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Mobile Participation in Urban Development

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Abstract. With an urban planning and participation research perspective, my contribution offers reflections on a specific case of mobile polling apps in urban development. After introducing considerations on the characteristics of mobile apps for participation in contrast to face-to-face and E-Participation, I present intermediary results from an ongoing R & D project and finish with thoughts on the future of E-participation and E-Democracy. Is participation enough, why and when would cooperative approaches be more suitable and what are it's implications for the relationship between politics, administrators and civil society?

Mobile Apps in Urban Development

Participatory decision making is a fundamental activity to the success of many organizations — whether it be profit, non profit or state institutions. While this is being recognized slowly in national, regional and city governments, citizens as well as administrators demand both improved decision quality and transparency of political decisions. Established methods of representative democracy are being criticized for their lack of effectiveness, disenchantment with politics is on the rise while voter participation in local and regional elections is lowering. At the same

time politics on the local and regional level increasingly include citizens and NGO in political decision making processes. New ways and methods have to - and already are – being explored and tested while a shared culture of participation still has to be established.

While face-to-face participation has become something like a standard in Western/ Northern urban development since the 1990s, E-participation was only introduced during that time. In consequence, the number of E-participation implementation cases is still quite small. And maybe not surprisingly, professional conceptions of E-Participation are closely related to face-to-face experiences¹. Accordingly, criteria for describing or analyzing E-participation rely heavily on the practical experiences with and theoretic reflections on face-to-face participation. But despite the initial hopes connected to participation via internet, the variety of forms and methods of E-Participation today is more limited than of face-to-face participation: most approaches to E-Participation are a combination of posts, comments and discussions, and informal voting/ rating as e.g. in many online citizen budgets, and municipal online dialogues. *After some 15 years of E-Participation experiences, innovative technical developments and patterns of communication and interaction in social networks may give new impulses to the idea of participation and cooperation in urban development.*

The specific characteristics and structures of mobile apps – which sometimes are in contrast to either face-to-face or e-participation – ask for taking a closer look at capacities and limits of using mobile apps in and for urban development. While best practices and handbooks for face-to-face participation emphasize the need for context-related, sensitive approaches (Schröder 2013), apps are a tool for fast and short communication (cp. Evans-Cowley 2011), that do challenge existing conceptions of democracy and (E-)Participation. Two central questions in this context are 1) how and 2) in which role(s) different actors and stakeholders can become part of democratic decision making processes via mobile apps. While "most of the apps out there simply allow information sharing" (ibid.) on various topics, administrators and experts are looking for ways to interact more with civil societies and stakeholders, and vice versa (Conroy and Evans-Cowley 2006). In consequence, we now do find apps that allow for more social interaction and sometimes education (ibid; Zeile et al. 2012), such as the quite popular apps

¹ E-Participation or e-democracy is defined in the following as "the use of ICT to support ... democratic decision-making processes" (Macintosh 2004). Narrowing this definition further down, one could add that e-participation refers to the goal-oriented interaction of civil society & administrators/ politicians via Internet, mobile devices such as Smartphone, Tablet, via different software and app.

that allow users to instantly interact with local administrations and services. At the same time, general polling and voting apps exist for almost anything, except in the field of urban development (Bohoj et al. 2011).

Overall objectives for using mobile apps in urban development are to facilitate interaction and support between groups and individuals (e.g. Knudsen et al. 2011), to better connect administrators, experts and public. A second, main objective is to privide better quantitative and qualitative data on individual lifestyles and choices. But due to space restriction, this context is not being looked at in this text. The hoped for consequences are increased productivity and responsiveness (Zeile et al. 2012), as well as (better) relations with civil society (Evans-Cowley 2011). Some future challenges for apps in urban development are consequently

- ★ the integration of open data initiatives (Evans-Cowley 2011)
- the collection and integration of (geo-tagged) public data and place-based knowledge (crowdsourcing, participatory sensing, emotional mapping, cp. Estrin, 2010; Lane et al., 2010),
- the integration of different ways of information (urban storytelling, 3DS, augemented reality, Near Field Communication (NFC) (cp. Evans-Cowley 2011; Zeile et al. 2012: 788).

The FlashPoll mobile app

A quite common situation in administrating municipalities is the need to take decisions of various scopes and with differing consequences for different administrative levels and target groups. Though participation has become a regular element in administrative decision processes, we have learned in recent years that early communication is not always enough to guarantee a successful and satisfying result. It also needs a continuous and transparent dialogue and feedback. To this end, a mobile application could facilitate municipal decision making processes by means of a feedback function. But the question is, whether apps (remember: they're short, fast tools) allow for *proper deliberation with sufficient information, rational enough communication and informed decisions.* FlashPoll (flashpoll.eu) is a mobile app aiming at a qualitative better integration of civil society in municipal decision-making processes through location based, instantaneous polling and opinion-giving. In addition, it will also allow for multiple poll initiators. If achieving this, the app would go beyond a traditional participatory approach to urban development (top-down) and generate multiple

ways of communication between indviduals.² On the one hand, shortcomings of face-to-face participation, such as limits to processing the input, opinionated stakeholders and process facilitators, (high expenses) and personnel required, intimidating socio-cultural or administrative structures could be counteracted by providing a neutral platform for opinions and dialogue. In addition, Flash Poll could facilitate participation because of its speed, reaching range, time-place asynchrony, anonymity, interactivity, and its ability to carry different forms of mediated content (e.g. sound, pictures). On the other hand, speed and limited text sizes may also cause problems: The need for text reduction on a smartphone screen affects the information given, questions asked as well as responses given. At this stage, it is not clear, whether advantages or disadvantages will be more prominent, but it is most certainly an opportunity to reflect carefully on what kind and what amount of information, communication and interaction is needed in the context of urban planning and decision-making

Consequences for using Apps as mobile method for participation in urban development



Use Case

Figure 1: General use case for the FlashPoll app

² There are three principles of using the app: 1) non-georeferenced surveys and sampling, 2) with support of the geo-localisation, space-related opinions and polls can be fed in and 3) the integration of contextual information and spatial data in order to address specific target groups within defined urban areas

The research team started testing FlashPoll in public in mid 2013 at different events in Germany, France and Sweden. As part of the University Network event "Long Night of the Sciences", the FlashPoll app was presented to and tested by the public for the first time. After downloading the app via Google Play, users could take part in five different instantaneous polls during the evening. Results were visible via the app immediately after polling.³ In order to ensure a larger number of testers, additional devices were provided as we wanted to do a technical test and participation research at the same time. Although the response rate was quite small (30 app downloads and 215 answered polls) and decreasing over time, there was a broad positive feedback on the FlashPoll concept and testers expressed interest in a future use of the tool.

From the participation research perspective however, and due to the relatively small number of testers and their unrepresentative selection, results of the poll questions can only indicate tendencies of the visitor's opinion. Without the possibility for open text answers (only single and multiple choice answers possible), it was only possible to receive non-captured views, no comments, and no suggestions. The prevailing requirements of a Android operating system version 4.0 or higher and access to a google mail account were problematic as they made comparatively many people shy away from downloading the app. In succeeding steps, the FlashPoll initiator web platform was designed and tested, then a skip-the-question button, the geolocalisation, the visibility of real-time results, varying lengths of information texts, varying numbers, length and complexity of questions and answers and the layout of the user interface. This evolving structures were mainly a result of the team's discussion process. In many cases, we discussed specific features in theory before implementing them. This procedure didn't correlate either to the management of app development nor participation practice but provided useful, though sometimes work-intensive, insights for both engineers and social scientists.

In interviews and focus groups, it became clear that a fast polling tool - that can be used on the spot without spending much time – is being asked for by both administrators and stakeholders. In consequence, descriptions of polls should be as compact but clear as possible, questions and answers provided rather detailed and clear (more than single words). There were also hints that a poll should not be too short in order raise motivation (approx. 10 questions) and should provide different ways of opinion giving (i.e. not only single and multiple choice questions, but also – where suited – scales and open text). Our privacy concerns

³ The polls consisted of 2-5 questions each and were launched through the app as the event progressed with the first poll starting at 4pm and the last one at 11pm.

were confirmed as testers appreciated that all feedback and polling results should always be anonymous or abstracted away from individual respondents.

Reaching a large variety of people resp. population groups is heavily dependent on the access to recent smartphone or tablet models. Statistics suggest a quick growth rate for smartphones as well as growing familiarity with the use of mobile devices in all age groups which may lead to the assumption that the introduction of mobile participation to large percentages of populations will be less complicated than the introduction of online participation: While younger people are said to be more affine towards new media, our (limited) test results do not support this: People that participated in testing the FlashPoll app were mostly middle-aged, politically interested and already actively participating in society. This goes along with findings from face-to-face participation, but also with the general population structure of the visitors of the event.

Conclusion

Although it is impossible to generalize our findings, reaching potential users is still one of our major concerns in the test stages: While we tried to limit the personal information needed in order to protect user's privacy (and not to do what is technically possible), we are left with very little knowledge on social characteristics of the participants . Assumptions that e-participation may allow for more and different participants, for more contributions are not easy to verify as all participation relies heavily on individual access to information about such a process. While it is often assumed that E-Participation processes. But it is just as time-consuming and delicate to deal with. And, surprisingly, statistical data of E-participation and mobile participation is almost not available (Schröder 2013). While the literature suggests that "there is a chasm between those who have computers, computer skills, and Internet access and those who do not" (Brabham 2009: 242), there is not enough data available yet to see whether this also applies to smartphone use and users.

As communication and interaction in E-Participation processes definitely ask for specific technical and social skills, E-participation is being considered a bigger challenge for members of local governments than for members of civil society. But with a new generation of administrators (those who learned about participation in schools and universities and those who grew into using computers and mobile phones) feedback and interaction are somehow a normality. Thinking further, one could ask what consequences this has for the use of ICT in local decision-making processes and what the relations of social and technical aspects of ICT and democracy are. The exclusive relocation of public discourses that deal with real spaces and real people into the internet realm may not be a vision to long

for. But in a more concrete step, it should be asked whether all E-participation is suitable for all levels: E-Participation processes are not as small-scale (yet) as many offline processes, mobile apps are mostly designed to offer non-location specific information.

What consequences does the (exclusive) use of mobile apps in local decisionmaking processes have? The exclusive relocation of public discourses that deal with real spaces and real people into the internet resp. mobile realm may not be too much a vision to long for. In practice today, we often find a complementary mix of offline, online, and mobile solutions (mash ups), even more so the smaller the scale to deal with gets (e.g. streets, small parks of only local significance, neighbourhoods). And finally, we have to deal with the fact that, due to (limits of) technical development, all E-Participation is informal as there haven't been invented any mechanisms yet to introduce formal voting that would make decisions by administrators or politicians redundant.

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