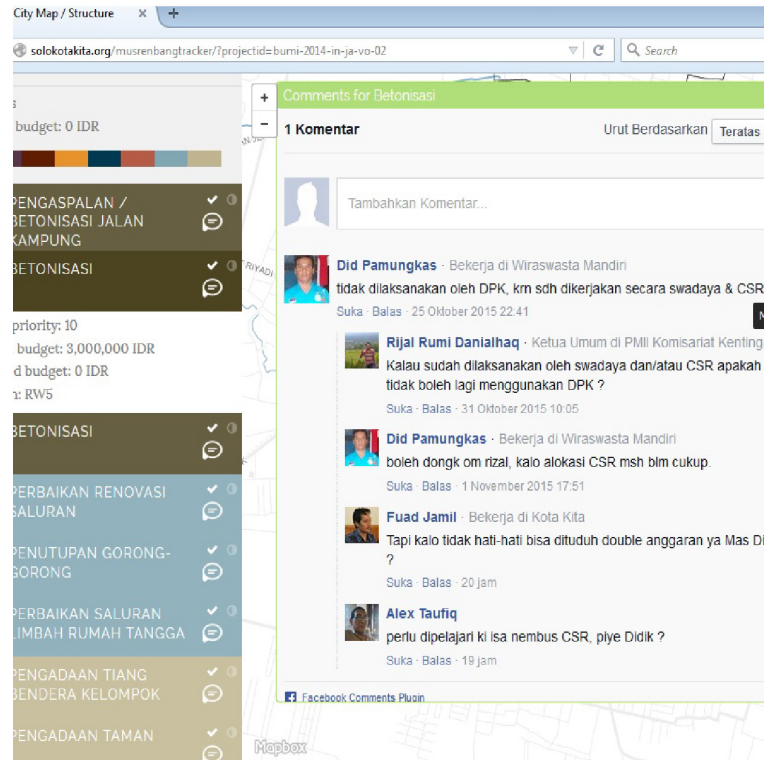


Toward Pro-Poor and Accountable Infrastructure Development Planning

Kota Kita Local Budget Transparency Research



INDONESIA INFRASTRUCTURE INITIATIVE

Toward Pro-Poor and Accountable Infrastructure Development Planning

Kota Kita Local Budget Transparency
Research

AIIRA RESEARCH REPORT

November 5th 2015

John Taylor, Kota Kita

INDONESIA INFRASTRUCTURE INITIATIVE

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John Taylor

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TABLE OF CONTENTS

| | |
|---|------------|
| ACRONYMS | III |
| EXECUTIVE SUMMARY | IV |
| CHAPTER 1: INTRODUCTION | 1 |
| CHAPTER 2: BACKGROUND | 4 |
| CHAPTER 3: RESEARCH QUESTIONS | 8 |
| CHAPTER 4: METHODOLOGY | 11 |
| CHAPTER 5: DISCUSSION ON RESEARCH FINDINGS | 18 |
| CHAPTER 6: CONCLUSION | 25 |
| REFERENCES | 28 |
| ANNEXES | 33 |
| ANNEXE 1: SURVEY INSTRUMENT | 33 |
| ANNEXE 2: INTERVIEW QUESTIONS | 39 |
| ANNEXE 3: SCHEDULE OF WORKSHOP | 40 |
| ANNEXE 4: FOCUS GROUP DISCUSSION PROTOCOL | 41 |
| ANNEXE 5: MUS-TRACKER | 42 |
| ANNEXE 6: TEAM COMPOSITION | 43 |
| ANNEXE 7: TABLES | 44 |
| ANNEXE 8: FIGURES | 49 |
| ANNEXE 9: SELECTED INTERVIEW RESPONSES | 51 |

LIST OF TABLES

| | |
|-----------|--|
| Table. 1a | Determinants of Location of Kelurahan Grant Projects by RW |
| Table. 1b | Budget allocations by RW Poverty Rate Quintiles |

LIST OF FIGURES

| | |
|---------|--|
| Fig. 1 | The Musrenbang process diagram |
| Fig. 2 | The stages of the Musrenbang process |
| Fig. 3 | Digitized and compiled the Musrenbang process into a database |
| Fig. 4 | A Kota Kita staff member conducts a survey with a community m |
| Fig. 5 | A Kota Kita staff member conducts an interview with a communi |
| Fig. 6 | Community members test out the Mus-Tracker online platform i group discussion |
| Fig. 7 | The Mus-Tracker web application encourages the participation o younger, tech-savvy generation |
| Fig. 8 | Screenshots taken from the Musrenbang Tracker, the web-basec tracking tool |
| Fig. 9 | Percentage of funded infrastructure projects by type |
| Fig. 10 | The varying amount of ghost projects |

ACRONYMS

| | |
|-------------------|--|
| AusAID | Australian Agency for International Development |
| Bappeda | <i>Badan Perencanaan Pembangunan Daerah</i> , Provincial Planning Office |
| BLT | <i>Bantuan Langsung Tunai</i> , a neighborhood cash transfer program |
| DFAT | Department of Foreign Affairs and Trade |
| GIS | Geographic information systems |
| <i>Kelurahan</i> | Neighborhood |
| <i>Musrenbang</i> | The short form of <i>Musyawaran Perencanaan Pembangunan</i> , a participatory budgeting cycle that occurs in cities. |
| NGO | Non-governmental organization |
| PNPM | <i>Program Nasional Pemberdayaan Masyarakat</i> -- National Program for Community Empowerment |
| RT | <i>Rumah Tangga</i> , a small administrative unit of an Indonesian neighborhood covering around 20-30 households |
| RT/RW | <i>Rumah Tangga</i> and <i>Rumah Warga</i> , a territorial and administrative ordering system for Indonesian cities |
| YKK | Our City Foundation, a local NGO based in Solo, Indonesia |

EXECUTIVE SUMMARY

Since the beginning of the *Reformasi* period, Indonesia has taken great strides towards including citizens in local government decision-making. The primary mechanism for citizen participation in financial decision-making, especially for infrastructure budgeting, is the *Musrenbang* process of proposing, voting on, and funding small-scale projects in neighborhoods across the nation. Solo, in Central Java, has a particularly robust *Musrenbang* structure, and serves as the case study for this research.

Despite the increasing prevalence of the *Musrenbang* model, there has been little effort to track process or outcomes. This makes it difficult for citizens and local government officials to assess whether the *Musrenbang* process is achieving its stated goal of directing funding towards projects serving those with the greatest need. The process is also very opaque. It is very difficult to track decisions about which projects to approve and fund, and equally difficult to access information on the actual projects implemented based on these decisions.

The research takes place in Solo, a city of approximately 600,000 inhabitants, where the first participatory budgeting experience was introduced in 2000 and continues to this day. The city government has been supportive of the *Musrenbang* process and funds are allocated annually to each neighborhood, or *kelurahan*, through the *Dana Pembangunan Kelurahan* (Neighborhood Block Grant). Kota Kita, a local Indonesian NGO based in Solo, gathered data from all 51 of the city's *kelurahans* about the citizens' choices of projects, how they ranked in terms of priority, their budget amount, and whether they were approved and executed (built) at the end of the process. This information, over 50,000 data points in all, was digitized to create a publicly-accessible citywide database that can be studied to analyze the performance of the *Musrenbang* in delivering upon citizens' democratically selected preferences. Other research was conducted through surveys, interviews, and focus group discussions.

Among the key findings the research reveals that poverty rates do not significantly influence project prioritization; thus the neediest areas of the city, where poverty concentrates and which lack services, do not receive more funding than other areas. In fact poverty rates actually have an opposite effect, in that the areas that receive most projects are those with *least* poverty. The *Musrenbang*, however, does seem operate democratically, with the most populous areas receiving more projects. Other findings include the discovery of opportunities for elite capture during the Public Phase of the process, in which citizens discuss and prioritize their needs. While the research cannot say with certainty how this occurs, it is likely that insufficient turnout by poor communities is an important factor. The research also found that a significant amount of the projects that are allocated for implementation originate outside of the voting process; these are referred to as 'ghost projects' in the report.

In order to begin to monitor the third and final phase of the *Musrenbang* process, the Execution (implementation) Phase, Kota Kita has developed an online application

called the *Musrenbang* Tracker (or Mus-Tracker for short). This web-tool operates by linking the citywide database to a web browser that can be accessed by anyone with Internet, for example through his or her smart phone or laptop. Citizens can use this to track individual projects that they voted on and monitor their status, as well as make comments about these projects. This allows the public to participate in monitoring the implementation of projects, and provide oversight. Early trials have garnered an enthusiastic response, and demonstrated the possibility for a younger, more tech-savvy population to become involved in neighborhood development. However, further promotion and development of the *Musrenbang* Tracker is likely required.

The research concludes that reform of Solo's *Musrenbang* process is needed in order to effectively address inequality and the needs of poor areas of the city. This might be achieved through better targeting of poor areas and more widespread promotion of the budgeting process to marginalized communities. Another conclusion is that urban data is a useful tool to indicate where problems in such policies occur, as well as give ideas of how to improve. With accurate data, solutions can be more carefully targeted, for example, by identifying the need for further capacity building and monitoring oversight in a particular underperforming *kelurahan*. Finally, continued promotion of monitoring tools can provide opportunities for the public to oversee the implementation of projects and increase accountability.

This research can help promote better understanding amongst policy makers about the limitations and potential of the *Musrenbang* process in addressing infrastructure needs; it can also indicate how data can be used to better follow and evaluate urban policies. The recommendations can be used by the city government of Solo to support evaluation and improvement of the current process, and to implement training and promote new monitoring tools. Finally the development and testing of the *Musrenbang* Tracker tool demonstrates early interest amongst citizens and has the potential to empower a younger demographic through the use of technology-based transparency mechanisms.

CHAPTER 1: INTRODUCTION

Indonesia is urbanizing rapidly. The country has one of the highest growth rates in urban population in Asia, adding 100 million residents to its cities from 1970 – 2010. It is projected to add another 72 million by 2030 (World Bank 2012; Oberman et al. 2012). This trend is straining local governments' ability to provide infrastructure and services to urban residents. At the same time, corruption, bureaucratic interference, and inefficiency hinder attempts to provide infrastructure planning and implementation in a way that addresses citizen needs, especially of the poor and most vulnerable. Given these realities, how can equitable development take place in decentralized democracies that are rapidly urbanizing?

Direct citizen participation in decision-making has been held up as a means to improve equity and efficiency of infrastructure development. Participatory budgeting was introduced in Indonesia during the Reformasi period in 2000, and the city of Surakarta (also known as Solo) served as a pilot location for the initiative. In 2004 the Indonesian Government mandated the use of participatory budgeting in every city across the archipelago through the *Musrenbang* (short for *Musyawarah Perencanaan Bangunan*), or Consultation Forum for Development Planning program¹. Despite its nationwide reach, there is little evidence available that the program works, and few mechanisms to monitor its effectiveness in small-scale infrastructure delivery.

This report highlights two data-based interventions by Kota Kita in Surakarta's *Musrenbang* program from 2011 to 2014. First, Kota Kita conducted a series of focus group discussions, workshops, interviews and digitization of government documents to create a comprehensive picture of the *Musrenbang* process in Solo. As revealed in this report the data gathering revealed a number of problems with the program's implementation, including poor targeting by the program in needy areas, demonstrating how data collection and analysis can be used to monitor and evaluate local participatory policies.

Second, Kota Kita developed the *Musrenbang*-Tracker (Mus-Tracker), a mobile and web-based application that provides a platform for citizens to comment and oversee the implementation of projects, and invites citizens to participate in tracking progress. Given the wide adoption of smart phones in Indonesia, particularly by the young, the Mus-Tracker aims to democratize access to the *Musrenbang* process and stimulate youth participation in Surakarta.

Through these two initiatives, it is our hope that Kota Kita will refocus efforts within the government and civil society toward rigorous data-based approaches for the monitoring and analysis of participatory budgeting for urban infrastructure. Greater

¹ The Indonesian government continues to implement participatory development programs; in 2014, the parliament passed a new Village Law (UU No.6/2014) which transfers funds directly to villages to determine themselves how to best allocate resources.

awareness of the benefits of using urban data for monitoring and analysis, of public access to information, and oversight by citizens, can promote more open and inclusive forms of governance and better infrastructure delivery in Indonesia.

The AIIRA research grant provided the impetus to Kota Kita to go beyond initial efforts to simply provide access to urban information, to better understand what happens when citizen decisions about local resources are taken, and, when they are executed, whether they indeed relate to citizen demands and needs.

1.2 Research Conclusions

The primary research conclusions were the following:

- (i) Solo's participatory budgeting mechanism is not targeting the neediest areas in the city (those with the highest concentration of poor people and those most lacking in services), but it does effectively respond to the demands of areas where the most people live.
- (ii) Urban data is an important tool to monitor and evaluate the budgeting process, and to indicate opportunities for improving it.
- (iii) Trainings and increased accountability for *kelurahans* and their officials can improve the performance of the *Musrenbang* process.
- (iv) Citizen-generated monitoring data provides valuable insights about whether projects have been executed by harnessing social media and citizen interest. Web-based platforms can become tools to improve transparency and accountability of the project implementation phase of the *Musrenbang* process.

1.3 Outputs and Outcomes

Outputs

The following outputs resulted from the research:

- The Solo government has agreed to continue to digitize neighborhood data from each of the 51 neighborhoods, and consolidate the datasets annually. The Mayor of Solo officially recognized this agreement in a Memorandum of Understanding that is currently awaiting a signature (November 2015).
- Solo government staff in every *kecamatan* have been trained and are now able to digitize *Musrenbang* data, and to use the Internet to submit it digitally to the Mayor's Office.
- A digital monitoring web platform, which also offers access to vital data about the city and infrastructure projects, called the *Musrenbang Tracker* has been developed. Although still a prototype, the public has added over 300 comments about existing projects throughout the city. This website can be accessed using a laptop or a smartphone at:

<http://solokotakita.org/musrenbangtracker/>

- Tara Grillos has completed her PhD dissertation at the Harvard Kennedy School of Government, several chapters of which were dedicated to an analysis of the *Musrenbang* process in Solo and explained issues of elite capture and impact. This is now publicly available².

Outcomes

The following are expected outcomes that will result from the research:

- **Local participatory planning processes are regularly evaluated**

The data generated has illuminated challenges and opportunities presented by different stages of the *Musrenbang* process. This research will allow the Government of Solo to more effectively monitor the performance of the *Musrenbang* process, and to identify what is going well and what is not. The city government will continue data digitization, collection, and analysis, will oversee the process with more rigor (due to the existence of more reliable data), and will also progressively train staff about how to improve management of the participatory planning process.

- **The *Musrenbang* process will be improved to better target poor areas and promote the involvement of the poor**

The research will increase the focus on the Public Phase of the process, so that more direct and regular promotional campaigns help raise awareness about the *Musrenbang* process, provide information that supports prioritization of projects, and increase the participation of poor communities in voting.

- **New participants will enter participatory budgeting processes and monitor infrastructure implementation processes themselves**

The design and development of the web-based monitoring tool, the Mus-Tracker, encourages more and more residents, youth, and other community members to become active in overseeing the completion of executed projects. This will help invigorate ownership and attendance at decision-making meetings and provide an opportunity for the poor to get involved in the development of their communities.

² Grillos, T. (2015). "Poverty Targeting and Elite Capture in Participatory Planning in Indonesia." *Participation, Power and Preferences in International Development* (Doctoral dissertation). Retrieved from DASH - Digital Access to Scholarship at Harvard.

CHAPTER 2: Background

2.1 The changing context of citizen participation in Indonesia

The decentralization that took root in Indonesia post-*Reformasi* has allowed local governments to make decision-making more participatory and accessible. Decentralization aimed to increase local government oversight and control over policy making, and give citizens greater budgetary decision-making power (World Bank 2003) [Reference can be made from this footnote³] In theory, direct citizen participation leads to “better delivery of public goods and services, better maintained community assets, and a more informed and involved citizenry that is capable of undertaking self-initiated development activity” (Mansuri and Rao 2004). This expectation has directly shaped Indonesia’s policies in incorporating citizen participation. Yet, more than 15 years after its implementation, political and economic outcomes have varied greatly across the country’s 508 cities and districts (Hill 2014; reference can be made from this footnote⁴). Decentralization has paved the way for the emergence of innovative ideas and leaders from throughout the country’s regions (Hamid⁵).

Decentralization has also offered Indonesia tremendous opportunities to increase the involvement of ordinary citizens in infrastructure delivery. Starting with the World Bank-initiated *Kecamatan* Development Program (Gibson & Woolcock 2008, Barron, Diprose & Woolcock 2006, Olken 2005, etc.), the Indonesian government has undertaken multiple initiatives to increase citizen participation in governance issues. While the KDP (and its current-day successor, PNPM) is often seen as an infrastructure delivery success story, it operates outside of the formal government budget structure and bypasses the local government, rather than strengthening it.

Kota Kita’s initiatives in Surakarta focus on the *Musrenbang* program. Since 2004, the program has been used by a number of cities and districts across the country to promote community participation and empower local communities to identify, prioritize, and implement local infrastructure projects supported by government funding. Indeed, *Musrenbang* meetings function as the official bottom-up component of the country’s annual national budgeting process. Since the program operates *within* Indonesia’s decentralized governance structure, improving its operation is crucial for the long-term prospects of community-centered infrastructure delivery.

³ <http://www1.worldbank.org/publicsector/LearningProgram/Decentralization/Hofman.pdf>

⁴ <http://aseasuk.org.uk/3/br/regional-dynamics-decentralized-indonesia>

⁵ <http://asiafoundation.org/in-asia/2014/10/01/in-indonesia-decentralization-and-direct-elections-two-sides-of-the-same-coin/>

The Village Law

The Village Law, No.6/2014 was passed by the House of Representatives on December 18, 2013 allocates higher development budgets to villages. It is estimated that each village will receive a central and regional government transfer of approximately Rp1.4 billion each year to fulfill basic needs such as infrastructure.

The Village Law is significant because citizens will have a greater deal of autonomy in prioritizing and managing resources. In order to do so better monitoring and accountability mechanisms are needed, as well as the adoption of good practices from participatory budgeting cases.

2.2 Research site

Solo is an instructive case for policy makers looking for lessons from participatory budgeting experiences. Solo is a thriving city in Central Java, home to some 600,000 inhabitants, and with a strong textile and handicrafts industry. It is also the first city in Indonesia to implement participatory planning in 2002. During his period as Mayor of Solo, Joko Widodo implemented the program with keen interest. In stark contrast to national reputation, the city has become synonymous with clean governance. Widodo's campaign slogan, 'Bersih Tanpa Korupsi' (Clean Without Corruption), has become synonymous with the city's attitude towards transparency.

Solo's *Musrenbang* process is interesting because of a unique feature of its implementation: the city allocates a local grant (DPK) to each of Solo's 51 neighborhoods annually. The allocation of grant monies is discussed and implemented by citizens and the neighborhood government in consultation with the city government's agencies. The *Musrenbang* program in Solo has operated for over 13 years, with continuous efforts to improve the policy. The *Musrenbang* process allows each *kelurahan* to autonomously determine infrastructure spending in their own neighborhoods, thereby improving the effectiveness of public investments. Since funding is determined through a consultative process, it should, at least in theory, map directly onto citizen preferences.

However significant challenges remain in fulfilling the potential of participatory development. Only 16% of proposals put forward by the community in 2011 were approved by the city government for funding. Despite the city government's strong commitment to this participatory budgeting processes there is substantial mismatch between citizen demand and actual infrastructure delivery. Moreover, *Musrenbang* facilitators have reported declining attendance in meetings and a sense of stagnation in the process. In this environment, youth participation is an important way to revitalize the program and promote more active involvement.

Furthermore the *Musrenbang* prioritization process occurs a full year before the *kelurahan* grant funding is actually distributed. As a result, there is a great deal of confusion as to the effectiveness of this system, particularly with respect to the third

step above. Our preliminary data indicates that the majority of infrastructure projects that appear on the funding distribution plan did not actually appear in the *Musrenbang* prioritization process at all. These “ghost projects” represent a major gap in knowledge about infrastructure delivery in Solo.

The existence of “ghost projects” could be a reflection of elite capture in the process, whereby local elites co-opt the participatory process for their own ends. However, they could also reflect legitimate action on the part of the *Musrenbang* leadership to contend with challenges brought about by the bureaucratic nature of the process and the time delay between prioritization of needs and actual delivery of funds.

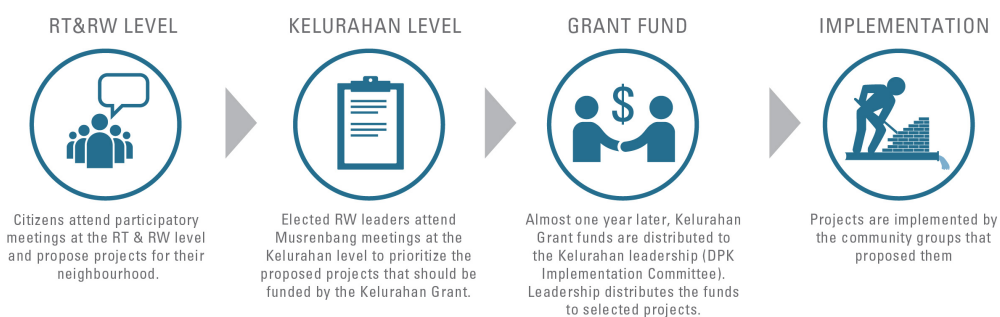


Figure 1: The Musrenbang process involves community members and leaders, and takes over 1 year from inception to implementation

At each stage, there are opportunities for failures or corruption in the process. At stage 1, there may be disproportionate representation among those who actually attend the meetings and make proposals. At stage 2, RW leaders may vote based on self-interest rather than on an assessment of the most pressing needs in the *kelurahan*. At stage 3, DPK leadership may diverge from the list of planned projects and distribute the funds according to their own interests. At stage 4, funds may be misallocated or pocketed rather than being used according to the original implementation plan. Disentangling these different steps and identifying possible discrepancies at each stage has been a major goal of this research.

One of the problems is that there are few accountability mechanisms that ensure that the *Musrenbang* is conducted effectively at the lowest levels (RT, RW) in Solo. At each level, the *Musrenbang* process documents priorities identified by citizen-participants. However, this documentation is rarely used because it is not readily accessible, is not digitized, and is sometimes discarded or lost after a certain period of time. Simply collecting this information and making it accessible would constitute a major contribution to the understanding of *Musrenbang* proceedings and their effects on infrastructure delivery.

Yayasan Kota Kita, also known as Kota Kita, is an Indonesian NGO based in Solo that has been collecting and analyzing data about the *Musrenbang* process in Solo, since

2010. Kota Kita's, mission is to promote citizen engagement and participation in decision-making about their communities and cities, thus a central focus of their work is to develop ways for citizens to be actively involved in local processes such as the *Musrenbang*. In 2010 Kota Kita first implemented a crowd-sourced data collection process that gathered socio-economic and demographic data from each of the city's 2,700 RTs, resulting in a new, publically accessible citywide information system for citizens. This was designed specifically to improve decision-making by residents about project priorities for the *Musrenbang*. The positive working relationship with the City Government of Surakarta developed through this process provides the opportunity to not only access their data, but also to influence policy makers with regards to needed improvements, and introduce new policies through recommendations.

Musrenbang

Musrenbang is an annual process during which residents meet together to discuss the issues facing their communities and decide upon priorities for short-term improvements. Once a list of priorities is made, it is submitted to the local government planning department, Bappeda, which will then assign resources to each neighborhood depending upon the available funds and according to need. The *Musrenbang* meetings occur in the community centers in every neighborhood during January.

This participatory budgeting process makes it possible for residents to articulate their needs to local government. There are also *Musrenbang* processes at the district and city levels as well as at provincial and national levels. *Musrenbang* is a bottom-up approach, which means resident voices can actively influence the city budget and how investments are made in neighborhoods.

CHAPTER 3: Research Questions

3.1 Research Approach

The research has two phases, the first (from September 2014 - May 2015) focuses on the government's management of Solo's *Musrenbang* process, the second (May–October 2015) focuses on engaging citizens to comment on the results of this process. While the *Musrenbang* also delivers other kinds of projects, including academic scholarships and funding for social and cultural events, this research examines the infrastructure portion of the *Musrenbang* process for all 51 *kelurahans* in Surakarta from 2011 through 2014.

The two phases of the research approach are:

1 Analysis of the *Musrenbang* process in Solo

A complete compilation and digitization of *Musrenbang* projects (for the years 2011-2014) that were voted on in the *Musrenbang* consultation process and those that were later reported as executed for that same year of funding, and analysis of the resulting database.

2 Creation of a citizen-driven, web-based transparency tool

The creation of a web-based transparency tool to share the above information with the public and crowdsource information about the actual implementation and maintenance of those projects reported to be executed, as well as subsequent, ongoing analysis of that crowd-sourced data.

It is important to note that neither phase is intended to be a single, discrete analysis, but rather each are conceived of as ongoing: as each year's process occurs, new data will be digitized, shared, and supplemented with crowdsourced data, and then analyzed as an integral part of the formal evaluation of these city processes.

3.2 Research Objectives

Our research objectives were to answer the following questions

1 Do citizen priorities established through the *Musrenbang* process reflect the most pressing needs of the community?

This question will help us to ascertain whether the *Musrenbang* process is having an impact by addressing poor and under-serviced areas of the city with needed infrastructure. To respond we look at different analytical lenses, such as examining project typology, location variables, and comparing different geographic scales of public services and need. We wanted to know whether citywide needs (water, sanitation, poverty) are related to the priorities selected by, and the budgets assigned to, *kelurahans* across the city. This will let us know whether there is a match between needs and demand citywide. By answering this question we will be able to ascertain whether the *Musrenbang* process is as useful

and effective in responding to citizen needs as is assumed.

2 Are the priorities established by the *Musrenbang* process those that are actually funded?

This question seeks to ascertain whether the *Musrenbang* process is effectively channeling citizen aspirations and executing projects that citizens vote for. To respond we look carefully at each of the individual stages of the *Musrenbang* process. Analytically this is a challenge because there are three steps of the process: (Step 1) Public phase proposal of projects and prioritization; (Step 2) managerial phase funding allocations; (Step 3) actual physical implementation of the projects by the groups receiving the funding.

3 PHASE OF MUSRENBANG

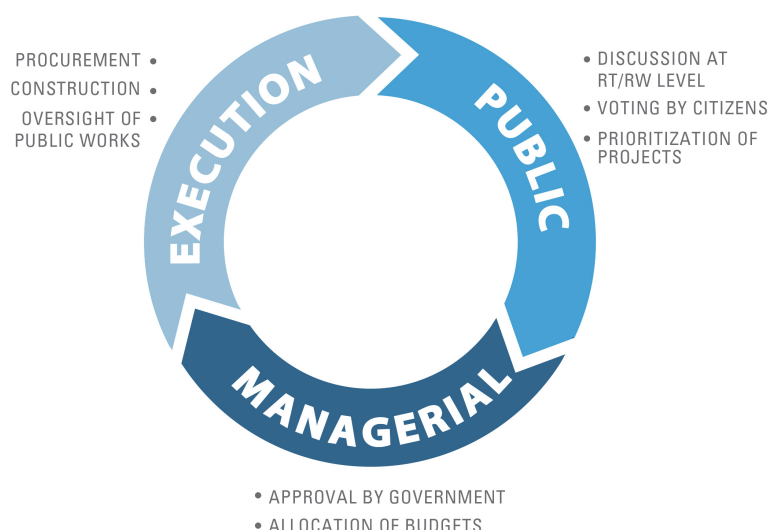


Figure 2: There are 3 phases of the Musrenbang Process: the Public Phase, the Managerial Phase, and the Execution Phase

We have used the quantitative dataset to review Steps 1 and 2, and hope to demonstrate how our crowd-sourced dataset can be used for Step 3. We aim to understand whether there are discrepancies between Stage 1 and Stage 2, and what might cause such discrepancies.

3 Are the needs of the community effectively addressed through the *Musrenbang* process over time?

This research question evaluates the effectiveness of the *Musrenbang* process over time, asking whether citizen demand changes from year to year, to see if there has indeed been an impact of implemented projects. To answer this we

utilize the citywide data set of socio-economic data for each RT to evaluate whether there are changing needs, and thus whether the program has had an impact over the last 4 years. This is useful to judge whether the process has managed to deliver projects to communities and progressively impact the city.

4 How does success vary across *kelurahans* and why?

We seek to evaluate if there are differences in performance of the *Musrenbang* process across the different *kelurahans*. This is useful to understand if the managerial capacity of the *kelurahan* officials may play a role, and if so, which officials may benefit from training or monitoring, in order to improve the process across all of the city's *kelurahans*.

5 Do citizen perceptions reflect our analytical findings?

We seek to gauge citizen perceptions of the *Musrenbang* process. The hope is that this research will allow us to use the qualitative survey to see if, in the places where there were large discrepancies between the public and managerial processes, there were also higher degrees of dissatisfaction or reports of corruption.

6 Are citizens interested in commenting on the status of projects using a web-based transparency tool?

Finally we would like to evaluate the popularity and ease of use of the *Musrenbang* Tracker platform to judge whether citizens will use it to comment and provide up to date oversight on the final 'implementation' phase of the *Musrenbang* process. This will demonstrate whether there is interest and capacity amongst citizens to further develop and use this tool.

CHAPTER 4: Methodology

The primary early focus of research was to understand characteristics of projects proposed to and supported by the *Musrenbang* process. This was done through extensive collection, digitization, and quantitative analysis of municipal data. Kota Kita supplemented this process with polling surveys, in-depth interviews, workshops, focus groups, and the development of the Mus-Tracker online system. The use of these diverse quantitative and qualitative methods allowed for a deep and comprehensive understanding of the state of participatory budgeting in Solo.

4.1 Digitizing Local Government Data

In the first phase of research (September 2014 – May 2015), Kota Kita collected information about the outcomes of the *Musrenbang* process, with a particular emphasis on the infrastructure spending through the *Musrenbang* process. This involved the collection and digitization of the following data for each of Solo's 51 neighborhoods spanning 2011–2014. In total, Kota Kita digitized 53,846 data points about 3,846 projects from the *Musrenbang* process, including their location, approval status, budget allocation, and typology.

- Outputs from the *Musrenbangkel* (the Neighborhood-level budget prioritization process) for all 51 neighborhoods: These documents contain the lists of all the proposals agreed upon by citizens at the neighborhood level. The lists cover a range of sectors: social, economy, general affairs and infrastructure; our research focused primarily on the lists of infrastructure priorities.
- Outputs from the *Musrenbangkot* (City-level budget prioritization process): A published list of projects that have been prioritized by the neighborhoods and approved, but which will be absorbed into the department-level budgets (therefore not by the neighborhood grant process) for implementation.
- The *Dana Pembangunan Kelurahan* (DPK) or Neighborhood Grant for each 51 *kelurahans* of the city.
- The APBD (City Budget): The APBD is the annual local budget approved by Parliament. Since Parliament effectively has the last word in deciding which projects can be approved, this document allows us to see which projects may have been prioritized and approved in the *Musrenbangkot* but were not approved by Parliament.
- The Mayor's Decree about the DPK Implementation Plan: This decree announces the amount of money that each neighborhood will receive through their block grant for local projects, including infrastructure projects.
- The Urban Land Use Plan (*Rencana Tata Ruang Wilayah*, RTRW): This document is the Solo city government's urban land use plan, which determines the overall development patterns for the city.

These multiple sources of data were quantified and digitized to create a complete database of *Musrenbang* outcomes over the past four years. This quantitative data was then analyzed extensively, comparing characteristics of the projects themselves, the RWs in which the projects were slated for implementation, and the *kelurahan* within which the funding allocation decisions were made.

In terms of quality control the major issue was ensuring the collection and inputting into the database of clean and reliable data. Efforts were taken to ensure that the data entry phase was rigorous and a safeguard measure was instituted using redundancy to identify incorrect data entry. This helped to ensure that the data used for analysis was reliable.

| KELURAHAN | YEAR | VOTED | CATEGORY | SUBCATEGORY | UNIQ... | LEVEL | PRIORITY | PROJECT_NAME | LOCATION | AGENCY |
|------------|------|-------|----------|-------------|---------|-----------|----------|---|-----------------------------------|------------|
| BALUWARTI | 2011 | VO | IN | SR | 01 | KELURAHAN | 01 | Rehap Poskamling RW5 | RW2-RT5 | PPK (Pari) |
| BALUWARTI | 2011 | VO | IN | DR | 01 | KELURAHAN | 02 | Perbaikan saluran/drainase | RW9-RT2,RW10-RT1,RW10-RT2,RW3-RT3 | PPK (Pari) |
| BALUWARTI | 2011 | VO | IN | SA | 01 | KELURAHAN | 03 | Pembangunan MCK/Rehap MCK PAUD | RW6 | PPK (Pari) |
| BALUWARTI | 2011 | VO | IN | AR | 01 | KELURAHAN | 04 | Pembangunan hidran umum berbasis masyarakat RW6-RT1 | RW6-RT1 | PPK (Pari) |
| BALUWARTI | 2011 | NV | IN | DR | 02 | KELURAHAN | 05 | Perbaikan gorong-gorong | RW11-RT2 | PPK (Pari) |
| BALUWARTI | 2011 | NV | IN | JA | 01 | KELURAHAN | 06 | Perbaikan jalan kampung | RW5-RT1 | PPK (Pari) |
| BANYUANYAR | 2011 | VO | IN | DR | 01 | KELURAHAN | 01 | Saluran (irigasi) | RW2,RW9-RT3 | PPK (Pari) |
| BANYUANYAR | 2011 | VO | IN | JA | 01 | KELURAHAN | 02 | Pemasangan paving | RW2 | PPK (Pari) |
| BANYUANYAR | 2011 | VO | IN | DR | 02 | KELURAHAN | 03 | Pembuatan saluran | RW1 | PPK (Pari) |
| BANYUANYAR | 2011 | VO | IN | SR | 01 | KELURAHAN | 04 | Pembuatan gapura | RW1 | PPK (Pari) |
| BANYUANYAR | 2011 | VO | IN | DR | 03 | KELURAHAN | 05 | Pembuatan talud | RW10-RT1 | PPK (Pari) |
| BANYUANYAR | 2011 | VO | IN | JA | 02 | KELURAHAN | 06 | Betonisasi bahu jalan | RW10-RT1,RW10-RT2,RW10-RT3 | PPK (Pari) |
| BANYUANYAR | 2011 | VO | IN | DR | 04 | KELURAHAN | 07 | Pembuatan saluran | RW11 | PPK (Pari) |
| BANYUANYAR | 2011 | VO | IN | JA | 03 | KELURAHAN | 08 | Betonisasi jalan perkerasan | RW7-RT6 | PPK (Pari) |
| BANYUANYAR | 2011 | VO | IN | DR | 04 | KELURAHAN | 09 | Pembuatan saluran | RW5 | PPK (Pari) |

Figure 3: Over 50,000 data points representing different stage of the Musrenbang process from each of Solo's 51 kelurahans was digitized and compiled into a database

4.2 Surveys/Polling

To complement the quantitative, observational data from the reporting procedures themselves, we also collected qualitative data, including a short-form survey conducted in January, 2015. The survey included 4 respondents (2 male and 2 female) from each of the 51 *kelurahan* in Solo, for a total of 204 participants. Survey respondents were on average 53 years old, with an age range of 20-77, and were randomly selected from lists kept in each RT of residents who had attended at least one *Musrenbang* meeting.

This survey focused on resident perceptions of the *Musrenbang* process, and sought to explore how members of the community experienced the process and whether experiences differed strongly across neighborhoods. We found that residents believed in the importance of the *Musrenbang* process and in its potential to impact community development, but that the majority were unsatisfied with the process and felt there was little way to predict whether proposals they made would be funded or not.



Figure 4: A Kota Kita staff member conducts a survey with a community member

4.3 In-depth interviews

In addition, we conducted 11 in-depth interviews with *Musrenbang* leadership in order to generate richer descriptions of the process itself. In each of Solo's 5 *kecamatan* (districts), we randomly selected at least 2 neighborhoods from a list of neighborhoods with 'ghost projects' as discovered by quantitative analysis described in 4.1. In each of these neighborhoods we sought interviewees who were deeply involved in *Musrenbang* proceedings, including:

- Facilitators of the *Musrenbang* at the *kelurahan* level
- DPK (Kelurahan Grant) Evaluators who monitor & evaluate DPK Implementation (these are residents, not government officials)
- LPMK (Neighborhood Council) members who are in charge of the overall *Musrenbang* process, from preparation to planning to implementation

These interviews were conducted shortly after the survey described in 4.2 was completed, in late January, 2015. The interviews allowed us to go into much greater detail and develop a deeper understanding of *Musrenbang* proceedings. We also specifically sought out leaders of this process with to greater understand how decisions regarding prioritization and funding were made. We found that there are no rigid criteria by which to prioritize projects. Additionally, while there is an initial prioritization of projects at the time of proposal, this is not binding and the actual decisions about which projects to fund takes place nearly a year later when the funding arrives at the *kelurahan* level. Leaders then use their discretion regarding the inclusion or exclusion of community members in this final decision making process. These community leaders all said that the 'ghost projects' were a result of new and pressing

needs that had arisen in the year between the initial meeting and the dispersion of funds, and were not evidence of corruption.



Figure 5: A Kota Kita staff member conducts an interview with a community leader

4.4 Workshops

Kota Kita conducted a series of workshops in order to maximize the benefit that the community could reap from this project. We aimed to assess community needs, give community members a platform to share ideas and critiques, and share how research and tools can be used. Two early workshops in June and July of 2014 introduced the AIIRA project to 38 *Musrenbang* facilitators, closely followed by a presentation in August introducing the project to Solo city government officials.

Another presentation to city government officials in early April, 2015, presenting the results of research conducted up to that point, kicked off a second series of workshops. This second set consisted of 5 workshops, one for each *kecamatan*, and trained 88 *Musrenbang* facilitators using a prototype of the Mus-Tracker. This series wrapped up with a similar training for 49 *kelurahan* officials. Through these presentations and workshops it became clear to all involved there were ways they could benefit from using the Mus-Tracker system. There were also a number of helpful suggestions for potential improvements and applications of the tool.

4.5 Focus Groups

On September 29th, 2015, following the release of the Mus-Tracker technology we conducted a focus group discussion with 6 *Musrenbang* leaders. The purpose of the focus group was to test, gauge reactions to, and solicit feedback to improve the Mus-Tracker tool. We made an effort to represent various levels of familiarity with technology amongst the participants: 2 were familiar with the internet and social media, 2 were familiar with the internet but not social media, and 2 were not familiar

with either the internet or social media. Observation of the participants and their feedback provided valuable input for improving both the form and function of the Mus-Tracker tool.



Figure 6: Community members test out the Mus-Tracker online platform in a focus group discussion

4.6 Mus-Tracker

The *Musrenbang*-Tracker, or Mus-Tracker, is a website which includes a user-friendly visual display of the data, and provides a forum for user-generated feedback regarding the implementation and maintenance of the projects included in the *Musrenbang* database. Use of the Internet, especially by mobile phone, is extremely widespread in urban Indonesia, with 73 million people, some 29% of the population using the Internet in 2015⁶. Now, with the Mus-Tracker platform, anyone with internet access can see what projects were proposed, which were funded, how much funding they were given, whether they were implemented, and how much budget was used, in any given neighbourhood.

In addition, this tool is interactive, and the public is encouraged to provide commentary about listed projects, for example whether they have been built or if they are poorly constructed, or have been abandoned. Government officials, community leaders, or those who proposed projects can respond, making the Mus-Tracker a dynamic platform for multi-stakeholder discourse. Projects are visible by maps, and can be overlaid with various demographic data and data about public service provision and access. This means that there are a huge number of possibilities for people to

⁶ The Jakarta Post, 2015,

<http://www.thejakartapost.com/news/2015/03/10/internet-users-indonesia-reach-73-million.html#sthash.gcAcB5CX.dpuf>

examine the contexts in which projects are funded – you can compare the number of projects in an RT to whether there is access to public water, or the concentration of poverty, or the average age in any neighbourhood.

The Mus-Tracker was unveiled on October 5th, 2015, and promoted on social media, through student organizations, and directly to community leaders. Kota Kita staff conducted a follow-up meeting with focus-group participants to show them the updated platform, and 6 individual meetings were held with district leaders, at least one per district. Initial results indicate that the Mus-Tracker has been well-received by government as a useful civil society innovation, and has been popular with the public, already garnering over 300 comments on community projects. With an increase in the use of mobile devices and the Internet the availability of information through digital means is increasingly important, especially to a younger demographic.



Figure 7: The Mus-Tracker web application encourages the participation of the younger, tech-savvy generation

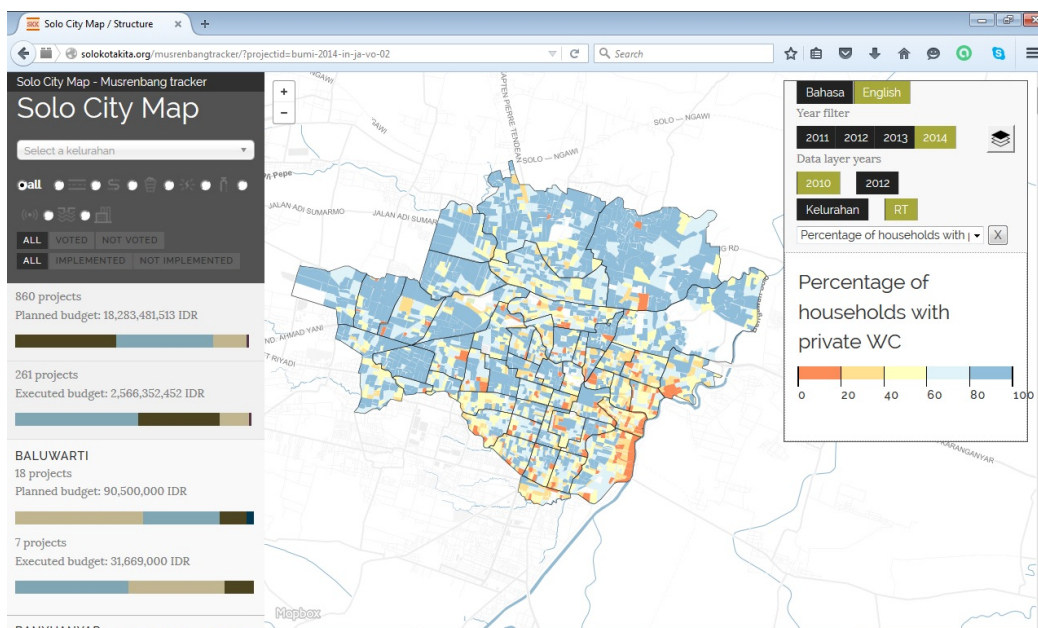
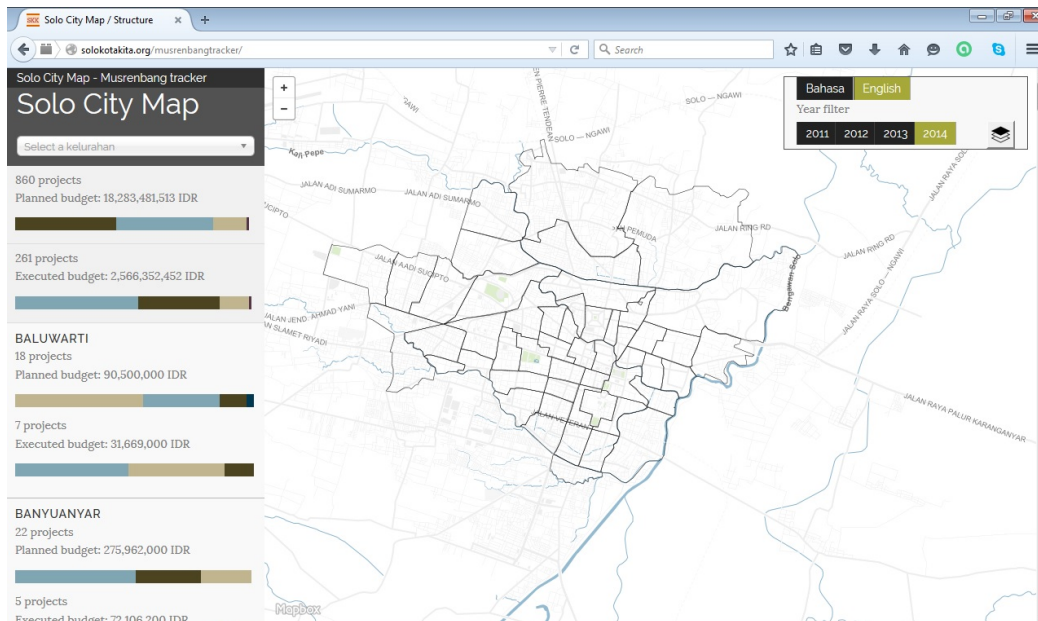


Figure 8: Screenshots taken from the Musrenbang Tracker, the web-based project tracking tool that was developed. The tool allows citizens to review which projects in their kelurahan received funding, the budget of each project, their location and their status. It also allows them to compare data about the city to help evaluate need. Citizens can comment on the status of each project and provide oversight on their implementation. <<http://solokotakita.org/musrenbangtracker/>>

CHAPTER 5: Discussion on Research Findings

5.1 Summary of Findings

1. In Solo the *Musrenbang* is not working to target neediest areas, but it is responding to citizen demands and investing in those with the largest populations. This reveals both the potential of the policy; but also opportunities to refine it in order to achieve distribution/ equality.
2. Transparency can be increased by developing technology tools that allow citizens more oversight and involvement in implementation of Musrenbang-selected projects.

5.2 9 Key Findings

1. Drainage and roads projects are the most popular infrastructure projects

An analysis of the database showed that drainage and roads projects are by far the most popular categories of infrastructure projects during the voting/prioritization process, and they are also more likely than other project types to be implemented if voted on and more likely to appear as ghost projects. There is inconclusive evidence to explain whether the variance in project type is due to a greater need for those kinds of projects, or whether they are preferred for other reasons, for example, technical difficulties with other project types. Since the preference for voting for drainage and roads is increasing over time, it is possible that this is in part a reaction to their greater likelihood implementation.

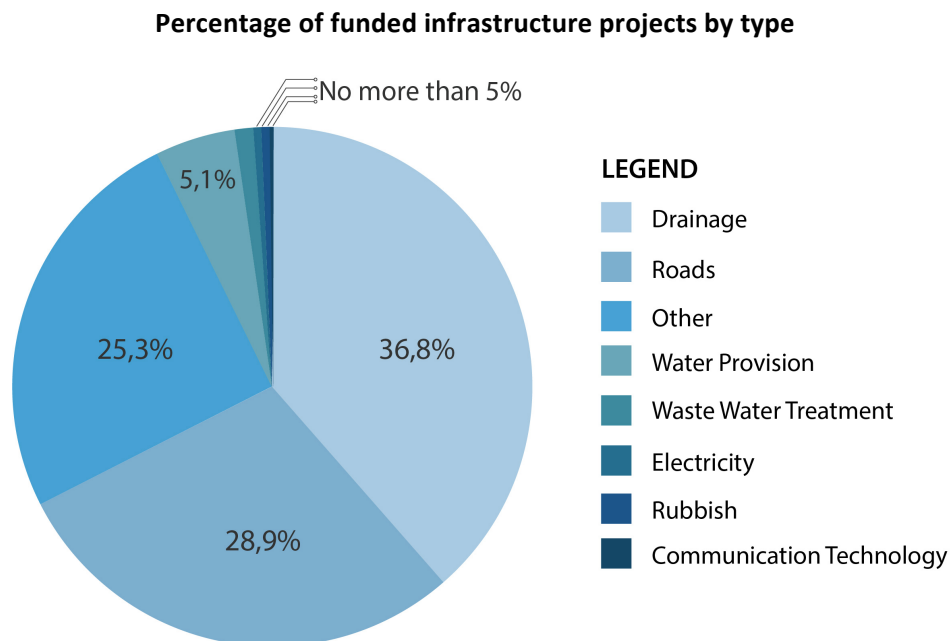


Figure 9: The large majority of funded projects focused on roads and drainage infrastructure

2. The *Musrenbang* process is not addressing the areas of the city with greatest need

According to the database, the neighbourhood poverty rate does not influence project prioritization, only the size of population seems to matter. RWs with more projects are those with larger populations, as evidenced in Table 1A which indicates that population size is the primary predictor of the prioritization of projects. Table 1B shows that poverty actually has an *opposite* influence on project prioritization to what we would expect if the process was used to target needs. Thus we can conclude that the RWs with most people, and the RWs with lowest concentration of poverty, get more funding. This indicates that not only are the neediest areas not targeted, but that, in fact, the neediest areas may be the *least* likely to receive funds.

Table 1a: Determinants of Location of Kelurahan Grant Projects by RW

(Source: Grillos 2015)

| | Percent of Voted Projects | Public Process Budget Outcomes | Percent of Executed Projects | Managerial Process Budget Outcomes | Difference Public vs Managerial Budget |
|------------------------------|---------------------------|--------------------------------|------------------------------|------------------------------------|--|
| Poverty Rate | -0.000319 | -0.00427 | -0.00485 | -0.00371 | -0.00000479 |
| | (0.00402) | (0.00505) | (0.00603) | (0.00614) | (0.000439) |
| Percent Land Tenure | 0.00109 | -0.00227 | 0.00175 | -0.00258 | -0.0000464 |
| | (0.00205) | (0.00274) | (0.00289) | (0.00297) | (0.000267) |
| Percent Water Access | -0.000742 | 0.00155 | -0.0000988 | 0.00280 | 0.0000750 |
| | (0.00191) | (0.00235) | (0.00280) | (0.00288) | (0.000220) |
| Percent Private Wells | 0.00158 | 0.00176 | -0.000249 | 0.00165 | -0.00000681 |
| | (0.00165) | (0.00171) | (0.00235) | (0.00240) | (0.000184) |
| Percent of Total HHs | 3.701*** | 4.673*** | 3.877** | 4.115*** | -0.0963 |
| | (0.834) | (0.973) | (1.252) | (1.209) | (0.112) |
| YEAR | -0.0676** | 0.0112 | -0.0120 | 0.0235 | 0.000721 |
| | (0.0255) | (0.0303) | (0.0374) | (0.0403) | (0.00296) |
| Constant | 133.2** | -25.60 | 21.38 | -50.27 | -1.642 |
| | (51.32) | (61.02) | (75.26) | (81.02) | (5.959) |
| Observations | 2295 | 2259 | 2304 | 2304 | 2259 |

Standard errors in parentheses

* p < 0.05, ** p < 0.01, *** p < 0.001

Table 1A shows that only the size of the population (percent of total households) seems to have been a significant determinant for the location of Kelurahan Grant Projects by RW.

Table 1b: Budget allocations by RW Poverty Rate Quintiles

(Source: Grillos 2015)

| | Percent of Voted Projects | Public Process Budget Outcomes | Percent of Executed Projects | Managerial Process Budget Outcomes | Difference Public vs Managerial Budget |
|---------------------|---------------------------|--------------------------------|------------------------------|------------------------------------|--|
| RW Poverty | -0.108* | -0.174*** | -0.151* | -0.206*** | -0.00695 |
| (by Quintile) | (0.0485) | (0.0439) | (0.0650) | (0.0600) | (0.0100) |
| Population | 1.471*** | 1.466*** | 1.235** | 1.022* | -0.0461 |
| (% Kelurahan) | (0.303) | (0.292) | (0.418) | (0.448) | (0.0685) |
| YEAR | -0.0182 | 0.162* | 0.0149 | 0.0606 | -0.00488 |
| | (0.0749) | (0.0639) | (0.0906) | (0.0872) | (0.0142) |
| Constant | 34.31 | -329.6* | -32.00 | -123.3 | 9.656 |
| | (150.6) | (128.5) | (182.4) | (175.4) | (28.50) |
| Observations | 248 | 248 | 248 | 248 | 248 |

Standard errors in parentheses

* p < 0.05, ** p < 0.01, *** p < 0.001

Table 1B shows that the poverty rate did have a statistically significant effect on determining budget allocations, but in the opposite direction from what we would expect if needs were being targeted. In fact infrastructure projects went to those parts of the city which had least poor people.

3. There are opportunities for elite capture

Through interviews, surveys, and database analysis, we learned that the *Musrenbang* process involves several potential access points for elite capture, and there exists a great degree of murkiness surrounding the outcomes of the process. The analysis of the database reveals an inverse relationship between interference by the management committee (measured by the ghost variable indicator) and elite capture (measured by the percentage of funds directed to non-poor areas). This strongly indicates that, while there likely is elite capture in the process, it does not seem to occur in the Managerial Phase. If wealthy elites influence the decision-making of the *Musrenbang* then this is done during the Public Phase of the process. This may occur either by elites' undue influence in the prioritization process, or by their overrepresentation during the meetings. This may also indicate that the poor may not attend in large enough numbers for them to influence the outcomes of the *Musrenbang*, or perhaps they aren't welcome at the meetings, so their preferences aren't represented. One firm finding is that there is a need for additional data collection in order to further clarify inconsistencies in the process.

4. A large number of projects are not a result of citizen voting, and originate outside the *Musrenbang* process

Database analysis reveals that between 2011 and 2014, 30% of the projects that were implemented had not been voted on at all. As these projects did not show up on lists of *kelurahan* priorities, we call them “ghost projects”. During this four-year period, only 21.1% of voted projects were executed (built or implemented in some way) and of those projects only 40.3% were ever voted on.

There are a number of alternate explanations for the existence of “ghost projects” including inconsistent reporting of project titles, the need to implement a project due to an emergency or natural disaster, and insufficient funds, therefore requiring different projects to be selected. Regardless, thanks to the database we know that a large number of projects are approved and executed that have not had any citizen influence or participation, which is against the original stated objective of the *Musrenbang* process.

| 0-9% | 10-19% | 20-29% | 30-39% |
|------------------|-----------------|-----------|--------------|
| KEPATIHAN KULON | KAUMAN | SETABELAN | GANDEKAN |
| KEDUNG LUMBU | KERTEN | TIPES | SEMANGGI |
| PUNGGAWAN | MANAHAN | SONDAKAN | DANUKUSUMAN |
| BANYUANYAR | TIMURAN | PENUMPING | KESTALAN |
| SUMBER | MANGKUBUMEN | SANGKRAH | JOYOTAKAN |
| JAJAR | PAJANG | NUSUKAN | SERENGAN |
| TEGALHARJO | | BALUWARTI | KADIPIRO |
| 40-59% | 60-69% | 70-89% | 90-100% |
| GILINGAN | KEMLAYAN | SEWU | JOYOSURAN |
| JEBRES | LAWEYAN | KEPRABON | JAGALAN |
| SRIWEDARI | KETELAN | JAYENGAN | SUDIROPRAJAN |
| PUCANGSAWIT | KEPATIHAN WETAN | BUMI | KRATONAN |
| MOJOSONGO | PASAR KLIWON | | GAJAHAN |
| KAMPUNG BARU | PANULARAN | | KARANGASEM |
| PURWODININGRATAN | | | PURWOSARI |

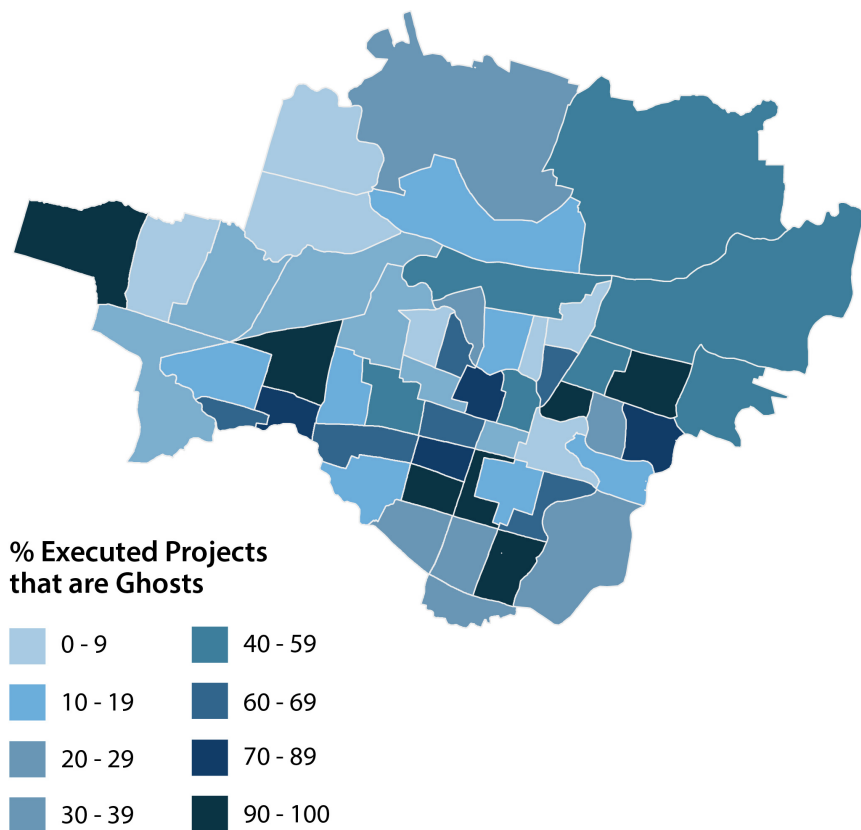


Figure 10: The table and map demonstrates the varying amount of ghost projects, as a percentage of the total number of projects, across all 51 kelurahan of the city. For a number of reasons there is a wide variance in the amount of ghost projects this suggesting that there is differing capacity across different kelurahan.

5. More than 75% of prioritized projects do not actually receive funding.

Despite citizen participation in the selection of priorities, the data revealed that a high percentage of these prioritized projects do not receive funding at all. This high number of rejected projects can be attributed to a number of explanations: (a) there was a difference in the available budget and the scale of projects put forward (However when we focus on only the top priority projects selected in each year, we still find that more than 60% of these do not appear on the list of executed projects. Thus the difference cannot be simply attributed to a mismatch between expected and received funding) (b) There may also be simply too many projects on the list, with the *Musrenbang* funding only able to stretch to cover the first few projects on the list of prioritized projects. Looking again to Table 1A, we see that there is a difference between the public and managerial phase outcomes which is not determined by any of our indicators. While we do not have data on income or wealth at the RW level (which

could be used to rule out the possibility that projects are directed towards wealthy elites; or whether the management committee members live in those areas which receive project funds) we can say that problems in the process originate the public phase (the citizen participation phase) not in the managerial phase. This is a significant finding because it goes against assumptions that problems are exclusively due to corruption and mismanagement by *kelurahan* officials and elites.

6. The *Musrenbang* process is helping to address need for public toilets

Musrenbang infrastructure funding is associated with an increase in the percentage of the population with access to public toilets. However, we cannot yet establish a causal relationship with respect to that finding. Additional information is required in order to establish the actual impact of the *Musrenbang* projects on communities.

7. There is significant variance across *kelurahans* in terms of their capacity to deliver upon citizen-prioritized projects

When we examine the *Musrenbang* data at the *kelurahan* level, we are able to see whether variance may be due to poor administration or differing levels of participation that occur in the neighborhood participatory planning process. The first map shows the different incidence of “ghost projects” across *kelurahans*, this indicates that there is significant variance all across the city.

A further map shows the difference in the lack of poverty targeting across *kelurahans*, which represents a measure of performance of the Public Phase of the *Musrenbang* process to target the poor. The last map indicates the difference in the percentage of the executed budget that belongs to “ghost projects”. This represents a measure of performance of the Managerial Phase of the process, reflecting its failure to carry out the citizen priorities established during the Public Phase. The analysis indicates a substantial variance across *kelurahans* on all of these measures. The qualitative surveys and interviews also indicate that there is quite a bit variance in the actual procedures used during this process in individual *kelurahans*. Together, this indicates an important area for future research, figuring out which characteristics of the *kelurahans* (institutional design, inequality, social cohesion) are driving the wide divergence in outcomes. It also indicates that better training and oversight at this level can improve outcomes.

8. People are enthusiastic about participation in the *Musrenbang*

Despite apparent inconsistencies in results, survey respondents report high degrees of satisfaction and trust in the process, and are either unaware or unwilling to admit that “ghost projects” and rejections occur. We surveyed *Musrenbang* participants to ask them about their perception of the process, whether people are indeed satisfied or dissatisfied overall. Respondents reported relatively high levels of satisfaction with the *Musrenbang* process and the management of the grants, and the actual number of “ghost projects” or rejected projects in their *kelurahans* did not significantly predict their satisfaction. On a scale of 1 to 5, where 1 meant “not at all” and 5 meant

“completely,” participants averaged more than 3 on questions relating to satisfaction with the *Musrenbang* process, and the management of the grants (as well as with respect to trust in the national and city government, the LMPK, the *kelurahan* leadership and the Development Committee). Despite an acknowledgement that issues such as ghost projects exist, respondents seem to be satisfied.

There are several possible explanations for the disparity between incidence of “ghost projects” and reported awareness of them, such as perceived legitimacy of these projects or lack of awareness of the final funding allocations. This points to the importance of the web-based transparency tool to correct information asymmetries, and to confirm whether the reported infrastructure projects already exist or not.

9. Early trials suggest that there is interest in using the *Musrenbang* Tracker app, especially with young people.

Finally, the focus group discussion and initial field-testing of the *Musrenbang* Tracker platform indicates that people are interested in and capable of using it. Young people in particular, who are adept at using smart phones and laptops, have used the app to comment on *Musrenbang* projects. They responded positively to the fact that anybody with an Internet connection can access information about the *Musrenbang* process. They were enthusiastic that a young generation of local activists and community-minded people can be more involved in community development due to their familiarity with the Internet and social media (the Mus-Tracker is accessed through Facebook). This represents a potential shift, as the oversight of local issues has generally been dominated by an older generation of residents. However, participants of the focus group voiced concerns about the difficulty of accessing the data in the Smart phone format, and noted that the prototype design was not to their liking. On the whole, participants responded positively to the Mus-Tracker.

CHAPTER 6: Conclusion

1. **Reforming the *Musrenbang* process, and adding targeting and promotion strategies, is needed for it to effectively address inequality and poor areas of the city.**

In its current format the *Musrenbang*, which is a democratic, direct-voting system, promotes a self-interested response from residents, who act to improve their own neighborhoods rather than prioritize the conditions of the worse off. People are thus voting according to what generates the greatest impact (in that it will benefit the largest number of people), rather than according to the greatest need (in which it would benefit the people who need it the most). While the policy does effectively promote democratic engagement of citizens with their city Bappeda's stated goal for the program is to ensure that government resources are addressing the urban areas of greatest need. The policy thus falls short of this goal.

A purely democratic budgeting process is insufficient to address inequality and poverty. Policy adjustments are needed, both in the Managerial Phase, as well as the Public Phase. In the Managerial Phase more oversight and monitoring is needed (this process is now beginning thanks to the digitization of data initiated by this research) but continued digitization and analysis of data will be important, as well as additional training for *kelurahan* officials. It is also critical to focus on the elite capture occurring in the Public Phase, likely due to an underrepresentation of the poor in the meetings. Thus, efforts need to be made to support raising awareness, providing more information to those who feel excluded from the process, and perhaps the introduction of technical fixes, like a weighting system, to ensure that poor areas have a higher probability of receiving needed projects.

Policy Recommendations for local government:

- Reform the process by creating a weighting mechanism that favors RTs and RWs which lack essential services and are poorer than the city average.
- Intensify efforts to raise awareness about the *Musrenbang* process and produce informational material that is clear and accessible.
- Promote better facilitation of the *Musrenbang* process through improved training and incentives to promote enhanced understanding of the process by all citizens.
- Indicate through revised guidelines that fewer projects should be selected, thereby raising the probability that prioritized projects will be implemented.

2. **Data is a useful tool to indicate where problems occur and give ideas of how to improve.**

Through analyzing the data we discovered that the process is not working according to plan; this demonstrates that data can reveal where the process is weakest and where improvements can be made. Initially we assumed we would find corruption in the Managerial Phase, and while we cannot rule that out, it seems that the

problems start earlier, in the Public Phase, because few poor people actually participate.

In order to minimize “ghost projects,” and improve the management and effectiveness of the *Musrenbang* process, it is important to digitize *kelurahan* data and consolidate it into a citywide dataset. This will continue the current trend towards tighter management of the *Musrenbang* funds and disincentivize those who seek to take advantage of the process.

In order to accurately monitor corruption in the Management Phase, a few additional data points would be helpful, including: income or wealth data broken down by RW (quite distinct from the currently available poverty rate); tracking the home RT/RW of members of the management committee (to check whether their own RTs are disproportionately benefitting); and data directly associated with issues brought up in qualitative interviews (for example, the *kelurahans* which experienced emergency situations or natural disasters, such as floods, in a given year).

Policy Recommendations for local government:

- Continue to digitize *Musrenbang* data and consolidate it for monitoring and analysis.
- Make digitized data more publically available to enhance transparency.
- Collect more precise data to cross check for corruption.

3. Trainings and increased accountability for *kelurahans* and their officials can improve the performance of the *Musrenbang* process.

Given the difference between citizen-prioritized lists and budgeting outcomes in the Public Phase, and the variations in “ghost projects” between different *kelurahans*, clearly some *kelurahans* perform better than others during the Public and Managerial Phases. The exact source of discrepancies is unclear, but problems during the Managerial Phase can be weeded out with good training, a systematic approach to uncovering corruption, and better oversight.

Policy Recommendations for local government:

- Use the data analysis to identify low performing *kelurahans* and target special trainings at improving internal systems such as documentation and management of the Public Phase.
- Develop and implement training modules for upgrading the skills of *kelurahan* government officials.

4. Continued promotion of citizen monitoring tools can provide opportunities for the public to oversee the Implementation Phase

This research grant has helped develop an early prototype of a web-based monitoring tool to be used by the public. This tool can provide greater oversight of the Implementation Phase, which is currently the least-tracked phase and perhaps offers the greatest opportunity for corruption (due to the chances of illicit procurement and poor quality construction). While the Mus-Tracker platform is still in its infancy, users have expressed enthusiasm about it. These users have also been younger and more technology savvy, suggesting that a younger generation of citizens has greater access to the *Musrenbang* process than they have in the past.

Review of the *Musrenbang* process reveals that overall it is opaque and poorly understood; citizen involvement seems limited to an older generation of residents, with insufficient participation of the poor. It may be possible to reform and improve the *Musrenbang* process by making more data available to both the government and the public, and creating new, portable, and accessible means of involvement and oversight. In order for the *Musrenbang* process to truly be participatory it must belong to the citizenry. This ownership is incomplete without full access to data that allows citizens to follow up on projects and see what has become of their participation in the budgeting proceedings.

Policy Recommendations for local government:

- Continue to promote the use of the Mus-Tracker, and work refine and develop it in collaboration with users.
- Encourage dialogue and discussion between citizens and *kelurahan* government officials about addressing needs and improving the effectiveness of the *Musrenbang* process.

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ANNEXES

ANNEXE 1: Survey Instrument

AIRA Perception Survey

Respondent : _____

Cell phone Number : _____

Day/Date : _____

Background & Demographic

1. Gender : male / female
Age _____ Kelurahan _____ RW _____ RT _____
Ethnicity _____
2. Are you a member of any groups, organizations or associations?

3. If yes, what kind organization do you join ? _____

Musrenbang Participation

4. Have you ever been participate in Musrenbang ?
 - a. Yes
 - b. No
5. What year did you first participate in Musrenbang ? _____
6. How many time have you participated ? _____
7. In Musrenbang, what level have you participated ? (*can choose more than one*)
 - a. RT
 - b. RW
 - c. Kelurahan (*neighborhood*)
 - d. Kecamatan (*sub district*)
 - e. City
8. If in RT level, what is your role in Musrenbang ?
 - a. Resident
 - b. Board of RT
 - c. CBO/CSO Representative
 - d. Never Participated

9. If in RW level, what is your role in Musrenbang ?
- RT delegate
 - Board of RT
 - Board of RW
 - CBO/CSO Representative
 - Never participated
10. If in Kelurahan (neighborhood) level, what is your role in Musrenbang ?
- RT/RW delegate
 - Board of RT/RW
 - Board of LPMK
 - LKM PNPM
 - CBO/CSO Representative
 - Religious leader
 - Community leader
 - Private/business sector
 - Never participated
11. If in Kecamatan (sub district) level, what is your role in Musrenbang ?
- Musrenbang Kelurahan Delegate/representative
 - Board of LPMK
 - CBO/CSO Representative
 - LKM PNPM Forum
 - Religious leader
 - Community leader
 - Private/business sector
 - Never participated
12. If in City level, what is your role in Musrenbang ?
- FGD SKPD (FGD in each government agency) delegate/representative
 - Musrenbang Kecamatan Delegates
 - Academician
 - Board of LPMK
 - CBO/CSO Representative
 - Religious leader
 - Community leader
 - Private/business sector
 - Never participated
13. Have you ever proposed a project ?
- Yes
 - No

14. Did the project you proposed get funded ?
- a. Yes
 - b. No
15. If yes why or why not ? _____
16. Have you ever participated in the PNPM prioritization process?
- a. Yes
 - b. No
17. How often do you participate in PNPM? _____
- a. Never
 - b. Rarely
 - c. Sometimes
 - d. Often

Musrenbang Evaluation

18. What do you see as the greatest need facing your kelurahan?
- _____
19. Have projects funded through the Kelurahan grant made an impact in the community?
- a. Yes
 - b. No
20. If yes, can you give an example? _____
21. If no, why not? _____
22. Are there ever projects that are prioritized in the consultation process that do not end up getting funding?
- a. Yes
 - b. No
23. If yes, why do they not receive funding?
- _____
24. How often does this happen?
- a. Never
 - b. Rarely
 - c. Sometimes
 - d. Often
25. Are projects ever funded by the Kelurahan grant that did not come from the community prioritization process?
- a. Yes
 - b. No

26. How often does this happen?

- a. Never
- b. Rarely
- c. Sometimes
- d. Often

27. Where do they come from? _____

28. How satisfied are you with the Musrenbang process in general?

- a. Not at all
- b. A little bit
- c. Somewhat
- d. Mostly Satisfied
- e. Completely Satisfied

29. How satisfied are you with management of the Kelurahan Grant?

- a. Not at all
- b. A little bit
- c. Somewhat
- d. Mostly Satisfied
- e. Completely Satisfied

30. How satisfied are you with PNPM?

- a. Not at all
- b. A little bit
- c. Somewhat
- d. Mostly Satisfied
- e. Completely Satisfied

31. Have you heard of Yayasan Kota Kita?

- a. Yes
- b. No

32. Have you ever used the mini-atlas in this Kelurahan?

- a. Yes
- b. No

Trust & Efficacy

33. How much do you trust the LPMK?

- a. Not at all
- b. A little bit
- c. Somewhat
- d. Mostly
- e. Completely

34. How much do you trust the national government?
- Not at all
 - A little bit
 - Somewhat
 - Mostly
 - Completely
35. How much do you trust City Government
- Not at all
 - A little bit
 - Somewhat
 - Mostly
 - Completely
36. How much do you trust Kelurahan (Neighborhood) Government
- Not at all
 - A little bit
 - Somewhat
 - Mostly
 - Completely
37. How much do you trust Panitia Pembangunan Kelurahan (Committee of Grant Implementation)
- Not at all
 - A little bit
 - Somewhat
 - Mostly
 - Completely

How much do you agree with the following statements?

38. I consider myself well qualified to participate in decision-making in the community.
- Strongly Disagree
 - Disagree
 - Neither Agree nor Disagree
 - Agree
 - Strongly Agree
39. I feel that I could do as good a job in a leadership position in this community as most other people.
- Strongly Disagree
 - Disagree
 - Neither Agree nor Disagree
 - Agree
 - Strongly Agree

40. We can resolve crises in this neighborhood without any negative after effects
- Strongly Disagree
 - Disagree
 - Neither Agree nor Disagree
 - Agree
 - Strongly Agree
41. Our community can work together to improve conditions in the community.
- Strongly Disagree
 - Disagree
 - Neither Agree nor Disagree
 - Agree
 - Strongly Agree
42. We can persuade the government to provide better services to people in this community.
- Strongly Disagree
 - Disagree
 - Neither Agree nor Disagree
 - Agree
 - Strongly Agree
43. Compared with before you began participating in the Musrenbang process, are you more likely to do any of the following ?
- Contact a public official
 - Vote
 - Consider working in politics
 - Volunteer for community projects
 - Join a community group
 - Other _____
44. As a result of participating in the Musrenbang process, do you think that you have:
- Learned more about how government works
 - Gained new skills
 - Become more confident in your own abilities
 - Gotten to know the people in your community better
 - Seen real changes in the community as a result of Kel Grant projects
 - Other _____

ANNEXE 2: Interview Questions

OPEN-ENDED QUALITATIVE QUESTIONS

Dana Pembangunan Kelurahan (DPK)

Name of Respondent :

Gender :

Kelurahan :

Role :

Date of Interview :

1. In this neighborhood what criteria do people use in prioritizing the projects? (For example, do they consider the poorest RT as most deserving, or do they consider projects that will benefit the most people as more important? Do they choose the biggest need facing the neighborhood as a whole, or do they choose what people are most passionate about?)
2. When Kelurahan earn grant money, how they decide which project that can be funded ? How they distribute/allocate grant ?
3. Why do certain projects get proposed to PNPM vs Musrenbang? How do you decide which go to which?
4. If ghost projects appear, where do they come from? (Bring a list of ghost projects from last year? Ask this diplomatically, as we did in our brief interviews this summer – What happens if projects have already been funded and there is money leftover, how do they decide where to put the additional funds?)

ANNEXE 3: Schedule of Workshop

The following official workshops and meetings took place with government and community partners.

| Date | Activity | Agenda | Participant |
|--|---|---|--|
| June 28th, 2014 in Kecamatan Serengan Office | Meeting with Musrenbang Facilitators in Kecamatan Serengan, Laweyan, & Pasar Kliwon | Introducing AIIRA Project to community leader | <ul style="list-style-type: none"> • Invitee were 27 Musrenbang Facilitators From 3 Kecamatan • 20 people attended |
| July 12th, 2014 in Kecamatan Banjarsari Office | Meeting with Musrenbang Facilitators in Kecamatan Banjarsari & Jebres | Introducing AIIRA Project to community leader | <ul style="list-style-type: none"> • Invitee were 24 Musrenbang Facilitators from 2 Kecamatan • 18 people attended |
| August 8th, 2014 in | Meeting with Sekretariat Daerah (Setda) and Bappeda Surakarta | Introducing AIIRA Project to Surakarta City Government | Bidang Pemerintahan Umum Setda (3) and Bappeda Surakarta (4) |
| April 2nd, 2015 in Bappeda Office | Meeting with Surakarta City Government | Presenting to Government official about AIIRA Project | <ul style="list-style-type: none"> • Sekretariat daerah (1) • Bappeda (3) • Kecamatan : Banjarsari (1), Jebres (1), Serengan (1), Pasar Kliwon (1), Laweyan (1) • DPPKA (1) • Inspektorat (1) |
| April 3rd, 2015 in Kecamatan Serengan Office | Training for Musrenbang & DPK Monev Facilitators of Kecamatan Serengan | Training how to use information system in AIIRA Project | <ul style="list-style-type: none"> • There are 7 Kelurahan in Serengan • Each Kelurahan sent 2 participants (Musren Facilitators & DPK Monev) • Invitees were 14 • 14 people attended |
| April 4th, 2015 in Kecamatan Laweyan office | Training for Musrenbang & DPK Monev Facilitators of Kecamatan Laweyan | Training how to use information system in AIIRA Project | <ul style="list-style-type: none"> • There are 11 Kelurahan in Laweyan • Each Kelurahan sent 2 participant (Musren Facilitator & DPK Monev) • Invitee were 22 • 18 attended meeting |
| April 6th, 2015 in Kecamatan Pasar Kliwon office | Training for Musrenbang & DPK Monev Facilitators of Kecamatan Pasar Kliwon | Training how to use information system in AIIRA Project | <ul style="list-style-type: none"> • There are 9 Kelurahan in Pasar Kliwon • Each Kelurahan sent 2 participant (Musren Facilitator & DPK Monev) • Invitee were 18 • 15 attended meeting |
| April 7th, 2015 in Kecamatan Jebres office | Training for Musrenbang & DPK Monev Facilitators of Kecamatan Jebres | Training how to use information system in AIIRA Project | <ul style="list-style-type: none"> • There are 11 Kelurahan in Jebres • Each Kelurahan sent 2 participant (Musren Facilitator & DPK Monev) • Invitee were 22 • 17 attended meeting |
| April 8th, 2015 in Kecamatan Banjarsari office | Training for Musrenbang & DPK Monev Facilitators of Kecamatan Banjarsari | Training how to use information system in AIIRA Project | <ul style="list-style-type: none"> • There are 13 Kelurahan in Banjarsari • Each Kelurahan sent 2 participant (Musren Facilitator & DPK Monev) • Invitee were 51 • 49 attended meeting |
| April 9th, 2015 in Bappeda Office | Training for Kelurahan Officials | Training how to use information system in AIIRA Project | <ul style="list-style-type: none"> • Invitee are 51 • 49 attended meeting |

ANNEXE 4: Focus Group Discussion Protocol

Participants

- Rebeka Rully (Danukusuman, DPK Evaluator)
- Ketty Ristini (Kemlayan, Musrenbang Facilitator)
- Alex Taufiq (Serengan, LPMK Leader)
- Nanang Kaswadi (Tipes, Musrenbang Facilitator)
- Suyanto (Timuran, LPMK Leader)
- Budi Raharjo (Kratonan, DPK Implementation Committee)

Protocol

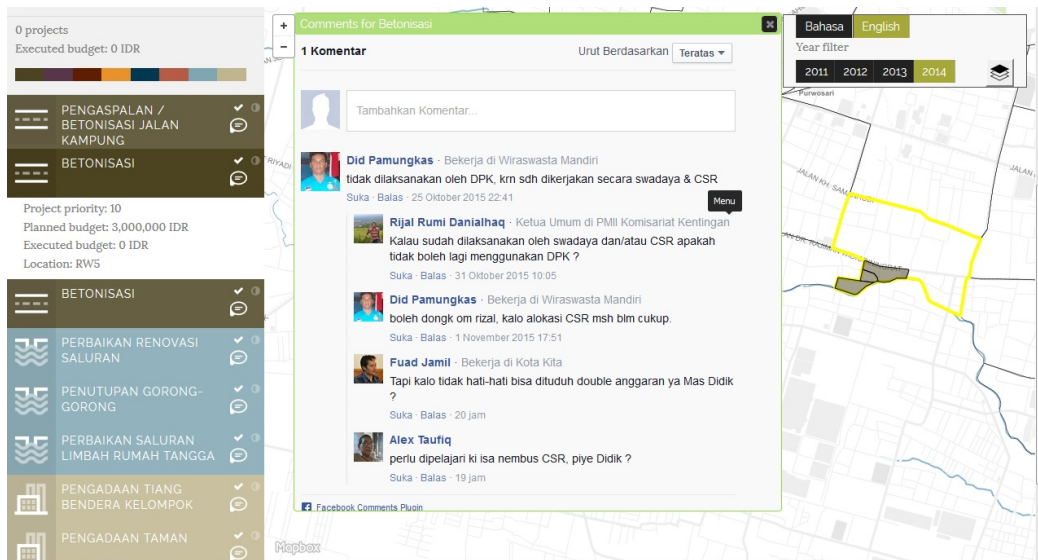
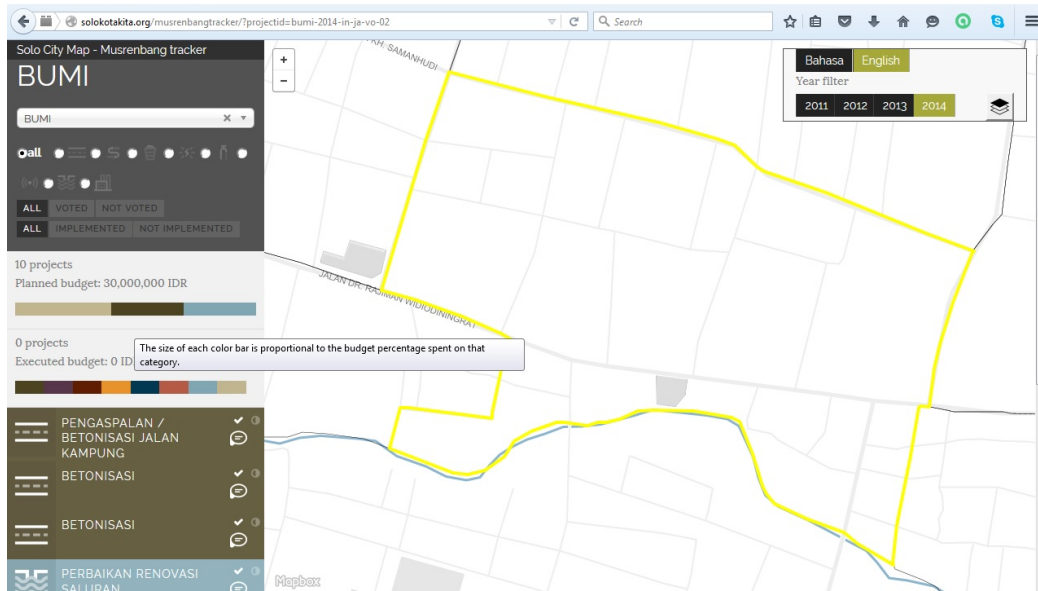
- Kota Kita provide PC for participant to use for accessing the tools (musrenbangtracker)
- Kota Kita train participant how to explore the tools (musrenbangtracker) : content, feature, etc
- Kota Kita train participant how to track the project and make a comment in any project
- Participant practicing the what they have learn, tracking at least 10 project and in same time make a comment

Key Questions :

- After using the musrebangtracker tool, what are you opinion ?
- What do you think about the content of musrenbangtracker?
- What do you think about the feature of musrenbangtracker?
- Is the display/appearance/interface of website convenient ? Why ?
- Is the tool/website easy to use ? Why ?

ANNEXE 5: Mus-Tracker

Screenshots of the Mus-Tracker online platform in action



ANNEXE 6: Team Composition

The research partnership is made up of team members from four different institutions: Yayasan Kota Kita (based in Solo), Peter McCawley (Australian National University, Australia), Tara Grillos (Harvard University, United States), and Urban Launchpad (San Francisco, United States).

The tasks for each team member were distributed in the following manner:

John Taylor: Project leader and Director of Yayasan Kota Kita. John Taylor managed the interactions between the different team members, coordinating data collection, planning meetings and conference calls, and managing the pipeline of activities and deliverables.

Peter McCawley: Mentor and senior research partner. Peter McCawley served to guide the research and provided valuable mentorship inputs to the team along the course of the research period. Given his busy schedule he was unable to visit Solo but was constantly engaged in discussing research findings.

Tara Grillos: Principal researcher. Tara Grillos is a PhD candidate at Harvard University in the United States. She travelled to Solo twice to support the research, conduct interviews and present the concept and preliminary findings to the Solo City Government. While back at Harvard University she conducted rigorous analysis on the data and communicated regularly via Skype with John Taylor to discuss findings and fill knowledge gaps.

Urban Launchpad: Digital database and website developers. Urban Launchpad are a start-up company who focus on developing innovative ways to organize and display urban information. Urban Launchpad became involved in the initial design of the database format, then worked on the design and development of the website interface, and the integration of social media and a comments function into the website.

Yayasan Kota Kita: Research coordination, community outreach, government liaison and financial management. The local Indonesian NGO Yayasan Kota Kita supported the implementation of the research through extensive data collection and project categorization, data entry into the database, as well as community outreach and concept development. The latter required continuous engagement with the city's coordinating planning agency (Bappeda), the Department of Public Works, as well as district and neighbourhood government.

ANNEXE 7: Tables

Table 1: Determinants of Location of Voted Projects

| | RW's Percent of Voted Projects in Kelurahan (2011-2014) | RW's Percent of Voted Budget in Kelurahan (2011-2014) |
|-----------------------|---|---|
| Poverty Rate | -0.002 (0.00) | -0.005 (0.01) |
| Percent Land Title | -0.001 (0.00) | -0.011*** (0.00) |
| Percent Water Access | -0.001 (0.00) | 0.008** (0.00) |
| Percent Private Wells | 0.001 (0.00) | 0.005 (0.00) |
| Percent of Total HHs | 4.245*** (0.75) | 6.408*** (1.33) |
| constant | -2.686*** (0.18) | -2.950*** (0.31) |
| Observations | 595 | 595 |

Standard errors in parentheses
* p<0.05, ** p<0.01, *** p<0.001

Table 2: Balance Table Comparing Rejected vs Ghost Projects (2011-2014)

| | <u>Rejected Projects</u> | | <u>Ghost Projects</u> | | T-test |
|---------------------------|--------------------------|-----------|-----------------------|-----------|----------|
| | Mean | SD | Mean | SD | p-value |
| Poverty Rate | 0.139685 | 10.09646 | -0.390793 | 10.87395 | 0.32 |
| Percent Land Titles | 2.143854 | 12.1608 | -4.098677 | 15.71809 | 0.00 * |
| Percent Water Access | 0.297615 | 16.20502 | 0.494241 | 16.35916 | 0.41 |
| Percent Private Wells | 0.913281 | 18.20298 | 0.21526 | 16.46868 | 0.24 |
| Percent Private Toilets | 0.361552 | 14.19508 | 0.731969 | 14.65801 | 0.32 |
| Percent of Households | 0.083535 | 0.0806604 | 0.092286 | 0.0806796 | 0.02 * |
| Percent of Citizens | 0.083941 | 0.0811583 | 0.092766 | 0.0809985 | 0.02 * |
| Percent from Subcategory: | | | | | Chi- |
| AR | 0.71 | | 0.21 | | Squared |
| DR | 36.37 | | 45.61 | | Pr=0.000 |
| IC | 0.11 | | 0.21 | | |
| JA | 28.13 | | 30.96 | | |
| LS | 0.53 | | 0.21 | | |
| SA | 5.83 | | 3.56 | | |
| SM | 1.17 | | 0.21 | | |
| SR | 27.17 | | 19.04 | | |

Table 3: Balance Table Comparing Rejected vs Executed Projects (2011-2014)

| | <u>Rejected</u> | | <u>Executed</u> | | T-test |
|---------------------------|-----------------|---------|-----------------|---------|-------------|
| | Mean | SD | Mean | SD | p-value |
| Poverty Rate | -0.1397 | 10.0965 | -0.4481 | 10.8566 | 0.25 |
| Percent Land Titles | -2.1439 | 12.1608 | -1.6136 | 11.2648 | 0.16 |
| Percent Water Access | 0.29761 | 16.205 | 1.97807 | 16.0471 | 0.01 * |
| Percent Private Wells | 0.91328 | 18.203 | -0.1607 | 18.3589 | 0.10 |
| Percent Private Toilets | 0.36155 | 14.1951 | 1.60134 | 19.5713 | 0.04 * |
| Percent of Households | 0.08353 | 0.08066 | 0.08432 | 0.07301 | 0.41 |
| Percent of Citizens | 0.08394 | 0.08116 | 0.08498 | 0.07404 | 0.39 |
| Percent from Subcategory: | 0.71 | | 0.28 | | Chi-Squared |
| AR | 36.37 | | 46.83 | | Pr=0.00 |
| DR | 0.11 | | 0 | | |
| IC | 28.13 | | 31.59 | | |
| JA | 0.53 | | 0.14 | | |
| LS | 5.83 | | 2.12 | | |
| SA | 1.17 | | 0.85 | | |
| SM | 27.15 | | 18.19 | | |
| SR | 23.17 | | 0.16 | | |

Table 4: Logit Model of Execution for Voted Projects (2011-2014)

| | Executed |
|-----------------------|---------------------|
| PRIORITY | -0.020*** (0.00) |
| PLANNED_BUDGET | 0.00 (0.00) |
| Drainage Project | 0.676*** (-0.15) |
| Road Project | 0.567*** (-0.15) |
| YEAR | 0.013 (-0.05) |
| Poverty Rate | 0.007 (-0.01) |
| Percent Land Titles | 0.010* (0.00) |
| Percent Water Access | 0.001 (0.00) |
| Percent Private Wells | -0.006 (0.00) |
| Percent of Households | 0.643 (-1.88) |
| constant | -26.753 (-99.85) |
| Observations | 2645 |

Standard errors in parentheses : * p<0.05, ** p<0.01, *** p<0.001

Table 5a: Number of KelGrant Projects and Change in Needs Data at RW Level

| | Change School Access | % | Change PDAM | % | Change Poverty Rate | Change Land Titles | % | Change Public Toilets | % | Change Private Toilets | % |
|--------------|----------------------------|---|----------------|---|---------------------------|--------------------------|---------|-----------------------------|---|------------------------------|---|
| # executed | 0.292 | | -0.818 | | 0.271 | | -1.445 | 2.020* | | -2.44 | |
| | (-0.4) | | (-1.25) | | (-1.04) | | (-1.54) | (-1.01) | | (-1.52) | |
| constant | -0.867* | | 0.151 | | 8.963 | | 0.744 | 16.398** | | -5.293 | |
| | (-0.43) | | (-5.34) | | (-5.02) | | (-1.21) | (-6.17) | | (-5.77) | |
| Observations | 443 | | 443 | | 443 | | 443 | 443 | | 443 | |

Standard errors in parentheses

* p<0.05, ** p<0.01, *** p<0.001

Table 5b: Percent of KelGrant Funding and Change in Needs Data at RW Level

| | Change School Access | % | Change PDAM | % | Change Poverty Rate | Change Land Titles | % | Change Public Toilets | % | Change Private Toilets | % |
|---------------------------------|----------------------------|---|----------------|---|---------------------------|--------------------------|---------|-----------------------------|---|------------------------------|---|
| RW's Percent of Executed Budget | -0.901 | | -5.943 | | 0.167 | | -2.452 | 12.380** | | -2.453 | |
| | (-1.63) | | (-4.86) | | (-3.44) | | (-6.43) | (-4.06) | | (-6.21) | |
| constant | -0.53 | | 0.415 | | 9.133 | | 0.062 | 16.072** | | -6.685 | |
| | (-0.42) | | (-5.26) | | (-5.01) | | (-0.99) | (-5.69) | | (-5.78) | |
| Observations | 437 | | 437 | | 437 | | 437 | 437 | | 437 | |

Standard errors in parentheses

* p<0.05, ** p<0.01, *** p<0.001

Table 6: Predictors of Ghost and Rejected Projects at Kelurahan Level

| | Across Years 2011-2014 | | <u>Year 2014</u> | |
|-----------------------------|------------------------|--------------------------|------------------------|---------------------------|
| | Percent Ghost Projects | Percent Rejected Project | Percent Ghost Projects | Percent Rejected Projects |
| Year | -0.183 | 0.024 | | |
| | -0.14 | -0.11 | | |
| Infrastructure Spending (%) | 1.614 | 0.736 | 5.28 | -1.076 |
| | -1.41 | -1.06 | -2.94 | -3.42 |
| Area | 0.004 | 0.001 | -0.021 | -0.015 |
| | 0.00 | 0.00 | -0.01 | -0.01 |
| Density | 0.009 | -0.001 | -0.001 | 0.005 |
| | -0.01 | 0.00 | -0.01 | -0.01 |
| YKK Website Usage | 0.00 | 0.00 | 0.003 | 0.004* |
| | 0.00 | 0.00 | 0.00 | 0.00 |
| Ethnic Diversity | 0.019 | -0.124 | 0.552 | -1.015 |
| | -0.29 | -0.22 | -0.63 | -0.64 |
| Musrenbang Participation | 0.142 | 0.416 | 0.989 | 2.066* |
| | -0.36 | -0.29 | -0.64 | -0.87 |
| Existing Infrastructure | -0.225 | -0.740* | -1.041 | -1.714 |
| | -0.4 | -0.32 | -0.89 | -0.94 |
| Civil Society Presence | -0.372 | -0.349 | -1.261 | -1.961** |
| | -0.29 | -0.22 | -0.65 | -0.67 |
| Income Inequality | 1.439*** | 0.957** | 3.009*** | 3.795*** |
| | -0.42 | -0.3 | -0.84 | -0.85 |
| Poverty Rate | -0.005 | 0.069* | -0.178 | -0.004 |
| | -0.04 | -0.03 | -0.1 | -0.08 |
| Percent Land Titling | 0.001 | 0.011 | -0.02 | 0.013 |
| | -0.01 | -0.01 | -0.02 | -0.02 |
| Total Citizens | 0.00 | 0.00 | 0.00 | 0.00 |
| Standard | 0.00 | 0.00 | 0.00 | 0.00 |
| Percent Water Access | 0.004 | 0.002 | 0.038 | 0.029 |
| | -0.01 | -0.01 | -0.02 | -0.03 |
| constant | 364.192 | -49.349 | -3.43 | -4.378 |
| | -273.24 | -215.59 | -4.17 | -4.36 |
| errors | | | | |
| Observations | 185 | 196 | 48 | 51 |

in parentheses

* p<0.05, ** p<0.01, *** p<0.001

Table 7: Balance Table Comparing Kelurahan Grant & PNPM

| | <u>Kel Grant (Executed)</u> | | <u>PNPM</u> | | <u>T-test</u> | |
|-------------------------|-----------------------------|-----------|-------------|----------|---------------|---|
| | mean | sd | mean | sd | p-value | |
| Poverty Rate | -0.0694071 | 7.326213 | 0.880601 | 7.422631 | 0.00 | * |
| Percent Land Titles | -15.72266 | 17.95086 | -18.023 | 20.20769 | 0.00 | * |
| Percent Water Access | 1.505267 | 17.5739 | -1.63789 | 16.20376 | 0.00 | * |
| Percent Private Wells | 0.6188745 | 14.42161 | -1.27483 | 14.82409 | 0.00 | * |
| Percent Private Toilets | -0.0136791 | 17.63636 | 0.454836 | 17.75471 | 0.28 | |
| Percent of Households | 0.0900635 | 0.0760267 | 0.126861 | 0.088337 | 0.00 | * |

ANNEXE 8: Figures

Figure 1: Sectoral Distribution of Kelurahan Grant Voted Projects

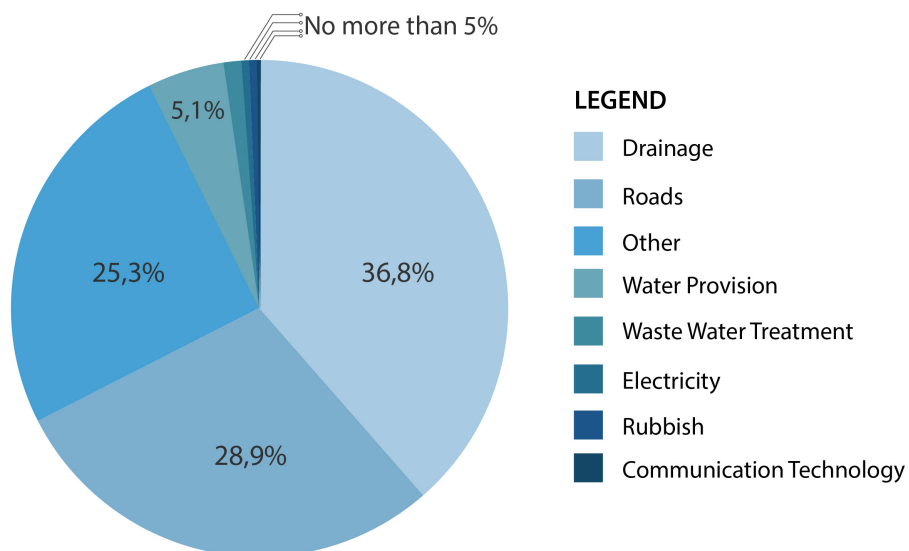


Figure 2: Rejected and Ghost Projects by Year

| YEAR | TOTAL VOTED | % REJECTED | TOTAL EXECUTED | % GHOSTS |
|------|-------------|------------|----------------|----------|
| 2011 | 838 | 81.03 | 333 | 52.25 |
| 2012 | 767 | 78.36 | 289 | 42.56 |
| 2013 | 903 | 77.85 | 304 | 34.21 |
| 2014 | 860 | 78.60 | 261 | 29.50 |

Figure 3: Percent Execution of Number One Priority Projects

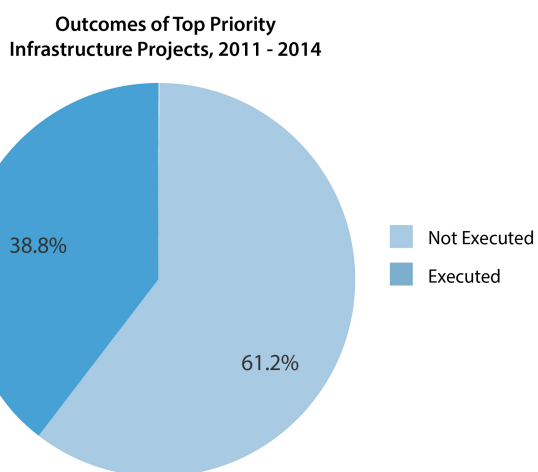


Figure 4: Kelurahan by Percentage of Executed Projects that are Ghosts

| 0-9% | 10-19% | 20-29% | 30-39% |
|---|--|---|--|
| KEPATIHAN KULON KEDUNG LUMBU PUNGGAWAN BANYUANYAR SUMBER AJAJAR TEGALHARJO | KAUMAN KERTEN MANAHAN TIMURAN MANGKUBUMEN PAJANG | SETABELAN TIPES SONDAKAN PENUMPING SANGKRAH NUSUKAN BALUWARTI | GANDEKAN SEMANGGI DANUKUSUMAN KESTALAN JOYOTAKAN SERENGAN KADIPIRO |
| 40-59% | 60-69% | 70-89% | 90-100% |
| GILINGAN JEBRES SRIWEDARI PUCANGSAWIT MOJOSONGO KAMPUNG BARU PURWODININGRATAN | KEMLAYAN LAWEYAN KETELAN KEPATIHAN WETAN PASAR KLIWON PANULARAN | SEWU KEPRABON JAYENGAN BUMI | JOYOSURAN JAGALAN SUDIROPRAJAN KRATONAN GAJAHAN KARANGASEM PURWOSARI |

Figure 5: Percentage of Ghost Projects by Income Inequality

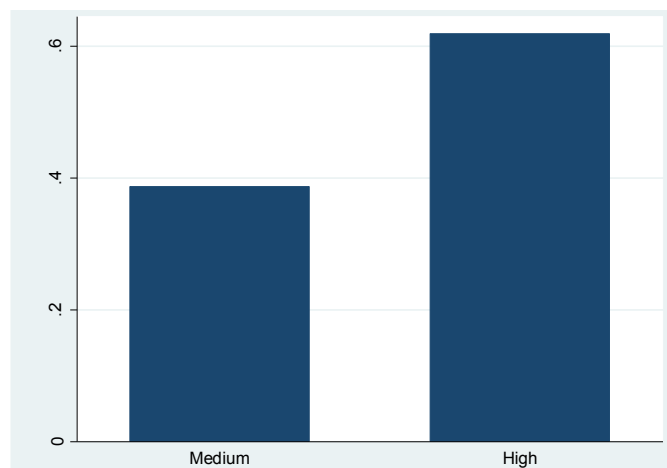
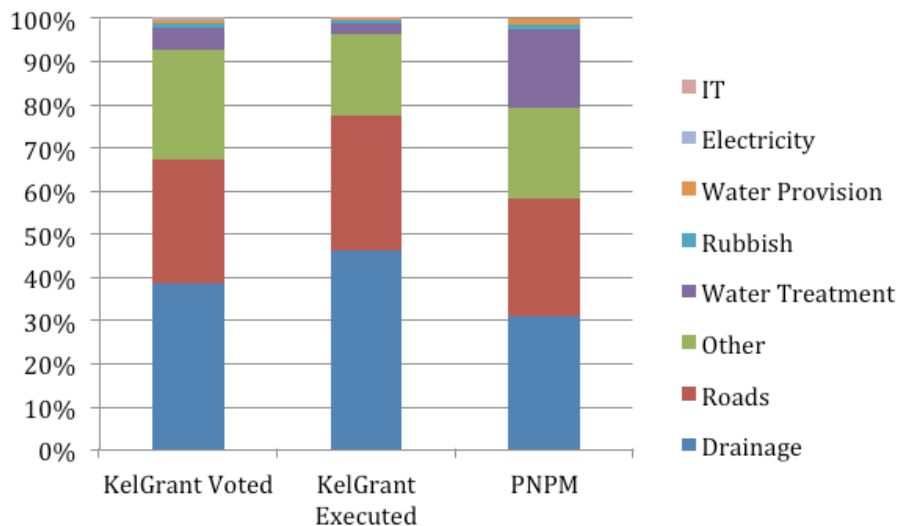


Figure 6: Project Type Distribution for KelGrant vs PNPM



ANNEXE 9: Selected Interview Responses

Interview comments regarding ‘ghost projects’ cite a variety of possible explanations: inconsistency in project titling, emergencies and natural disasters, due to the re-allocation of funding to other needs, or due to technical difficulties.

Inconsistent Project Titles:

“I guess if there are differences between the *Musrenbang* proposals and the DPK Budget Plan its because of different project names or titles.”

– Male, Kratonan

“If there are differences between the result of the *Musrenbang* and the DPK Budget Plan, it’s not because there are ghost projects but usually because you might have the same project but under a different title or name.”

-Male, Kepatihan Wetan

Emergencies:

“Yes, there is a possibility where project might appear when there was emergency or *force majeure*. For example, when the Kelud volcano erupted, some of the community’s drainage was clogged. So the community decided to use the DPK money to resolve that problem. “

– Female, Kemlayan

“Ghost projects usually appear in the DPK Budget Plan if there are urgent problems that need to be resolved, such as natural disasters, and public health epidemics of disease. This decision should be consulted with all the *Kelurahan* stakeholders and approved by Bappeda and Sekda”

-Male, Sewu

Reallocation of funding to other needs

“They are not ghost project actually, they’re just due to the reallocation, or readjustment, of the project. For example, there was a case recently of a proposed road improvement in one of our RWs; when the money came, we knew that the road was no longer broken, so we re-allocated the project to another need, with the acknowledgment from the evaluation team and Bappeda.”

– Male, Mansur

“The level of voluntary in infrastructure projects in Kadipiro is still high, many infrastructure problems were solved by the community funding, rather than waiting for DPK or PNPM.”

– Female, Kadipiro

Technical Difficulties

“We sometime have to cancel some projects due to technical or non-technical problems. For example with drainage under houses, we have limitations to go into houses and make improvements.”

– Female, Kemlayan

“There was an example of deleting project in Kadipiro in 2010, the construction of a building... but when it was about to be built, the land status was questioned. Finally it we found out that it belonged to an individual. So the project could not proceed. But we noted the minutes of the meeting [where we decided upon the cancelation] and reported to Bappeda.”

- Female, Kadipiro

Interview quotes also indicate that there is a substantial divergence between how the prioritization and implementation phases are actually conducted and by whom:

“A year after the *Musrenbang* when the Kelurahan earns the grant money, PPK (the committee for DPK Implementation) will make the DPK Budget Plan based on the DPK project proposal (they were selected a year before the funding comes, during the *Musrenbang*). PPK has to follow the decision of *Musrenbang*, and so no change can be made on their own decision.”

- Female, Kadipiro

“A year later when the Kelurahan earn grant money, PPK (committee of DPK implementation) will invite the Neighborhood Facilitator, the Chairman of the *Musrenbang* Plenum, and the Chairman of the *Musrenbang* commission to meet and discuss the composition of the DPK Budget Plan. They will choose which project that can be funded and included in the DPK Budget Plan. They will omit unnecessary projects, such as sound systems, and uniform procurement, from the DPK Budget Plan. For infrastructure and economic proposal the PPK will visit the site to check the actual conditions.”

-Male, Kepatihan Wetan

“We never eliminate proposals that come from communities, all become *Musrenbang* results. When the money comes, then we will make the priorities based on actual analysis; but we keep the list in our bank of proposals. The indicator of prioritization is based on consensus, I think the discussion of community representatives justifies that.”

-Female, Kemlayan

Interviews also indicate that, generally speaking, projects are proposed to PNPM or to the Kelurahan Grant depending on the size of the budget.

“So the rules of the game is that if the project is less than 10 million [Rupiah] it will go to DPK, but if the projects are more than 10 million [Rupiah] they will go to PNPM. Other proposals more than 50million [Rupiah] we will advise the applicant to proceed to the city-scale *Musrenbang* funded by the City Budget.”

-Female, Kadipiro

“We share with PNPM based on the type of projects, we agreed that housing projects (house / neighborhood improvement) go to PNPM, but small infrastructure such as drainage, toilets and pavement should be for the *Musrenbang*.”

- Female, Kemlayan

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