GlassFish Infrastructure – GF Lite

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What It's All About

- TBD (Probable) Items (An unordered list)
- Q + A
- Disclaimer: DRAFT, hence Vastly Incomplete
- Goal
    - Background for one-pagers/test-plans
    - Spur several discussions on admin alias

1 Pluggability

- Admin Console/Admin CLI to plug-in a Module
  - Excellent install experience - a must
    - File-system/UCR
  - Necessary configuration changes
  - Provide default configuration
- Unknowns
  - UCR integration
  - A Jar-file or an HK-2 module or an OSGi bundle?

2 Modularity

- Merge Configuration/Admin with Modules
  - Mostly internal re-organization
  - Split configuration interfaces
- Unknowns
  - Is it really needed?
  - See slide 6 for a counter-case

3 Configuration Enhancements - I

- Improved Configuration
  - Minified default domain.xml
  - Data-type based validation & Advanced, pluggable validation
  - Support for editing default-web.xml
  - Changed Grizzly configuration
  - Ability to have upgrade-aware config beans
- Unknowns
  - default-web.xml support
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3 Configuration Enhancements - II

- Full Support for Tokens
- A Novel Way to Implement *Config-only* Operations (Internal)
  - Generic create/delete/set/get/list *anywhere*
- Dynamic Reconfiguration
  - List of changes *yet to be applied*
  - Incorporating *Restart Required* flag
- Offline Configuration API
- Unknowns
  - Offline configuration support is tricky, hard to get right

3 Configuration Enhancements - Misc

- Introduce *Version* on Domain (no DTD!)
- Ability to Set Server Environment Variables
- Tree Locking for Multiple Administrator Case
  - See slide on security
- Unknowns
  - What to do with AMX? (See slide for Interfaces)
  - Logging configuration
  - References Vs. inheritance

4 Misc (Infrastructure)

- Remove Admin Port Confusion
- Support Domain Restart on Admin Console
  – Launcher stays behind
- JMX MBeanServer Integration
- JMX Connector Integration
- Launcher Provides THE Startup Command (as an asadmin command)
- No com.sun.appserv MBeans
- Support for Custom MBeans as a Module

5 CLI

- Publish a List of Supported Commands
  - Carried over as-is, deprecated, removed, new
- Develop Enhanced CLI Shell (Multi-mode)
  - Based on jline (jline.org)
  - Command completion and history
- Support Syntax that Reflects
  - asadmin [asadmin-options] command [command-options] [command-operands]
  - Ability to persist end-points based on User (User Preferences)
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6 Domain Infrastructure

- Publish Domain's File Layout (not Install's)
- Domain Creation Procedure
  - Relates to security slide
  - Remove quirks
  - Deal with templates intelligently
- Usage Profiles
  - This is really challenging
  - Extract profile?

7 Admin Security

- Support Multiple Admin Users and Realms
  - No RBAC yet
  - All users are *identical*
  - Support JDBCRealm for Admin Users?
- Formalize Anonymous Login
  - Make it work
- Provide Admin Access Only on Secure?
- Easy Certificate Installation Procedure?
- Split Authorization Support?

8 Interfaces

- Admin Console and CLI
- AMX?
- REST
  - Specify it *completely*
  - Uses adapter

9 Non-goals

- Clustering Management
  - Eliminates several other things
- Node Agent
- RBAC