Progress of the BOINC Working Committee

Kevin Reed
Motivation

- BOINC changed to a community driven model in June of 2015. Since then only 7 contributors averaged more than 1 commit a month
  - This is also true over past 12 months and in the past 1 month
- Builds of the BOINC client have slowed

Builds Per Month of BOINC 7 Client
Motivation

- Projects like World Community Grid and Einstein@Home run older and modified versions of the server code.

- Overall not a sign of a healthy community.
Purpose

• Review best practices of open source projects
• Bring together representatives from different sub-communities within BOINC to discuss the challenges facing the community
• Examine why the current model is not yielding greater participation
• Produce concrete proposals that can be put forward to the community for review and then approved
Who

- David Anderson - BOINC
- Christian Beer - Einstein@Home
- Jord van der Elst - Alpha Tester and Contributor
- Laurence Field - CERN/LHC
- Eric Korpela - Seti@Home
- Richard Haselgrove - Alpha Tester and Contributor
- Tristan Olive - Grid Republic
- Kevin Reed (Committee Chair) - IBM/World Community Grid
- David Wallom - Climateprediction.net
Potential

- In 2013, World Community Grid conducted an extensive volunteer survey. 36% of respondents reported working in the IT field.
- BOINC stats reports over 175,000 volunteers currently actively contributing.
- If only 1 in 1,000 IT workers among the volunteers contributed to BOINC on a regular basis, that would increase the BOINC contributor base from 7 to 70.

- [https://www.worldcommunitygrid.org/about_us/viewNewsArticle.do?articleId=323](https://www.worldcommunitygrid.org/about_us/viewNewsArticle.do?articleId=323)
- [https://boincstats.com/en/stats/-1/project/detail/user](https://boincstats.com/en/stats/-1/project/detail/user)
Activities

- Weekly Meetings since July 11th
- Started with a Discovery Phase
  - Shared articles, lectures, and other sources of open source practices
  - Develop personas to provide different ways of viewing engagement with the project:
    - Discouraged Dan
    - Earl the Enthusiast
    - Ed the Expert
    - Steve the Scientist
    - Victoria the Volunteer
Activities

- Policy Phase
  - After some work we started working on specific policies

- Code Contribution Guidelines
  - Development Workflow Document
    - How to propose a change or report a bug
    - How to contribute code
  - Revisions to Governance Document
    - Clarify how voting works for approving a feature change or pull requests

- Proposal was announced for review by community last Friday
Future Work

- Client Release Process
- Server Release Process
- Define role and voting rights of non-technical contributors in governance document
- Review structure and meetings of PMC
- Review persona's and identify additional areas of work
- Implement automation for builds
- Enable test driven development practices
- Disband committee and continue work through regular committers and PMC discussion processes
Success Metrics

- The work of the committee will have been successful if over the next year:
  - Increase number of engaged committers (more than 1 commit per month)
  - Pick any one committer and have them take a month vacation, work on project should continue fluidly
  - Pull requests are resolved in a timely manner
  - Bug reports from users (project and volunteers) are described well in issues, prioritized and the backlog of open issues starts to shrink
  - Client builds are produced regularly as needed to adopt new features and changing operating system requirements