X-ray news from RW Auriga: Optical dimming associated with iron rich corona and exceptionally high absorbing column density

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**RW Aur A**
- Physically bound with RW Aur B (semi-major axis 200 au)
- Age: 10 Myr
- Distance: 140 pc
- Mass: 1.4 solar masses
- Active accretion disk

**Chandra images**
- Binary resolved (blue regions are spectral extraction regions)
- Cross-contamination low and can be modeled.
- RW Aur A variable

**Chandra spectra**
- Vastly different every time we look

**We observe**
- Emission at high energies multiplies
- Absorbing column density $N_H$ increases by 400 to $4 \times 10^{23}$ cm$^{-2}$
- $Fe$ abundance in corona increases from 0.5 to 15 times solar

**Absorber**
- Optical extinction is grey → thick absorber or large grains
- $N_H/A_V$ skyrockets: gas rich absorber? (or at least non-ISM grains)

**Where does it come from?**
**Ideas:**
1) Break up planet(esimal) with Earth-like Fe core (e.g. due to collision).
2) Collect dust in dust trap, then release due to some massive disturbance in the inner disk.

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