



# THEO – A Multi-dimension Analysis on the Use of New Communication/Social Media in Crisis Situations

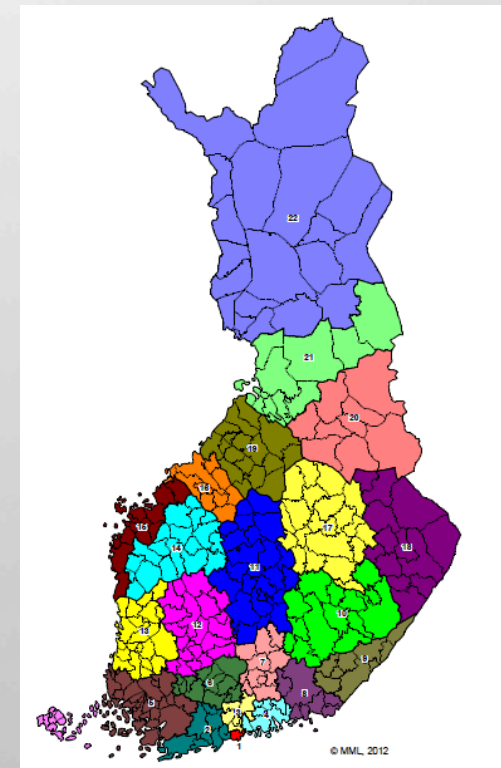


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- Social media in crisis situations
- Social media in Finnish rescue services
- The iSAR+ approach
  - Introducing the project
  - THEO multidimensional analysis
  - THEO challenges
  - iSAR+ methodology
- Conclusion

- Recent examples of the same trend
    - 2004 Indian ocean tsunami, 2010 Haïti earthquake, 2011 Japan tsunami, 2012 Sandy hurricane...
  - Increased usage of social media
    - Dedicated blogs
    - Facebook, Twitter
  - Increased usage of mobile devices
    - Citizen journalism (photos, geo-tagged information)
    - Dedicated mobile applications (UN, FEMA, Red Cross...)
- ⇒ Deployment of disaster management platforms  
Sahana, Ushahidi, Google Crisis Response...

- A recent move towards social media in crises
  - Fire Officers' Union launched “Rescue Services in Social Media” in 2011
- 16 out of 22 Regional Rescue Departments own a Facebook page
  - Publication of warnings, communication with citizens
- Centralized Youtube channel, Facebook and Twitter accounts
  - The audience is still very low (4800 likes compared to the 193 500 likes for the Finnish Police Forces page)



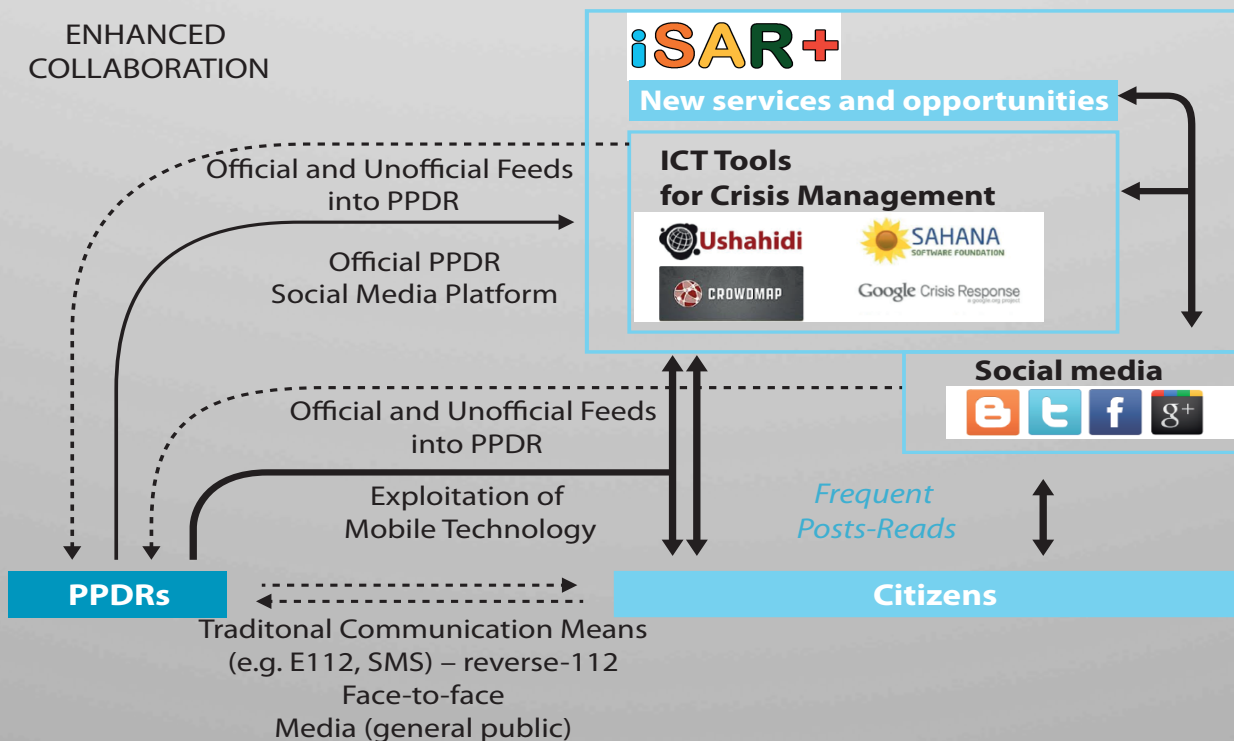
**Figure 1** - Regional Rescue Service Departments (Reference: [http://www.pelastustoimi.fi/download/41747\\_Pelastuslaitokset\\_2013\\_vari.pdf](http://www.pelastustoimi.fi/download/41747_Pelastuslaitokset_2013_vari.pdf))

# **THE ISAR+ APPROACH**

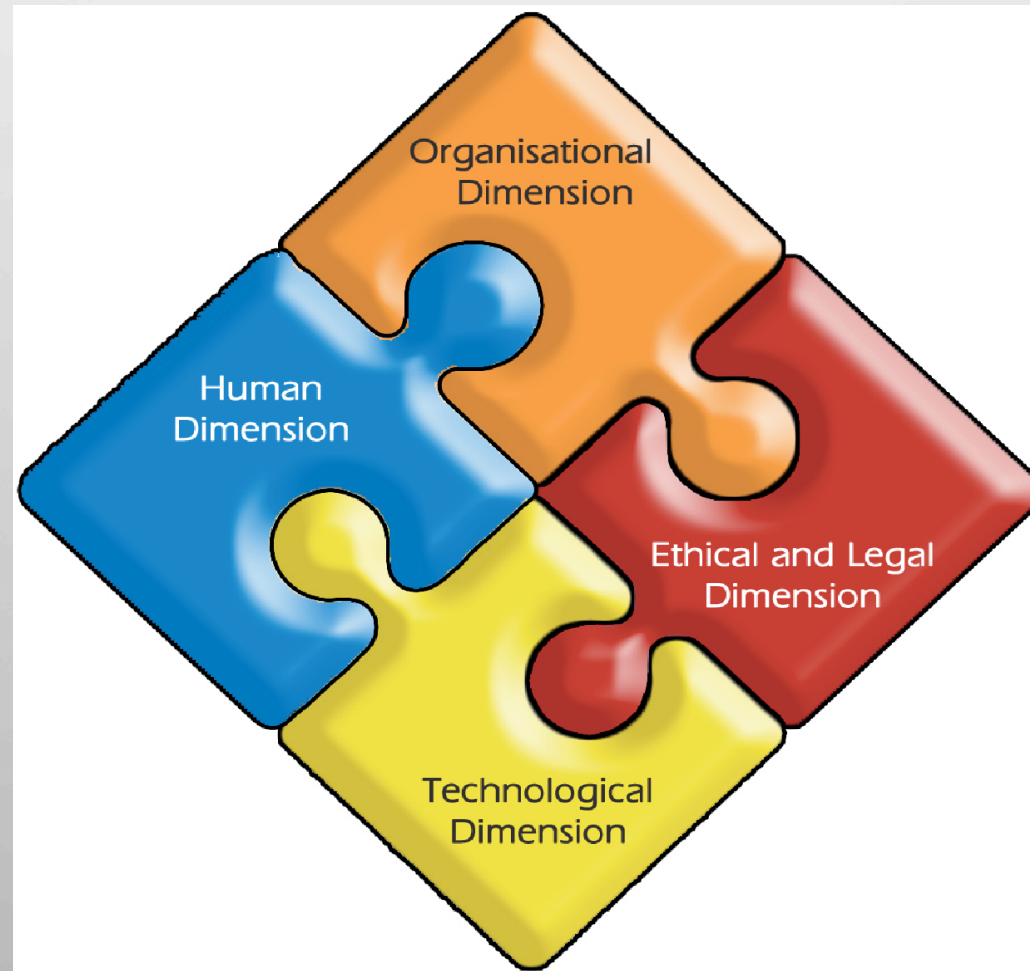
# The iSAR+ project



- Online and Mobile Communications for Crisis Response and Search and Rescue
- Co-funded by the EU FP7, with 16 partners
- Started the 01/01/2013 for 30 months



# THEO multidimensional analysis





## Technological

- Technologies & equipment in use vary between the actors
- Leap from traditional to new equipment and technologies
- Architectural design should be open to allow integration of future technologies

## Human

- Organizational hierarchy regulates communication
- Compatibility of new media to the current systems and preferred methods
- Acceptance of the use of new media at the individual level ; usability and perceived usefulness of social media in SAR
- Changes in communicational behavior - moving away from bureaucratic language

## Ethical and legal

- Information may be partially restricted/ classified to certain audiences
- Information might include sensitive aspects about an individual / location / objects (e.g. pictures from accident scenes)
- Ensure information security and privacy
- Define the boundaries between information needs of the citizens and authorities: what is needed and where - what can be published
- Liability of the content
- Forgetting civilians' duty to assist over publishing interest

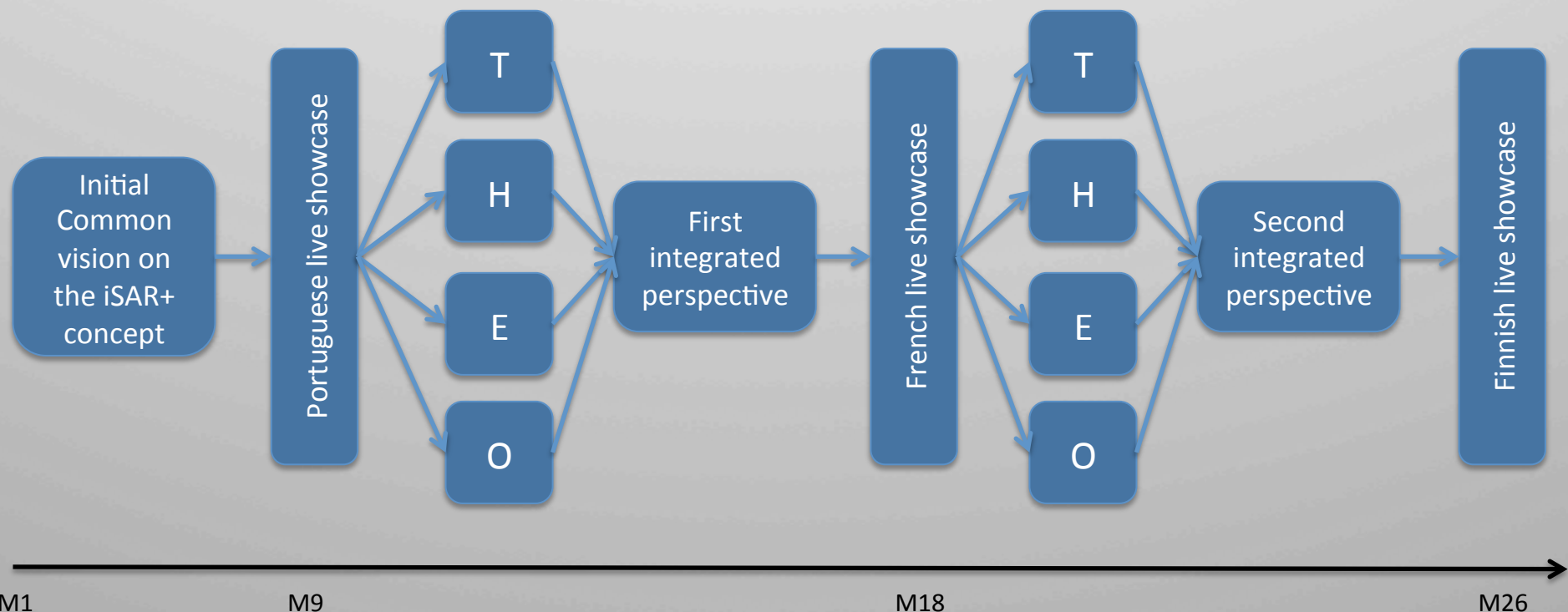
## Organizational

- Acceptance of the use of new media at the organizational level; attitudes towards and understanding of new media
- Resources to use, be present and interactive in new media (from individual and organizational point of view)
- Procurement policies: who buys / maintains / pays / owns the services & contents
- "Specialty" or uniqueness of the social media services developed by individual rescue departments
- Authority / authority-like organization (rescue services vs. voluntary fire brigade)



# The iSAR+ methodology

- Iterative development of the THEO guidelines & the platform
- Live showcases with end-users to collect feedback



- Accomplished work
  - Requirement collection (end-users & citizens)
  - Definition of the common vision on the iSAR+ concept
  - Live CPX simulation with Portuguese end users, using a prototype version of the platform
    - Collection of end-user feedback to adjust the iSAR+ concept
- Building a transnational community of interest around iSAR+
- Upcoming tasks
  - First iteration of the developments along the 4 dimensions
  - Development of the integrated perspective
  - Preparation of the French showcase (mid 2014)