

Minutes of HSF Startup Team with Intensity Frontier Community (1/8/2015)

People attending:

R. Kutschke (mu2e), D. Elvira (HSF Startup Team, FNAL simulation management), E. Snider (LArSoft), Ph. Canal (Root, Geant), A. Lyon (FNAL management, g-2), J. Paley (NOvA, ELBNF), J. Kowalkowski (art framework), K. Genser (Mu2e, Geant4), G. Perdue (MINERvA, GENIE), M. Potekhin (ELBNF), Bret Viren (HSF Startup Team, ELBNF), A. Valassi (HSF Startup Team), P. Mato (HSF Startup Team, ROOT management), M. Jouvin (HSF Startup Team,), T. Wenaus (HSF Startup Team), C. Tull (HSF Startup Team, Daya Bay), S. Patton (Daya Bay), A. Norman (NOvA), T. Junk (ELBNF), L. Sexton-Kennedy (HSF Startup Team, ELBNF), M. Paterno (art), C. McGrew (T2K, ELBNF).

Presentation:

- T. Wenaus gave an introductory presentation on behalf of the HSF Startup Team.
<https://indico.fnal.gov/conferenceDisplay.py?confId=9233>

- See SLAC Workshop agenda skeleton at:
<https://indico.cern.ch/event/357737/other-view?view=standard>

Questions, comments, input:

- R. Kutschke: SLAC Workshop is splitting into small groups or is it all plenary presentations?
- T. Wenaus: Plenaries.
- L. Sexton-Kennedy: Everybody invited to submit abstracts, give a short talk. Other foundations (i.e. Apache) will tell us how they started.
- D. Elvira: Thursday is available for informal small group meetings.
- R. Kutschke: Mu2e wants to use Hypernews or equivalent, forbidden at FNAL for security reasons. Mu2e wants recommendations for discussion forum tools. FNAL wants a (commercially) supported tool rather than open source.
- C. Tull: Open source and supported is not mutually exclusive.
- R. Kutschke: Happy to see there is discussion on career path, training. He looks at this as a spectrum of things such as onboarding young people, promoting them to intermediate, promoting intermediates to experts.
- A. Lyon: Nice extensive list of services. Is the HSF a collaboration where people can bring resources. Is there a management board?
- Torre: HSF would rely mostly on labs with experts who could contribute to the effort. For example CERN is very open to this.
- P. Mato: It depends on what people agree to do. If the community as a whole agrees on something we should go to the labs and ask for resources. Go to CERN, FNAL, SLAC, DESY, etc. Get small contributions from labs.
- A. Lyon: You could go the other way. People are already doing something that can be expanded.

- D. Elvira: to answer A. Lyon question about a management board, the Startup Team is not discussing governance yet but what the HSF should be and do. Regarding resources, as long as HSF activities are well aligned with the labs programs, there is a good chance they would contribute resources to HSF (i.e. Fermilab).
- L. Sexton-Kennedy: Funding agency people are invited to the SLAC workshop (i.e. Lali Chaterjee from US DOE). We want her to buy into this. Convince funding agencies that HSF has value.
- T. Junk: There will be people making small contributions and others making bigger contributions of tools that need support. These two types of contributions need a different degree of commitment. Should the HSF be responsible for supporting for example new technology?
- L. Sexton-Kennedy: HSF can be the umbrella forum for projects to offer support of their tools.
- T. Junk: Would funding agencies give money for people to do support?
- R. Kutschke: When small projects grow into something more real we can request support from the labs. Many leading tools had a "pirate" beginning (ROOT). The HSF can identify them and provide support if authors do not have the resources.
- G. Perdue: Is HSF promising access to resources on many platforms and architectures? This is very ambitious.
- P. Mato: An example is that we need to evolve our software to new architectures (many cores, GPUs, coprocessors) and instead of groups buying their own hardware the foundation can provide them with access to for example ARM servers, clusters of GPUs, where they can run performance tests, do R&D.
- L. Sexton-Kennedy: We can see this as opportunistic use of computing platforms you would not typically have.
- G. Purdue: Will the foundation be buying machines?
- L. Sexton-Kennedy: initially it could take advantage of resources made available by members.
- R. Kutschke: If a startup experiment needs an event display, is the CERN techlab the place to go?
- P. Mato: The techlab is really about hardware, if you want to do ARM development for example. For use of event displays we could organize training.
- R. Kutschke: Many different event displays developed by junior people hit a wall. We need somebody who sees over the wall and use new technology.
- D. Elvira: I imagine the HSF as a place where projects related to visualization collaborate with each other. We can offer advice, expertise, and training.
- P. Mato: Scale plays a role here. The bigger the community, the more efficiently a group of event display expert could provide advice. There would always be a new experiment requiring this.
- T. Wenaus: concurs. It is easier to justify funding a position that serves the entire community than one lab. May be Lali (US DOE) would like this.
- B. Viren: In Daya Bay they benefit taking software from CERN and MINOS. Better than reinvent things by themselves. It could have been easier. HSF can provide a conduit for the sharing and generate a network effect, the more people, the better and more useful.

- C. Mc Grew: Similar experience with T2K and CAPTAIN. This really helped to get experiments off the ground. For example if best practices are shared around the community.

What would be the next steps for the HSF?

- R. Kutschke: Keep the long term in mind but go for the low hanging fruit initially.
- G. Purdue: There is a large range of activities, a wide scale in resources and ambition. Some are reachable others would need steady commitment. Sort them by cost.
- M. Jouvin: We have to be pragmatic. We cannot build things that are manpower intensive. Have a vision but define first steps compatible with existing resources; build on success to define more ambitious goals; go to funding agencies and ask for resources to do bigger things.

Wrap-up:

The HSF is in the formation stage. People are encouraged to look at hepsoftwarefoundation.org, participate in the SLAC workshop in person or remotely (fill out the doodle poll), there is also a questionnaire that gives you the opportunity to say individually what you think. The HSF is a grassroots initiative, open, contributions are appreciated. The threshold to get involved is low.

Doodle poll for remote participation:

<http://doodle.com/xhqpfykhgynkrp8b>

Quick survey (short) for input from individuals:

<https://docs.google.com/forms/d/1yMc11rCP8NIK7Kl30jU37RjrufiDqqe2gHTwOrdLwHQ/viewform>