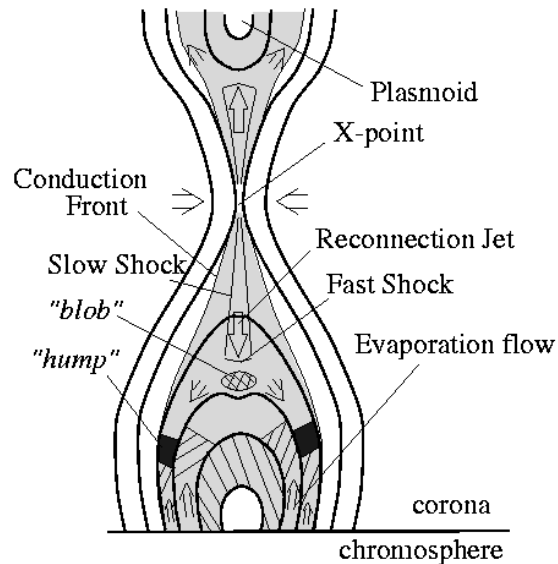


2D MHD simulation including Heat
conduction

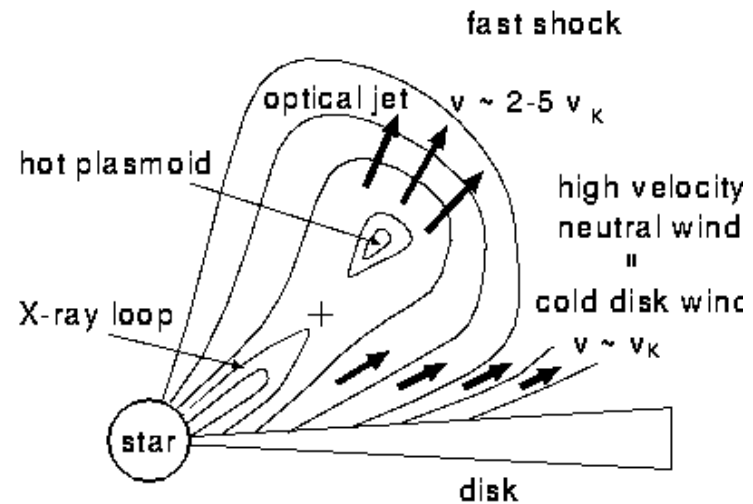
Yokoyama & Shibata 1998



Solar Flare & Disk Flare



Yokoyama & Shibata 1998



Hayashi et al. 1996

To Study Disk Flare & Disk Evaporation

Hayashi Model + Heat Conduction

cans2d/hdmlw, cndsor, cndbicg

- 2D resistive MHD (Lax-Wendroff)
- Heat conduction (SOR or BiCGstab)