JSR 363 Public Review
Spec Lead Report

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Agenda

- Introduction
- History
- Scope, Features
- Publicity, Collaboration
- Participation
- Issue Tracker
- Questions, discussion, next steps
About this JSR

• A framework supporting robust representation and correct handling of quantities.
  – For example, it may be unclear whether a person's mass is expressed in pounds, kilograms, or stones.

• JSR 363 established safe and useful methods for modelling physical quantities.

• Interfaces and abstract classes supporting unit operations including
  – Checking of unit compatibility
  – Expression of measurement in various units
  – Arithmetic operations on units

• Concrete classes implementing standard unit types (base, derived) and unit conversion.
History

• List the significant dates in the history of JSR 363.
  – Submitted: March 11, 2014
  – Creation approved: April 7, 2014
  – EDR finished: January 27, 2015
  – Currently in Public Review Ballot until January 25, 2016
The Expert Group

• The JSR 363 EG has members from every continent except Antarctica (or Australia)
  – V2COM, 4 JUGs, individuals (several of them working at large companies like Airbus, IEM, *JP Morgan* or open-source groups like GeoAPI)
• The EG operate via Mailing lists, hangouts/calls at least every quarter, F2F either at EC meetings or events like JavaOne
• Mailing lists, JIRA are used as collaboration tools to facilitate EG communications
Publicity

• DevoXX UK 2015
  – Hackergarten
  – Interview for Voxxed
  – Session during conference
Publicity (2)

- **Session at Devoxx BE 2015**
- **JavaOne LA 2015**
  - Session
  - Hackergarten
Publicity (3)

- JavaOne SF 2015
  - Voted Most Significant JSR of 2015
  - Hackergarten
Collaboration with other community groups

• There is collaboration and exchange in particular with
  – GeoAPI / GeoTools
  – JScience
  – Eclipse (Science WG, UOMo and others, especially current users of either Unit-API 0.6 or JSR 275)
  – ICU (Unicode Organization)
  – OpenJDK / Project Kona as a potential collaboration in the future
Implementations

• Several implementations (apart from the RI) exist:
  – Java SE 8 port:  
    https://github.com/unitsofmeasurement/uom-se
  – Lightweight implementation using Enums:  
    https://github.com/unitsofmeasurement/uom-impl-enum
  – Eclipse UOMo: http://www.eclipse.org/uomo/  
    (subject to CQ for JSR 363)
  – JScience 5: http://www.jscience.org/ (planned)
• The expected schedule to completion of the JSR, with milestones and JSR stages, is:
  – Q2/2016: Final Draft
  – Q3/2016: Final Release
RI and TCK development

• We are developing the JSR collaboratively through http://unitsofmeasurement.github.io
  – Committers: 4 EG Members (desruisseaux, keilw, leomrlima, otaviojava)
  – 20 GitHub and 16 java.net users contribute to wider project (SE port, demos, JSON-, QS integration, etc.)

• The RI is available for public download on https://github.com/unitsofmeasurement/unit-ri
  and on public repositories like JCenter or MavenCentral

• The TCK is available for public download on https://github.com/unitsofmeasurement/unit-tck

• The source-code repository is at https://github.com/unitsofmeasurement
Adopt-a-JSR

• We are participating in the Adopt-a-JSR program
• 4 JUGs / their members have so far joined the EG:
  – Morocco JUG
  – SouJava
  – JUG Chennai
  – JUG Hyderabad
• Especially SouJava / Otavio continues to help a lot also with active contributions to API, RI or the Java SE 8 port.
Mailing lists or forums

• We communicate with the public and they can communicate with us using:

• Public mailing list(s) and/or forum(s)
  – Units-Dev on Google Groups: https://groups.google.com/forum/#!forum/units-dev
  – Units-Users on Google Groups: https://groups.google.com/forum/#!forum/units-users
  – EG only mailing list on java.net, archive fully visible: https://java.net/projects/unitsofmeasurement/lists/experts/archive

• Total number of messages, threads?
  – 107 topics on units-dev, 100+ on units-users
  – The EG list has approx. 50-100 messages per month.
Issue tracker

• Total number of issues?
  177

• How many in each state (open, closed, deferred, etc.?)
  – Open 21 (12%)
  – In Progress 8 (5%)
  – Reopened 1 (1%)
  – Resolved 137 (77%)
  – Closed 10 (6%)

• Some issues are also filed either on GitHub, via Gitter or Mailing lists (especially if participants have no Java.net or JIRA account) and adjusted appropriately
Document archive

- Our document archive, where meeting minutes and materials are published, is at https://java.net/projects/unitsofmeasurement/downloads
- Other materials are available for download:
  - Milestone (e.g. EDR, PR) of the Spec
  - Snapshot release of the Spec with changes since the last milestone
- Most presentations are made available on sites like SlideShare
Questions, discussion, next steps
Thank you!