
Benefits and performance of ATLAS approaches to utilizing opportunistic resources

— Andrej Filipčič on behalf of the —
ATLAS Collaboration

- Many centers have computing resources which are willing to contribute to ATLAS but they are not part of WLCG
 - High-Performance Computing centers in EU, US and China (~10)
 - Shared academic clusters
 - Cloud resources, academic or commercial, private or public
 - Volunteers with home or office PCs
- 10% of MC events were simulated on opportunistic resources in 2016
- ATLAS Distributed Computing has demonstrated to be able to transparently integrate any kind of opportunistic resources into its production system to participate in the production in automated way due to:
 - Well designed production and data management system
 - Flexible separation and distribution of job execution steps
 - Extending the middleware backends and job execution wrappers to various computing site architectures