

Deployment of a Kubernetes-based Analysis Facility for ATLAS

Tuesday 26 October 2021 17:55 (25 minutes)

We present a technical report on the new ATLAS Analysis Facility hosted at the University of Chicago. Designed to support both traditional batch computing and novel analysis frameworks, this facility represents a shift in how future clusters will be deployed, federated, monitored and operated. We will describe the “cloud native” underpinnings of the facility (Kubernetes, GitOps, and Rook), how we leverage federated service deployment via SLATE, and how we incorporate technologies from IRIS-HEP such as ServiceX and Coffea Casa. The flexibility offered by these technologies allows the resource to be configured for the IRIS-HEP Scalable Systems Laboratory, providing a declarative platform for analysis and data delivery systems development.

Desired slot length

Speaker release

Yes

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Session Classification: Grid, Cloud & Virtualisation

Track Classification: Grid, Cloud & Virtualisation