
All aboard! A starting point towards broad-spectrum citizen involvement

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Abstract

When cities want to involve people in the design and development of the public environment, it is not an easy task to involve every city inhabitant in the same way. This may lead to situations in which specific social groups might feel neglected and less heard compared to others. In this position paper we reflect upon a methodological approach that aims towards involving a large amount of people with a wide variety of backgrounds. We hereby set out a starting point for further reflection regarding this approach and its relevancy within the context of urban design.

Introduction

Cities are typically a place where a wide variety of people live and share space. This variety can be on different levels, ranging from 'functional preferences', such as preferred mode of transport, to very deeply rooted emotional differences, such as cultural heritage or religious beliefs [2]. An important challenge we want to explore in this paper is how this melting pot of people can be involved during an urban participative design process.

A crucial aspect of this seems to be the role played by digital technology when involving citizens during the design phase(s) of urban areas. As the call for papers for the 'making places' workshop states: "Emerging

technologies are providing new ways of experiencing information in urban space". We want to reflect on the technological aspect, and question how suitable digital technologies are, or can be, in relation to the involvement of a broad range of city inhabitants.

Digital and non-digital urban projects

To illustrate what we mean when talking about something digital or non-digital, we briefly want to illustrate this using two examples.

#TheLivingCity

The living city [4] is a project by the Better Cities initiative and is a good example of a non-digital way of urban participatory design. Central to the project is a large table, on which passers-by are invited to build urban elements using lego bricks. Doing so, it becomes clear that cities are living organisms. People start building their own creations, they are free to adapt or recreate the elements already built by others.

Because of the open format of this project, there are very little boundaries of what is possible. There is no central question that people have to answer, but by inviting passers-by to engage with the construction of city scale model they are invited to reflect upon city life. Although that this also implies that there is no real focus, and people are free to build without reflection, the dynamic exhibit does provide a platform to engage a wide variety of people in thinking about topics relevant to them in a city context.

Block By Block

This project [3] is an initiative by the United Nations and Mojang. Mojang is well known for the sandbox game called minecraft, which is the core tool used in

the Block By Block project. The project specifically targets the involvement of people during the re-interpretation of public areas in developing countries. During several sessions, people adapt and/or change virtual representations of local urban environments depending on their wishes or needs. Doing so, the people involved in the project learn how their living environment can be improved and where their priorities regarding urban planning lie.

In this case, the sandbox game minecraft is used as a medium for discussion. Since its open characteristic, lots of things are possible to 'create' in this virtual setting. In comparison to the previously mentioned TheLivingCity project, the Block By Block project brings together people during guided sessions. This implies that debate is facilitated and can be focused regarding one or more topics.

Both examples are very similar regarding the functionally offered by the co-creative tool used. What is interesting is that they both present a research approach that goes beyond questioning the public using 'classic' questionnaires, which are often encountered when a city council wants to engage people. Doing so, both projects use a design driven research approach in which they learn from qualitative insights expressed during the process. From a designer perspective, this approach is more valuable compared to a 'classic' approach as it does not start from a predefined solution but leaves room for creative interpretation and exploration. Related qualitative approaches such as cultural probing or contextual investigation have proven their use within the design research field [1]. When this type of research approach is transposed to an urban

setting, we believe that there are at least two challenges that emerge:

Size of sample & data analysis:

Qualitative research methods, such as cultural probing, interviewing and participatory design sessions are typically used on a rather small scale. These research methods tend to provide a very large amount of 'rich' data, which needs to be analysed and reflected upon. Additionally, the time investment is often high, since personal contact needs to be established between the design/research team and the participants. In an urban context, involving a large amount of people and stakeholders in such a process seems very valuable. However, when doing so using existing methods the data generated rapidly becomes too much to structure and handle in a useful way.

Research medium used

When, for example, using a diary study to generate empathy with a target audience the format in which the diary is presented can be tuned to the specific target audience. For example, project ara [6] used a digital platform to run a large-scale contextual study of how people use their smartphone. Since the target audiences of this research are people who have an interest in smartphones, it makes sense to use that as the research medium. Again, when transposing this to an urban environment, it becomes less evident to pick a research medium that appeals to all people. A typical example is that the senior population is less comfortable with digital technology to express themselves. When offering a digital medium, there will almost always be a part of society that is excluded because of that choice.

Both challenges link to the statements listed in the smart citizen manifesto by WAAG society [5]: "Value empathy, dialogue and trust". When involving citizens in an urban development project, the requirement of a certain level of trust indicates that in order to gather the 'rich' data mentioned before, citizens need to feel confident to share information. Regarding sample size, participants need to feel heard and involved, which is not a straightforward task with a large amount of involved stakeholders. When considering a research medium, people need to be confident and comfortable with the medium presented. This again is a challenge when considering the wide variety of people in a city.

Phases, methods and people

We have briefly set out our concerns to do qualitative research with citizens in an urban context. In order to overcome these challenges, we want to explore the possibility of building upon existing participatory design methods that do allow the involvement of a large amount of stakeholders who each can have their own preferred medium of communication.

In order to set out some initial requirements for this method, we have split up in three 'rough' phases; explorative, reactive and incremental. These phases emerge from an urban planning process, which goes from something very vague and abstract to a very well defined plan of actions. During this development process, specific methods appear to be more valuable than others.

Explorative approach

Even before a specific urban planning project is communicated to a larger public, it makes sense to

understand what dreams, worries and problems city inhabitants have. During this very early stage of an urban planning process, ideas are typically very scattered and non-focused. The aim of a researcher or designer at this phase is to gather insights based on context and to generate empathy with people. This results in requirements, recommendations and (high level) concepts, which need further crystallization. Although that this approach can be very valuable to generate empathy between city officials and citizens, the challenge is to actually convert the gathered rich data into 'feasible' proposals and take them outside of the conceptual phase.

Methods that are relevant during this phase: Cultural probing, diary study, future exploration, design fiction.

Reactive approach

When a city already has a destination or 'plan' with regard to urban planning, the public can still be involved in a reactive way. Ideally, an urban planning process enters a reactive 'phase' as a follow up to an explorative phase, but in reality this is rarely the case. It is clearly a convergent phase, in which the (flexible) constraints have been set out. The challenge here is to collect usable feedback and actually be able to still change plans that have been made based on that feedback. People should not only be data spectators, but should be involved in a way that their input can be translated into actionable elements.

Methods that are relevant during this phase: Co-creative sessions with stakeholders, make/hack-athons, public voting.

Incremental approach

Once an urban planning project has been executed, or when a project has to be created within a very constricted set of requirements it becomes harder to involve the dreams and high level conceptual ideas city inhabitants have. Involving citizens during this phase should still be possible, although that the focus of the involvement shifts more towards, for example, enhancing the social fabric within an area.

Methods that are relevant during this phase: Community activities, open calls for projects

Discussion

We have outlined a first version of a thought process with regard to a co-creative approach to participatory design in an urban context. Currently, we have primarily focused on a method that would allow us involve a large amount and wide variety of city inhabitants during an urban planning process.

Our current approach builds further upon co-creative techniques emerging from human centered design methodology. We should still reflect further upon involving methods from other domains, such as innovation management or artificial intelligence. Where we are currently taking the 'medium' used during the design process as something that should vary, we could also use the social dynamic between people as a variable. For instance, instead of attempting to involve people from a variety of social backgrounds, we could work with a system of motivated representatives, which are 'elected' in a bottom up way. Doing so, we could work towards a system in which the focus is much less on individuals, but more on urban systems and social groups [8]. The central challenge of making a

connection between 'city officials' and 'people' will, however, still remain and should not be neglected.

Our interest in the Making Places workshop

At the moment of writing, the authors of this workshop paper are involved in the ITEA3 C3PO project [7]. In this project, we plan to design, develop and trial a collaborative platform for urban design. Using visualization and simulation tools, we have the ambition to improve citizen participation and speed-up decision making. When creating this platform, making a link to urban interaction design seems essential.

Understanding and learning about current state of the art will be crucial to construct a platform for city co-creation that is truly useful.

References

- [1] Sanders, E., Stappers, P.J., 2012, Convivial Toolbox, Amsterdam, BIS publishers
- [2] Sommers Miles, R. (ed.), 2014, Urban Interaction Design – Towards City Making, Amsterdam, Booksprints
- [3] Block by block, www.blockbyblock.org, accessed 25/08/2014
- [4] The Living City, <http://www.betterciti.es/projects/thelivingcity>, accessed 25/08/2014
- [5] WAAG SOCIETY, 2013, A Manifesto for Smart Citizens.
- [6] Project ara, <http://motorolaara.com>, accessed 25/08/2014
- [7] C3PO project, <https://itea3.org/project/c3po.html>, accessed 25/08/2014
- [8] Batty M., 2013, The New Science of Cities, MIT Press