

auri research brief

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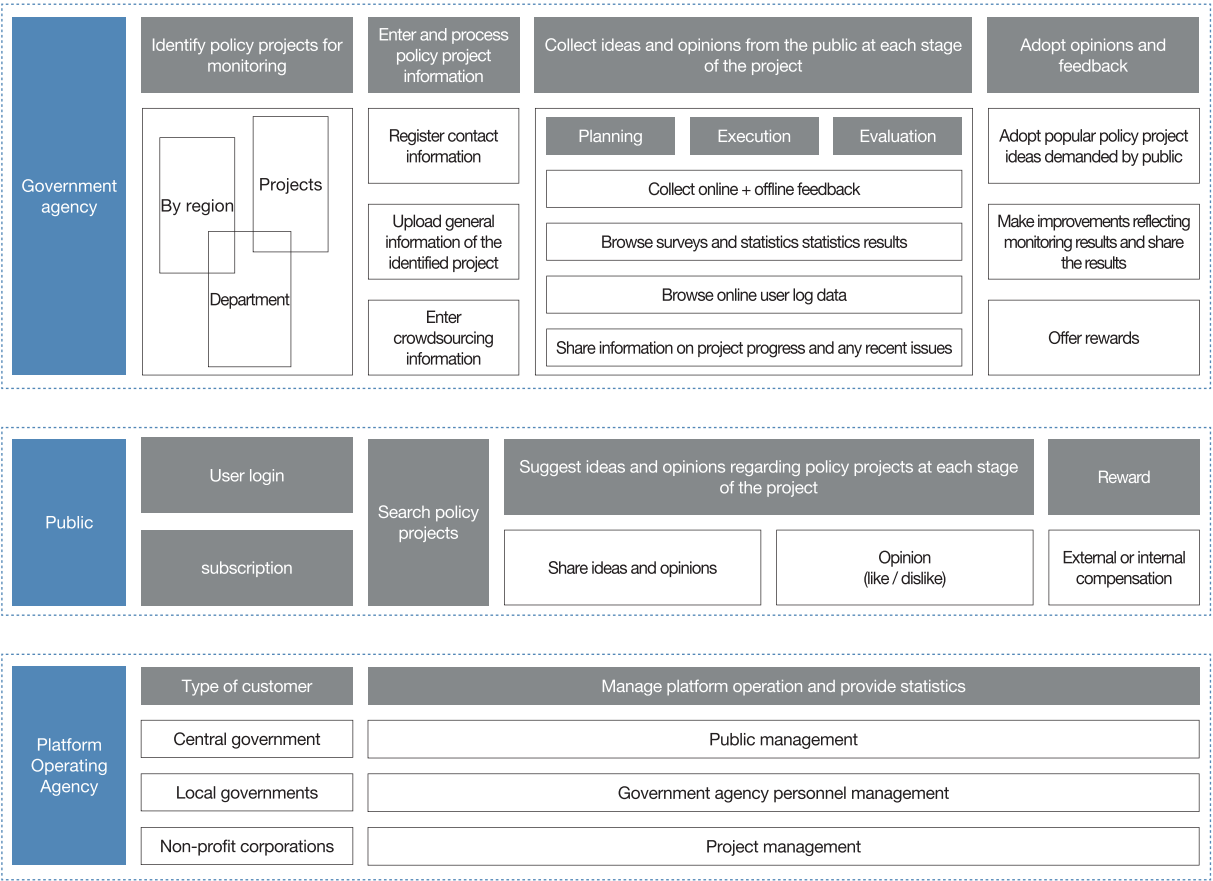
Monitoring Architectural and Urban Policy Through Crowdsourcing

Since the 2000s, a number of important architectural and urban legislation have been enacted and revised. Due to these changes, numerous related policies were derived and projects implemented nationwide. However, in the process of implementation, a number of common problems have been identified including a supplier-centered project monitoring and feedback system, a lack of distinctive character in each local project, and lack of participation from user groups. In the United States and United Kingdom, crowdsourcing has been utilized in public projects to tackle similar issues. ‘Crowdsourcing’ is a term first coined by Jeff Howe in the June 2006 issue of *Wired* magazine which combines the words ‘crowd’ and ‘outsourcing.’ This refers to the act of seeking problem identification and solutions from the non-specialist general population. Central and local governments, as well as NGOs and private sector companies nowadays are utilizing online platforms to obtain ideas from local residents regarding architectural and urban policy projects. Crowdsourcing is used to identify architectural and urban issues within the local community, develop local policy projects, expand community participation, and evaluate ongoing projects through their many stages of development. Korea has an apt environment for utilizing crowdsourcing whereby a first-rate ICT infrastructure can be installed with more than 93% of the population being a smartphone user.

The purpose of this study is to explore the possibilities for crowdsourcing as a means to monitor policy and architectural projects. Toward this goal, the study developed a prototype crowdsourcing-based project monitoring system and applied it to learn the possibilities and limitations of such a system.

The study developed a prototype crowdsourcing-based project monitoring system to oversee the process of planning, execution, and evaluation in architectural and urban policy projects. The system was built to collect information monitoring each stage of the policy project. For effective platform management, the system was equipped to comprehensively manage the overall policy project, the civil workers and professionals involved as well as the public themselves. To ensure ease of use and accessibility, a simplified log-in procedure was applied to the crowdsourcing platform.

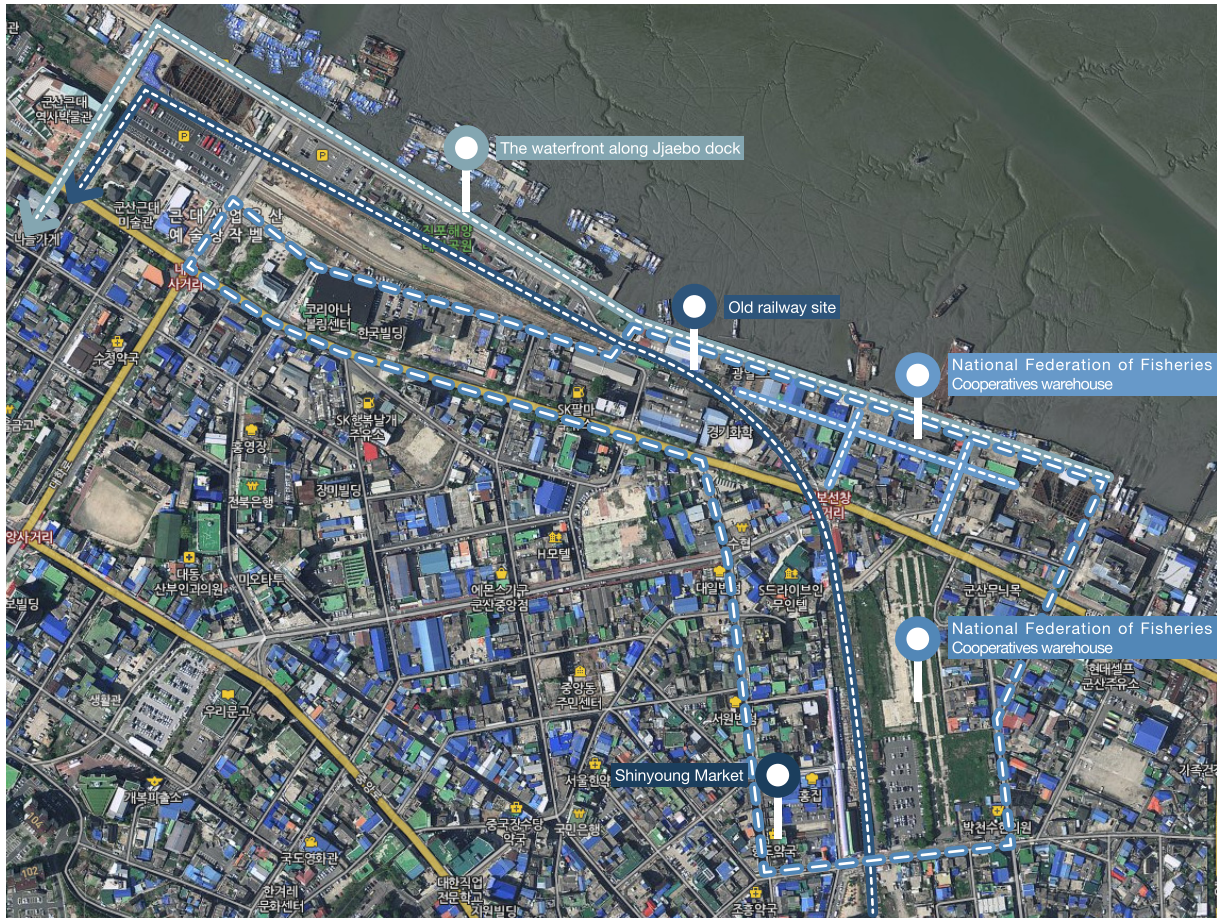
[Figure 1] Crowdsourcing-based Policy Project Monitoring Prototype System User Process



The study conducted a pilot project to explore possible use of online crowdsourcing in the construction and implementation of architectural and urban policy projects. The pilot site was Gunsan where many urban and architectural projects have been completed or underway. The operation of monitoring was divided into five stages. First, the study selected a suitable project to be monitored. The study identified the Gunsan Jjaebo dock project, an urban regeneration New Deal project that commenced in 2017, as suitable to monitor at its planning stage. For a project in its evaluation stage, the study selected the modern history and culture belt project near the inner port area of Gunsan. Second, the current conditions of each project were analyzed. Third, consensus with stakeholders was reached through consultation. Fourth, the study proceeded to monitor policy projects based on the crowdsourcing application. Fifth, results from the crowdsourcing monitoring process was collated and shared with stakeholders to discuss future applications. As a result of the pilot project, the study confirmed that crowdsourcing was an effective means to evaluate projects and identify improvement measures. It served as a tool for gathering ideas and opinions from diverse members of the general public. Monitoring based on an online platform was much more effective than similar offline activities in terms of cost, time, ease of analysis, and comparison. However, there were some limitations to the online crowdsourcing monitoring process. First, senior citizens who are not accustomed to using smart devices were largely unable to participate in the process. Second, the rate for crowdsourcing participation was not very high. To overcome this, it may be helpful to consider cooperating with local primary and secondary schools and not just resident groups. Third, a lot of time and effort was required to process and refine the data. In the future, the online platform system will need to be upgraded so that collected data could be automatically analyzed and visualized.

[Figure 2] Results of the Crowdsourced Monitoring Process

Residents' opinions on the Jjaebo dock New Deal project and its surroundings using the crowdsourcing platform



The waterfront along Jjaebo dock

Create a safe and unique place with a local narrative



- 1 Creating a food stall street
Install food stalls along the coast next to the marine theme park parking area



- 2 Creating a history exhibition hall
Establish a history exhibition hall of Jjaebo dock



- 3 Creating a coastal walkway
Create a walkway with benches and railings for coastal safety



- 4 Developing town storytelling
Develop a travel guide with a story of life around the dock

National Federation of Fisheries Cooperatives warehouse

Creating a space that can be used in the daily life of the residents and in preservation of local history



- 5 Creating a maritime museum
Install food stalls along the coast next to the marine theme park parking area



- 5 Creating a community center
Create a space where local residents can gather and communicate



- 5 Reconstructing the history of shipped goods
Reconstruct how goods traveled in the market (bicycle, rickshaw, tram, etc.) after being auctioned



- 5 Reconstructing auctions of sea products
Run a program to recreate the auction of sea products from olden days

Old railway site

Rehabilitate railroad and create a feasible tourist course operating trains or rail bikes



- 10 Creating a flower tunnel
Create a flower tunnel along the railroad tracks with vine plants such as wisteria, roses etc.



- 11 Running a tram trail
Consider using trams to move around the bay area near Jjaebo dock



- 12 Running a rail bike service
Consider running rail bike activities which were proven successful in Jeongsun, Gangwon province



- 13 Developing train tourism
Develop a tourist route for an open train which stops at sightseeing spots similar to VIA Rail Canada

Hanwha site

Creating a park with diverse attractions and for public rest and leisure



- 6 Large sculpture park
Park of symbolic sculptures representative of the area around the Jjaebo dock



- 7 Outdoor movie theater
Provide a place where families can gather and watch movies outdoors



- 8 Creating an urban camping site
Campsite around the urban areas of the old railroad tracks



- 9 Running a local festival
Develop a representative local festival and provide attractions

Shinyoung Market

Revitalizing the traditional market by supporting young entrepreneurs and increasing tourism



- 14 Changing bus routes
Provide diverse transportation routes passing through the old market roads



- 15 Supporting young entrepreneurs
Support the increase of young entrepreneurs and make success stories like that of Shinchang Market in Dobong-gu Seoul, and provide a variety of food products



- 16 Developing a narrative for the market
Develop narratives incorporating stories of merchants into the market products



- 17 Running market-related activities
Set up a place where visitors could experience various programs such as Kimchi making, Develop experiential programs

Keywords : Crowdsourcing, Policy project, Monitoring, Planning participation, Online platforms

