

GammaLib - Feature #1747

GModel for Gamma Ray Spectrum from Dark Matter

03/17/2016 12:02 PM - Rodriguez Fernandez Gonzalo

Status:	New	Start date:	03/17/2016
Priority:	Normal	Due date:	
Assigned To:		% Done:	0%
Category:		Estimated time:	0.00 hour
Target version:			
Description			
<p>Following the feature #1520, from Nathan, (GModels for Dark Matter Halo Density Profiles). I would suggest to add the gamma ray spectra for dark matter, because it is not easy to model with the current functions used in gammalib.</p> <p>I would like to suggest the solution adopted by the Fermi collaboration in their science tools. They use the DMFit tool to calculate the gamma spectrum, then from a xml file they just model the spectrum using 4 parameters, normalization, channel, branching ratio and mass.</p> <p>From M.Cirelli et al I have used their Mathematica notebook to create the ASCII file for different wimp mass and annihilation channels for the CTA energy range.</p> <p>Cheers, Gonzalo.</p>			

Files

gammamc_dif.dat	914 KB	03/17/2016	Rodriguez Fernandez Gonzalo
test.py	1.89 KB	03/17/2016	Rodriguez Fernandez Gonzalo