

Lightweight deployment of the SAM grid data handling system to new experiments.

Monday 13 February 2006 11:00 (20 minutes)

The SAM data handling system has been deployed successfully by the Fermilab D0 and CDF experiments, managing Petabytes of data and millions of files in a Grid working environment. D0 and CDF have large computing support staffs, have always managed their data using file catalog systems, and have participated strongly in the development of the SAM product. But we think that SAM's long term viability requires a much wider deployment to variety of future customers, with minimal support and training cost and without customization of the SAM software. The recent production deployment of SAM to the Minos experiment has been a good first step in this direction. Minos is a smaller experiment, with under 30 terabytes of data in about 600,000 files, and no history of using a file catalog. We will discuss the Minos deployment and its short time scale, how it has provided useful new capabilities to Minos, and where we have room for improvement. The acceptance of SAM by Minos has depended critically on several new capabilities of SAM, including the C++ API, the frozen client software, and SAM Web Services. We will discuss lessons learned, will speculate on future deployments, and will invite feedback from the audience in this regard.

Summary

Recent developments in the SAM data management system make it much easier to deploy to new experiments; we discuss such a deployment to Minos, and the work being done to further improve the process.

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Session Classification: Poster

Track Classification: Grid middleware and e-Infrastructure operation