System Management Working Group – November 22, 2019

Attendees



Old Business

- 1. Geneva Scope Review/Status
 - a. edgex-go-based system management agent/executor (Michael Estrin, Dell)
 - i. Created issues and project board to track Geneva work (<u>https://github.com/orgs/edgexfoundry/projects/29</u>)
 - b. CLI (Alex Courouble, VMware)
 - i. Issues to track Geneva work (<u>https://github.com/edgexfoundry-holding/edgex-</u> cli/issues)
 - c. Open Horizon (Joe Pearson, IBM)
 - i. Creating Geneva use cases
 - ii. Expect to kick off integration efforts week of January 20th
 - iii. (first pass has been done; David Booz to break down use cases into GitHub issues between now and week of January 20th; will need a repository in holding to hold code/issues; Ifty on IBM's side will work with EdgeX devops to figure out the Open Horizon build/test/deploy story; Joe will be on vacation through the end of the year but will be sporadically available via Slack during that time)

New Business

- 1. Moving CLI from edgexfoundry-holding to edgexfoundry
 - a. What is the current state of the CLI interface (e.g. coverage of EdgeX functionality)?
 - i. 0.0.1 in version. Hopes to have 0.1.0 by end of year. To include use of configuration file that has complete URIs.
 - b. What missing features/functionality should be completed prior to conversion?

- i. 0.1.0 end of year targets
 - 1. Better testing
 - 2. Better error handling
 - 3. standardized error messages across CLI
 - 4. Every command/query should have URI in configuration file
- ii. 0.2.0 might be target for Geneva release
- c. What other work needs to be completed prior to conversion?
 - i. See b.i above
 - ii. Support for Windows, MacOS? (Anthony)
 - 1. Will need to be tested (Alex)
 - 2. Need to define priorities and roadmap (Jim White)
- d. Strategy for handling Geneva revisions to core services APIs?
 - i. Routes/URIs configured in configuration file pointed to a command
 - ii. Would leverage go-mod-core-contracts for model definitions
- e. Pros and cons of moving CLI into the project?
 - i. Long-term maintenance intent is to support it forward as long as CLI is useful to the community
 - ii. Is it part of EdgeX or is it a tool to be used with EdgeX? Main repositories are implementation. (Jim White)
 - iii. Is CLI as important as an API alternative? Is CLI equivalent to the UI (which is in the main project)?
 - What about IDE extensions would those be included in the main project as well? (Mike)
- f. Once converted, how do we ensure changes to EdgeX APIs include corresponding changes to the CLI?
 - i. Add new command; trivial new subcommand
 - Add new field to DTO/model go-mod-core-contracts is used so new field would be reflected there and become immediately available; CLI command implementation selectively outputs DTO/model fields (and would need to be updated to support the output of a new field)
- g. A couple of reasons we haven't moved it yet (Jim White)
 - i. Lack of unit test coverage
 - 1. Have tests for what is easily testable.
 - 2. Automated testing for commands is hard; easier to manually test
 - ii. Developer tool
 - 1. Alex believes scope goes beyond EdgeX developers
 - 2. Related; one of the deliverables is to enable CLI to talk through Kong to the rest of EdgeX (i.e. for use by external user)
- Potential use of CLI as testing tool/usage as testing tool may facilitate testing of CLI (Michael/Alex)
- i. Backwards-compatibility
 - i. Would mirror larger system
 - ii. Would need version alignment with larger system; maybe keep major versions aligned as indication of compatibility

- j. Community Input
 - i. Should CLI be moved to main org?
 - 1. Yes (Alex)
 - Mixed feelings; CLI would need to match version/API if CLI is broken or doesn't adhere to system contracts, would that stop a release? Sees CLI as power-user tool. (Anthony)
 - a. Alex doesn't think a release should be held if CLI is broken or not supporting the release's API/contracts
 - b. CLI shouldn't be in main project if it's not aligned with the version of the system components it queries. (Anthony)
 - c. Clarification how is UI versioned by release? It is.
 - d. Would lack of support of a releases functionality or breakage stop a release? (open question).
 - 3. Mike has no strong feelings. Would lean towards moving it into main org.
 - 4. Jim echoed what Mike said.
 - ii. What is the gate for going to the TSC with a recommendation to include CLI as part of the main project?
 - 1. Alex wants to get the 0.1.0 changes before we do this; expects to have this done by the end of this year.
 - 2. Alex for the next system management working group call, a list of...
 - a. What should be done prior to requesting CLI be moved into main project?; and
 - b. What will be done for Geneva release?
- 2. Other new business?
 - a. No meeting next week (US Thanksgiving holiday)
 - b. Easy way to interact with system management agent other than REST?
 - i. Client in system management agent in go-mod-core-contracts?
 - ii. Currently uses general client (<u>https://github.com/edgexfoundry/go-mod-core-</u> contracts/tree/master/clients)
 - iii. Michael Estrin to create an issue to refactor and make it so.