



GT4 Java WS Core Overview

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GT4 WS Core Implementations

- Java, C, Python (contribution from LBNL)
- Implementations of the Web Services Resource Framework (WSRF) and Web Service Notification (WSN) family of specifications
 - ◆ Based on June 2004 OASIS schemas with minor changes
 - 2004 version of WS-Addressing specification
 - ◆ WS-BrokeredNotification not supported



A Closer Look at Java WS Core

- Provides API and tools for building WS-Resources (Web services that operate on stateful resources)
- Clear separation between services and resources
 - ◆ Services
 - Stateless
 - Perform business logic
 - POJO
 - ◆ Resources
 - Stateful
 - Contain/represent the state
 - Managed by ResourceHome
- Implemented with 'standard' Apache software
 - ◆ Axis (the web service engine)
 - ◆ Addressing (the WS-Addressing implementation)
 - ◆ and more



Java WS Core GT 4.0 Features

- A JNDI based registry
 - ◆ Used for discovery of ResourceHomes, etc.
- An implementation of the Work Manager and Timer (J2EE) specifications
 - ◆ Used for starting and managing background threads and periodic tasks
- A standalone and embeddable container
- Tomcat support
- Automatic service and ResourceHome activation on container startup
- Service operation providers
- Basic API for resource persistence and recovery
- Persistent subscriptions support

Differences from GT3 Java WS Core

- Resource vs. Service Instances
- No 2-level naming scheme (no more GSHs)
- Notifications are no longer tied to service data
 - ◆ Topics & Topic spaces
- No gwsdl
- No base porttype
- No pre-defined factory class/porttype