

## **A Telecom Italia view on the future of Social networking**

Social Networks are growing unexpectedly and going far behind a “list of friends” concept. Users want to express their identity and share information in restricted virtual communities; Social Networks are perceived as a kind of “private”, human sized profiles of the Web.

My phone address book is indeed a logical Social Network. I’m not just carrying a phone with me, I’m carrying the possibility of being in touch with people I need. Connecting people has always been the primary objective of Telco Operators and that is also why Telecom Italia is looking with interest at this phenomenon.

Social Networks might drive the evolution of the Internet from a “flat” Web model towards a number of interconnected “social oriented” Webs. The “way of communicating” evolves from point-to-point message exchange between isolated end users to group-oriented activities. In order to follow an organic evolution Social Networks need to be tightly coupled with the underlying real ones, which for the time being are mapped by traditional Telecommunication Networks.

Social Networks role cannot be limited to a fancy medium to keep us in touch with influential fellows in our life; the underlying social graphs could in fact represent outstanding innovation drivers in terms of communication, business and environment sustainability.

Telecom Italia believes that for assuring Social Networks flexibility and interoperability the following risks have to be managed through a standardization mission in which W3C should take part.

### Identity fragmentation

It is an oxymoron to stress that user’s identity is unique by definition. A user shouldn’t be obliged to apply to other social networks for connecting to real friends belonging to those “Walled Gardens”. To some extent a similar issue has been solved within the Telecommunication domain with the introduction of the number portability. A Telco user is effectively assigned with a unique identifier (phone number) which identifies him uniquely and by which he can be reached on any network (roaming) at any point in time. Like in real communities, identity certainty is also a critical baseline for keeping the community safe.

W3C Standardization opportunities:

Will W3C fully endorse OPENID for addressing the identity issue?

### Profile fragmentation

Social Networks capture real-life relationships where people use to keep different profiles for different situations, although they are definitely identified as unique: user’s profile is property of a user and not of an application.

W3C standardization opportunities:

Profiles might be distributed and standard mechanisms for integrated views would be strongly advisable; e.g. a minimal interoperable (RDF) vocabulary for enabling a syntactical and semantic interoperability among the various Social Networking platforms and initiative (e.g. a specialization of FOAF for Social Networks interoperability like SIOC).

Furthermore a specialized URI scheme for retrieving information of people belonging to the same Social Network from different SN implementations would be advisable too.

## Authorization and Privacy

As in real-life relationships, besides keeping different profiles for different situations, people engage social relationships with different levels of confidentiality. For a Social Network reliable modeling of a real community it is required to define different confidentiality levels of information and mechanisms for granting a secure and differentiated access. Users must be in control of what they disclose to others or to applications and should be able to define disclosure rules (e.g. “first”, “second” social ring).

W3C Standardization opportunities:

Propose or refer to a general purpose IdM framework (e.g. Liberty Alliance).

Endorse open protocols like OAuth.

Envisage a policy-based authorization mechanism for querying profile repositories (e.g. Profile Query Language).

Envisage a standard for opt in.

## Usability and runtime experience

Being connected to and interact with a Social Network via mobile phones produces usability requirements in terms of user interfaces (multiple information displayed on small screens). Moreover to improve the Social Network experience at run time a Telco could also add contextual information such as location and context (e.g. who’s meeting whom and where) by analyzing information collected from mobile devices. Improving Social Networks real time experience would require a more fine grained definition of the set of dynamic information which describes a current user or group of users’ status.

W3C Standardization opportunities:

Best practices of Social Network mobile user interfaces.

Delivery context Ontology should be extended modeling also a broader definition of context (e.g. user activity, situation).

## Social Networks and monetization: just an example

In commerce, vendors of immaterial goods (whose value is strongly related to users’ perception thus related to subjective experiences e.g. travel, leisure and assurance) spend a lot of money and efforts for reaching end users with ads for creating this value and those costs are then overturned on buyers themselves. This effect is partially mitigated by the so called “word-of-mouth marketing” whose effect is tremendously powerful but difficult to measure and control and not relevant in terms of the microeconomics global figures. On the internet, Blogs and Recommender Systems (which exploit collaborative filtering) are used as a surrogate of that. A social Network could enable a digital “word-of-mouth marketing” mechanism within the closer social relationships which would amplify its effects and produce significant aggregate results.