

Agenda for FIPE side meeting at IETF 111

<https://trac.ietf.org/trac/ietf/meeting/wiki/111sidemeetings>

Tuesday, 9am - 10:30am

<https://fipe-580.my.webex.com/fipe-580.my/j.php?MTID=m5144cfc5522e1554c262e2aa1ba13aab>

- Introduction: fipe@googlegroups.com
- Agenda bashing
- This is not an official IETF WG meeting, but please Note Well: <https://www.ietf.org/about/note-well/>
- Recordings: <https://registration.ietf.org/111/>
 - Links will be made available after the meeting

- "Layer Independent Security Services" (Robert Moskowitz) (10 minutes)

Secure Communication needs to be uniformly available at all communication layers. Key Management is layer-independent as a consistent service with well defined APIs with appropriate security boundaries. A uniform security communications wrapper with specific use profiling is also provided.

- Questions

- Mesh Callsign Service (Phillip Hallam-Baker) (10 minutes)

The Mathematical Mesh began as an attempt to make PKI easy to use and ended up redesigning public and private key infrastructure from the ground up applying threshold cryptography and notarized append only logs (blockchain) as the building blocks. Lessons learned that may have broader implications include:

- Internet hosts and Internet Services should be separately credentialed.
- Internet devices and Internet Users should be separately credentialed.
- Least privilege demands that incoming messages be access controlled
- The DNS is not a naming infrastructure for individual users
- Accounts should belong to users, not service providers.

The Mesh Callsign registry emerged from an attempt to allow Mesh users to change service providers without switching costs. It was then realized that the same infrastructure could support a naming infrastructure for users and a key infrastructure that does not require trusted third parties.

- Questions

- Hexa-X (Hannu Flinck) (10 minutes)

6G is projected to impose new network layer requirements. This presentation will outline the Hexa-X project and summarize network layer gaps and requirements, including the AI/ML components.

- Questions

- Network programmability - (r)evolution of IP (Stefano Salsano) (10 minutes)

Presentation centering around IPv6 possibilities if given more freedom in header processing.
Contract-based network layer.

- Questions

- General Discussion
- Next Steps