

MERCoNe

Multiaccess Experimentation in Real Converging Networks

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Multiaccess Experimentation in Real Converging Networks (MERCone)

- Raimo Vuopionperä, Mervi Ranta, Jouni Korhonen, Andrei Gurtov, etc.
- Focus: Testing (of HIP) in live networks, participation to standardization, transport protocols, performance evaluation. Semi-continuation of VHO project.
- GIGA Tekes call
- Partners: Ericsson NL, TSF, HIIT, TKK, UH, ...
- Duration: 2 years
- Tentative budget of HIIT: 200 000 €/year

Tentative WPs

1. Mobility in heterogeneous environment
2. Transport
3. AAA and policies for handovers & roaming
4. Triggering support for mobility & transport
5. Experimentation and demonstration
6. Novel applications & services in heterogeneous environment



Background on InfraHIP project

- Tekes funded with Nokia, Ericsson, Elisa, Puolustusvoimat, 2004-2006
- Focus on infrastructure development for Host Identity Protocol
 - NAT, DNS, HIPL, firewall, management GUI
 - Application migration, DHT, i3, PlanetLab
- Standardization in IETF
 - Leading IRTF research group on HIP
- Close cooperation with ICSI/Berkeley
 - Joint seminars, visits during summer 2005

Possible areas for MERCONE

- Live experimentation and standardization of HIP
- Gain HIP deployment experience
 - Cooperate with CERNET/China on installing HIP on many hosts
 - User-mode implementations for Linux/Windows available
- Porting HIP to mobile platform (Symbian) e.g. using Python
 - Small-scale trial deployment as a proof-of-concept
- Measurements of DHT and overlay (i3) performance in wireless scenarios
- Driving IPv6 deployment in Finland

InfraHIP2 vs. MERCONE

- InfraHIP2, planned for 2007-2009
- MERCONE cannot be a replacement to InfraHIP2 due to a smaller number of researchers supported in HIIT
- Make a clear distinction?
 - MERCONE will concentrate on live experimentation with HIP in heterogeneous networks
 - InfraHIP2 will continue development of HIP advanced features and research concepts based on HIP (e.g. peer-to-peer trust)