HOW TO FILL THE IMPLEMENTATION GAP FOR INCLUSIVE GROWTH:
CASE STUDIES COVERING URBAN TRANSPORTATION SECTOR DEVELOPMENT IN EGYPT

Hideki Matsunaga
Mayada Magdy
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INTRODUCTION
Since January 2011, Egypt has been going through a turbulent period with two regimes having been toppled by mass protests. Social injustice, a widening gap between rich and poor and widespread corruption are considered to be the major reasons that took protestors to the streets.

Poor infrastructure and deteriorating public services, which are characterized by frequent power cuts, chronic traffic in Cairo and piles of garbage on the street, are said to have exacerbated public discontent with the governments of President Mubarak and President Morsi. In Egypt, decades-long low level investment resulted in underdevelopment of infrastructure and public services compared with many other emerging economies.

This does not mean that the Egyptian government has not exerted any efforts to improve the situation. On the contrary, in order to solve these problems, many strategies and plans have been formulated and numerous numbers of projects, programs and policy reforms have been proposed. According to research conducted by the Japan International Cooperation Agency (JICA), there were at least 41 existing plans and strategies in various forms as of 2012.¹

However, not only are there too many overlapping strategies in many cases, very few have been implemented to any significant degree.

In both the business community and the public sector, a great deal of energy and resources are often poured into formulating strategy, while too little effort is diverted to the implementation of that strategy. In Egypt, the lack of strategy implementation for so many years has led to low rates of public investment and poor infrastructure and deteriorating public services.

The presidential election in May 2014 saw Abdel-Fattah el-Sissi, a former military leader, elected by an overwhelming majority vote. Within months of his inauguration, the new administration took a number of major reforms such as the reduction of fuel subsidies and the implementation of the Suez Canal widening project. For some, expectations are rising that the new leadership has a strong commitment to bring real change to the country. However, the challenges for the leaders will be how to make the machinery of government work in order to implement changes and strategies. Public sector management and institutional reform is indispensable for the success of the new government, and much will hinge on reforming implementation.
BRIDGING THE GAP BETWEEN “WHAT TO DO” AND “HOW TO DO”

The challenge of bridging the gap between strategy and implementation is not unique to Egypt, and while there has been a good deal of research on policy planning, there has been much less on implementation. Still, the research contained in this paper indicates that Egypt is one of the typical countries which is suffering from very low implementation rate of plans and this is due to the huge “Implementation Gap” that exists in the system of the country. The implementation gap is the difference between goals and outputs on paper and how they are carried out in practice. In other words, the implementation gap covers the discrepancies between prescriptions and what happened on the ground.

This paper aims to identify key reform areas that would be necessary to fill the implementation gap in Egypt, based on case studies exploring the barriers that caused low rates of implementation of plans and strategies for urban transport development. Some public sector reform agendas seem to be common among countries, yet there is no “one size fits all” and each country’s experience should be studied to understand the local conditions in order to provide relevant recommendations.

This paper is structured as follows: In Chapter 1, we analyze recent trends in public investment in Egypt and public perceptions on their livelihood. Chapter 2 presents an analytical framework for the paper with an introduction to the literature on implementation cycles as well as implementation gap. Chapter 3 includes empirical analysis on the causes of low implementation rates of urban transport strategies in Egypt, while Chapter 4 examines the implementation gap based on a comparative analysis with Asian countries’ experiences with urban transport development. Chapter 5 extends the analysis based on the framework of the implementation cycle and the exploration of a range of reform measures that would fill gaps and enhance implementation, thus promoting inclusive growth and development of Egypt. Chapter 6 provides concluding thoughts.
1. PUBLIC INVESTMENT TRENDS IN EGYPT

If you were to visit one of the capital cities among emerging economies after a 20-year absence, you would be astonished with the drastic change that took place during your absence. There are more high-rise buildings, more highways, and new public transportation systems. In Cairo, however, where the city landscape has changed little in the last two decades, you might be left with a very different impression. Yes, there are more shopping malls and real estate development in the outskirts of the city but, compared with many emerging economies, such changes are hardly drastic. We would like to take a look at this issue from the aspect of declining levels of public investment over the last several decades.

Level of Public Investment in Egypt

There are extensive studies on the impact of public investment on growth. One study shows that public investment has positive effects on growth and that no country has sustained rapid growth without also keeping up substantial rates of public investment—in infrastructure, education and health. Far from crowding out investment, this spending crowds it in. The International Monetary Fund’s (IMF) 2014 World Economic Outlook underlines that increased public infrastructure investment raises output in both the short and long term.

Figure 1.1: Egypt’s Investment and Savings (1980–2013)

Source: International Monetary Fund, World Economic Outlook Database, April 2014
In the Egyptian context, Loayza and Odawara had conducted detailed analysis on infrastructure development. They conclude that in the past 15 years, infrastructure in Egypt has suffered a substantial decline, which may be at odds with the country’s goal of raising economic growth. This decline in public investment, however, has not been offset by a rise in private investment.

Figure 1.1 clearly indicates a declining trend in investment in Egypt over the last thirty years. This trend can be compared with other countries with similar socio-economic conditions, such as India, Indonesia, and Thailand (Figure 1.2), where we see that Egypt witnessed a comparable investment level until the early 1990s after which the level dropped below that of other countries.

Figure 1.3 shows how public investment in Egypt has been experiencing a declining share of GDP over the last 20 years, shrinking from over 20 percent in 1988 to less than half of that figure in 2008. This is mainly attributable to a large fiscal deficit and high social spending, which came at the expense of a shrinking investment budget. In addition, some issues of public investment management in Egypt and implementation capacity have undermined the efficiency and effectiveness of public spending, as subsequent sections of this paper will show.

Figure 1.2: Investment share of GDP-Egypt/India/Indonesia/Thailand.

Source: International Monetary Fund, World Economic Outlook Database, April 2014
With regard to the private investment share to GDP during the past 20 years, it either declined or remained the same. Between 1988 and 2008, we find that it has maintained a similar share of GDP (around 12 percent) and thus did not compensate for the decline in public investment.

Over the last 30 years, Egypt has been experiencing a quite volatile trend of real GDP growth, as shown in Figure 1.1. While we can see high growth rates around late 1990s, and also accelerated growth at an average of around 7 percent from 2006 to 2008, Egypt has not seen a sustained trend of high growth. The average growth rate during the past 30 years was around 4.5 percent, one to two percent less than other emerging economies such as Thailand, Indonesia or India, and much lower than the country’s potential.

**Public Perceptions**

Rapid GDP growth during the mid-2000s made GDP per capita grow at rapid rates. However, as Figure 1.4 indicates, it was not accompanied with an increase in positive perceptions among people regarding the impact of growth on their livelihood. Opinion polls showed that the share of those describing themselves

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**Figure 1.3 Public Investment Trend in Egypt**

![Graph showing the public investment trend in Egypt from 1980 to 2014](source.png)

*Source: World Development Indicators.*

*Notes: We chose to utilize the data of Gross Fixed Capital Formation from the WDI for two reasons: (i) It covers a longer period of time to enable comparison; (ii) It is more indicative than other data sources since it accounts for the investments by public sector companies in Egypt, which occupies a significant share of public investment.*
as thriving (a combination of their current and future expectations of economic well-being) fell from 25 percent to 12 percent in Egypt between 2007 despite the steady growth in per capita GDP. In addition, discrepancy between the rich and the poor for such perception has widened as it was shown by the fact that only the richest Egyptians rated their lives better in 2010 than in 2009.

One reason why public sentiment may have declined was because of the collapse in satisfaction with public services. One opinion poll shows that satisfaction with the public transportation system in Egypt fell by 30 percent between 2009 and 2010 and public perceptions on other public services also worsened. This opinion poll needs to be interpreted with caution since public services do not typically deteriorate in such a short period of time, and the worsening perception must have been exacerbated by other factors. But it is worth noting that public satisfaction on the outlook for livelihood was worsening rapidly until right before the revolution. The new government needs to pay due attention to the people’s perceptions on their livelihood.

**Figure 1.4: Egypt: Recent Trends of % of people classifying themselves as “Thriving” and GDP per Capita (PPP)**

International Experience of Implementing Public Investment Programs

While there are many studies that explain the positive impact of public investment on growth, there are some counter-arguments that cast doubt on the efficiency of public investment. Of course, not all spending on public investment leads to positive results, and weakness in public investment management has resulted in inadequate returns to both public and private investment in many cases. The IMF points out that a substantial scaling-up of public investment in a weak institutional environment runs the risk of potentially undermining its growth benefit as well as prospect for fiscal and debt sustainability.\(^7\)

Managing public investment matters a great deal. In fact, the World Bank has conducted ample research in this area, assessing how public investment management (PIM) works in different countries, and has contributed to expanding knowledge on how to boost implementation and how to efficiently and effectively manage public investment in order to realize the intended development outcomes. One study by Lursen and Myers and another by Petrie\(^8\) conducted gap analyses of PIM in several countries to identify potential areas for reform. Both studies found gaps in PIM along the implementation cycle in many countries, starting with strategic planning and budgetary inconsistencies, weak linkages with sector policies and poor appraisal processes in the planning phase, procurement problems and weak monitoring and reporting. They provide a good reference for best practices for improving PIM.

In order to develop some quantitative method of assessing PIM, Dabla-Norris\(^9\) developed the Public Investment Management Index (PIMI). The PIMI provides a useful indicator of the degree of efficiency in the implementation of public investments along the implementation cycle, starting with strategic planning and appraisal to project selection and budgeting, followed by project implementation and then evaluation and audit. Dabla-Norris studied the process of PIM in 71 low- and middle-income countries including Egypt. In the budgeting and implementation stages, in particular, they evaluated aspects that can cause implementation gaps such as poor integration between project selection and budgeting, interrupted budget execution and disbursement, inefficient procurement processes, and weak monitoring and internal control matters.

In general, the authors found that low-income countries have weaker public investment management than middle-income countries, albeit with some exceptions. In Egypt’s case, on a scale from 0 to 4, where 4 represents better public investment management, it achieved only 1.43, below the average score of 1.68 and lower than other countries of similar socio-economic conditions such as Indonesia, the Philippines and Thailand, (1.47, 1.85 and 2.87 respectively). Detailed sub-index scores reveal that the weakest processes in Egypt’s public investment management are those pertaining to budgeting and implementation, which scored only 1.2, highlighting the need for improvement in these areas.

As denoted by the PIMI index above, Egypt is very weak in the aspects related to budgeting and implementation. Weak public investment is usually a result of weak governance. According to the World Governance Indicators, which among other aspects capture the capacity of government institutions to effectively formulate and implement policies, Egypt scored 25.4 in the Government Effectiveness Index (on a scale from 0 to 100) in 2012, which compares unfavorably with countries in the region and those of a similar income group (scoring around 50 points). Even if we take 2010 as the year of comparison, and thus excluding the period of political and economic instability in Egypt, the country still scores lower. Ineffective governance and public investment management in general undermine growth and are the main causes behind the implementation gap.
2. ANALYTICAL FRAMEWORK FOR THE IMPLEMENTATION CYCLE AND IMPLEMENTATION GAP

The real challenge for governments and policymakers is not to formulate a convincing strategy but to effectively implement their plans, whether they involve specific project recommendations or policy reforms. Projects require tangible resources such as financial, physical, and human resources for successful implementation, while policy reform rely on less tangible resources such as leadership and constituency building. Since developing countries are often thought to suffer from shortages in financial and human resources, policy reforms are considered easier to effect than project implementation. But as later chapters will show, policy reform is often more difficult than project implementation.

So what are the common impediments to implementation? How can strategies move from good intentions to real change on the ground?

The Implementation Cycle

There is no definitive theory of implementation, nor any single, commonly accepted framework, yet many studies divide the process of implementation into several phases, albeit in many cases using different terms to describe the implementation cycle.

The PDS (Plan-Do-See) Cycle and the PDCA (Plan-Do-Check-Action) Cycle are the simplest methods used to describe an implementation cycle. For example, the PDS Cycle divides the process into three major phases and each phase consists of several actions: (i) “plan” (direction setting, strategy formulation, and planning); (ii) “do” (resource mobilization, organizational setting, action); and (iii) “see” (monitoring and evaluation), with the aim of continuously improving the process (See Figure 2.1).

Meanwhile, the Asia Pacific Community of Practice on Managing for Development Results (COP-MFDR) 2011 identifies five components in the public sector implementation cycle: (i) planning; (ii) budgeting; (iii) implementation; (iv) monitoring; and (v) evaluation. Similarly, the Center for Effective Services (CES) Guide defines four phases in the process: (i) exploring and preparing; (ii) planning and resourcing; (iii) implementation and operationalization; and (iv) business as usual—the point at which the policy becomes fully integrated into the system.10
As these examples show, whatever the description of the implementation cycle, the implementation phase lies in the middle of the process, preceded by the planning phase and followed by monitoring and evaluation (in practice, the lines of separation between these phases are not necessarily defined clearly). The cycle must remain dynamic, given that any unforeseen events may require adjustments to earlier phases or those undertaken in parallel. For example, the planning phase may be revisited as a result of experimentation in the implementation phase, while continuous monitoring and evaluation should identify potential improvements to the planning and implementation phases.11

**Analysis Based on the Implementation Cycle and Implementation Gap**

In this paper, we will utilize the implementation cycle described in Figure 2.2 as our analytical framework.12 Such a framework helps to identify the required tasks to implement projects and policy reforms and is also useful to assess systemic weaknesses in the implementation cycle.

It is possible to identify several factors that hinder policy implementation and lead to implementation gaps. Implementation gaps exist within each phase of the implementation cycle, as well as between phases. Brynard.13 lists five common variables that affect the implementation process (the “five Cs”): (i) the policy content itself, in the sense of its expected impact on people and how that would influence their reaction; (ii) context, particularly the institutional context and state of relations within the organization and among all organizations involved; (iii) commitment of implementation, which is usually influenced by other variables, (iv) capacity of the public sector to deliver policy changes, whether they relate to human, financial or technological capacity, and including non-tangible aspects such as leadership and motivation; and (v) clients and coalitions, referring to interest groups and the need to carefully consider the potential stakeholders affected by the policy.

Drawing on the proposed analytical framework in Figure 2.2, the next chapter uses gap analysis to identify key challenges in the implementation process in Egypt. Using urban transport development as a case study, a comparative analysis is made with several Asian cities. Based on these analyses, the paper presents a broader assessment of how the Egyptian public sector institutions may hinder implementation and lead to implementation gaps, and provides policy recommendations to address these issues.

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Figure 2.2: Task-Based Policy Implementation Cycle

Source: Brinkerhoff & Crosby (2002)
3. THE IMPLEMENTATION GAP IN URBAN TRANSPORT DEVELOPMENT IN EGYPT

The Importance of Urban Transportation for Development in Egypt

One sector that suffers from an implementation gap in Egypt is the transportation sector, especially urban transportation in Cairo. As most residents and visitors would likely attest, traffic in Cairo is chaotic and unbearable. Traffic congestion is among the heaviest of all large cities in the world and it is getting worse every year, at great cost to Egypt in terms of time waste, fuel, air pollution and its accompanying health problems, accidents and loss of economic productivity.

As in other countries, the urban transportation sector plays a pivotal role for accelerating socio-economic development in Egypt. Urban transportation is important for linking sectors of production, consumption and supply of raw materials, and is a key for employment generation, poverty reduction and providing vulnerable groups with access to the city for economic or social services.

Urban transportation touches and affects the lives of at least more than 20 percent of Egypt’s population who live in Greater Cairo, as well as the people who commute daily to the city for business and income generation, for health care or for education. Without easy access to the city, the living conditions of these people would deteriorate. Ministry of planning data show that the transportation sector accounts for 4 percent of Egypt’s GDP and 6.8 percent of its employment.

In addition, congestion leads to huge economic loss in Egypt, most of which from the time and fuel wasted in traffic, which the World Bank estimates at 50 billion Egyptian Pounds (around US$ 6.5billion), representing around 3.5 percent of GDP and placing Egypt as the largest metropolis in terms of such loss. There are also significant dangers to health caused by pollution as well as deaths caused by traffic accidents, which are at least 1,000 annually.

Faced with these problems, the government officials in the transport sector interviewed for this paper recognize the problems facing the sector, as well as corrective steps that need to be undertaken. The officials agree that the urban transportation sector has been the subject of an abundance of strategies and studies, but few have yielded any significant results on the ground.

An urban transport development master plan (the Cairo Regional Area Transportation Study, or “CREATS”) formulated with the support of JICA in 2002 had estimated that, without any efforts to improve the traffic situation in Egypt beyond committed projects under the fifth five-year plan (2002-2007), travel speeds would decline from 19 kph on average to 11.6 kph by 2022, and the average home-work commuting time by car would be increased from 37 minutes to 100 minutes. Worryingly, according to the latest update to this study by the Egyptian Ministry of Transport, the trip speed is expected to drastically worsen to reach 5 kph and the trip time to a staggering 240 minutes by 2022 if nothing is done to improve the situation. These alarming findings have caused officials to consider why so little has been done to improve urban traffic and how the implementation gap in the Egypt’s urban transportation sector can be filled.

Master Plan for Urban Transport Development in Egypt

Cairo is not only the city suffering from traffic congestion. Many large cities around the world are facing
similar challenges. These cities are also adopting a range of measures in attempts to improve their respective conditions. Urban transportation development is a very complex issue because so many stakeholders are involved at both central and local levels and various social, economic and cultural factors are involved. Experiences elsewhere in the world have shown that some countermeasures turn out to be effective, while some have had less impact than expected. In the case of Cairo, however, besides the ongoing construction of subway system, a large problem lies in the fact that very few measures have been undertaken, neither in capital investment in infrastructure nor in policy reform.

This is clearly illustrated through an analysis of CREATS. CREATS is divided into two phases: phase one required the formulation of a transport master plan, which was completed in November 2002, and phase two called for feasibility studies of selected priority projects in the master plan, which were completed in October 2003.

While planning the methodologies of CREATS, all previous master plans were reviewed and the need to involve more stakeholders was identified as a priority in order to make the master plan more comprehensive and implementable (see Box 3.1 for key features of CREATS).

Sometimes, plans and strategies are not implemented when they are formulated with limited participation since the sense of ownership for the output is not well shared by stakeholders. Before the revolution, during the Mubarak regime, Egypt had produced six five-year plans which set the national policy direction. These plans were drafted inside one section of the Egyptian Ministry of Planning without building consensus among major stakeholders, including each of the ministries responsible for implementation. These national plans were simply concepts on paper that did not call for execution, so Sakamoto advocates the introduction of inclusive planning to Egypt. Based on previous lessons, CREATS was designed to secure wider participation among stakeholders. Most of the key stakeholders related to the transportation system in Cairo—the Ministry of Transportation, the Egypt National Institute of Transport (ENIT), the National Authority for Tunnels (NAT), the Egyptian National Railways Authority (ENR), the General Authority for Roads Bridges and Land Transport (GARBLT), the Cairo and Giza governorates, and others—were involved in the planning process with three levels of committees being set up in order to exchange views in an inclusive and effective manner. Civil society and private sector actors were also invited to participate in the discussions. Widespread information dissemination methodologies were employed by holding a number of workshops and seminars as well as distributing periodic newsletters. Despite these efforts, CREATS did not achieve the desired impact on implementation. The problem of non-implementation under CREATS lay in the obstacles occurring after the formulation of the plan.

Factors Contributing to the Poor Implementation of CREATS

Our research here tries to identify the reasons behind the poor implementation of urban transportation development and the execution of recommendations under CREATS, based on interviews with key policymakers, academics and public officials in the transport sector. Through this analysis, we try to identify the root causes of the implementation gap in the urban transportation sector and remedial actions to address the gap.
Box 3.1: Key Features of CREATS:

Between the late 1990s and early 2000s, JICA provided technical assistance to the Egyptian government to formulate "The Greater Cairo Urban Transport Master Plan" in two phases. Under the first phase, completed in November 2002, the master plan provided 59 recommendations of projects or programs over a 20-year period, divided into three groups: short term (2003–2007), medium term (2008–2012) and long term (2013–2022).

Prepared in the belief that additional transport infrastructure alone was insufficient to solve the traffic problem, CREATS called for an integrated set of actions to improve urban transportation, many of which were soft components such as encouraging the connection between transport modalss and policies and coordination among transport sector agencies and with other sectors, at the top of which were urban development and land use planning, and improving traffic management.

As we see from the below figure, five key strategies were proposed and the achievement of each required infrastructure investment as well as policy and governance reforms.

<table>
<thead>
<tr>
<th>Visions</th>
<th>Missions of Transport</th>
<th>Key Strategies</th>
<th>Planning Issues</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sustainable Social and Economic Growth</td>
<td>Economically Effective Urban Transport Systems</td>
<td>1. Improvement of People’s Mobility</td>
<td>Enhance Public Transport Systems to improve “people’s Mobility”</td>
</tr>
<tr>
<td>Assurance of Social Equity</td>
<td>Equitable People’s Mobility</td>
<td>2. Optimal Infrastructure Development and Management</td>
<td>Meet with Urban Development (Needs-driven Transport)</td>
</tr>
<tr>
<td>Improvement of Urban Environment</td>
<td>Safe &amp; Environment-friendly Transport System</td>
<td>3. Accessible Transport for All</td>
<td>Integrate Different Public Transport Modes (ENR, METRO, Tram, Bus, Shared Taxi)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>4. Safe and Environment-friendly Transport System</td>
<td>Structure A Functional Road Network for Passengers and Cargo</td>
</tr>
<tr>
<td></td>
<td></td>
<td>5. Sustainable Institutional and Financial Mechanism</td>
<td>Alleviate Social Exclusion (including gender, handicappers, urban poor)</td>
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<td>Improve Traffic Management and TDM</td>
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<td>Enforce Environmental Measures</td>
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<td>Facilitate the Human Factors (Awareness on safe traffic and Training of Operators)</td>
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<td>Organize a Single Authority (CMTB) for Policy Integration and Coordination</td>
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<td>Strengthen the Financial Mechanism for Capital Investment and Sustainable O&amp;M</td>
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</table>

Source: (Cairo Regional Area Transportation Study (CREATS), 2002)
Many interviewees claim CREATS is still relevant and its recommendations could be useful to easing the traffic congestion in Cairo, if only they were implemented. The following are common factors described by some of the interviewees as major causes that prevent the sector from implementing its plans or policy:

**Effective Authorization Process**

The lack of an effective authorization process for plans and strategies is identified as a significant factor contributing to the implementation gap. In case of the five-year plans, Article 9 of the Egyptian Planning Law No. 70 for year 1973 stipulates that a general framework of the plan is supposed to be submitted for endorsement by the cabinet and the Parliament. At the sectoral and regional levels, in many cases, plans and strategies are reported to the incumbent ministers who might not be in their position by the time implementation is expected to start. A new minister tends not to have a strong commitment to plans formulated by his predecessors, so these plans end up gathering dust on bookshelves. One exception is the energy sector, where long-term strategies are subject to approval by Egypt’s Supreme Energy Council, headed by the prime minister and comprising key ministers related to the energy sector.

In the case of CREATS, the plan was authorized by so-called Higher Committee led by the relevant minister at the time, but both the minister and the other committee members have since changed and, while the committee still legally exists, it has not met in many years. As a result, the legal status of CREATS is unclear and the commitment of the government to implement the plan is weak.
Coordination of Key Stakeholders

For the implementation of any strategy to succeed, coordination and collaboration from multiple entities is indispensable. Under the Egyptian Ministry of Transport, there are 12 entities; six service authorities, including ENIT, NAT, GARBLT, ENR, and six economic authorities, each of which is in charge of a specific transport sub-sector or modal.

The coordination problem is not only in vertical coordination within the ministry of transport and its affiliated entities, nor between central and local levels, but also in horizontal coordination among concerned ministries and agencies outside of the Ministry of Transport. In the case of urban transportation, other ministries and agencies such as the Ministry of Housing, the Ministry of the Interior and the Cairo and Giza governorates are key stakeholders.

To improve coordination, the Greater Cairo Transportation Regulatory Authority was finally created in 2013 (the decision to establish the agency was taken in 2009). To have such a focal agency among all stakeholders represents a big step forward, but whether it will function effectively or not remains to be seen since it currently has only one professional employee. The agency was created as a financially self-sufficient body that is supposed to operate using its own revenue, mainly from license fees to public transportation such as micro buses. This may prove challenging.

A number of other initiatives have been undertaken to improve the planning, coordination and implementation of transportation plans. The Egyptian Transportation Center of Excellence (ETCE) is another entity recently created under the Transport Planning Authority (TPA) and the Ministry of Transport. Again, this entity is equipped with minimal staff and a small budget and demarcation between its role and responsibilities and those of the TPA remains unclear.

Factors Affecting Ministerial Capacity

The degree of implementation differs across institutions and institutional capacity is a major factor that affects the implementation of policies and projects. Donors sometimes refer to this as absorption capacity, since many institutions in developing countries tend to struggle to implement projects and use allocated donor funds effectively and efficiently. In this section, however, we do not discuss ministerial capacity in general, but identify factors that constrain the institutional capacity of the Ministry of Transport in Egypt.

Leadership is a key factor that affects the capacity of any organization. The Ministry of Transport’s frequent changing of ministers has degraded the consistency and continuity of ministry policy. In the three years since the ouster of President Mubarak, there have been seven ministers. The resulting lack of consistency on policies and priorities for development is one of the most serious issues identified by interviewees. Some interviewees pointed out that one minister expressed interest in the development of the railway system, while the next minister was keen on airport development. Since the top-down drive is strong in the Egyptian public system and the technical back office is weaker, when ministers change, it is difficult to secure continuity and consistency for the direction of the ministry.

Some interviewees underline ministry’s involvement in the operation of the transportation system overwhelms the ministry’s capacity. Although NAT, GARBLT, ENR are quasi-subsidiary organizations of the ministry in charge of operating of each transport modality, the boundary of responsibilities between these subsidiary organizations and the ministry is unclear, often leading to excessive ministerial involvement in operational issues.

Another factor that affects ministerial capacity is the serious shortage of qualified technical staff. This is a common problem not only for the Ministry of Transport
but across different ministries. Though the Egyptian public sector employs a huge number of public servants, most of them are administrative staff and the number of staff with sector-specific technical expertise is insufficient.

The shortage of technical experts on staff often leads to the appointment of outside experts, such as academics, as advisors to the minister. Since most advisors are replaced when ministers leave, it is difficult to accumulate a knowledge base and experience inside the institution. Some interviewees claimed that this also affects access to information since some of the short-term advisors do not document their work appropriately.

**Budget Limitations and Private Sector Participation**

Many interviewees claim that the budget shortages are the biggest factor preventing the development of the urban transportation infrastructure. Still, even though there is a huge need for capital investment in transportation infrastructure, the same could be said for most of the countries, both developing and developed, which face their own budget constraints.

Even with existing budget limitations, there are still many measures that a country can take. First, a country can improve its selection and prioritization of projects with good sector strategies linked to budgetary commitments, improved cost-benefit analyses, and risk management strategies. In case of the Egyptian Ministry of Transport, it is not clear which criteria were used in the selection of projects. Some interviewees claimed that officials in charge of budgeting are somehow separated from the planning process so that the priorities in the annual investment plan do not necessarily reflect the sector strategy and priorities.

Second, a country can promote private investment to offset budget constraints, which Egypt has thus far largely failed to do. While the enormous amount of investment and difficulties in recovering costs in the transportation sector make it difficult to mobilize private sector funding, Egypt is far behind other countries in mobilizing private financial resources for the development of urban transport infrastructure. This will be discussed further in later chapters in the comparative analysis with select Asian cities.

Third, poor cost recovery is another factor that affects the availability of financial resources for further investment and undermines the financial soundness of government entities. In theory, users should cover both investment and maintenance costs through fuel prices, tolls, fuel tax and license fees, but in reality few effective, direct user charges exist.\(^{19}\)

The metro tariff remains too low, at 1 Egyptian Pound (US$0.14) per ride, far below the rate needed to recover the huge investment costs. Cairo introduced the metro system in 1987, and subsequent extension work has been very slow. This is partly because the existing lines have not contributed sufficiently to offset investment and operating costs, so additional investment decisions tend to be delayed due to the unavailability of funds. This lack of return on investment can be seen in most transportation sub-sectors.

**Flaws in the Subsidy System**

In Egypt, fuel is heavily subsidized and the prevailing fuel subsidy is hampering the development of the urban transportation system. Vehicle operating costs are a key determinant of modal choice relationships, and the price of fuel is a major variable in this relationship.\(^{20}\) So, the low price of fuel discourages people from choosing a public transportation option since it costs so little to drive their own cars.
In addition, subsidies place a huge burden on the state budget, accounting for 25 percent of the national budget, and the fuel subsidy constitutes 50 percent of total expenditure on subsidies. It is widely recognized that the fuel subsidy is not an effective mechanism to support the poor since vehicle owners, who tend to be wealthier, benefit most from the subsidized prices. The IMF found that, in Egypt in 2008, the poorest 40 percent of the population received only 3 percent of gasoline subsidies. A better mechanism to subsidize the poor requires better targeting, such as through the introduction of a cash transfer system. Better targeted subsidies would help reduce the burden on the national budget and avail more resources for economic and social development.

Besides being a fiscal burden, subsidies tend to be an ineffective and inefficient policy tool for meeting government objectives. They are regressive, they undermine energy efficiency initiatives, they can reduce investment in the energy sector and they have negative environmental impacts. The decision by the new government in July 2014 to cut the fuel subsidy and to increase the price of fuel and electricity is both a bold and welcome step towards mitigating the fiscal burden of subsidies. The reduction of subsidies in Egypt has been considered a third-rail political issue for many years after the President Sadat’s decision to reduce the food subsidy met with fierce protests in 1977, which eventually made him reverse course. During President Mubarak’s reign, fuel subsidies were left largely untouched, adding to

the fiscal burden after world oil prices surged. In that sense, the recent decision to cut subsidies should be praised as first, large step forward. Still, greater reform will be needed in future.

**Flaws in the Donor Approach**

Donors can be part of the implementation problem. A common criticism of donors is that they tend to overwhelm the recipient government with a multitude of recommendations without setting out a clear implementation plan that takes into consideration the institutional constraints. Some interviewees pointed out that donors need to focus more on improving governance, institutional structure, and human resource development of recipient governments.

Devarajan argues that recommendations made without consideration of the political context of a particular country often fail at the implementation stage. He points out that in Egypt, a major reason for delays in subsidy reforms is the intervention from politically connected, energy-intensive firms. In order to implement policy, donors must not only assess the capacity of particular executing agencies, but also the political context in which the policy reforms are to be implemented. Devarajan contends the dissemination of information to the public, especially about the benefits of the change, is an effective mechanism to encourage implementation. This issue will be further discussed in Chapter 5.
4. COMPARATIVE ANALYSIS WITH URBAN TRANSPORTATION DEVELOPMENT IN OTHER COUNTRIES

Egypt is not only the country which suffers from worsening traffic problems; many countries all over the world continue to face difficulties with urban transport development to meet the increasing accessibility needs of growing urban populations. In particular, many emerging economies have been experiencing urbanization in which rapid population increases in metropolitan areas are outstripping expansion in transport infrastructure. Urbanization has brought with it increased congestion, low quality public transport, deteriorating air quality and traffic safety. In many countries, slow policy and program implementation has worsened the situation and enlarged the supply-demand gap in the urban transportation sector.

Various attempts have been made by each country to resolve traffic problems. Some measures were effective and some passed without much impact, yet useful lessons can be drawn from both successes and failures. In this chapter, we will discuss the measures taken to address urban transport problems by a number of cities in emerging Asian economies.

Overview of Urban Transport in Metropolitan Areas in Asia

For this section, we chose to review urban transport development efforts in Jakarta, Manila, and Bangkok. These Southeast Asian cities share socio-economic similarities with Cairo, and each is considered to be in the middle stages of development, according to per capita income. They also have high rates of urban density (see Table 4.1).

These three Asian cities are also facing chronic traffic congestion. For instance, the population of the Jakarta metropolitan area in year 2000 was 21.3 million, and it has since increased to almost 28 million (CMEA/JICA, 2012). Between 2000 and 2010, the number of cars on the road doubled and the number of motorcycles increased 4.6 times. Consequently, the Indonesian government has implemented many measures to ease congestion. They have expanded the bus network, which is the main mode of transport in Jakarta.

Table 4.1: Socio-Economic Data for Cairo and Select Asian Cities

<table>
<thead>
<tr>
<th>City</th>
<th>Country</th>
<th>Population(^1) (In Thousands)</th>
<th>Density/(^2) km(^{2})</th>
<th>GDP/Capita(^3) (current US$)</th>
<th>Transport MP Year(^4)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bangkok</td>
<td>Thailand</td>
<td>13,500</td>
<td>5,400</td>
<td>5,480</td>
<td>1979, 1988, 1990</td>
</tr>
</tbody>
</table>

Sources: Demographia World Urban Areas 10\(^{th}\) Edition, March 2014 and World Bank

Notes:
2. Density is calculated with approximation to the nearest 100.
4. Year Urban Transportation Master Plan was formulated
TransJakarta, the Bus Rapid Transit (BRT) system in Jakarta, was set up in 2004 and has expanded to include 12 lines with three more under construction. It is considered the largest BRT in the world. In addition, the government is constructing a Mass Rapid Transit (MRT) system. Jakarta has also introduced several Traffic Demand Management (TDM) measures to reduce congestion.

In Manila, there is no metro system constructed yet. Instead, the city’s public transit system centers on an elevated railway called Light Rail Transit (LRT). It was introduced in 1984 and has expanded to four lines. The government has been active in mobilizing private sector investment into LRT.

Bangkok was already experiencing severe traffic congestion by the late 1980s, and so began introducing measures to ease congestion earlier than the other three cities. The city’s 1991 strategy (“Seventh Plan Urban and Regional Transport, or SPURT) focused on several mega projects, particularly road expansion through the construction of expressways, some of which involved public-private partnerships (PPPs). In 1999, an elevated urban MRT system, Skytrain, began operating. A subway line was recently constructed to complement the Skytrain, and the government has plans to expand them both to cover the whole city.

Timing of Introduction of Mass Transit System and its Extension

Several studies indicate that the timing of introducing a mass transit system is a critical decision for successful urban transport management. If such a decision is postponed, mass transit systems can be more and more difficult to implement because of complications in acquiring right of way as the economy develops and dependence on private vehicles increases. At the same time, mass transit systems are known to involve high initial investment costs while many developing countries are facing fiscal constraints. Therefore, to strategically consider the investment needs and priorities in the transport sector becomes of utmost importance.

By introducing a metro system in 1987, Cairo was one of the first cities in a developing country to introduce a mass transit system. In the 25 years following its creation, the system’s three lines have been extended to cover a total of 69 kilometers. Meanwhile, Delhi’s metro system, which only came into service in 2002, already has six lines covering 190 kilometers.

The timing for the introduction of metro systems is closely related to the level of socio-economic development a city has achieved. In the 1980s, it can be said that Cairo was more advanced than these other Asian cities. So why, despite its early introduction, has the development of Cairo’s metro system been so slow compared with other large cities in the world? Many interviewees attributed this to budget limitations, but such constraints should be common for most cities. Some pointed out that metro lines have been constructed through soft loans provided by the French government, but since the low tariff makes cost recovery difficult, the government and NAT became hesitant to make further investments because of their repayment obligations.

Others argue it is due to the institutional capacity of NAT. In the case of Delhi, an executing agency, Delhi Metro Rail Corporation Limited (DMRC) established in 1995, was a driving force in ensuring the city’s metro came into operation on schedule. JICA has funded both Delhi Metro and Cairo Metro No. 4 under its soft loan scheme. While Lines 1 to 3 of Delhi metro were astonishingly completed without any delay, the devel-
opment of Cairo Metro No. 4 is facing a further two-year delay, over two years after the signing of the loan agreement. An extension to Cairo Metro No. 3 was recently commissioned, but it is said that it has faced six years of delay from the project’s original timeline.

Private Sector Participation

Many countries have been trying to mobilize private financing for transportation projects to reduce the burden on the state budget and to promote higher quality and increased efficiency in service provision. In Asian countries, PPPs started to be adopted for transport infrastructure development in the early 1990s, but in Egypt there has been no private sector involvement in urban transport infrastructure development.

The two common schemes applied to PPP-driven transport infrastructure development in Asian countries are Build-Own-Transfer (BOT) and joint ventures (JV) between public and private companies. Many transport infrastructure projects have been built through PPP schemes. Bangkok and Manila have been promoting private sector participation in transport projects since early 1990s in order to reduce the burden on their budget and to reduce reliance on foreign loans.

In Manila, a PPP was used for express way development as well as for LRT. The JV method has been applied to develop Metro Manila Skyway and also STAR (Southern Tagalog Arterial Road), and has become the first BOT project in the Philippines. The first LRT line in the early 1980s was financed by relatively expensive borrowing, while the second line was financed through a soft loan from JICA after the failure of the initial trial of BOT. In the 1990s, the Philippines legislated on BOTs to prepare the regulatory framework for private sector participation. Following passage and amendment to the BOT act, the third LRT line—MRT 3—was built and began service in 1999 as a BLT Build-Lease–Transfer (BLT) project.

In Bangkok, private sector involvement in infrastructure has also centered on express way development as well as mass urban transit development. The Second Stage Expressway System (SES) was built under a BTO (Build-Transfer-Operate) scheme. Two lines of the Skytrain system and one subway line were built by PPP.

The question of whether these Asian experiences of PPP infrastructure development represent success stories is hotly debated. These PPPs certainly succeeded in building up urban transport infrastructure, but many projects have faced financial problems. This is often the case when political calculations are used to inform economic decision-making. For example, during the development of MRT 3 in the Philippines, the government had to guarantee private investors a minimum return on investment to cover any revenue gap. As the government wanted to keep fares low for political reasons, it was left shouldering a huge liability from subsidy payments to the private sector. Bangkok’s SES was similarly forced to operate using lower toll fares, which affected its profitability. The stock of SES owned by foreign investors was eventually sold to a local construction company.

These Asian experiences illustrate the mixture of successes and failures of PPP-led infrastructure development to date.

Traffic Demand Management

Though the development impact of introducing a mass transit system is large, the huge investment cost is usually a major impediment to implementation. So, it worth considering controlling the demand side to
match the limitation of supply in infrastructure. Many TDM solutions exist and have been gaining recognition during the past two decades to reduce congestion and decrease the flow of traffic by reducing the attractiveness of using private vehicles, dispersing demand during peak hours, and more efficient use of road space.

In an attempt to restrict car usage during particular areas or hours, Jakarta initiated the so called “3 in 1 scheme,” requiring motorized vehicles entering the city to carry at least three passengers during peak hours in order to reduce congestion. Manila introduced a “Color Coding” program in 1996, which used number plates to regulate which cars were permitted to drive in the city within certain weekday hours. Other TDM measures such as truck-bans or bus priority lanes were introduced. Bangkok has also implemented an intelligent traffic information system (ITIS), which provides drivers with timely traffic information in order to avoid congestion.\(^{28}\)

The most effective TDM can be achieved through proper pricing. This could be done through car licensing fees, parking fees, road pricing and appropriate fuel cost (without subsidy or with fuel tax). As described earlier, vehicle operation cost is a key determinant of modal choice relationship.

In Jakarta, Manila, and Bangkok, attempts to reduce traffic through proper pricing have always faced intensive debate. For example, Bangkok has tried to introduce some TDM measures such as road pricing, bus priority lanes and parking restrictions, but these efforts have failed due to political and institutional constraints.\(^{29}\) While Indonesia’s recent efforts to reduce the fuel subsidy have faced large political challenges, the Philippines successfully removed fuel subsidies in 1998. Such success not only affects demand side management in the transportation sector, but also prices renewable energy due more competitively.

The lesson here is that TDM solutions are essential to tackle urban congestion and can be financially less costly than other measures, but to introduce effective TDM solutions can be as challenging as the introduction of a mass transit system since it requires public acceptance to work. Efficient communication and coordination among concerned agencies and relevant stakeholders are also required.

**Land Acquisition and Land Value**

Transport infrastructure development, land use and land development have both positive and negative interrelation. Most urban cities in both developed and developing countries face land acquisition problems when they are engaged in the development of infrastructure. In developing countries, issues can be more serious due to the lack of proper land acquisition laws and proper ways of assessing land value. The delay of land acquisition is often the major cause of delay in the development of infrastructure, particularly for those projects requiring substantial amounts of land.

Many mechanisms and methodologies have been developed in order to capture the proximity benefits generated from transport facilities on increased land and real estate values and to use such benefits to offset losses from insufficient fare revenues or to reduce reliance on public sector budgets. Land-based financing of infrastructure can be divided into three categories: developer exactions, value capture, and land asset management.\(^{30}\)

Land value capture methodology is more complicated than the other two since to administer the tax system with proper land valuation is not an easy process.
In many countries, land asset management—in the form of land sales, one-time development charges or joint land development with private parties—is far simpler and is being applied. For example in Japan, railway companies have benefited from land development both along rail corridors and the land adjacent to stations. Many developing countries are adopting similar techniques for development of transport infrastructure. In Bangkok, BTS Group Holdings, a public holding company, has been engaged in land development by forming a JV company with a private company. In Delhi, Delhi Metro Rail Corporation (DMRC) has earned substantial amounts of income from selling land to private investors. In Manila, revenues from commercial development rights for MRT 3 were a large income source for the Manila Rapid Transit Corporation (MRTC).

In Egypt, a similar exercise has been tried for land development projects on the outskirts of Cairo. The New Urban Communities Authority (NUCA), a public company under the Ministry of Housing, Utilities and Urban Development, has been a leading proponent promoting such a scheme. It offers desert land owned by the state to private investors, who then assume responsibilities for the development of on-site and off-site infrastructure in addition to the real estate development. In past exercises, NUCA has faced a number of legal challenges from investors and the impact on the development of off-site infrastructure still remains to be assessed, but the exercise so far does not seem to have had a strong connection with public transport institutions. This collaboration needs to be strengthened.

Institutional Coordination

As mentioned in the last chapter, one of the main weaknesses causing an implementation gap in urban transport development for Cairo relates to a fragmented institutional set-up, with weak coordination and communication between the various agencies involved in planning and implementation of transport projects. This institutional barrier hinders and even obstructs any potential effort to approach urban transport planning in an integrated and comprehensive manner, through aligning the individual actions and projects under a clear metropolitan strategy, allocating resources to achieve that goal and monitoring the implementation. In fact, several emerging countries are suffering from the same institutional deficiencies and lack of communication and coordination. These problems are further exacerbated with limited financial and human resources and unstable political and economic situations. Bangkok, where more than 30 institutions are involved in transport development, faces an even more difficult situation than Egypt, and yet the city has somehow managed to develop its infrastructure since the early 1990s. Manila faced similar hurdles until planners formed the Metropolitan Manila Development Authority, an agency that plans, monitors and coordinates urban development of several cities located in Metropolitan Manila in 1995.

In 2004, with the support of JICA, the Indonesian government conducted the “The Study on Integrated Transportation Master Plan for Jabotabebek” (SITRAMP) for the Jakarta metropolitan area. This plan experienced a low implementation rate in its first few years of operation and the traffic situation greatly worsened. Part of the blame for this implementation gap was the lack of a focal institution to manage the planning, coordination, implementation and monitoring and evaluation of proposed projects from a holistic metropolitan view. As a result, the government established the Jabodetabek Transportation Authority (JTA) at the central government level with the participation of more than 15 relevant entities to facilitate the implementation process through coordination of activities, and avoiding any overlap.
Several other countries, including India, Singapore, and China, have tried to establish focal or lead institutions for managing urban transport development. Kumar and Agarwal\textsuperscript{37} reaffirm the necessity to consider urban transport development in an integrated and comprehensive manner, which requires establishing lead institutions. While their report specifies that there is no uniform set up for such institutions, they provide useful lessons from case studies from other countries. Other experiences indicate that the establishment of lead institutions is not easy and takes time, but once established, they can be sustainable if they have sufficient technical and financial capacities, political support and control of financial resources to help them meet the public’s needs.

Whether the newly established Greater Cairo Transportation Regulatory Authority functions well or not remains to be seen, but there are many lessons the agency and the government can learn from other parts of the world.

In addition to institutional matters within the transportation sector, the relationship with central economic institutions such as the Ministry of Finance and the Ministry of Planning and these sectoral ministries and institutions does affect strategy implementation. This issue will be further discussed in Chapter 5.
5. HOW TO FILL THE IMPLEMENTATION GAP IN EGYPT? ANALYSIS AND POLICY IMPLICATIONS

This chapter attempts to summarize and synthesize the main findings that emerge from the analysis of the urban transportation sector in Egypt and the comparative analysis with Asian cities, and to show how they apply generally to the rest of the economy. Some of the issues which we have observed in the urban transportation sector are common for many other sectors and public institutions in Egypt. While implementation capacity differs according to institution and sector, common problems that cause implementation gaps and hamper the implementation of strategy can be observed across many sectors and institutions.

An assessment will be made of the causes of implementation gaps based on the analytical framework in Figure 2.2. The causes of gaps can be attributed to the problems within each phase and between phases. Some problems cut across multiple phases. Based on the gap analysis, the study makes a series of policy recommendations.

Planning/Formulation

As we have seen, in Egypt so much resource and energy is exerted in the first phase of the cycle—the planning part—with far less attention and resources directed to the subsequent phases of implementation cycle. Even so, planning in Egypt still has room for improvement. One improvement is to make the process more inclusive by involving a wider group of stakeholders, an issue extensively studied by Sakamoto.38 Another gap in the planning phase is the lack of a detailed implementation plan, which should be formulated after the formulation of strategies.

The planning stage is often considered complete after the goals have been defined and a strategy formulated, but without clarifying in detail how to execute the plan with identified actions, timeline and concerned stakeholders, many master plans have foundered. These drivers can be consolidated into an execution or implementation plan.

This is closely linked with the capacity as well as ownership of each executing agency. Once they are given clear direction, some institutions will make all efforts to realize strategies, but when the capacity of a particular institution is weak, automatic implementation will not happen. In such a case, some kind of external support, often from donors, is required. We need to be aware, however, that donor assistance without sufficient participation of executing agencies and stakeholders may create dependency. Enhancing a sense of project ownership is key to successful implementation.

The necessity of an implementation plan becomes more acute for national plans than sectoral plans since the goals and directions set out at the national level tend to be very broad and general so that the gap between goals and actions are wider. Our research indicates that the lack of an implementation plan and weak linkages with each executing agency’s plans were one reason for the low implementation of past five-year plans in Egypt. This trend continued even after the revolution in 2011. The Ministry of Planning produced a new 10-year national plan in 2012, only to begin formulating a new plan for 2015 to 2030 before the first was implemented.

Legitimization and Authorization Process

As we discussed in the analysis of Egyptian urban transportation development, the lack of proper le-
Legitimization or authorization process is one factor contributing to the weak commitment of the Egyptian government to implementation. Legitimization and authorization are important for any policy action since it provides momentum and support for implementation, especially when there is a strain on budget resources. If legitimacy is not appropriately secured, stakeholders will not recognize the need to comply with the plan and to work on achieving it. A key issue is at which level legitimization is given. This legitimation level can be divided into three: the political level, the executive branch level and the public level. Each level has its own challenges.

With higher level legitimation, plans and strategies are recognized as a commitment by the government requiring full implementation. The question remains which governing body is best suited to provide such legitimation. The cabinet often has insufficient capacity to undertake such a task, and while parliament could be a strong legitimation body, it is composed of many members representing different vested interests, so consensus-building would take time and it would not work practically. As such, a new higher economic authority, such as National Economic Council, could be created to legitimize strategies.

Sometimes, legitimation is provided from the top—the president—which definitely drives project implementation as some of mega projects, such as the Suez Canal Corridor Development Project and the Aswan High Dam, show. In these cases, momentum for implementation is not an issue. However, whether these mega development projects deliver benefits to the wider public is a different story. During the Mubarak era, the Toshka Development Project in southern Egypt was one of the highest priority projects. Yet the project, which is still in progress, is no longer considered successful. One reason for this is when top-down drive is too strong, projects may move ahead without enough consideration of economic and technical feasibility.

Some countries give more authority over sectoral strategies to central economic agencies such as planning or financial ministries. In Egypt, however, they have almost no authority over sectoral or regional strategies, even while they retain a role in budget allocations. A central planning agency, such as BAPPENAS in Indonesia or the Planning Commission in India, could be given greater authority not only for national master plans but also for sectoral or regional plans. Some countries share such authority among several central economic agencies. In Thailand, the National Economic and Social Development Board (NESDB) is functioning effectively as a central planning agency, albeit a less powerful one than those found in Indonesia and India.39

In Egypt, it is necessary to reassess the authorization and legitimation system for plans and strategies both at the political and bureaucratic level. It is difficult to strike the right balance between two levels, since if the political level is too strong, it may move without considering proper technical and economic assessment and it can be subject to excessive political intervention, while with only executive branch-level endorsement, things may not move in a country like Egypt where decision-making is highly top-down.

The third level of authorization is from the public. In addition to acquiring authorization and legitimation from the government, a kind of authorization or support needs to be given by the final beneficiaries, the Egyptian people. In other words, getting “buy in” from the public is another key factor for the success of implementation. This issue is discussed in more detail in the next section on constituency building.
Constituency Building and Public Relations

Constituency building can be said to be one of the weakest points in the Egyptian implementation system. Any plan or policy reform needs to be marketed and promoted so as to acquire public support in order to be implemented successfully. Also, the wider public should be well informed about the potential benefits and drawbacks of projects and reforms. Devarajan points out that the “why” of policy reform, such as the cost benefit analysis, should be provided to the general public—the majority of whom are likely to benefit from the reform—in order to smoothen the implementation process. The lack of a participatory process and sense of involvement was one of the driving forces that took the Egyptian people to the street in 2011 to topple the regime.

Communication is essential to build trust and credibility for the government and to keep citizens involved, increase their sense of ownership and reduce information asymmetries among stakeholders involved. It is easier to make people accept the new strategies when they feel they are part of the decision-making and implementation process.

The lack of well-functioning constituency building mechanisms tends to make the Egyptian government make less controversial policy choices. As we have observed in the previous chapter, one such example is the lack of a traffic demand side management. Demand side management reform requires less money but more support from the public to be effective.

The recent decision to reduce subsidies and to increase the prices of fuel and electricity came as a surprise and this might be a sign that the new government is prepared to depart from the previous propensity for inaction. Judging from the lack of fierce public opposition to the decision so far, the government’s efforts to gain support for the decision appear to be working so far. Some claim that the last three years of debate concerning the IMF program, might have laid the foundation for better understanding among stakeholders. The capacity to maintain public support for this tough policy decision will continue to be tested, especially given further subsidy reform will likely be required.

The decision to raise prices is always difficult for governments. In Japan, it took the government more than 16 years to raise the consumption tax—one of the lowest among both developed and developing countries—and even then by only 3 percent. Egypt has been debating the introduction of a value-added tax since the mid-1990s. And, as discussed in Chapter 4, Indonesia has found it difficult to reform its subsidy system. The Philippines, however, successfully reduced fuel subsidies in 1998.

A major reason for the Philippines’ success involved the government taking a range of mitigation measures, such as weekly meetings with public transportation leaders, nationwide fuel discounts at 300 filling stations, and the adoption of corporate social responsibility programs among oil companies to better engage with local communities. In addition, smart cards entitling the holders to discounts and other services were provided to vulnerable groups such as Jeepneys, Filipino micro-bus drivers and tricycle operators. Such public relations efforts helped mitigate the impact of the decision, and the Philippines was spared large-scale public rallies to the fuel price increase.

Compared with the Philippines, the Egyptian government’s mitigation measures still appear to fall short, though efforts are being made to introduce a cash transfer system. Egypt should learn from the experiences of other countries in putting a constituency building mechanism in place in order to advance the reform process.
Organizational Design and Modification

The question of how to make the machinery of government work to implement projects and strategies is not easily answered for many developing countries. Egypt has a huge bureaucratic system with 6.5 million public employees and more than 30 ministers. Its reform challenges are enormous but reforming public sector management and institutions will be indispensable to achieve inclusive growth and reduce poverty, as well as to solve the implementation problem in Egypt. Such reforms will face with strong resistance from those who prefer the status quo. Given the size of the challenges, comprehensive reform recommendations are beyond the scope of this paper, but two key issues merit specific mention, namely coordination and accountability, as key drivers to enhance the implementation capacity of the Egyptian public sector.

How can coordination among public sector institutions be improved? Coordination issues can be multi-dimensional. There are so many agencies and institutions within the sector and across different ministries, and fragmentation in organizations can hinder the implementation of complex policies and projects that require coordination and cooperation. Egypt suffers from both vertical and horizontal coordination problems due to the lack of hierarchical structures in the public sector.

For vertical coordination, problems exist at a number of levels: lines of command within ministries from ministers to entry-level staff, between ministries and subordinate executing agencies, and between upstream core economic ministries such as the Ministry of Finance and the Ministry of Planning and downstream bodies including sector ministries and subordinate state institutions.

As for horizontal coordination, coordination between ministers of the same rank seems to function to some extent, whether through cabinet or committee meetings. But below the level of minister, such as deputy-level interactions, effective coordination mechanisms do not exist since each ministry’s chain of command differs making it difficult to find the right interlocutors.

The lack of a uniform hierarchy in public sector organization is one crucial cause of bottlenecks for coordination among different institutions in Egypt. Since the whole restructuring of the organizational structure in the public sector is an extremely challenging task, as a short-term countermeasure, the establishment of a focal agency can serve as a solution in a similar way to the Greater Cairo Transportation Regulatory Authority. But again, without proper resource provision and political support to enhance its capacity and its function, such a solution to establish a focal coordinating agency does not work.

Another coordination challenge in Egypt relates to coordination among or with central economic agencies in the implementation process. In the Egyptian context, the central economic agencies are the Ministry of Planning, the Ministry of Finance, the Central Bank, and the Ministry of International Cooperation. Key questions related to this issue include: What would be the optimal organizational setup to conduct strategy formulation, budget planning and budget execution? What should the relationship be between recurrent and capital expenditures? What should the relationship be between central economic agencies and sector ministries and other stakeholders?

Many countries have faced these issues and grappled with central economic agency reform. In many cases, the role and function of planning institutions have become a target for reform initiatives. In Indonesia, after the ouster of Suharto in 1998, there was heated debate around the appropriate planning system in line
with the move towards decentralization and prevention of corruption. A new budget law (“Law on State Finances 2003”) and a new planning law (“Law on the National Development Planning System 2004”) were introduced, restructuring the roles and functions of the Indonesian Ministry of Planning—known as BAPPENAS—and the Ministry of Finance. More recently, in India, President Narendra Modi is attempting to reform the country’s Planning Commission, a powerful planning agency.

These changes are partly influenced by the increasing roles and activities of the private sector and a growing perception that traditional planning institutions are relics of an outdated concept of a centrally planned economic model. The reform efforts in Indonesia and India reflect the growing shift to decentralization.

In Egypt, the economic and political contexts are quite different from these countries as the momentum for substantive decentralization is still weak and private sector activities are not up to the level of other countries. Also, compared with institutions in Indonesia and India, the Egyptian Ministry of Planning is considered to be less powerful. Yet, the Ministry of Planning does have authority over the public investment budget and, as discussed in Chapter 1, the public investment ratio has experienced a serious decline over the last 30 years. Furthermore, numerous strategies and master plans, some of which are formulated by the Ministry of Planning, have not been implemented. It is clear that some kind of reform is necessary for the Ministry of Planning and its relations with line ministries and public agencies.

Some interviewees claim that, at least in its budgetary functions, the Ministry of Planning should be merged with the Ministry of Finance. Such a merger has been debated in the past, though it has never come to pass. Amendments to planning law 1973 are necessary to meet the current needs and changing environment.45

While differing political and economic circumstances over time and across countries mean there is no single solution to this issue, it is time for the Egyptian government to reassess the role and function of its central economic agencies, in particular the Ministry of Planning, in order to improve the coordination among public institutions and to enhance the implementation capacity.

Concerning organizational design and modification, a far broader issue relates to increasing “accountability”. Who will be accountable for implementation? Of course, each executing agency should be accountable for the implementation process in their sector, but as we have seen, self-regulation does not work in many cases in Egypt. There needs to be a mechanism to hold institutions accountable.

One interviewee suggested that huge infrastructure projects require some kind of “stick” for successful implementation, just as there had been for Egypt’s great historic projects such as the Pyramids, the Suez Canal, and the Aswan Dam. Today, such a “stick” might take the form of applying peer pressure to each responsible agency, policymaker and leader to move towards implementation.

Positive peer pressure will enhance both the performance and accountability of public institutions. Peer pressure can come from two directions: from the top—the president or prime minister—and from the bottom—citizens. How can such a positive peer pressure mechanism be put into place in the Egyptian system? This needs to be tackled in comprehensive manner.

The 2004 World Bank Development Report points out that accountability acquires so many different us-
accountability is a set of relationships among service delivery actors with five features: i) delegation, ii) finance, iii) performance, iv) information about performance, and v) enforceability. Good delegation (legitimization) and financing (resource mobilization) mechanisms are important prerequisites to sustain and improve performance, while access to information about performance (monitoring and evaluation) and enforceability (peer pressure) are also essential.

The importance of a chain of actions in such a cycle is what we are trying to emphasize in this paper. As far as accountability and peer pressure is concerned, a proper monitoring and evaluation system will be indispensable. This will be further discussed later in this chapter.

The institutional challenges to the implementation capacity of Egypt's public sector go far beyond the two issues discussed above. Egypt's public sector has been fiercely protected for so long, functioning as an absorption mechanism for the labor force without its effectiveness and efficiency ever being suitably tested. As a result, there are too many employees, which represent a huge fiscal burden for the country. Too many ministries exist and most of ministers struggle to execute their work since technical back offices are weak, and the lack of well-established hierarchical structures hampers proper coordination. For the new government, which seems determined to maintain momentum for change, it is time to consider serious public sector management and institutional reform.

Resources Mobilization and Action

Before resources are mobilized and actions are initiated, policy change tends to be largely a paper exercise, but the resource mobilization task shifts the policy from paper to action. While resources might have quantitative and qualitative constraints, gaps between strategies and resources are also causes of low implementation. Effective use of different kinds of resources, such as financial, human, technical and physical resources, is essential for effective and efficient implementation.

In the analysis of the urban transport infrastructure, this paper discusses the issue related to financial resources, often identified as a key factor impacting the implementation gap in developing countries. But financial constraints can be mitigated by a mixture of countermeasures, including better prioritization, improvement of cost recovery, and the introduction of private sector participation.

In this chapter, our analysis will also be extended to issues related to human resources. At 6.5 million employees, public sector employment as a share of population in Egypt is quite high, at a rate of 1:13 compared with a world average of 1:30, and a rate of 1:80 in the case of Japan. The wage bill consumes more than quarter of Egypt's annual budget. In addition to its bloated size, the sector lacks a proper development program for staff further exacerbating the human resource gaps facing the Egyptian bureaucratic system.

Except for the Ministry of Foreign Affairs and the Central Bank, as well as a handful of subsections within ministries, the public sector does not attract high quality young candidates. Unlike many Asian countries, public sector jobs are generally not considered as elite posts, but rather posts for those who seek job security. This lowers the quality of the ministries and public sector institutions in general. Due to the shortage of capable technocrats, many ministries try to fill higher policymaking posts with temporary senior advisers, often from universities. These advisors are employed for certain periods of
time and do not contribute much to the capacity development of ministries.

Dimian and Al Mashat underline human resource development as critical to advancing policymaking and implementation in Egypt, proposing that it should work on two parallel axes: attracting highly qualified candidates to join ministries for policy management and other senior executive positions, and developing the technical and managerial capacities of government staff through well-structured, long term career development strategies. In doing so, the mandate and technical capacity of the Central Agency for Organization and Administration (CAOA) should be reassessed and modernized. Recent decisions in Egypt to place a cap on wages might discourage competent public sector employees to join.

In addition to the capacity gap in human resources, there is also a demographic problem. Due to the excessive number of employees, many ministries have frozen recruitment resulting in a distorted demography where the majority of staff over 50 years of age. In 10 years, as current employees retire, this is likely to become a serious issue for ministries lacking younger employees. Equally, such decrease in the number of employees might offer a good opportunity to substantially reform public institutions. This process should be strategically planned and managed.

**Monitoring and Evaluation**

The lack of an effective and efficient monitoring and evaluation mechanism is a critical weakness in the Egyptian public system. On this, the majority of those interviewed for the research agreed. In order to increase the impact and quality of public investment and to promote better service delivery to the public, the monitoring and evaluating mechanism needs to be strengthened. This will have a positive impact on the enhancement of institutional capacity and accountability.

In Egypt, the Ministry of Planning, the National Investment Bank (NIB), the Central Auditing Organization (CAO) and the Center for Project Evaluation and Macroeconomic Analysis (PEMA) in the Ministry of International Cooperation are key agencies responsible for monitoring and evaluation of public spending. Except PEMA, which undertakes comprehensive evaluation for donor-funded projects and programs, other institutions are mainly monitoring the spending of the budget or compliance with laws and regulations, not the developmental impact or performance.

Before the revolution, each five-year plan spared one chapter for analysis on the achievement of the previous five-year plan, but most of the analysis focused on how much money had been spent for each item compared to the original budget. Analysis on the performance of the plan was very weak. In the implementation cycle, it is important to feedback lessons, both successes and failures, into next cycle of implementation. An effective feedback system does not exist in Egypt.

Some countries such as the Philippines, Indonesia, and Malaysia have been trying to strengthen monitoring and evaluation mechanisms by introducing results-based management and budgeting, such as Key Performance Indicators (KPI), for the public sector. Both the Philippines and Indonesia have made significant progress in establishing a result-oriented public sector management and performance-based budgeting mechanism, where linkages between planning and budgeting have been strengthened. Both installed a medium-term expenditure framework and set performance indicators to be monitored during implementation. In the case of Indonesia, the president
established a special unit to monitor the progress of results and incentivize performance.\textsuperscript{50}

In Malaysia, performance-based budgeting is also used. A whole machinery for monitoring and evaluating the implementation of five-year plans has been set up, coordinated by a special agency called the “Implementation and Coordination Unit,” which reports directly to the prime minister while many agencies at the federal, state, and district levels involved in monitoring can coordinate through an online system known as the Project Monitoring System II.\textsuperscript{51}

Currently in Egypt, the Ministry of Planning is trying to strengthen its monitoring capacity and this initiative needs more attention and support. They are trying to align individual projects under a specific program as an initial attempt to manage results. However, measuring results should not be an end in itself, but rather a means to feedback and improve performance, decision-making, and service delivery.

Introduction of effective monitoring and evaluation mechanisms may enhance the capacity of public institutions as well as public officials. In the previous section, we discussed the need for “peer pressure” to enhance performance and accountability. In a country like Egypt, where the top-down drive is strong, a results-oriented model of monitoring can be a good mechanism for creating “peer pressure” and incentivizing performance if it is linked with resource allocation.

In Malaysia, KPIs were developed to measure the performance of public organizations and civil servants to improve service delivery. Civil servants are required to prepare their targets and indicators, on which their performance is evaluated annually and based on that their salary raise and promotion is determined. At the organizational level, KPIs are used to measure the public institution’s performance through evaluating their (i) efficiency and effectiveness of service delivery, (ii) financial productivity, and (iii) public satisfaction.\textsuperscript{52}

The effectiveness of such a sophisticated system is nevertheless a matter of debate since the nature of public sector work is sometimes difficult to quantify. It is important for Egypt to learn from these experiences and to work on strengthening the public sector’s capacity and accountability through a rigorous system of monitoring and evaluation.

**Issues in Implementing Reform in a Transitional Period**

In implementing the policy recommendations proposed in this chapter, we have to consider the special circumstances facing Egypt today. After experiencing two political upheavals in the last few years, Egypt is still in a transitional period. The economy is still in recovery and society remains volatile and disconnected from many economic, political and social activities, particularly young people. This fluid situation might be a good chance for drastic change but efforts need to be made to avoid creating more chaos. In considering the effective implementation of reform, we raise here a number of issues specific to Egypt’s current circumstances.

First, policymakers and leaders need to have a strategic vision of the short-term and long-term actions, goals and benefits of their development policies and plans. In the short term, it is quite natural that stability will be given the highest priority in policy deliberations. But the long-term future of the country should not be sacrificed in the pursuit of short-term stability if it stifles the reform process. Egypt needs steady evolution, not revolution, with due consideration of both short-term and long-term goals and benefits.
Second, striking a balance between inclusiveness and efficiency is another challenge. As it was indicated by the Gallup opinion poll referred in figure 1.4, rapid growth during the mid-2000s did not bring an improvement in the way people viewed their livelihood. One of the key factors leading to the revolutions was the sense of exclusion from the decision-making process and the economic development process. Achieving inclusive growth should be a major goal of the new government. However, with greater inclusiveness come higher costs and slower processes.

Given the bitter experience of two turbulent political transitions, it is true that in the long run, it is better to involve as many stakeholders as possible. But, we have to be aware that this would slow the input process. Egypt’s current situation is not business as usual situation and, in some cases, it might be more efficient to go ahead with quick decisions and actions, if a clear goal and appropriate methodology can be identified, as was the case with the recent subsidy reform decision. If the government had postponed its decision until the parliament was in place, such a drastic decision might have not been taken place at all. Such decisions will make some people unhappy and draw criticism over their legitimacy, but as long as the long-term benefit is made clear to the people—in other words, inclusiveness in output—it might be justifiable to give efficiency and speed higher priority. An extreme example of this can be seen in cases of natural disaster or war, in which efficiency and speed take precedence in order to save people’s lives. Still, the government should not always use emergencies as justification for such decisions and every effort must be made to realize benefits to the people after decisions are made.

Third, the new leaders need to tackle the psychological gaps among public officials between goals and decisions and actions. Historically, Egypt has been a country with a highly centralized system in which the top-down decision-making drive is very strong. After the revolution in 2011, the propensity for risk aversion was even stronger, leading to delays in decision-making in every aspect. Many politicians and high-ranking government officials suspected of corruption were arrested or went into exile, leaving many ministers and technocrats afraid to make decisions and take actions. This risk-averse atmosphere resulted in longer delays to development projects than the preceding political turmoil.

The new president and prime minister seem to recognize the importance of decisive action, but many middle layers of the bureaucracy as well as some ministers seem to still be wondering which way to go. Clear messages should be conveyed by leaders that the public officials will be evaluated on their actions, not by inaction for fear of making mistakes. Public officials need a greater a sense of ownership for their decisions and actions. To change such a mindset is not an easy task, but without it things will not improve.
6. CONCLUSION

As the new Egyptian government strives to achieve inclusive growth and make the difficult transition to democracy, it needs to tackle diverse challenges on many fronts. On the one hand, it is grappling with the challenges created by instability in the wake of the revolutions, and on the other with the historic challenges that have plagued Egypt for so many years.

Underlying this research is the simple fact that Egypt has many master plans and strategies, but few of them have ever been implemented. There is no shortage of ideas regarding “what to do,” but not nearly enough attention paid to “how to do,” the implementation process. The lack of implementation has been affecting the declining trend of public investment. Though rapid GDP growth was achieved during the mid-2000s, it did not improve the perceptions most people held regarding their livelihood. Infrastructure and public services were deteriorating and the development process was not inclusive in either inputs or outputs. This was a crucial factor that led people to take to the street to topple the two governments.

This paper tries to identify why implementation has been so poor in Egypt, using urban transport development as a case study. From the research, it is clear that there are many missing links that hinder the smooth flow of implementation cycle.

Today, the launch of so many initiatives and strategies by the new government is not only gradually improving the people’s perceptions of their livelihood but also raising their expectation for the future and for change. The government need to make every effort to deliver on these expectations in the future. To that end, leaders need to make the machinery of government function more effectively and efficiently. Comprehensive public sector management and institutional reform will be indispensable.

This research identifies the areas in which the new government must effect reform, but this needs even wider and deeper analysis in the current Egyptian context. Such reform needs to be tackled as comprehensively as possible since even if reform is achieved in one phase of the cycle, if gaps in other phase are more fundamental obstacles, it may not produce the desired result.

Egypt is a country with great history and tremendous resources and potential. Unfortunately, such resources and potential have not been utilized and realized in the past several decades. With the new leadership in place, now is the time for implementation. The time has come for Egypt to transfer from revolution to evolution with steady action.
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ENDNOTES

5. See Kharas, Ghanem et al. (2012).
11. See Meyers et al. (2012).
12. This implementation cycle is formulated based on a cycle proposed by Brinkerhoff and Crosby in their book Managing Policy Reform (see Brinkerhoff and Crosby (2002)).
16. Cairo Regional Area Transportation Study (CREATS) (2002).
17. Before CREATS, three transport master plan studies for Cairo existed; the first one made in 1973 using French support under Transport Planning Authority, the second one in 1989 using JICA support under Cairo Governorate, and the third one in 1999 using French support under National Authority for Tunnels (NAT).
24. See Kawaguchi et al. (2013).
27. JICA (2011).
32. See Kawaguchi et al. (2013).
33. See Mandri-Perrott (2010).
34. JICA and BAPPENAS (2004).
35. See CMEA/JICA (2012).
41. See OECD (2010).
42. Following the revolution of January 25th, 2011, in order to fill the increasing fiscal gap, the Egyptian Government started negotiations with the IMF to receive loan assistance, based on the condition that the Government would implement an economic reform program. The negotiations were never completed, amid strong objections to the reforms.
43. See Fossil-Fuel Subsidy Reform: Challenges and Opportunities (2012).
44. See Dimian and Al-Mashat (2013).
45. The Ministry of Planning is currently drafting new legislation, but it does not include any drastic change to budget responsibility, nor roles and functions.


47. See Brinkerhoff and Crosby (2002).


49. Ibid.

50. See Asia Pacific COP-MFDR (2011).

51. See Chia (2009).

52. See Khalid (2010).
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