

17 Oct 05 GCR Meeting Notes

Montpelier

- Montpelier will have a full-time programmer, Claudia Lavalley, starting beginning of December. She will be available to work on GCR calib tasks
- It should be possible to run GCR-related simulations on the Lyon farm. We need to investigate this possibility. Also, we need to establish a way to move large files back and forth efficiently, regardless of where runs take place.
- Fred will need to do sims to replicate the GSI data configuration.
 - This means a new config in Gleam
 - He needs to determine number of events required
- Eric N. has been working DC2 prep tasks so not much done recently on GSI analysis. He has gathered together the software pieces he needs for the task
- Fred is still working on MIP finder, esp. on trying to make it work with the odd events that make it past other cuts in bkgd analysis. He is also working with Sylvain to define new variables and cuts
- Fred points out that if the TKR is not usable for GCR tracks (see below), a modified, more sophisticated MIP finder may be required
 - Must account for different energy deposition pattern
 - Requirement depends on rates determined from Andrey's work and allowable collection times. If we can just use the "obvious" events, we may not need a MIP finder

NRL

- Andrey continues to work on GCR rates via Gleam.
 - With help from Tracy and Francesco, he is closer to being able to get particle IDs from MCIntegratingHits
 - His findings on file sizes and Gleam performance make the following points clear:
 - Files produced (esp. mc.root) are **HUGE**. We can deal with this in several ways:
 - Prune files
 - Focus incident particles on certain types of interest (e.g. Fe) rather than the entire suite of CRHeavyIonPrimary particles
 - Create specialized data products (i.e. tuples). This is what Andrey is doing via UserAlg
 - TKR Recon is very slow on these events (due to large number of delta electron hits). We need to deal with this somehow (e.g. specialized path through Recon?)
 - Suggestion was made that maybe a back-of-the-envelope calculation of rates using propagator and cross sections could be made
- Eric Grove suggests that FIFO overflow in the TKR may result in events with only the lower layers read out. Can this be incorporated into the simulation for investigation?
- Mark needs to produce the next step in planning/tasks by approx. 1 Dec.

Next vrvs meeting on 2 Nov (note: Wednesday) at 10AM Eastern time

Should include an initial discussion of simulation labor and resources requirements