Šarūnas Girdzijauskas, KTH

Seif Haridi, KTH

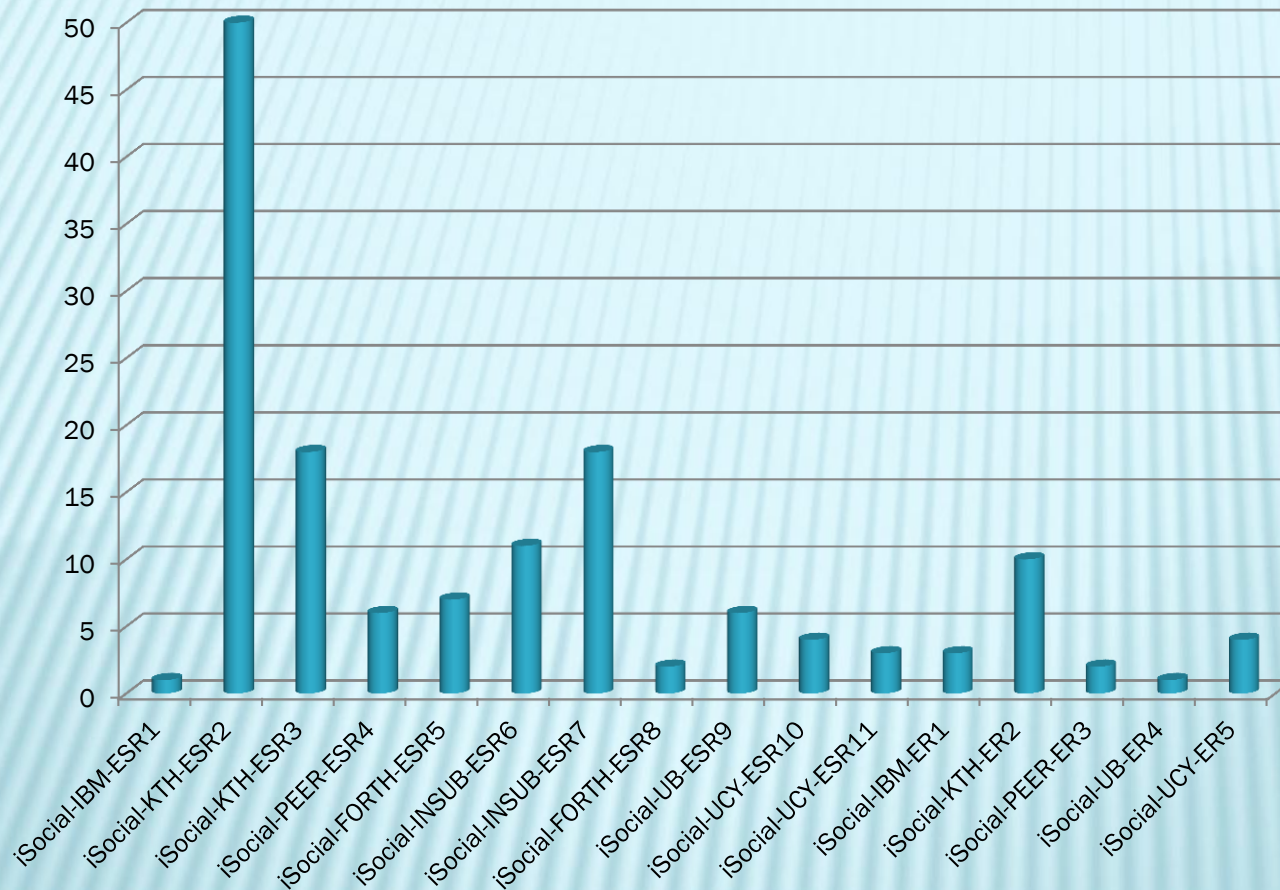# Marie Curie "iSocial" ITN meeting
Jan 2013, Barcelona

Latest News

- The GA & CA are signed
- The money (prefinancing for 2 years) arrived
  - The next batch only after the mid-term review
- iSocial positions were announced
  - We got ~150 applications (for KTH 19% females)
  - Too few for UB and IBM (extended the deadline)
  - 1 female fellow per partner!

iSocial

Applications

|	
iSocial-IBM-ESR1	1
iSocial-KTH-ESR2	50
iSocial-KTH-ESR3	18
iSocial-PEER-ESR4	6
iSocial-FORTH-ESR5	7
iSocial-INSUB-ESR6	11
iSocial-INSUB-ESR7	18
iSocial-FORTH-ESR8	2
iSocial-UB-ESR9	6
iSocial-UCY-ESR10	4
iSocial-UCY-ESR11	3
iSocial-IBM-ER1	3
iSocial-KTH-ER2	10
iSocial-PEER-ER3	2
iSocial-UB-ER4	1
iSocial-UCY-ER5	4

- Within KTH ESR applications 19% women

iSocial

The Goals of this Meeting

- **Research Roadmap for iSocial**
  - Architecture of decentralized online social networks
  - Establish Collaboration between the partners
    - Exchange of the fellows among the partners.
  - Base on our previous FET Open Submission?
- **Promised deliverables**
  - Workshop in Crete
    - Planned M6 (no problem with PO to postpone)
    - Collocate with EMDC?
  - D4a: Detailed Work Plan (M6)
  - D4b: Detailed Outreach Plan (M6)
- **iSocial webpage**
  - Marian suggested to hire a professional company

iSocial

Training Events

	Training events, workshops & conferences	Lead Organising Institution	Planned date/duration	Planned venue
1	Workshop on "Content Distribution for OSNs"	FORTH	M6 /(1 day)	Heraklion
2	Online course on "Distributed Systems"	KTH	M7-M12	---
3	Summer School on "Distributed Technologies for Social Networks"	KTH	M12/(3 days)	Stockholm
4	Online course on "Internet Infrastructures for OSNs"	UCY	M12-17	---
5	Online course on "Data and Network security"	INSUB	M13-M18	---
6	Online course on "Privacy-aware data management"	INSUB	M19-M24	---
7	Workshop on "Simulation and Modelling of OSN Infrastructures"	UCY	M24/(1 day)	Nicosia
8	Online course on "Distributed Computing, Peer-to-Peer and GRIDS"	KTH	M25-M30	---
9	Workshop on "Complex Systems"	UB	M32/(1 day)	Barcelona
10	Online course on "Complex Networks"	UB	M31-M36	---
11	Summer School on "Security and Privacy in Social Networks"	INSUB	M36/(3 days)	Como
12	Online course on "Advanced Topics in Distributed Systems"	KTH	M37-M42	---
13	Conference on "iSocial: Decentralized Social Networks"	FORTH	M46/(2 days)	Heraklion

iSocial

iSocial (old) Architecture and WP structure
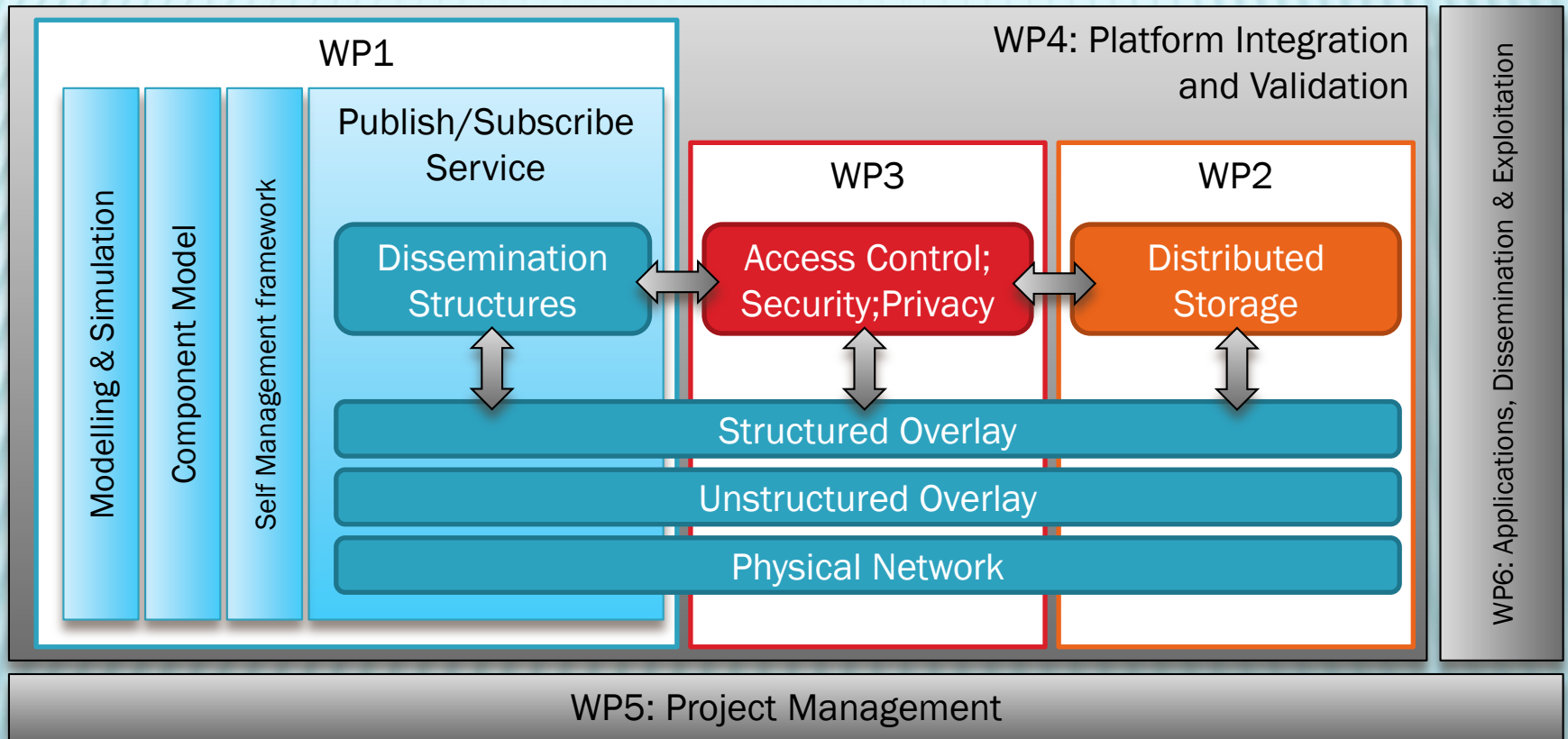
- Problem statement/state of the art
  - Privacy
 - Censorship resilience
- Flat architecture
  - P2P, push
- WP1

iSocial

iSocial Workpackages/Research Topics

1. **WP1 (ALL)**
   1. Architecture design
   2. Unified framework
2. **WP2 (KTH, IBM,UB, PEER , FORTH)**
   1. Overlay Infrastructure for Decentralized Online Social Networking Services
      1. Self-management
      2. Networking (NATs, firewalls...)
      3. Mobile devices
3. **WP3 (UCY, PEER, INSUB)**
   1. Data Management/ Dissemination
   2. Caching
4. **WP4 (INSUB, FORTH, KTH)**
   1. Security, Privacy and Trust
5. **WP5 (UB, UCY)**
   1. Social Network Modeling
6. **WP6 (UCY,FORTH, KTH, INSUB)**
   1. Social (privacy preserving) data mining and analysis
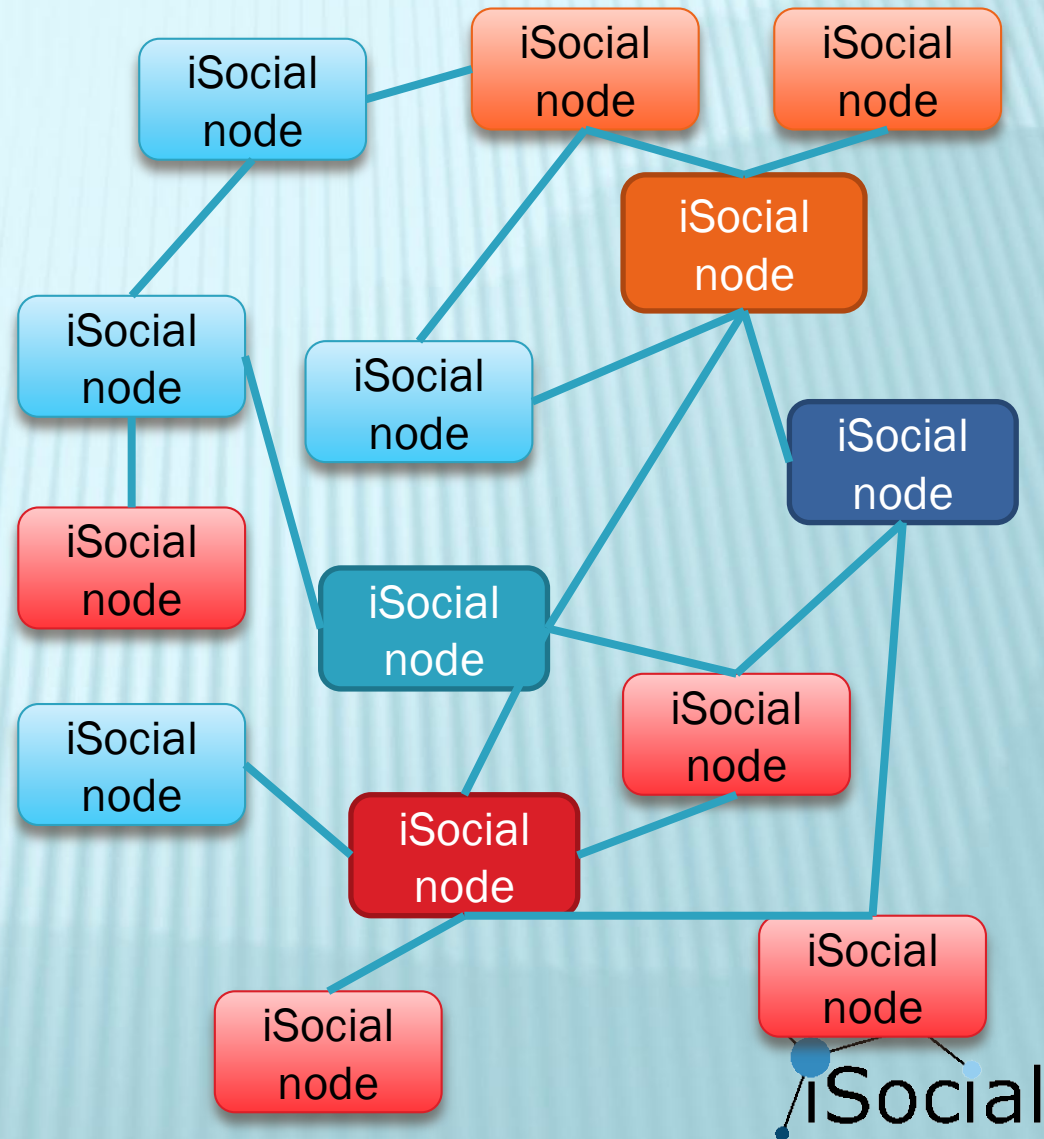
iSocial

1st Concept: Mail-Server style

- A node in the system can have any of the two roles:
  - iSocial users
  - iSocial servers
- The system consists of a network of iSocial servers (super-peers)
  - Similar concept to "Mail Server"
  - iSocial users connect to their iSocial servers
- Any peer willing to contribute resources can become iSocial server
- iSocial servers are only in control of the data in their domain
- No encryption needed, because all the data is stored localy
- Problem: data availability
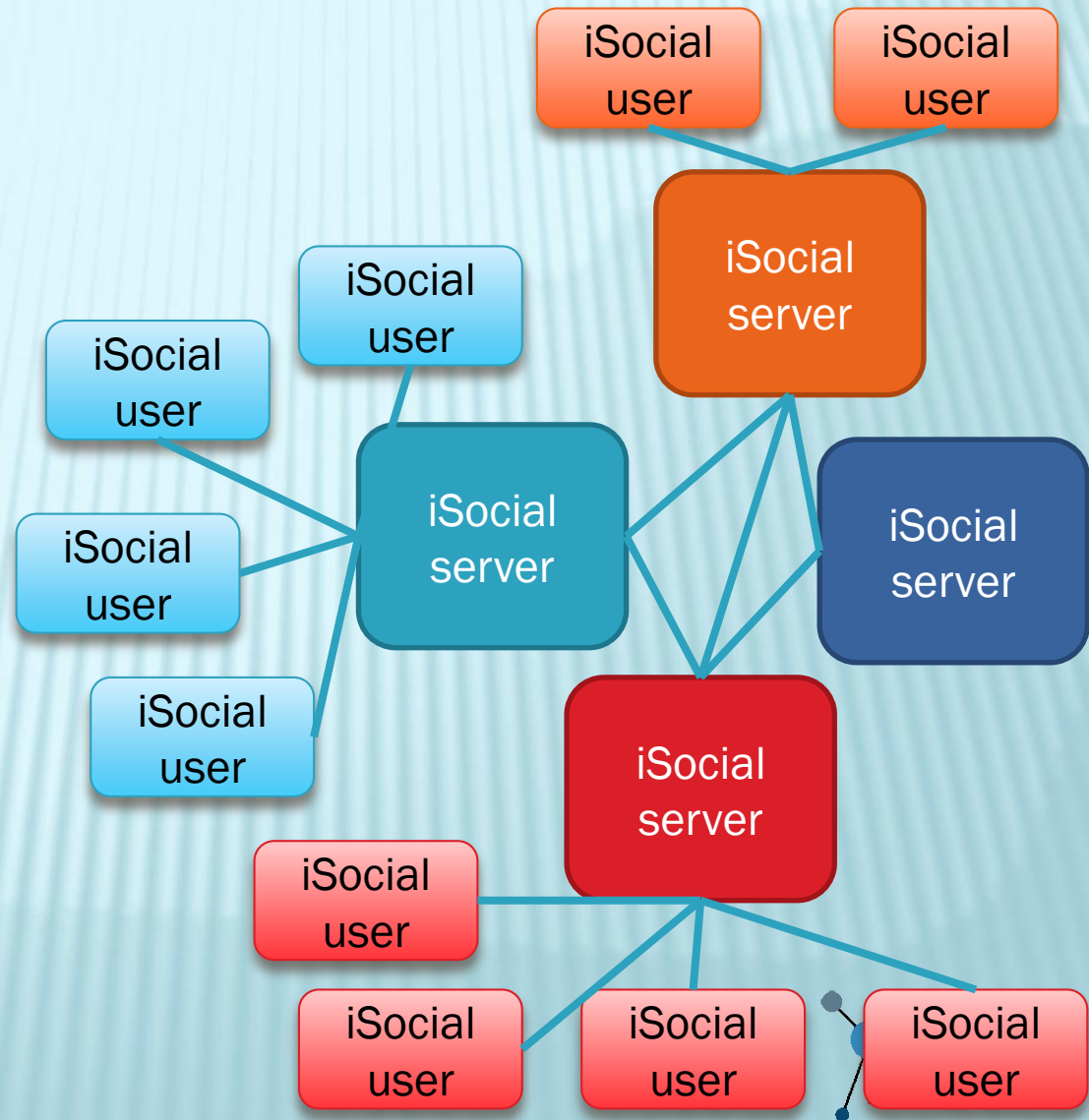
2nd Concept: Flat

- Completely decentralized, all nodes are treated equally
  - E.g., **Smart phones, 24/7 online**.
- The system is based on a large decentralized Publish/subscribe paradigm
  - Users subscribe to certain resources/events (photos, tweets etc)
  - Users are notified in a decentralized fashion whenever appropriate event occurs
- Privacy assured by encryption
- Data is stored in a distributed fashion all over the network
- Availability is assured by replication

3rd Concept: Hybrid

- Similar to 1st Concept but **iSocial servers** are arranged in a flat (2nd) concept
- Distributed storage with security and privacy handling is implemented among iSocial servers
  - iSocial servers are **NOT** only in control of the data in their domain
  - Data is stored **NOT** only locally
  - Encryption is needed
- Higher data availability (in contrast to 1st and 2nd Concepts)
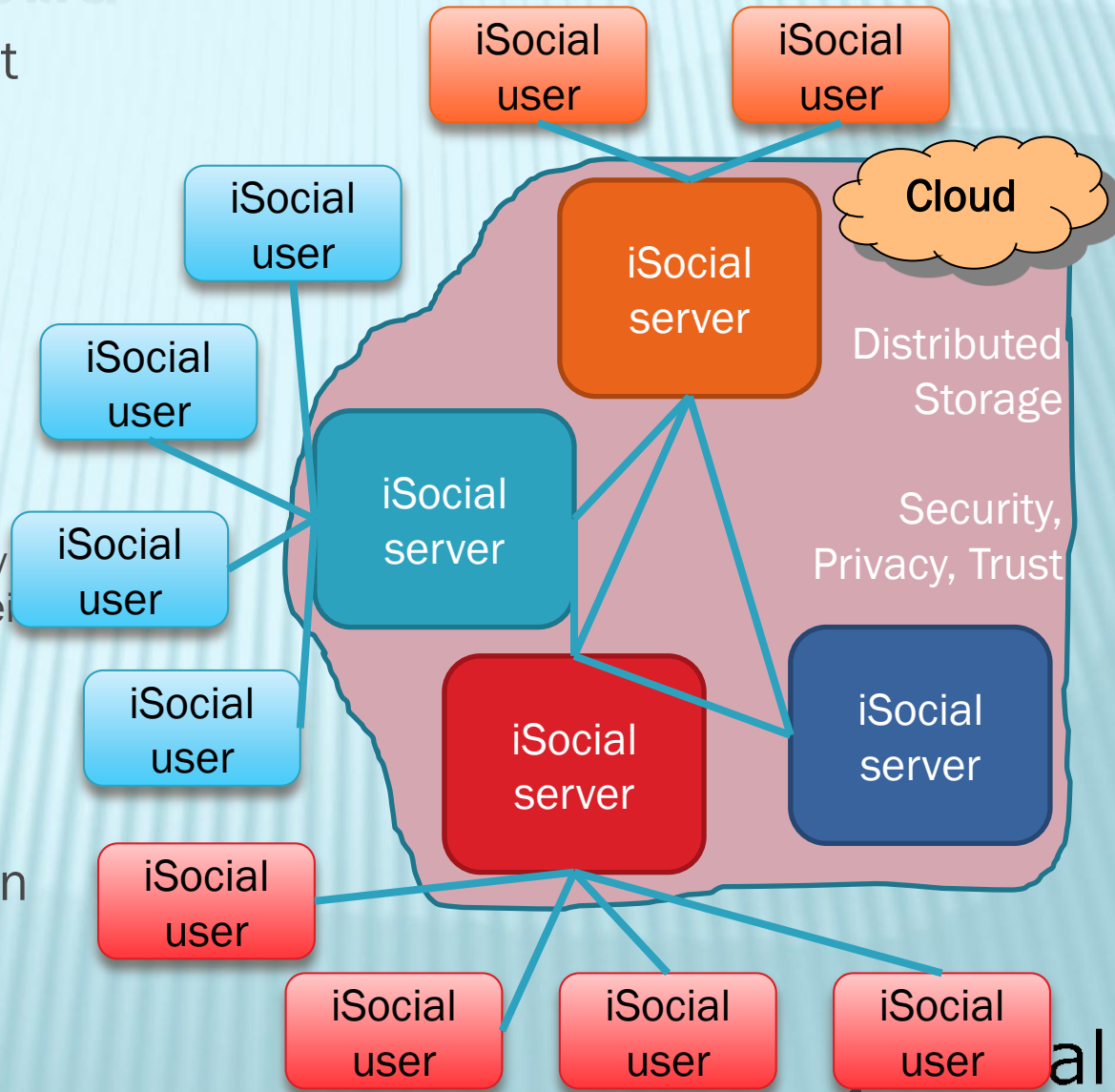
- Ask all the partners to send their financial people emails
- Notification to the selected fellows with a (one week) deadline
- Workshop in Barcelona together With complex systems conf.
  - Deadline Feb 18
  - Need an exact date to invite Ricardo
  - "Social network analysis" for a digital world
- Visit to EMDC-JD on May, next year joint organization of the event
- Preselect female applicants form kth list by Tuesday
- Notification to the fellows by the end of Feb.
- Architecture discussion by Sept?
- FORTH logo of the
- 500eur/hour course