The TeV Connection

Information and discussions about LAT common interests with the TeV community

Relevant VHE experiments

Name	Type	**Ethresh (1)**
H.E.S.S.	Imaging Atmospheric Cherenkov	120 GeV
VERITAS-4	Imaging Atmospheric Cherenkov	120 GeV
CANGAROOIII	Imaging Atmospheric Cherenkov	500 GeV
MILAGRO	Air Shower	400 GeV - 40 TeV (2)
MAGIC	Imaging Atmospheric Cherenkov	50 GeV

(1) We need to distinguish between anticipated threshold and achieved/documented threshold. Until then, be critical to any quoted number
(2) The threshold/energy response of a ground array like Milagro cannot easily be compared to ACTs. This interval respresents the energy range over which 90% of events from a crab-like spectrum are detected.

Experimental Issues

Optimizing variability studies

- Visibility tools proposals and tools H.E.S.S.
- * Unified VHE visibility tool
- * LAT visibility tool

- Alerts/transients/scheduled observations
- * VHE timetables

Analysis Issues

Spectral fitting tools

- Calibration
- Response Functions

VHE sources

- Galactic
- Extragalactic
- Variable
- All

Collaboration & Policy Issues

"Wish List" for H.E.S.S.

The object of desire: What we ought to know about the facilities

Facility	Object visibility/constraints	Analysis technique/data products	Comments
template	energetic threshold = f(dec); low threshold cuts readily available ?	shower reconstruction: which MC/version ?	
	point source sensitivity = f(dec); public? generally applicable ?	high-level data product: gamma-ray excess-map - availability / conditions ?	
	extended source sensitivity = f(source size); public ? generally applicable ?	high-level data product: gamma-ray excess-map - format (root/fits) ?	
	energy resolution public? known dependencies ?	high-level data product: spectral data - availability / conditions ?	
	angular resolution public ? known dependencies ?	high-level data product: spectral data - format (xspect/root/...) ?	
	timeline: observational history : which objectes ? when? eff. exposure? result published ?	high-level data product: spectral fits - fit-function flexibility ? which uncertainties ?	
	schedules: which objects ? when ? result will be made available when ?	intent of matching contemporaneous analysis ? when ? how ?	
		lc: minimal timescale ? flexibility in rebinning ?	

Conferences (presentations and proceedings)

Towards a Network of Atmospheric Cherenkov Detectors VII, April 2005, Paris

Meetings

Friday Nov 4 2005: GLAST, GRB and TeV observations
Saturday Mar 4 2006: F2F meeting
Wednesday, June 14, 2006 (9am Pacific): VRVS meeting in Vela

Whiteboard

A place to throw ideas