

# Open Grid Services Infrastructure Working Group (OGSI-WG)

## GGF6

Global Grid Forum 6, October 15, 2002

# Open Grid Service Infrastructure (OGSI-WG)

- Charter: The objective of the OGSI WG is to review and refine the Grid Service Specification and other documents that derive from this specification, including OGSA-infrastructure-related technical specifications and supporting informational documents.
- <http://www.gridforum.org/ogsi-wg>
- [ogsi-wg@gridforum.org](mailto:ogsi-wg@gridforum.org)
- Chairs: Steve Tuecke, Dave Snelling

# GGF6 OGSi WG Sessions

- Working group update
  - Tuesday, 10:00 – 11:30a
- Discussion of technical issues with Grid Service Specification
  - Tuesday, 2:00 – 3:30p
  - Wednesday, 12:00 – 1:30p
  - Wednesday, 2:00 – 3:30p
  - Thursday, 8:00 – 9:30a

# Overview

- Document Status and Changes
- Other Grid/Web Services Standards Efforts
- Implementations of GS Spec
- Process and Planning

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# Grid Service Specification

- Latest draft: v4, October 4, 2002
- Updated since GGF5 to reflect decisions of WG (email, telecons, interim meeting)
- Many refinements, including:
  - GGF document compliance
  - Section 4: The Grid Service:
    - > General cleanup, resolved many small issues, etc.
    - > Rewrote handle/reference/resolver section
    - > Refinements on service data
  - Section 6: The GridService portType
    - > Substantial refinements

# A Timestamp for Distributed Computing

- Specification for *measured timestamps*
  - dateTime + accuracy + resolution
- Revived from GMA wg before GGF5
- Problem: No clean way in XSD to represent measured timestamps as a derived simple type
  - Resolution: Do not use them, unless/until a solution to this is found.

# Handle URI Definitions

- A GSH (handle) is a URI, conforming to some basic properties
  - But syntax & interpretation of any particular URI scheme is not defined in GS Spec
- OGSF wg is likely to host some GSH specifications
  - Separate spec with http/https schemes that were previously in GS Spec draft 3
  - SGNP



# Physiology of the Grid

- Latest draft: v2.9 (6/22/2002)
  - Second public draft
- No changes since GGF5
  - Proposal: Once GS Spec is finished, then make *minor* updates to this document for accuracy, and publish as GGF informational draft.
  - Alternatives: Drop it. Move it to OGSA wg.
- Also appearing in:
  - IEEE Computer (June)
    - > Reduced version of Physiology paper
  - Book edited by Tony Hey (Fall 2002)

# Primer

- Update?

# Grid Compliance Service

- Prior to GGF5: Requirements, Design, and Specification documents
  - “A Grid Compliance Service is a testing service which tests other Grid services for their compliance with the Grid Service Specification and their own service specification.”
- At GGF5, had a vigorous debate if it belonged in ogsi-wg
  - Resolution: Come back with more specific document that we can evaluate
- Any update on this?

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# GGF OGSA-Related WGs

- OGSA
- OGSA Security
- DAIS: Database Access and Integration
- Usage Record
- Resource Usage Service
- Java Container Interfaces for OGSII
  - Proposed at GGF5, but not yet operating
- Others?

## W3C WSDL WG

- W3C has a WSDL working group
  - Drafting v1.2 to become W3C recommendation
- Steve Graham (IBM) & Steve Tuecke are invited experts on this wg, representing GGF
  - Inject OGSi requirements into WSDL wg
- WSDL v1.2 working draft contains two features that are critical to OGSi
  - portType extension
  - Open content model
- Questions about this later...

# Other Web Services Work

- W3C
  - WSDL v1.2 in progress
  - SOAP v2 in progress
- OASIS
  - Shaping up as a home for Web services security standards
    - > WS-Security, SAML, XACML, XrML
- Project Liberty Alliance
  - Identity federation

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# Implementations of OGSI

- Globus Toolkit OGSI Technology Preview
  - Thomas Sandholm
- Unicore OGSI Demonstrator
  - David Snelling
- Others?

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## WG Activities Since GGF5

- 9 weekly teleconferences
  - Wednesdays, 10am CDT
- 1 interim meeting
  - At Argonne, September 4-6
- Very broad, active participation
  - For example, interim meeting included people from: Argonne, Avaki, EMBL, Entropia, Fujitsu, IBM, Microsoft, NASA Ames, Sun, USC/ISI

## Working Group Chair

- Dave Snelling (Fujitsu Labs) became co-chair in August
  - Replaced Jeff Frey (IBM)
- What about a secretary?
  - I've seen reference to this a few times recently (2 chairs + secretary)
  - Dave is handling minutes

# Document Schedule

- Focused on Grid Service Specification
- At September interim meeting decided:
  - GGF6: draft 4
  - Nov 11: draft 5
  - Nov 14-15: Proposed interim meeting, nail down remaining open issues
  - Dec 15: Submit into GGF document process
  - GGF7: Approved as GFD
    - > Minimum 6 months to recommendation
- Aggressive, but feasible
- Other documents in flux

# Grid Service Specification, v1.1

- Looking increasingly likely that there will be a v1.1
  - For some issues, we do not know enough yet, and/or don't have consensus
  - Remove from v1.0, or include a minimal solution that can be extended later
    - > Wait for more implementation/use experience before v1.1
- May need to remove some sections to meet v1.0 document schedule
- Question: Drop or delay?

# Bugzilla

- [www.gridforum.org/ogsi-wg/bugzilla](http://www.gridforum.org/ogsi-wg/bugzilla)
- Definitive source of remaining issues with the documents
  - Document will be complete when all bugzilla issues have been addressed
  - If there is an issue that you feel needs to be addressed prior to completion, it MUST be in bugzilla

## Weekly Phone Call

- Weekly phone calls have been very effective for debating and resolving outstanding technical issues
- Plan: Continue weekly 1.5 hour phone calls to resolve issues in specification
  - Propose Wednesday 10:00am US Central time
  - May need to adjust for daylight saving time



## ogsi-wg Interim Meeting

- Held first one on September 4-6
  - 15 people, great progress
- Propose: Hold another 2 day meeting, to resolve final issues with the draft
  - Propose: Argonne, November 14-15
  - Must be in Chicago for Steve to attend
- ***Please no tourists!!!***
  - To be effective, this needs to be a small, face-to-face, round-table meeting
  - Only people who have read the GS Spec, and who want to engage in technical debate on it

# IPR Statements

- Recent announcements:
  - “IBM is pleased to announce that any essential patent claims, held by IBM, that are necessary to implement the “Grid Services Specification” document submitted to the Global Grid Forum, will be licensed on a royalty-free basis.”
  - ANL and USC/ISI have committed to not asserting patents on its technologies.
  - Others?
- How should these be documented?
  - In GS Spec? On ogsi-wg web? On ggf web?

# WSDL 1.2 Timing

- WSDL 1.2 is still in flux
  - Original document deadline was year-end, but it looks like they will not make that
  - Tooling for WSDL 1.2 is sure to lag
- But GS Spec needs WSDL 1.2 features
  - Open content model, portType extension
- What to do? Options:
  - Delay GS Spec for WSDL 1.2
  - Figure out how to shoe-horn into WSDL 1.1
  - Subset of functionality for WSDL 1.1, full functionality for WSDL 1.2

# Technical Discussion Topics

- Notification (Bugs 18,41-44,57,59)
  - (“Event-style mechanisms”)
- Registration/Collection interface (Bugs ??)
- Read-Write SDEs (Bug 51)
- Extension relationship in the GS portTypes.
- Coherency semantics of multiple findServiceData operations
- Resolver behavior and the semantics of multiple naming schemes
- Bugzilla issue review

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