Smart City and Smart Citizen: Two peas in a pod!

"Ghent is the smartest city" headlined the Flemish newspaper *De Standaard* on January 31, 2013. Having analyzed the new local government policy agreements of 15 Flemish cities to assess their 'smart city' content, Agoria, the federation for the Flemish technology industry, had ranked the City of Ghent first.

"**Smart**", what does that mean?
The term "smart" does not translate easily into Dutch. Even though the most common translation, also used by the City of Ghent, is "*slim*", we prefer to use the English terms "smart", "smart city" and "smart citizen". Moreover, the concept of smart city is multidimensional to say the least and cannot be simply summarized under a single definition.

What exactly is a smart city?
A city can be described as "smart" when investments in human and social capital and in traditional and more innovative communication support its sustainable development. Natural resources are being used in a sustainable way and a local participatory policy is in place. A smart city should be a good place to live, with the best possible quality of life and the most efficient use of resources.

But a smart city is more
A smart city reconnects people with their environment and city to create more efficient and optimal relationships between available resources, technology, communities, services and events in the urban fabric. The reconnection of people also means that citizens once again become (partly) responsible for their environment.

Participation is important
Smart cities need to have smart citizens to be fully inclusive, innovative and sustainable. This evolution clearly requires a holistic approach. Today, in a European context, energy efficiency aspects and challenges of urban mobility seem to be the main focus. However, it is crucial to address other aspects as well, such as social innovation, connecting and empowering (potential) smart citizens and setting up parallel paths to motivate citizens and enable them to help build the city of the future.

These actions ensure that once again, we concentrate our efforts on the citizen, on the people for whom and with whom we work in order to make our cities sustainable, inclusive and open societies. And, last but not least, we focus on the opportunities and challenges of the knowledge and information society in which we live as citizens and have to position ourselves as cities.

The city cannot do it on its own
We start from the organic makeability of urban society, where we, as a local government, make policy with a clear ambition. A smart city realizes that "policy" alone is not enough to reach all ambitions. A smart city looks for support among its citizens and local stakeholders in order to achieve its goals. They are called to jointly take responsibility and to engage in the process. Building social capital is essential to ensure that smart citizens acquire the capabilities and skills to meet the challenges of the future. Only then does a city become "future fit".

Finding a balance through technology
Technology, and more specifically innovative ICT applications, always takes a prominent place in the existing literature and in (international) examples of smart cities. Ghent is committed to monitoring the balance between a technological and non-technological approach and to see how both types of solutions affect each other (e.g. complementarity between online and offline services).

What's so smart about Ghent?
Ghent strongly focuses on its smart citizens. The city council enables a large number of initiatives by participating as a stakeholder. This can be done by providing financial support, but also by recognizing the potential for smart city ideas that is already prevalent among the citizens themselves. Local initiatives are identified and facilitated by the city council, by tapping into the existing (creative, socio-economic, ecological, etc.) potential, and helping it flourish. The city council actively invests in its citizens to enable them to become smart citizens.

The 2013-2018 local government's policy agreement displays a strong focus on energy-efficient

interventions in the urban fabric, renewable energy sources and sustainable mobility, but it also stresses the need for e-services and open data policy. There is a strong interaction between policies and urban society in many domains.

Urban Participation
This refers to the cooperation between the various stakeholders (residents, organizations, municipality, etc.) in the city when carrying out their joint tasks and duties. This can happen through formal participation channels (district debates, advisory boards, etc.) but it might also take a more active and often more indirect form, such as pop-up concepts for vacant buildings, participatory urban development schemes and allocation of budgets for specific districts.

Climate Alliance
Ghent wants its citizens to participate in the pursuit of climate neutrality. The citizens are partners within the covenant and may suggest various climate-friendly actions themselves. Anyone can contribute in these activities. This has already spurred a number of great initiatives. For example, some 100 citizens joined forces in a cooperative organization that deals with wind energy: "EnerGent". This initiative seeks to produce local, clean and affordable energy and thus ensure independence from larger power producers.

Involvement and social cohesion
This dimension, too, is promoted in Ghent from a smart citizen's perspective. From February 23 to March 23, 2013, two Ghent neighborhoods played the city game called "ZWERM" (i.e. flock of birds in English). The elements of the game were the result of an online survey in which we asked our citizens to share their ideas on how to use ICT to make Ghent an even more pleasant place to live or work in. An initiative run by the City of Ghent, ZWERM uses a mobilization system to reach the goal of consolidating and activating social capital. The idea is that, by interacting with ZWERM, individual residents will get to know each other and undertake actions together that will benefit society. It is through these actions that self-organization can be supported.
The ZWERM game took place in two neighborhoods (called 'Papegaai' and 'Ekkergem') in the City of Ghent. The ZWERM concept was developed in collaboration with multiple stakeholders including Ghent personnel and residents. More than 250 people from the selected neighborhoods actively participated in ZWERM. Preliminary survey results show that a great majority of players enjoyed ZWERM. More than 80% of the players stated that ZWERM helped them to get to know the people in their neighborhood better, while more than 75% stated that ZWERM induced a sense of community and improved neighborhood cohesion. (www.zwermgent.be)

ICT innovation and co-creation
"Apps for Gent" is an example of initiatives in this domain. It is a contest (a hackathon) for the creation of apps, websites or concepts that use the open data of the City of Ghent and partners. Not only does it show what is possible with open data, it is also used as a forum to talk about ideas and possible applications. At the same time, it acts as a mini-laboratory, in which the participants discover how life in Ghent can be made easier, more fun and more interesting by using open data.

Commitment to an open and inclusive society
In Ghent we approach the city as a social ecosystem - including as regards the makeability of society - in which all actors have a place, play a role and influence the functioning of that system. (New) connections between citizens, government, research institutions and businesses are forged on the basis of a so-called quadruple helix model.

Ghent Living Lab
The Ghent Living Lab is one of the instruments used in Ghent to connect the different actors within the city. A living lab is an important component of a smart city, as it is a means to capture the collective intelligence and creativity that is present in that city; a tool to help city residents, businesses, (digital) creative forces, researchers and other stakeholders realize that they are all part of the same ecosystem and that they can join forces. Ghent and Ghent related organizations are invited to make use of the Ghent Living Lab and to become real co-creators. They are invited to become active members of the smart city ecosystem. We are not merely looking for the so-called digital natives. On the contrary, in Ghent we find complementarity between online and offline solutions particularly important. Certainly, technological and IT solutions are important, but they are not everything - always a means, not an end in itself. The City of Ghent concurs with the conclusions reached within the

FIREBALL EU project on smart cities as innovative ecosystems. A smart city is not a static concept, not a simple sum of constituent and defining elements. It is rather a scenario, a direction towards which you want to evolve as a city. What really counts is how citizens (as individuals or organized stakeholders) help shape the city and are supported and encouraged to do so. In this sense, a smart city is an urban laboratory, an innovative ecosystem, a living lab in itself and a driving force for change.

Conclusion

We do not look at a smart city in terms of a ranking which is no more than a snapshot. A smart city actually is how a city behaves as an innovative ecosystem, in a smart way. The (interim) results or manifestations of such processes are by definition very context dependent. One thing is certain: there is no such thing as a standard template or a magic all-in-one smart city application. There are as many smart cities as there are local ecosystems, each with its unique dynamics and specific cast of actors.

Links

http://www.ghentlivinglab.be
http://data.gent.be
http://appsforghent.be
http://www.gentsklimaatverbond.be
http://www.energent.be/
http://www.eurocities.eu
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