

Is Recombination an important
source of dekekeV XRs
thermally at flare temperatures
and nonthermally from beams?

John Brown (Glasgow)

Procheta Mallik (Glasgow)



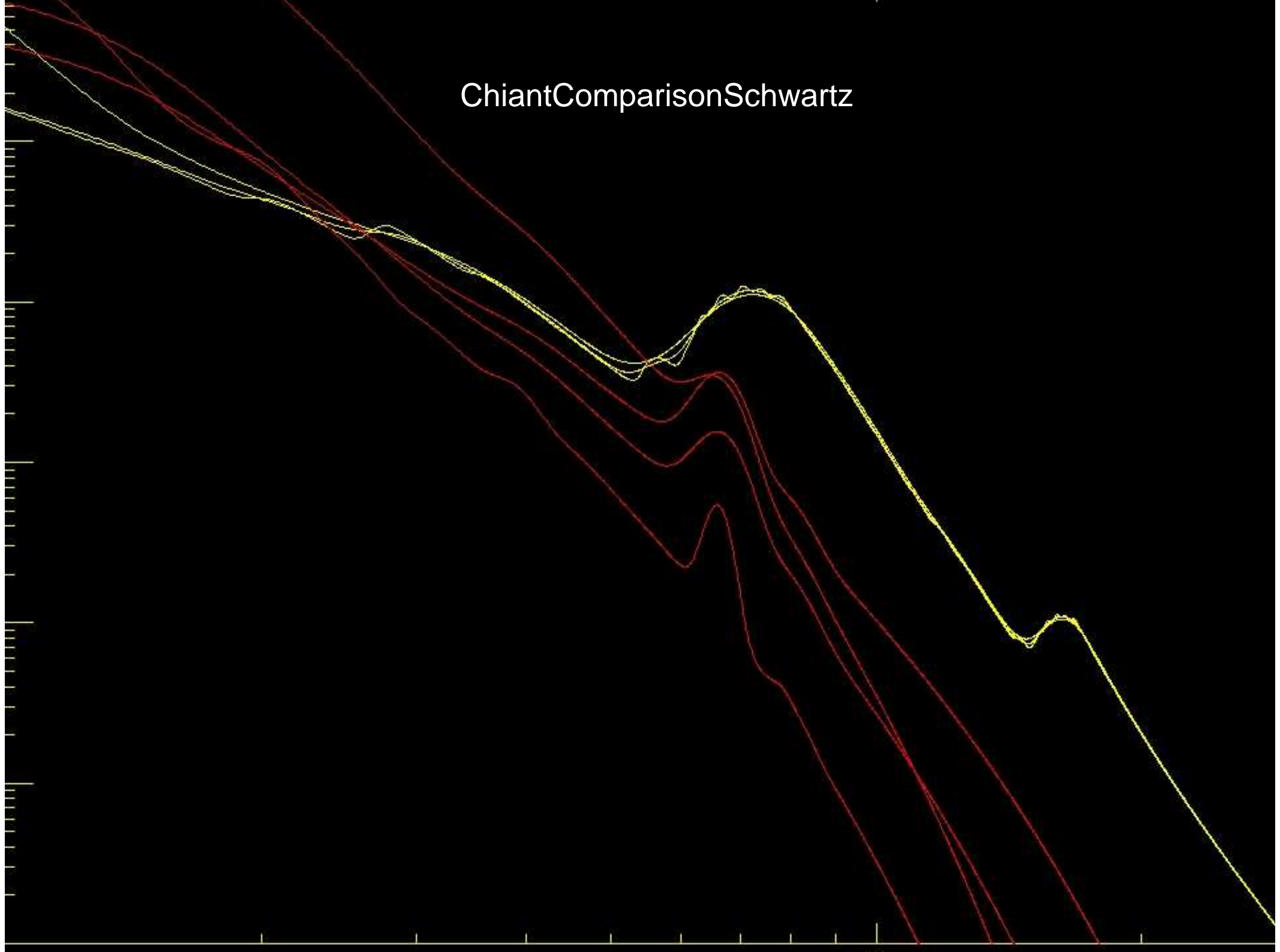
Brown & Mallik (Glasgow) claims
2008 A&A 481, 507
2009 ApJ 697, L6

Results discrepant with Chianti and RHESSI
Even for the thermal continuum
WHY ??

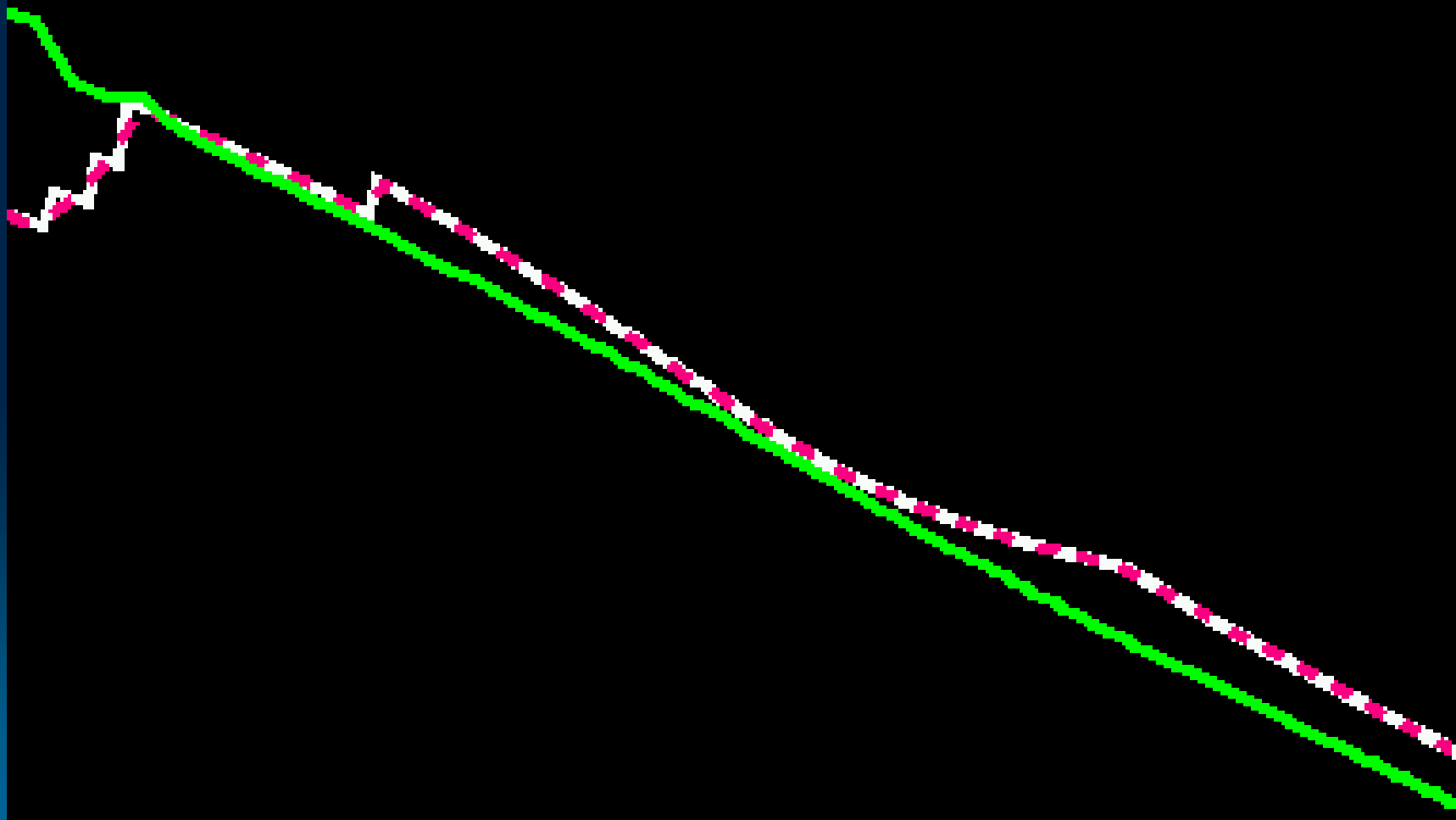
Recent collaboration with

- Eduard Kontar (Glasgow)
- Nigel Badnell (Strathclyde)
- Enrico Landi (NRL)
- Richard Schwartz (GSFC)

ChiantComparisonSchwartz



RHESSI DATA COMPARISON PHOTON SPECTRA



SO - Is Recombination an important source of dekekeV XRs thermally at flare temperatures and nonthermally from beams?

ANSWER ?

Nothing like as important as Brown & Mallik claimed due to a **blunder in our atomic physics**.

However still significant in hot HXR sources (20-40MK) where it could still be key diagnostic of – Plasma n , T and nonthermal $F(E)$ features

A paper on the revised results is in preparation