



Bedework 3.0

an institute-wide open source
Java calendar system

Communications & Middleware Technologies
Rensselaer Polytechnic Institute
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calendar
bedework

Topics

- Overview of Bedework
- Recent progress
- Demonstration
- Future plans

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Overview of
Bedework

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An institutional calendar could provide:

- Events publishing
- Personal calendaring
- Group calendaring
- Resource scheduling



- Bedework is
 - a comprehensive calendaring and events system
 - open source
 - Java (hence platform independent)
 - modular, extensible, and easily integrated with other systems
 - intended for higher education
 - *and...*

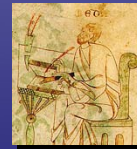
STANDARDS COMPLIANT

- iCal : RFC 2445
<http://www.ietf.org/rfc/rfc2445.txt>
- CalDAV draft version 06
<http://ietf.webdav.org/caldav>
- Why? ...interoperability!

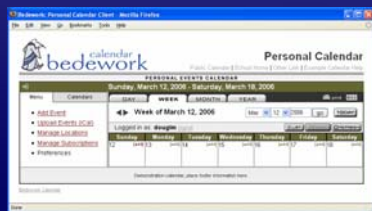
- Calendaring could be like email
- Aggregation at client and server
- Exchange? Oracle?
 - All or nothing vs. modularity
 - Change from one system to another?
- CalConnect
 - Oracle, IBM, Mozilla, Yahoo, & Novell among others; approx. 10 universities

- Why Bedework?
 - Bedework is based on UWCalendar 2.3
 - Needed a name not derived from a specific institution
 - All word play on “cal” is exhausted (from clever, banal, to ugly: “cal” names are all in use)
 - So, we turned to calendar history...

- Bedework:
 - named after the Venerable Bede (AD 673-735)
 - monk & highly influential scholar
 - in 725 AD wrote treatise: *On the Reckoning of Time*
 - and a Google search of Bedework, for now, returns only references to this project!



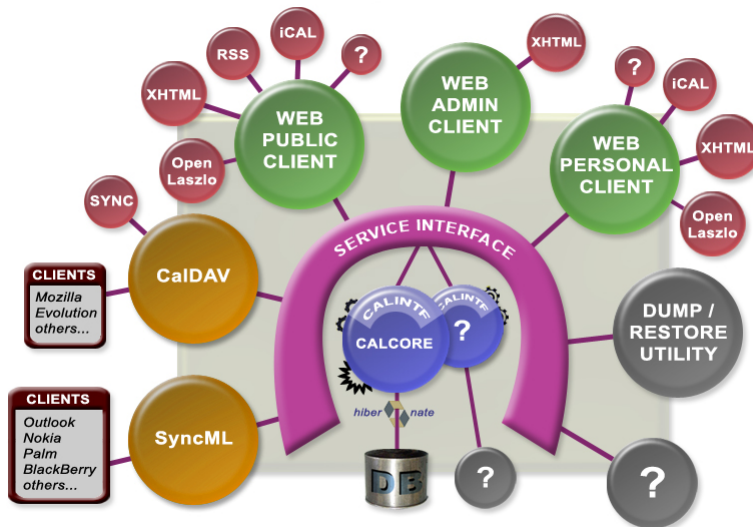
- Four main components:
 - public client
 - personal client
 - administrative client
 - CalDAV



- Features:
 - Distributed, fine grained administration
 - Administrative groups
 - Location and contacts management
 - Access control & sharing
 - Stand-alone & portlet implementations
 - True synchronization
 - Highly customizable look and feel
 - Deliver to any platform, device, or media



- Java / J2EE
- XML, XSLT
- Hibernate
- Again, supporting JSR-168 and CalDAV



- **Modular**
 - Built under a service interface (“service oriented architecture”)
 - Implements Callntf
 - Comes with a Hibernate implementation on a local database
 - Could have, for example, a CalDav implementation with a remote calendar
 - Or both: many implementations simultaneously possible (e.g. Exchange connector)
 - This gives us server-side aggregation of calendars

- JSR-168
- Implemented for Jetspeed using the portal-struts bridge
- uPortal version implemented by Satish Sekharan (Memorial University, Newfoundland)



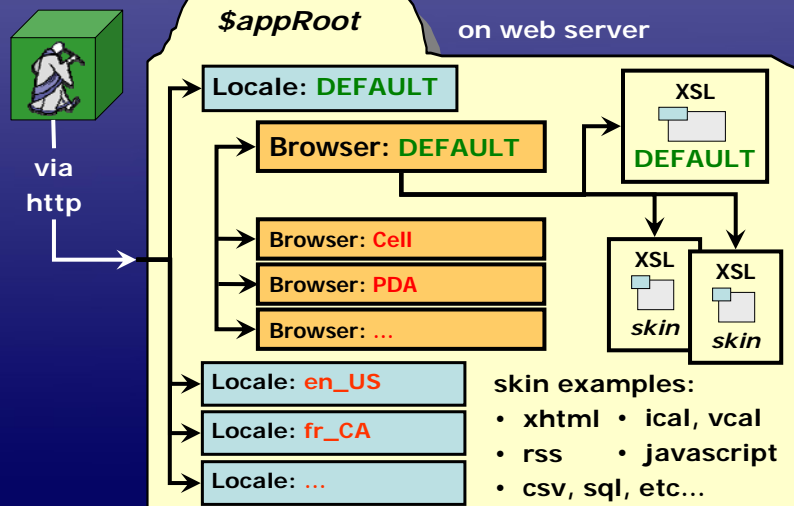


- Emerging standard
- Based on WebDAV
- Provides synchronization
- Promises flexibility in choice of user client
- Clients and servers being developed by vendors now: Oracle, Mozilla, Evolution
- Outlook OpenConnector for caldav: openconnector.org

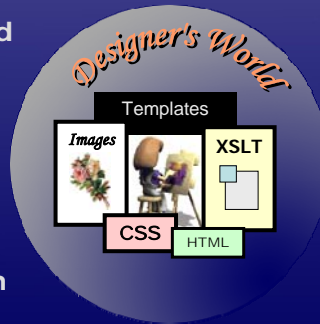


- Have proof of concept implementation of synchronization using SyncML
- Successfully synchronized with Outlook
- Funambol (previously called Syn4j) supports synchronization with many devices:
 - Microsoft Outlook
 - RIM Blackberry
 - Palm
 - Microsoft SmartPhone
 - Microsoft Windows Mobile PocketPC
 - Apple iPod
- See <http://www.funambol.com/opensource/>

- XML-based J2EE web applications built in the MVC framework
- Separate business logic from presentation and presentation from content so that each can be developed independently

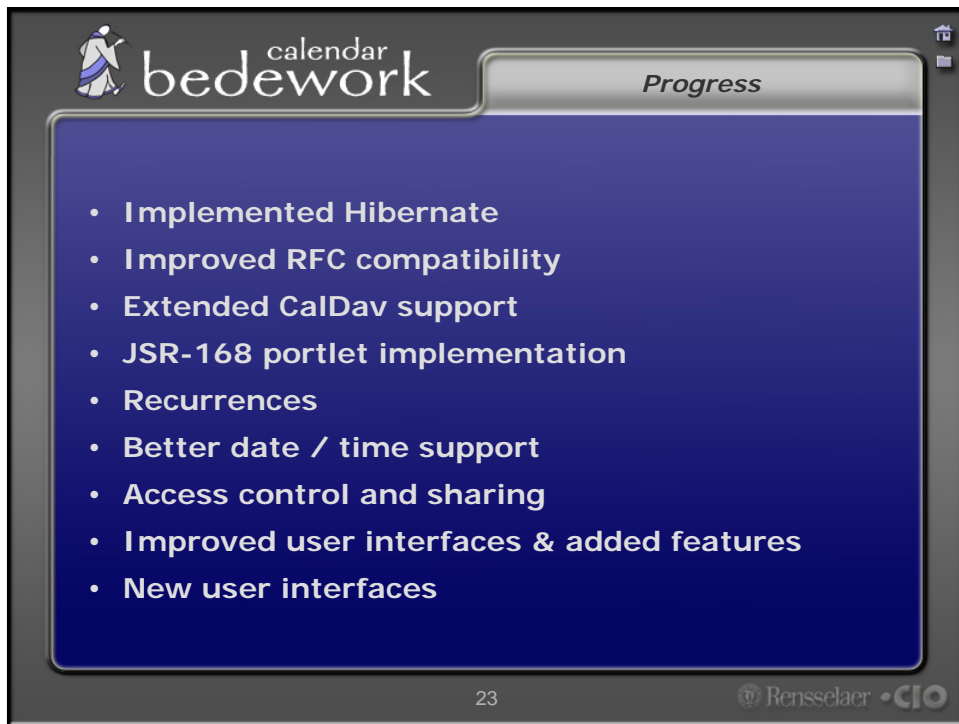


- Applications are accessible to regular web designers
- XSLT lives in designer's world
- Easy to change look and feel
- XSLT files live on the web "outside" our applications and are called over http and cached
- We don't need to redeploy an application to change its appearance or to deploy a new skin



Progress

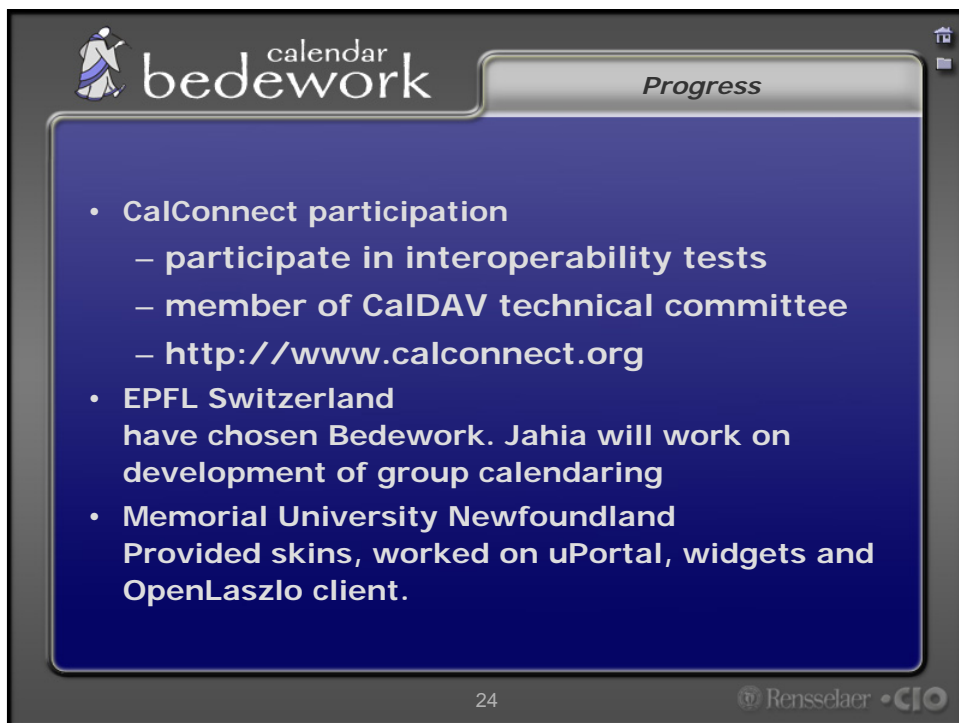
What's been accomplished over
the past year



calendar bedework Progress

- Implemented Hibernate
- Improved RFC compatibility
- Extended CalDav support
- JSR-168 portlet implementation
- Recurrences
- Better date / time support
- Access control and sharing
- Improved user interfaces & added features
- New user interfaces


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calendar bedework Progress

- CalConnect participation
 - participate in interoperability tests
 - member of CalDAV technical committee
 - <http://www.calconnect.org>
- EPFL Switzerland
have chosen Bedework. Jahia will work on development of group calendaring
- Memorial University Newfoundland
Provided skins, worked on uPortal, widgets and OpenLazlo client.

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Demonstration

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Demonstration







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Future Plans

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Future Plans & Opportunities

- ✓ Departmental calendars
- ✓ Group calendaring
- ✓ Event notification (alerts)
- ✓ Emailing of events
- ✓ Support clustering
- Room / resource scheduling

✓ = imminent

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- Major goal:
 - ease installation and configuration
 - encourage adoption and development



bedework.org