

MAUS - Support #1359

defining a new material in Geant4/Maus

14 October 2013 16:18 - Carlisle, Timothy

Status:	Closed	Start date:	14 October 2013
Priority:	Normal	Due date:	
Assignee:	Rogers, Chris	% Done:	100%
Category:	Simulation	Estimated time:	0.00 hour
Target version:			
Workflow:	New Issue		

Description

Hi Chris,

I'd like to make scattering simulations in LH2 but using the measured (MuScat) density of 0.0755g/cm³ rather than the standard value of 0.0708g/cm³. Is there a simple way to do this?

I imagine I need something like this:

```
G4double density = 0.0755*g/cm3;  
G4double a = 1.008*g/mole;  
new G4Material("LH2_MuScat",z=1.,a,density);
```

does this go into geant4 & recompile...? Or is there a simpler route, in a geometry file perhaps?

Thanks,

Tim

History

#1 - 14 October 2013 16:20 - Rogers, Chris

There is a big list of materials in src/legacy/Simulation/FillMaterials.cc which is probably what you are looking for. At some point this should be cleaned up, but for now it is what we have...

#2 - 14 October 2013 16:30 - Carlisle, Timothy

Ah great, so I can add a few lines & then recompile Maus. Will close issue when sorted. Thanks!

#3 - 16 October 2013 09:23 - Carlisle, Timothy

- Status changed from Open to Closed

- % Done changed from 0 to 100