



LHC Computing Grid Project - LCG

ARDA

Approach for the Middleware

ARDA Workshop

21-22 January 2004

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General Approach

- ARDA RTAG: "Leverage emerging experience in large distributed Environments & exploit R&D in the Grid middleware projects"
 - Get together Generic Middleware providers to see whether a common effort was possible
 - Involving people from AliEn, EDG, LCG-AA and VDT
 - European and US
 - Including EGEE contributions
 - Organized a meeting on December 3-4
 - Small enough that controversial ideas could openly be disputed and discussed



A Note on OGSI

- ARDA RTAG: "ARDA architecture should be implemented as OGSI compliant set of Services that implement Distributed Analysis"
 - Partially invalidated by January 20, 2004 [announcement](#) by Globus et al.
 - We'll look at WSRF specifications and implementation(s) when available
 - It was already concluded at the December 3-4 meeting that OGSI was rather an envelope for Services than defining the Services themselves
 - Concentrate on the base (Web) Services, Semantics & Interfaces



Towards an ARDA Prototype *Generic* Middleware

Miron Livny (Univ. Wisconsin)



Possible Timeline

- **December 2003**
 - Bootstrapping phase
 - Initial Middleware Meeting
 - Reports to LCG PEB & SC2
- **January 2004**
 - Working on initial Services & API document
 - First (this) workshop
 - Scope of Distribute Analysis
 - Scope of Middleware
 - HEP specific components
 - Responsibility of Experiments
 - Project organization
 - Define Work plan and Milestones



Possible Timeline (II)

- February 2004
 - Deliver Middleware document and project plan
 - Get feedback from experiments (and other parties)
 - Agree definition & priorities of Services
 - Start prototyping activity
 - Define further workshop dates
- March 2004 onwards
 - Experiments start frameworks interfacing
 - Get initial feedback from using prototype
 - Integrate with EGEE Middleware activity
 - Iterate regularly



Next Steps Needed

- How does Middleware activity interact with Experiments?
- How does one agree what is in Generic Middleware, HEP specific Middleware, Experiment specific Middleware?
- How does one get convergence on Services?
 - Definition, Interfaces, Semantics
 - Priorities
- How does one evolve the specification of the Services