

CMF 2.0: Roadmap

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How far have we come?

- Late 1998: Principia “open source” announcement @ IPC8
- Early 2000: “Portal Toolkit” preview @ IPC9
- Early 2001: Content Management Framework 1.0 (CMF) @ IPC10

Zope3 learns from CMF

- Tools-based architecture
- Separation of concerns
 - Site designer
 - Content author
 - Developer
- Pluggable policies
- “Type-based” policies
- Skinnable UI

EuroPython 2004

- Most projects represented, with good interchange
- Overlapping efforts among projects
- Panel audience identifies need for closer cooperation / sharing among projects

Castle Sprint 2004

- Identification of goals / features for Zope3 CMS
- Initial discussion about ways and means of collaboration
- Useful prototypes
 - “Pipelined” response processing
 - Activity-based workflows

Paris Sprint 2005

- Originally aimed at implementation of Zope3 ECM features
 - semantic / RDF indexing
 - skins framework
- Added focus on integration of Five into Zope2
 - Silva/CPS/CMF/Plone all run on Zope 2.8.x!

Importance of Five

- May 2005: Five 1.0.1 ships, along with Zope3 3.0, as part of Zope 2.8.0
- Five allows shops to begin using Zope3, while preserving Zope2 investment
- Five expands audience for Zope3 *dramatically*.
- ***See Martijn Faasen's & Phillip's talks!***

Current Collaborations

- Zope3 Enterprise Content Management project
- Related Infrastructure work at Z3Base
 - Zsemantic, RDF-based indexing
- Cubic
 - A working “mini-CMS” based on Zope3
 - Demonstrates integration of components to create an out-of-the-box site

CMF Roadmap

- CMF 2.0 moves toward Zope3
 - Requires Zope 2.8.1+, Five 1.1+
 - Implements Zope3 views for content
 - Refactors content classes
 - Publishes Zope3 events
 - Architecture for export / import of content
 - Improved packaging model

CMF Roadmap (cont'd)

- Time frame
 - Goldegg 1, September/October
 - Castle Sprint after conference
 - Packaging sprint in San Jose, October
 - CMF 2.0a1 November

Using Z3 Views for Presentation

- Improves clarity
 - no more gnarly Python expressions in ZPT
 - Templates are managed / bound to the “view logic” currently found in scripts
- Improves maintainability
 - Views can be unit tested!
- Improves performance
 - Presentation logic can be trusted code

Simplifying Content Classes

- Poster child: CMFDefault.Document
 - Responsible for storage of “document source”
 - Responsible for “cooking” HTML
 - Responsible for “scrubbing” HTML at input
 - All-or-nothing on all this logic
- Refactoring Document
 - Adapters for cooking, scrubbing allow pluggability: e.g., add new source types, change the “tag blacklist”

Publishing Z3 Events

- Why events?
 - Simplify code
 - Break dependencies (e.g., catalog reindexing / workflow notification)
 - Allow pluggability

Publishing Z3 Events (cont'd)

- Which events?
 - “Content” events (creation, modification)
 - “Container” events (adding, renaming / moving, deletion)
 - “Workflow” events (at transitions)
 - “Timing” events (to drive scheduled work)

Publishing Z3 Events (cont'd)

- Published where?
 - To the “global” Z3 event “service”, e.g.:

```
from zope.event import notify
notify(ContentAddedEvent(obj))
```

Publishing Z3 Events (cont'd)

- Subscribers
 - Catalog
 - Deferred indexing
 - Workflow tool
 - Automatic transitions
 - Logging
 - Content subscription
 - Cache invalidation

Content Export / Import

- Use cases
 - Revision control
 - Staging
 - Preserving content across software upgrades
 - Interoperability (e.g., JSR 170)
 - No “lock-in” on content

Content Export / Import (cont'd)

- Adapter-based serialization
- Variety of formats:
 - Zipfile
 - Filesystem
 - Parallel folder structure
- Exported content can be part of the CMFSetup “profile”
- Export / import views directly on content

Content Export / Import (cont'd)

- Issue: Need to revisit Z3's fssync, reusing work there if possible
- Kapil's work on Archetypes <-> XML

Zope3 ECM Collaboration

- Project currently hosted at z3labs.org
 - whitepapers, feature maps, flash demos, etc.
- Agreement among projects to share “framework” components
 - Zope Public License for shared code

Ongoing ECM Work

- Semantic index integration
- Workflow engine
 - WFMC / XPD L definitions
- Content repository
- Content versioning
- Extended schema framework
 - RelaxNG / W3Schema
 - XForms

Goldegg and Z3 ECM

- CMF 2.0 enables CMF / Plone to play in ECM world
 - “Consuming” shared components
 - “Producing” new components

Lagniappe: Frostbite

- portal_skinfreezer tool
- Select skin path, then templates / scripts
- “Freeze” selected objects into a filesystem module
- Add a “freezer” to your skins tool, “shadowing” multiple paths
- Demo
- Release: Frostbite 0.2 today!

Q&A

Other Resources

- CMF 2.0 Roadmap Documents
 - <http://www.zope.org/Products/CMF/rqmts/>
- Goldegg Stack Project
 - <http://www.goldeggstack.org/>
- Zope3Lab Portal
 - <http://www.z3lab.org/>

Thank you!

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