

Rezone the game: playing for urban transformation

Michiel de Lange | mdelange@bijt.org | 17 April 2013

Introduction

How do you tackle a pressing and complex urban issue like vacancy of buildings and underused land? Especially in times of economic decline it is hard to reach solutions through conventional means. Traditional parties involved in urban development are not inclined to invest and instead wait for others to make the first step. The Bosch Architecture Initiative (BAI) and Digital Workplace (DW), two cultural organizations from the city of Den Bosch in the Netherlands, came up with an innovative intervention: Rezone, an urban game that challenges players to 'fight blight'. At first it may seem strange to tackle a serious and actual problem by means of a game. After all, playing games appears to have little to do with the work of urban professionals. How then can a game like Rezone contribute to involve stakeholders in developing their city? We shall see below how Rezone offers unsuspected potential to address urban issues.

About Rezone the Game

In the game Rezone (www.rezonethegame.nl) players must keep the city safe from deterioration and vacancy by salvaging real estate from decline. Participants adopt one out of four possible stakeholder roles. In the case of vacancy these roles include proprietor (owner of real estate), mayor (representing the municipality), engineer (urban designer) and citizen (neighbors). The challenge is for players to not just pursue individual self-interest but to strategically collaborate in order to defeat the system, which is programmed to let the city descend into decay.



Rezone is composed of a physical board game with a number of 3D printed iconic buildings that represent the neighborhood, an *augmented reality* layer of real-time information about these buildings projected on a screen, and a computer algorithm programmed to induce vacancy. When the game begins all buildings are fully occupied.

Then at alarming speed they spiral down towards total abandonment. A vacancy meter on the screen indicates the level of occupation from 4 (completely occupied) down to 0 (abandoned). Empty buildings act like a contagious virus that infects neighboring buildings too.



To turn the tide each player has two pawns that they can move to a building where the problem starts to run out of control. Players need not wait for their turn: acting swiftly is key as the tempo is high. However, pawns must be placed in the right order, like in the 'real world'. An engineer cannot just upgrade a building before getting permission from the proprietor and a permit from the mayor. In the end the citizen will have to start using the building to turn the tide for good. The proprietor takes the initiative by being the first to put a pawn near a particular building where vacancy looms, thereby upgrading the score from 0 to 1. A mayor can reinforce this upgrade by adding a pawn and bring the score to 2. The designer can keep a building out of the danger zone for a long period of time, whereas the citizen can intervene for a shorter stretch. When all buildings are out of the danger zone the players have defeated the abandoned city.

A camera above the game board monitors QR codes on the pawns in real-time and registers the players' moves. The game engine continually adapts to changes in the game. It is possible to program the game with scenarios for specific neighborhoods and buildings. In the case of Den Bosch, for example, the policy of stimulating creative industry facilities in the periphery has resulted in an increase of vacant buildings in the inner city. This substitution or waterbed effect can be programmed into the game.

Initiators

Rezone is a collaboration between Rolf van Boxmeer of the Bosch Architecture Initiative (BAI, www.bai-denbosch.nl) and Tessa Peters of the Digital Workplace (DW, www.dws-hertogenbosch.nl). BAI aims to contribute to the spatial quality of the city of Den Bosch and organizes activities for both citizens and urban professionals. The Digital Workplace is an art and culture center that organizes artistic expositions and large-scale urban festivals.

Development of Rezone

The idea for Rezone emerged from the question how cultural organizations like BAI and DW can contribute to developing their city, despite the fact they cannot build themselves. Their intuition was to use digital media technologies and engage new audiences in designing the city. The initiators observed that the use of play and games in professional domains like healthcare and education advanced but lagged in the world of architecture and urbanism. At BAI the 2012 program theme was “Reset the City”. This connected the concrete theme of repurposing the city to the use of digital media and play. Rezone, as the to-be-developed game was dubbed, was developed with a starting grant from the Netherlands Architecture Fund (now Creative Industries Fund). The initiators got in touch with the department Game Design and Development at the Utrecht School of the Arts (HKU, <http://www.hku.nl/web/English.htm>). Under the supervision of Lies van Roessel, six international students in their third year have designed the concept and developed Rezone in 3-4 months fulltime. Rezone was tailor-made for the neighborhood Spoorzone, just west of Den Bosch central railway station, an area suffering from blight. Additionally, the Expert Center Games and game-design (www.expertisecentrumgames.nl) helped to define target groups and formulate the question. A distinction was made between people who would play the game (local stakeholders between 18 and 50 years old) and people who would be interested in the outcomes of the game (urban policy makers and developers).

Launch of prototype and future

In less than a year the prototype of Rezone was realized. This period included the distinct phases of ideation, concept design, developing a prototype, and public launch. On December 14 2012 Rezone went public during the Playful Arts Festival (www.playfulartsfestival.com), a festival for play and games in urban space. This three-day festival took place in the Spoorzone area in Den Bosch. The intention was to test the prototype during the festival in order to make improvements. Several lessons were garnered from players’ feedback. Players thought the game was particularly relevant to people who have an interest in particular areas that suffer from, or risk abandonment. Another lesson was that the game has a learning curve and therefore needs to be played with a fair degree of attention instead of casually. The software too needs further improvement. At the moment Rezone is fully under construction. The ambition for 2013 and beyond is to improve Rezone based on these lessons and stakeholder feedback, and to play the game on locations together with stakeholders.

Context: connecting to three trends

Now that we have a better view of Rezone we can address the question how this applied game can help to solve complex urban issues. To do so we shall look at three interconnected trends.

First, Rezone fits in the trend that digital media technologies increasingly intersect with urban space. Ten years ago the computer was a rather clunky device on or under the desk at the office or at home. Now it has become portable and blends together with mobile communication in the form of the smartphone. Digital media technologies no longer constitute a separate virtual realm but are increasingly woven into everyday life. Today's city has become a media city. Media technologies shape urban relationships: how people relate to physical space, how they initiate and maintain social ties, and how they experience the city on cognitive and affective levels. Until now most digital applications attempt to make life in the city easier and more efficient for individuals. Rezone by contrast is a project in which digital technologies help to engage citizens with each other and their living environment.

The second trend Rezone connects to consists of a broad range of societal changes in, among others, the relationship between professional and layman, between politics and citizen, and between producer and consumer. Professional expertise is no longer self-evident. Driven in part by digital media and online culture, networked citizens now want to do it themselves. This DIY mentality and open source ethics of collaborating and sharing can be seen for instance in online '[community curated works](#)' like Wikipedia or the Linux kernel. Groups of people spark innovations based on a shared sense of ownership. In people's own neighborhoods and communities too many of these networked bottom-up initiatives spring up: from the collective sharing of private resources like cars and tools to starting a cooperative energy enterprise. In a time in which architecture is under pressure – financially but also with regard to the legitimacy of professional expertise – it is important that new processes are developed that allow citizens to become shared owner of the processes and outcomes of urban interventions. Rezone is an attempt to establish this sense of ownership through intrinsically motivated play and contribute to livable and lively cities.

Third, Rezone fits in a number of recent developments in the game design world where game are not just made and played for their entertainment value but also for a more serious purpose. These developments are known under a range of labels: serious games, games for change, applied games, gamification. It takes too far to address differences in nuance. It appears very promising to use games and play principles for specific purposes in order to contribute to solving a problem. In designing such games, proper balances must be struck between tensions like the intrinsic pleasure of playing and reaching a goal outside of the game itself, between simulating 'real world' complexity and simplification.

Games for social innovation

According to Dutch historian Johan Huizinga, author of the seminal work [Homo ludens](#) (1938), play is not part of culture but at its origin. Play spawns culture because it offers

safe spaces for experimentation, innovation and new cooperations without failure directly having serious consequences. The use of games like Rezone in urban creation processes thus contributes to the creation of culture. In play citizens are not merely passive users of their city but can become active makers. By playfully engaging in co-creation they become 'owners' over their environment. Citizens then generate their own urban culture instead of leaving it up to others like governments, corporations and design professionals. Playful creation processes shape existing and new relationships between people and space, among different people, and ultimately between people and their selves. Games thus may be fuel for new maker identities.

In play various stakeholders can meet each other in a playful atmosphere instead of a serious negotiation table. By playing together without direct consequences, trust between stakeholders can be forged. The game itself is pleasurable to play and acts as a catalyst for potential follow-up actions on complex issues like vacancy. What makes a game like Rezone so interesting is that it is a simplified artificial setting in which real emotions can emerge that seep through the game boundaries into the 'real world'. While playing something is at stake. Players feel emotionally attached with both the activity of playing and with the outcomes of the game. Moreover, Rezone invites people to assume temporary roles, to stand in their adversaries' shoes. This may lead to better understanding of mutual standpoints through embodied experience instead of mere rational arguments and deliberation.

Concluding

Rezone is not a game for everyone (although everybody can play). It is an applied game for specific areas in development and particular stakeholders who have a real interest in a neighborhood. A process that is stuck can be approached from another angle through a game and be put back on the rails. Like almost any game Rezone is a radical simplification of a complex issue. Rezone itself does not provide solutions. What it can do is to put an issue on the agenda, convene various stakeholders around an issue, and allow them to discover horizons for action for themselves. And when people craft their own solutions, they will have a much stronger sense of ownership over complex questions like urban vacancy.