QVT Operational 1.0
Ganymede Simultaneous Release
Graduation Review

June 04, 2008

QVTO – Ganymede Release Talking Points

- Features:
  - Project builder and nature
  - Launch configuration
  - Source code Editor
  - Meta-model browser view

- Quality of APIs
  - Overall: no "provisional" APIs, all non-API code in "internal" packages

- End of Life Issues:
  - None

- IP Issues:
  - None

Features

- Project Builder and Nature
- Source Code Editor
  - Syntax highlighting and coloring
  - Hyperlinks – go to definition or navigate to meta-model browser
  - Problem annotations and hovers
  - Structure folding
  - Outline view
  - Completion Templates
- Code completion
  - Rich set of completion proposal

- Meta-model browser view

- QVT interpreter – runtime execution

Non-Code Aspects

- Testing

    - 552 test cases

- Building and packaging

    - Uses common modeling releng

- Documentation

    - EclipseCon 2008 long talk paper available

    - Though not many docs provided at the moment, OMG specification for QVT and OCL is available

- Examples

    - Uml2RDB available, more examples will be published

APIs

- No "provisional" APIs

- All non-API code in "internal" packages

- Minimal API exposed – Transformation execution from Java

Architectural Issues, Usability, End-of-Life

- **Architectural Issues**
  - Parsing time for very large source files in QVT editor ->
    to be solved in the next release by incremental parsing.

- **Usability**
  - QVT transformation development and execution
  - Essential set of QVT language constructs supported
  - Improvements in transformation deployment needed

- **End-of-Life Issues**
  - None

Bugzilla

(as of May 20, 2008)

Status

	NEW	ASSIGNED	REOPENED	RESOLVED	Total
blocker	.	.	.	1	1
critical	.	.	.	2	2
major	.	.	.	5	5
normal	18	3	1	106	128
trivial	.	.	.	1	1
enhancement	.	.	.	2	2
Total	18	3	1	117	**139**

Severity

Standards and UI Usability

- Standards
  - OMG™ Object-Constraint Language (OCL) - used (MDT OCL)
  - OMG™ Query/View/Transformation (QVT) implemented

- UI Usability
  - No usability issues have been reported
  - Localization

    All strings are externalized and accessed through localization APIs

Schedule

- **Release Plan**
  - ✓ Wednesday October 03, 2007 - Milestone 2 (1.0 M2)
  - ✓ Wednesday November 14, 2007 - Milestone 3 (1.0 M3)
  - ✓ Monday January 07, 2008 - Milestone 4 (1.0 M4)
  - ✓ Monday February 18, 2008 - Milestone 5 (1.0 M5)
  - ✓ Monday April 07, 2008 - Milestone 6 (1.0 M6) – API Freeze
  - ✓ Tuesday May 06, 2008 - Milestone 7 (1.0 M7)
  - ✓ Tuesday May 20, 2008 - Release Candidate 1 - (1.0 RC1)
  - ▪ Tuesday May 27, 2008 - Release Candidate 2 - (1.0 RC2)
  - ▪ Tuesday June 03, 2008 - Release Candidate 3 - (1.0 RC3)
  - ▪ Tuesday June 10, 2008 - Release Candidate 4 - (1.0 RC4)
  - ▪ Wednesday June 25, 2008 - Release - (1.0)

Communities

- Evolving newsgroup (eclipse.modeling.m2m) - [QVTO] prefix
  - actively supported

- Conference Participation
  - Long talk at EclipseCon 2008
  - Tutorial at EclipseCon 2008

IP Issues

- About files and license files are complete and correct

- No third-party contributions submitted

- IP log created at
  - http://www.eclipse.org/modeling/m2m/qvtoml/eclipse-project-ip-log.csv

Project Plan – next release

- Complete QVT language support (OMG spec, ptc/07-07-07)

- Incremental parser

- Core debugging support

- Provide transformation deployment concept

- Support 'XMI Exportable' interoperability level

- Improve documentation – examples, tutorials

Graduation: Codebase and Community

- Codebase
    - Active code base, 3 committers working on features
    - Iterative development driven by the Eclipse milestone schedule

- Community
    - Evolving community of diverse and global users in the newsgroup
        - well monitored, responsive support
    - Developers
        - 4 committers, including 3 active committers
    - Known adopters
        - Borland

Graduation: Open and Transparent

- Bugzilla used for bug and feature tracking
    - bugs (total count:141, resolved : 119)

- Use m2m-dev@eclipse.org mailing list for developer discussions
- Use eclipse.modeling.m2m newsgroup for user discussions

- Regular/Continuous builds
    - JUnit test cases executed with every build process
    - Manual Smoke Test on weekly basis

- Project resources are all available to the public

Graduation: The Eclipse Way

- Able to demonstrate record of following correct Eclipse IP processes
  - CQ: #1355 (QVT initial contribution)
  - CQ: #1560 (LPG parser generator 3d party library)

- Long talk and tutorial at EclipseCon 2008

- Integrating with other Eclipse projects: MDT OCL, EMF

- Integrated by GMF project - use of QVT in <mapping->genmodel> transformation (under development)

- The developers understand and adhere to the Eclipse Development Process, committer responsibilities and due diligence rules, as well as the Eclipse IP Policy.

- IP Log:
  - http://www.eclipse.org/modeling/m2m/qvtoml/eclipse-project-ip-log.csv

Graduation: Technical Architecture

- Eclipse component dependencies: *MDT OCL*, *EMF*

- Extends MDT OCL parser and evaluator

- Supports Ecore based user defined meta-models

- Defines QVT concrete and abstract syntax Ecore based meta-models, extends existing MDT OCL AST, CST meta-models.

- Implements QVT model based parser and analyzer

- QVT Interpreter – evaluates AST models constructed from QVT concrete syntax

- QVT Editor – editing textual concrete syntax, utilizing both AST, CST models for advanced editor features