

Radio observations of Mrk501

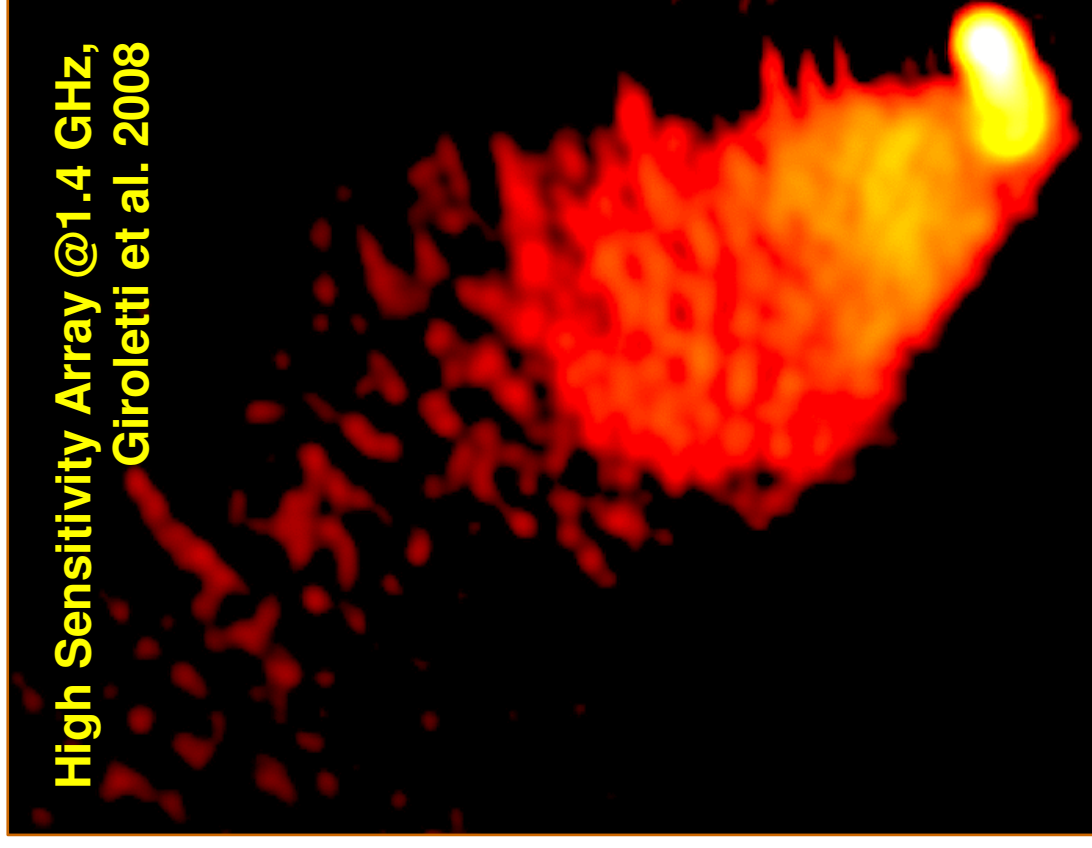
Marcello Giroletti

INAF Istituto di Radioastronomia



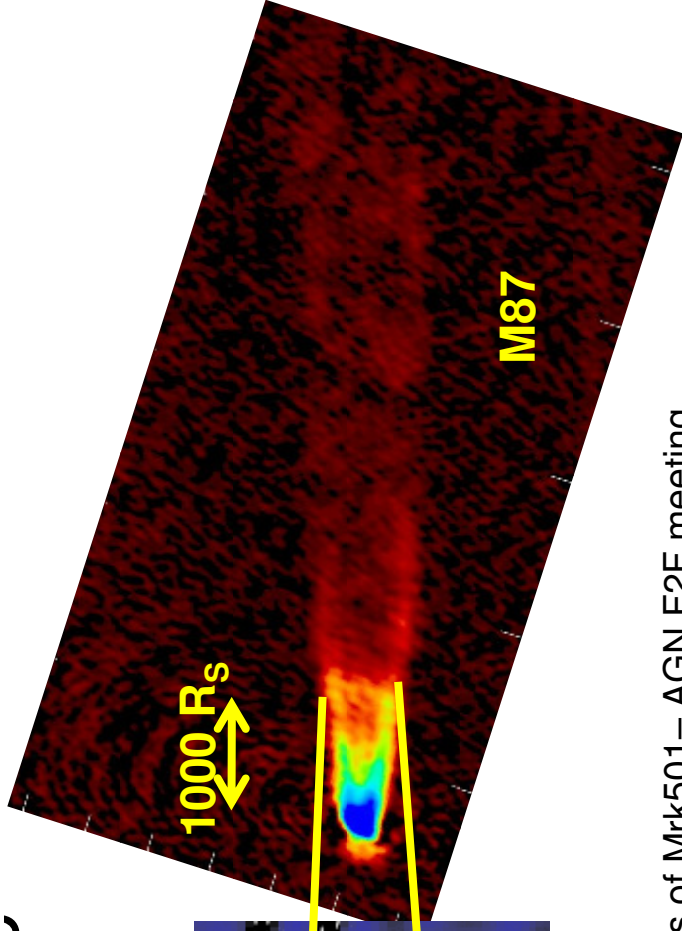
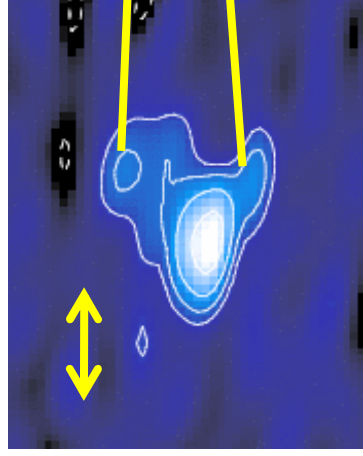
Mrk 501 – radio summary

- Best case for evidence of stratified structure on various scales:
 - limb brightened **total intensity**
 - spine-sheath in **polarization** and **spectral index**
 - transverse **RM gradient**
- possibly linked to TeV emission (**not a 3EG source**)



mm-VLBI observations

- GMVA: 8 VLBA telescopes plus Effelsberg, Pico Veleta, PdBI, Onsala, Mets.
- baseline sensitivity around 0.1-0.4 Jy
- Mrk501 successfully observed (good fringes) and with rich structure
- resolution < 0.1 pc



mm-VLBI – future

- new mm-VLBI observation were obtained in May 2008 but Pico Veleta snowstorm leaves little hope for improvements
- mm-VLBI time obtained also for Mrk421: will be taken next October
- next GMVA deadline for proposals is Oct 1st...



M. Giroletti – radio observations of Mrk501 – AGN F2F meeting

Proposal time – all on Oct 1st:

- GMVA
- VLBA-EVN
 - re-submit proposal on BZCAT FSRQ?
 - re-submit proposal on **HBLs** in light of Fermi result
 - problem with non LAT co-Is
- INAF single dish telescopes
 - 22, 43 GHz available at Noto, Medicina (32m)
 - successfully participated in Mrk 501 campaign, can take part in Mrk 421, others...

