Fuego Test System
Roadmap and Priorities
Discussion
June 2018

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Outline

• Old roadmap
• What to work on next?
• Projects in progress
  • Tim’s working on...
  • Daniel’s working on...
  • Liu’s working on...
  • Wang’s working on...
• Discussion
Roadmap

Recent past ➔ Near Future ➔ Long Term
Roadmap

Recent past:
- Features for LTS, CIP
  - Hardware control

Near future:
- Documentation
  - Conversion to reStructuredText
  - Tutorials
- Pre-built docker image
- More tests for AGL, LT SI, CIP
- Sharing of customizations
Roadmap (cont.)

• Near future (cont.):
  • **System provisioning support**
    • Install of software under test
      • Has been out-of-scope for Fuego
    • e.g. AGL image deploy, LTSI kernel update, etc.
    • Full automation requires board management API

• **Long-term**
  • Test store
  • Distributed test network
  • Hardware testing
What to work on next?

- Things that slipped from the 1.3 release:
  - Documentation conversion
  - LTS Provisioning support
  - Pre-built docker
- Short-term items
  - Test program build cache
    - FUEGO_NO_BOARD_CONNECT ??
  - More tests
- Long-term items
  - Test server
    - ftc put-board
Projects in progress

- Just a note:
  - This is open source...
  
  **THERE IS NO MASTER PLAN**

- Projects get done when individual developers work on them and contribute patches

- I won’t tell you what to work on
  - Your priorities are your own

- But of course we can have a shared vision...

- If you need ideas, ask me.
Tim’s projects

- Easy customization
  - Expected value customization (research)
    - save baseline, compare with baseline
  - ftc set-criteria (research)
- Dynamic documentation (almost done)
  - Ability to integrate dynamic report into testcase documentation
- Test program binary cache (new)
  - Build deployable tarballs for test program binaries
    - in /fuego-rw/cache/<platform>-<testname>-assets.tgz
  - May help with LAVA integration
Easy test customization

- Customizable system state check
  - Ability to save a snapshot of system status or behavior
  - Example:
    - “I want the system to still have X”
    - “I want the system to continue to be able to do Y”
- Make it very easy to capture state or behavior
- Reduce maintenance of tests
Features in progress (slightly)

- Fuego centralized test server
  - Share ad-hoc test (test package)
  - Request test on someone else’s board
  - Has been on backburner
- Share customizations
- Share results
Daniel’s projects

- dynamic variables
- using ftc from jenkins
- publishing run.json and artifacts to Squad
- argparse
- trinity (fuzzing test)
- useful scripts
Liu’s projects

- Fuego/LAVA integration
Wang’s project

- busybox test suite (from scratch)
Discussion

- (use the wiki page to record information)
- http://fuegotest.org/Fuego_Jamboree_2
Fuego
Other Priorities

- LAVA integration
  - We have everything needed for transport integration
  - Need test-level integration
    - Separate build phase (done)
    - Deploy to LAVA server
    - Create LAVA test that does:
      - Execute test on board
      - Collect results