CURRENCY EQUIVALENTS

(Exchange rate as of 10 November 2008)

Currency unit = Philippine peso
USD 1 = P48.510
Philippine pesos 1 = USD 0.020614

FISCAL YEAR
January 1 – December 31
**LIST OF ABBREVIATIONS AND ACRONYMS**

<table>
<thead>
<tr>
<th>Abbreviation</th>
<th>Acronym</th>
<th>Description</th>
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<tbody>
<tr>
<td>ADB</td>
<td>Asian Development Bank</td>
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<tr>
<td>BOT</td>
<td>Build-Operate-Transfer</td>
<td></td>
</tr>
<tr>
<td>CAAP</td>
<td>Civil Aviation Authority of the Philippines</td>
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<tr>
<td>CIDA</td>
<td>Canadian International Development Agency</td>
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<tr>
<td>CIIP</td>
<td>Comprehensive Integrated Infrastructure Program</td>
<td></td>
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<tr>
<td>DOTC</td>
<td>Department of Transportation and Communications</td>
<td></td>
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<tr>
<td>DPWH</td>
<td>Department of Public Works and Highways</td>
<td></td>
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<tr>
<td>GDP</td>
<td>Gross Domestic Product</td>
<td></td>
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<tr>
<td>GNP</td>
<td>Gross National Product</td>
<td></td>
</tr>
<tr>
<td>GOCC</td>
<td>Government-Owned and Controlled Corporation</td>
<td></td>
</tr>
<tr>
<td>HDM-4</td>
<td>Highway Development and Management Version 4</td>
<td></td>
</tr>
<tr>
<td>ICC</td>
<td>Investment Coordinating Committee, National Economic and Development Authority</td>
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<tr>
<td>IT</td>
<td>Information Technology</td>
<td></td>
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<tr>
<td>JICA</td>
<td>Japan International Cooperation Agency</td>
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<tr>
<td>LRT</td>
<td>Light Rail Transit</td>
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<tr>
<td>LRTA</td>
<td>Light Rail Transit Authority</td>
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<tr>
<td>MRT</td>
<td>Mass Rail Transit</td>
<td></td>
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<tr>
<td>MTEF</td>
<td>Medium-Term Expenditure Framework</td>
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<tr>
<td>MTPDP</td>
<td>Medium-Term Philippine Development Plan</td>
<td></td>
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<tr>
<td>MTPIP</td>
<td>Medium-Term Public Investment Program</td>
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<tr>
<td>MVUC</td>
<td>Motor Vehicle User’s Charge under Republic Act 8794</td>
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<tr>
<td>NAIA</td>
<td>Ninoy Aquino International Airport</td>
<td></td>
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<tr>
<td>PEGR</td>
<td>Philippines Australian Partnership for Economic Governance Reform</td>
<td></td>
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<tr>
<td>PDAF</td>
<td>Priority Development Assistance Fund</td>
<td></td>
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<tr>
<td>PPIAF</td>
<td>Public-Private Infrastructure Advisory Facility</td>
<td></td>
</tr>
<tr>
<td>PNCC</td>
<td>Philippine National Construction Corporation</td>
<td></td>
</tr>
<tr>
<td>PPP</td>
<td>Public-Private Partnership</td>
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EXECUTIVE SUMMARY

Infrastructure needs in the Philippines must be addressed to ensure long term economic growth. After several years of fiscal pressure, the Philippines is now in a position to address these needs. Despite the current international financial situation, the country is now in a position to commit resources to improve transport infrastructure. To this effect, it is necessary to i) make resource allocation more effective and ii) improve governance in the coordinating departments and in implementation agencies. The suggested actions that follow address these two fundamental needs within four groups of recommendations.

First, focus should be on improving infrastructure quality and service delivery. While the quantity of transport infrastructure in the Philippines in network and facility density compares well with other countries in the region, its capacity and quality does not. Some critical transport costs are higher in the Philippines than in its neighbouring and competing countries. Substantial extra public and private expenditure is required to bring the quality of transport infrastructure up to an acceptable standard. This need applies to funding the maintenance of road and railway assets as well as to the capacity and quality of ports and airports.

Second, the processes for allocating public resources could be improved. With additional public resources available, project preparation, planning and budget processes need to ensure that expenditures are well focused on areas that offer the best value for money in improving service quality. The government has taken important initiatives to achieve this end. But much remains to be done. The quality of multiyear planning and the quality of project preparation and selection in the annual budgetary process could be improved. Allocating resources by default to the funding of deficits of Government owned and controlled corporations could be discontinued. Better preparation of transport infrastructure projects is required—whether projects are funded by the government, international financial institutions, donors or the private sector. Contingent costs of public-private partnerships need careful analysis beforehand, which will require criteria for assessing public contributions.

Third, higher public spending on transport infrastructure will be effective only if accompanied by a program to confront institutional and policy distortions. In national budgeting and planning processes, this means improving the quality of planning documents and project appraisal and strengthening of prioritization in the national planning. It also means developing a multi-year multi modal transport infrastructure plan as a basis for project selection and national planning. For Government Owned and Controlled Corporations this means separating the regulatory functions from operational responsibilities so that free and fair competition can work to benefit consumers. Those steps require reforming several public operating agencies and government owned and controlled corporations. For local government units this implies increased access to financing through greater autonomy and effectiveness in raising local taxes and getting access to private sector financing.

Fourth, the private sector could be encouraged to continue its important role in transport infrastructure investment. Public resources alone will not meet the financing needs. In the mid-1990s the Philippines experienced a rich supply of proposals for private finance, mostly unsolicited. Often poorly coordinated with other facilities, these initiatives met with mixed success. Unsolicited proposals need more careful scrutiny than they receive. Recent experience suggests that the days of private sector eagerness to invest in public transport infrastructure are over. Improved processes and a stronger public sector institutional context are needed if private sector financing is to play a role in the future.
1. GROWTH AND TRANSPORT INFRASTRUCTURE

**Key Findings**

- The quality of transport infrastructure has become an impediment to sustained development. High subsidies to counter rising food prices, a projected decline in the tax ratio, slowing economic growth and a more challenging global environment have significantly reduced fiscal space for 2008 and 2009. Fiscal space can be increased through a number of initiatives, including (a) more revenue mobilization (which is outside the scope of this report) and higher public savings; (b) higher efficiency across the entire spectrum of public expenditures to make space for more investment in transport infrastructure; and (c) altering the composition of public expenditures by cutting back lower priority areas.

- This report argues that investment in overcoming structural impediments to sustained and balanced growth is critically important and consequently should be given high priority. There is broad recognition in the Philippines of the need to increase the level of investment and improve the quality of spending on transport infrastructure. The Philippine Authorities plan to invest 5 percent of GDP by 2010 to investment in infrastructure (transportation, power, water, sanitation, etc.) compared to 3.1 percent today.

**Key Recommendations**

- Notwithstanding the ongoing global financial crisis, the Philippines can invest in overcoming the most important impediments to sustained balanced growth, including investments in the quality of transport infrastructure, without jeopardizing public debt sustainability or macroeconomic stability. In so doing the focus should be more on improving the quality of transport infrastructure and less on capacity expansion (kilometers of road, number of ports).

- Attention could also be given to the policymaking environment for providing transport infrastructure, including planning, budgeting and execution of construction, maintenance, and operations to make sure that policy priorities are translated into budgetary and implementation priorities.

---

**ECONOMIC RECOVERY**

1. **Through 2007, economic activity expanded significantly and vulnerabilities were reduced.** Following negative growth during the Asian Financial Crisis ten years ago, economic growth has averaged 5.8 percent from 2003 to 2007, peaking at 7.3 percent in 2007. As in recent years, more than 60 percent of growth was from private consumption, supported by growing migrant workers’ remittances. Revenue reforms and privatization in 2004–06 made it possible for the government to increase public spending, while maintaining the fiscal consolidation effort (the national government budget deficit declined to 1.6 percent of GDP in 2007). As a result national government public debt declined through 2007 to 47.8 percent of GDP. Average annual inflation, at 2.8 percent, fell below the government’s target of 4–5 percent, in part due to a strong appreciation of the peso. Net international reserves more than doubled from 2004 to 2007 so that they now cover over twice short-term debt, against over one in 2004. However, poverty increased from 2003 to 2006 with 32.9 percent of the population living below the Philippines' poverty threshold. Recent food price increases are estimated to push another 2.7 million people into poverty.

2. **2008 proved to be a challenging year, with growth slowing while inflation briefly climbed to double digits and the current account surplus declined.** Following weak first three quarters 2008 growth (owing to weak private sector spending and slowing external demand) and a rapidly worsening global economic environment, GDP growth is now projected to slow to 4.3 percent in 2008 and further slow down to 3.0
percent in 2009. Inflation surged from 2.8 percent in 2007 to 9.3 percent in 2008, mainly due to high oil and food prices but is expected to recede. As economic growth slowed, the fuel and food price shocks revert, headline and core inflation decline, and key central banks around the world aggressively cut policy rates, the Philippines central bank started easing its monetary policy in December. Inflation is expected to slow down to 6.5 percent in 2009. Despite a projected widening of the trade deficit, the current account is projected to remain in surplus both in 2008 and 2009.¹⁷

3. Notwithstanding the recent period of high growth rates, growth in the Philippines has been slightly below those of comparable countries in the region. This slower growth has been attributed to a number of structural impediments. These include inadequate infrastructure, weak investor confidence related to governance concerns and a number of unaddressed market failures.¹⁸ Although the tax base expanded following the introduction of the value added tax in late 2005, revenue performance has significantly trailed government plans. The tax–to-GDP ratio is projected to revert to levels close to the pre-VAT reforms in 2009. Non-indexation of excises to inflation and widespread tax incentives are two sources of revenue leakage that could be addressed promptly and provide the government with the revenue needed to be able to fund government development expenditures going forward.

Figure 1: Growth rates of real GDP, 2000-2007

Source: Asian Development Bank's Statistical Database System (SDBS)

¹⁷ For the latest updated macroeconomic assessment of developments in the Philippines, see the January 2009 of the World Bank’s Philippines Quarterly Economic Update.

¹⁸ ADB, Philippines: Critical Development Constraints, 2007
SUSTAINING GROWTH

4. To achieve the Philippines’ goal of joining the ranks of advanced nations, the level of growth in recent years would need to be sustained for at least a generation. The favorable international environment that existed through 2007 has rapidly switched to an especially challenging one. In light of this, the resiliency, efficiency and competitiveness of the economy will be important to navigate the ongoing turbulent times. With the Philippine economy nearing full capacity, sustaining high growth must increasingly come from higher investment, greater productivity increases, lower transaction costs and better technology. A new World Bank report on the Philippine economy suggests that stronger emphasis on policy reforms will be critical, especially in the following key areas:

(a) Make better progress on structural fiscal consolidation. The government would benefit from raising more revenues in order to finance the spending on infrastructure needed to sustain growth and the social programs to make it more inclusive while reducing fiscal risks.

(b) Expand efforts to make government more effective by improving institutional effectiveness, expenditure management and procurement processes and eliminating corruption.

(c) Focus on the quality and effectiveness, not just quantity, of infrastructure, which is key to sharing growth across regions and sectors.

5. While external conditions for the Philippine economy have significantly worsened, the country is in a reasonably good position to tackle these challenges thanks to a steady reduction in its macroeconomic vulnerabilities. The Philippines accumulated substantial reserves in through September 2008, which, at more than USD 36 billion cover over 5 months of imports. This level of reserves should help the country cope with the cyclical downturn and potential shocks. Current turmoil therefore ought not to result in reduced government spending on long term investments, including on infrastructure.

6. In the long term, there are concerns regarding the sustainability of growth without structural reforms and infrastructure investments. Although there is some evidence that total factor productivity growth picked up the last 7-8 years, a significant part of recent growth acceleration was facilitated by the uptake of spare capacity. As spare capacity is mostly exhausted, continuation of high growth levels will require faster growth in the capital stock—that is, much higher investment—and faster productivity growth. Signs of declining Philippine export market shares and competitiveness this decade are concerns. Indeed, international experience suggests that growth accelerations often fizzle out unless they are supported by continued policy reforms. Addressing these challenges will require government to deepen structural reforms and foster an environment conducive to greater innovation that is the engine for longer term growth, including by providing high quality infrastructure.

19 World Bank, Accelerating Inclusive Growth and Deepening Fiscal Stability, 2008, draft
INFRASTRUCTURE AS A DRIVER FOR CONTINUED GROWTH

7. The importance of the infrastructure sector as a general driver of growth is larger than previously suggested in the literature on economic growth (see Box 1). Research has concluded that poor quality, unreliable infrastructure services, or insufficient infrastructure will make firms less willing to invest. The effectiveness of infrastructure investment in producing growth crucially depends on the quality of the infrastructure development and its maintenance. Consistent with this conclusion, attention has turned to the mechanisms to set priorities and select investments. The discussion on infrastructure should be less about its quantity and more about the policymaking environment for providing it.

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Source: Asian Development Bank’s Statistical Database System (SDBS), 2008


Box 1: Infrastructure investments and economic growth

Evidence of the beneficial effects of good infrastructure on growth continues to emerge. Conventional links between transport infrastructure and growth include the direct productivity effect on private production inputs and the complementary effect on private investment. The 1994 *World Development Report* detailed the importance of infrastructure for growth, and more recent research has examined the dynamics of the relationship between the two. Findings indicate that the impact of infrastructure investment depends on the relative size of that investment to existing infrastructure – that is, infrastructure investment has a smaller impact on growth in a country like the US, which already has a substantial infrastructure network, than on growth in developing countries. In countries starting at a lower level of infrastructure, the impact could be dramatic: one study estimated that if Peru, starting with a relatively low level of infrastructure, could rise to Costa Rica’s level (the infrastructure leader in Latin America), its growth rate would rise by 3.1 percentage points. In addition, infrastructure investment is associated with lower levels of income inequality.

Recently, Agenor and Dodson (2006) established that beyond the conventional links there are a number of overlooked channels for public infrastructure to produce growth, including:

- Indirect effects on labor productivity.
- Effects on adjustment or investment costs.
- Effects on the durability of capital.
- Impacts on health, nutrition, and education.

The Agenor and Dodson paper concludes that the importance of the infrastructure sector as a general driver of growth is much larger than previously suggested and that a focus on infrastructure should be renewed in developing countries.

This is in line with the recent Growth Commission Report which highlighted the importance of public investment in infrastructure, because of both the inherent value of infrastructure and the role that public investment can play in attracting private investment.


8. Recent assessments indicate that there is a potential for improving maintenance and management of transport infrastructure in the Philippines. Substantial additional expenditures are required to bring the quality of transport infrastructure up to an acceptable standard comparable to other countries in the region (see chapter 2). This applies to all key categories of transport infrastructure including maintaining road and rail assets, and to improving the capacity and quality of seaports and airports. This is all the more important in view of the Philippines’ rapid population growth and urbanization. Between 1980 and 2000 the total population grew at 2.3 percent per year, and the urban population grew even faster at 4.5 percent per year. An analysis undertaken by the National Center for Transportation Studies for the National Economic and Development

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22 World Bank, Philippines: Meeting Infrastructure Challenges. 2005.
23 It could be argued that the pace of urbanization in the Philippines is slower than in most other emerging market economies. Irrespective of a comparatively slower pace, urbanization poses infrastructure in the Philippines as in other countries.
Authority and the Legislative-Executive Development Advisory Council in 2000 indicated that losses due to congestion in Metro Manila alone were around P100 billion a year in 1996 prices, or 4.6% of GDP. Funding shortages are not the only reason for low quality, deteriorating infrastructure. Between 25 and 35 percent of the funding for maintenance of national roads is allocated to activities that are labor intensive but have somewhat transitory impacts, such as the road beautification program. In addition, funds are being distributed equally to districts regardless of need.

**Figure 3: Population Growth and Urbanization**

![Population Growth and Urbanization](http://www.un.org/esa/population/unpop.htm)


**COMMITMENT TO INCREASED INFRASTRUCTURE SPENDING**

9. **There is broad political consensus in the Philippines on the need to improve transport infrastructure to advance economic competitiveness and foster balanced growth.** Infrastructure is a priority in the Government’s Medium Term Philippines Development Plan (MTPDP) for 2004-2010. Infrastructure accounts for 59 percent of the total envisioned budget in the plan with transport infrastructure accounting for 38 percent. Pronouncements made by the President (e.g. in the State of the Nation Addresses) likewise cite the need for greater investment in infrastructure, specifically in transport to decongest Metro Manila. The planned increase in infrastructure expenditure is based on the perception that middle-income countries in East Asia will need to spend at least 5
percent of GDP on infrastructure to meet infrastructure needs in the next 10 years\textsuperscript{24} and the observation that most developing countries in the region that have spent more than this benchmark have sustained growth better. Catching up with peers is believed by decision makers in the Philippines to be an important contribution to increasing national competitiveness, consistent with the target of balancing the budget by 2010.

10. \textbf{The draft 2009 budget provides for a fiscal space of 44.9 billion pesos, equal to 3.2 percent of the ceiling}\textsuperscript{25}. Although this is a reduction in fiscal space compared to the 2008 budget (7.7 billion pesos or 4.7 percent of the ceiling) the fiscal headroom is still considerable. Forward estimates in the 2009 budget provide for a substantially increased fiscal space available to address development needs and other political priorities.

\begin{table}[h]
\centering
\begin{tabular}{|l|c|c|c|}
\hline
 & 2009 & 2010 & 2011 \\
\hline Obligation Ceiling & 1,404.0 & 1,549.2 & 1,772.6 \\
Forward Estimates & 1,359.1 & 1,410.1 & 1,480.7 \\
Fiscal Space & 44.9 & 139.1 & 291.9 \\
\hline Percent of ceiling & 3.2 & 9.0 & 16.5 \\
\hline
\end{tabular}
\caption{Fiscal Space in the 2009 National Budget, P, 2008 prices}
\end{table}

Source: Department of Budget and Management, Fiscal Planning Bureau, 2008 preliminary estimate

11. \textbf{Increased transport infrastructure spending is planned to account for over 40 percent of the fiscal space}. Of the total expected fiscal space of 44.9 billion pesos in 2009, new policy measures for infrastructure is currently planned to reach 19.5 billion pesos. Other priority areas include education, health, science, the environment etc.

12. \textbf{Increasing the effectiveness and efficiency of public spending is crucial to boosting the Philippines’ medium- to long-term balanced growth prospects}. A key challenge is to ensure that increased expenditure offers the best value for money. The challenge will be to 1) maintain and deliver on the political commitment to increase spending; and 2) to ensure that spending is well planned, budgeted and executed. Accordingly, this report discusses the impact of budget policy, planning, and priority-setting in the provision of transport infrastructure services. Complementing the recent comprehensive overview of infrastructure in the Philippines,\textsuperscript{26} it describes and assesses transport infrastructure and expenditures in the sector (chapters 2-3). It then assesses the institutional impediments to effective public expenditure in the sector (chapters 4-8).\textsuperscript{27}

\textsuperscript{24} World Bank, Philippines: Meeting Infrastructure Challenges, 2005
\textsuperscript{25} Fiscal space is defined here as the difference between the obligations ceiling and the forward estimates.
\textsuperscript{26} World Bank, Philippines: Meeting Infrastructure Challenges, 2005
\textsuperscript{27} In this report, the meaning of the term “transport” is aligned to the newly adopted strategic direction of the World Bank Group captured in the document: World Bank 2008, “Safe, Clean, and Affordable Transport for Development: The World Bank Group’s Transport Business Strategy for 2008-2012,” (Washington D.C.: World Bank). In this report “Transport” applies to the subsectors of Roads, Railways (heavy and urban/light), Urban Transport, Aviation, Ports, Shipping and Logistics and relates to fixed assets and to the services delivered using the fixed assets. The report covers nationwide issues but not the special questions and processes pertaining to transport infrastructure in the Autonomous Region in Muslim Mindanao.
2. TRANSPORT INFRASTRUCTURE IN THE PHILIPPINES

**Key Findings**

- Road density is on par with comparable countries in the region but road quality compares less well. The result is that the Philippines suffers from higher land transportation costs and a higher rate of accidents compared to other parts of the East Asia region.
- Ports and airports are plentiful in number across the country but the airport capacity in Metro Manila is likely to come under pressure in the coming years.
- The quality of railroad tracks and services is poor.
- Assessments of the overall transport infrastructure network indicate that the quality is low and cost is high compared to other countries. The Philippines ranked 65 out of 150 countries in the 2007 logistics performance index (LPI), behind neighboring Thailand (31), China (30), Indonesia (43), and Vietnam (53).

**Key Recommendations**

- Focus should be on upgrading the quality and capacity of existing ports, roads and airports rather than on expanding the coverage of transport networks.
- Focus should be on upgrading the quality of railroad tracks and services and then – possibly – on expansion of the network.

**FINDINGS**

**Infrastructure Quantity**

13. The quantity of transport infrastructure in the Philippines compares favorably with most developing East Asian countries. Road density and the number of ports and airports are both above or on par with comparable countries in the region, whereas railroad density understandably is significantly lower.
14. **The country has a national railway network of around 1,000 kilometers.** This equals about 3 kilometers per 1000 square kilometer of land which is less than half the density of rail in Malaysia, Thailand and Vietnam but on par with the railway density in Indonesia. However this low railway density can be explained by the archipelago-nature of the Philippines and therefore the low density should not necessarily be taken as grounds to increase railway coverage across the country. Only 56 kilometers of commuter lines are operational.

15. **The Philippines has a large number of airport and seaport facilities.** It has 85 national (public) airports, including 4 regular international airports; of these, 62 have paved runways and 23 have unpaved runways. In addition, there are around 130 private/non-national airports, mostly with unpaved runways. There are also at least 115 public seaports and around 400 private seaports reporting to the Philippine Ports Authority. There are 6 independent port authorities with one (Cebu Ports Authority) having a number of public and private ports under its jurisdiction.

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28 PPA is currently updating its inventory; there might be more ports included under its jurisdiction. According to its revised charter, all government and commercial ports not under the jurisdiction of another government agency or entity shall belong to or under PPA’s administrative jurisdiction.

29 There are also ports under the jurisdiction of the Autonomous Region in Muslim Mindanao and fishing ports under the Department of Agriculture’s Philippine Fisheries Development Authority.
Table 2: Airports in the East Asia and Pacific region, 2007

<table>
<thead>
<tr>
<th>Total Number of Airports, with Runway Length</th>
<th>Philippines</th>
<th>Thailand</th>
<th>Malaysia</th>
<th>Indonesia</th>
<th>Vietnam</th>
<th>China</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Paved</td>
<td>215</td>
<td>106</td>
<td>116</td>
<td>652</td>
<td>44</td>
<td>467</td>
</tr>
<tr>
<td>over 3,047 m</td>
<td>62</td>
<td>65</td>
<td>36</td>
<td>158</td>
<td>37</td>
<td>403</td>
</tr>
<tr>
<td>2,438 to 3,047 m</td>
<td>6</td>
<td>11</td>
<td>9</td>
<td>15</td>
<td>5</td>
<td>128</td>
</tr>
<tr>
<td>1,524 to 2,437 m</td>
<td>24</td>
<td>23</td>
<td>8</td>
<td>51</td>
<td>13</td>
<td>130</td>
</tr>
<tr>
<td>914 to 1,523 m</td>
<td>26</td>
<td>17</td>
<td>8</td>
<td>49</td>
<td>10</td>
<td>20</td>
</tr>
<tr>
<td>under 914 m</td>
<td>2</td>
<td>6</td>
<td>6</td>
<td>39</td>
<td></td>
<td>67</td>
</tr>
<tr>
<td>Total Unpaved</td>
<td>153*</td>
<td>41</td>
<td>80</td>
<td>494</td>
<td>7</td>
<td>64</td>
</tr>
<tr>
<td>over 3,047 m</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2,438 to 3,047 m</td>
<td>1</td>
<td>1</td>
<td>5</td>
<td>1</td>
<td></td>
<td>13</td>
</tr>
<tr>
<td>1,524 to 2,437 m</td>
<td>12</td>
<td>7</td>
<td>27</td>
<td>3</td>
<td>17</td>
<td></td>
</tr>
<tr>
<td>under 914 m</td>
<td>28</td>
<td>72</td>
<td>462</td>
<td>3</td>
<td>26</td>
<td></td>
</tr>
<tr>
<td>Percent paved</td>
<td>32</td>
<td>61</td>
<td>31</td>
<td>24</td>
<td>84</td>
<td>86</td>
</tr>
</tbody>
</table>

Note:  * No breakdown by length

Infrastructure quality

16. The key questions in transportation infrastructure are about not the number of facilities, but their effective capacity, the quality of the services they can provide, their location and how they work as a network. Although the Philippines has a higher density of roads than most developing countries in the region and a reasonably high endowment of roads per capita or per dollar of GDP per capita, it has a low proportion of paved roads and a low proportion of roads in good condition and good or fair condition (Table 3).

Table 3: Road kilometers and conditions in Asian countries

<table>
<thead>
<tr>
<th>Country</th>
<th>Road km per km²</th>
<th>Road km per capita</th>
<th>Road km per $ GDP per capita</th>
<th>% of roads paved</th>
<th>% of roads in good condition</th>
<th>% of roads in good or fair condition</th>
</tr>
</thead>
<tbody>
<tr>
<td>Philippines</td>
<td>671</td>
<td>2.45</td>
<td>2.37</td>
<td>20</td>
<td>18</td>
<td>50</td>
</tr>
<tr>
<td>China</td>
<td>201</td>
<td>1.44</td>
<td>0.97</td>
<td>81</td>
<td>n.a.</td>
<td>n.a.</td>
</tr>
<tr>
<td>India</td>
<td>1138</td>
<td>1.49</td>
<td>4.90</td>
<td>47</td>
<td>n.a.</td>
<td>n.a.</td>
</tr>
<tr>
<td>Indonesia</td>
<td>203</td>
<td>0.98</td>
<td>1.43</td>
<td>58</td>
<td>n.a.</td>
<td>54</td>
</tr>
<tr>
<td>Japan</td>
<td>3230</td>
<td>9.21</td>
<td>0.25</td>
<td>78</td>
<td>n.a.</td>
<td>n.a.</td>
</tr>
<tr>
<td>Korea</td>
<td>1016</td>
<td>2.09</td>
<td>0.15</td>
<td>87</td>
<td>87</td>
<td>100</td>
</tr>
<tr>
<td>Malaysia</td>
<td>300</td>
<td>3.97</td>
<td>0.83</td>
<td>81</td>
<td>78</td>
<td>98</td>
</tr>
<tr>
<td>Pakistan</td>
<td>335</td>
<td>1.70</td>
<td>2.69</td>
<td>65</td>
<td>88</td>
<td>100</td>
</tr>
<tr>
<td>Thailand</td>
<td>112</td>
<td>0.90</td>
<td>0.36</td>
<td>98</td>
<td>98</td>
<td>100</td>
</tr>
<tr>
<td>Vietnam</td>
<td>287</td>
<td>2.70</td>
<td>4.91</td>
<td>19</td>
<td>n.a.</td>
<td>n.a.</td>
</tr>
</tbody>
</table>

17. Road accidents cost the economy P49,173 million (USD894 million) in 2002, or slightly more than 1 percent of GDP. Although official statistics show about 2.9 road transport fatalities per 10,000 vehicles, which compares favorably with other countries in the region, it is widely believed that statistics severely understate the problems in road safety. One study estimated that fatalities are 5.5 times the reported figures and serious and minor injuries were 50–100 times the reported figures.

18. Poor road quality results in intercity freight rates that are 50 percent higher than in Thailand or Vietnam. The poor road surface translates into higher vehicle operating costs per kilometer. One study in 1999 estimated that a 1 percent improvement in the international roughness index (IRI) for national roads would yield a 4 percent reduction in vehicle operating costs, equal to P13 billion a year. It also estimated that the required annual maintenance cost to improve the IRI by significantly more than 1 percent to be P10 billion. This is consistent with the finding of the Department of Public Works and Highways that average vehicle operating costs have doubled between 1999 and 2003 while the consumer price index has increased by only 20 percent.

19. Over time the quality of road infrastructure has declined. While the percentage of paved roads increased (as a share of total roads) between 1982 and 2006, the percentage of paved national roads in good and fair condition declined from 52.4 percent to 47.0 percent, reflecting the under-funding of road maintenance and vehicle overloading. The condition of roads has improved slightly in 2007.

Table 4: Road Quality, 1982, 2001, 2006 and 2007

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Percentage of national roads in good and fair condition</td>
<td>52.4</td>
<td>47.0</td>
<td>47.0</td>
<td>52.7</td>
<td>-0.26</td>
<td>0.22</td>
</tr>
<tr>
<td>Percentage of national roads paved</td>
<td>44.0</td>
<td>70.7</td>
<td>70.2</td>
<td>71.5</td>
<td>1.97</td>
<td>1.96</td>
</tr>
</tbody>
</table>


20. The facilities for air transport are likely to become inadequate. A recent Japan International Cooperation Agency (JICA) study forecasts that air traffic will increase with GDP growth—at an average annual growth of around 5.5 percent for the next 20

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31 Better Roads Philippines, World Bank 1999
33 The improvement in 2007 (vs. 2006) was due to additional funding from the 2007 GAA, on top of the Motor Vehicle User's Charge (MVUC) special funds for the same year. The General Appropriations Act augmentation was part of the Philippine Budget Strategy for 2008 which placed a high priority on asset preservation.
years. Full capacity at the Ninoy Aquino International Airport (NAIA) at Manila is expected to be reached in a decade. Before the limited opening of the NAIA Terminal 3, domestic traffic exceeded the capacity of the terminals (Old Domestic Terminal and half of Terminal 2) capacity by 3.4 million passengers, based on Table 5.

### Table 5: Manila Airports’ Capacity and Traffic, 2007

<table>
<thead>
<tr>
<th>Airport</th>
<th>Capacity in Million Pax</th>
<th>Type</th>
</tr>
</thead>
<tbody>
<tr>
<td>Old Domestic Airport</td>
<td>2.5</td>
<td>Domestic</td>
</tr>
<tr>
<td>NAIA Terminal 1</td>
<td>4.3</td>
<td>International</td>
</tr>
<tr>
<td>NAIA Terminal 2</td>
<td>7.7</td>
<td>Philippine Airlines, combined domestic and International</td>
</tr>
<tr>
<td>NAIA Terminal 3</td>
<td>12.6</td>
<td>Some portions opened; Cebu Pacific Air, combined domestic and International</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>27.1</strong></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Airport</th>
<th>2007 Traffic in Million Passengers</th>
</tr>
</thead>
<tbody>
<tr>
<td>NAIA Domestic</td>
<td>9.7</td>
</tr>
<tr>
<td>NAIA International</td>
<td>10.7</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>20.4</strong></td>
</tr>
</tbody>
</table>

Source: For Airport Capacity, PhilJac Study for various years and Civil Aviation Authority of the Philippines for 2007 traffic estimates.

21. **The main determining factor for the capacity of NAIA is the capacity of the existing runway which is virtually impossible to duplicate because of the limited aerodrome space and surrounding built-up areas.** Based on the JICA study, the traffic will reach the runway capacity (51 hourly or 176,000 annual aircraft movements) by 2010 if general aviation continues to use the airport along with scheduled commercial aviation. The runway capacity will be reached by 2015-2016 if general aviation operations are transferred to another airport. The corresponding passenger traffic by 2015 would be 26 million passengers per year; if occasional excessive delays in aircraft movements are accepted, the capacity could be stretched to 30 million passengers a year at most, which would be reached between 2015 and 2020. The government is thus proceeding with the development of Clark Airport and the corresponding airport access system to serve Manila.

22. **Outside of the Ninoy Aquino International Airport and the international airports, many principal airports (under the Civil Aviation Authority of the Philippines, formerly Air Transportation Office) do not have sufficient runway lengths and widths to cope with the current and projected traffic, using the standards of the International Civil Aviation Organization (ICAO), based on the abovementioned JICA study.** This is shown in Annex 1. While problems may not appear immediately, proactive measures taken in the near term would help the government avoid significant difficulties in the future.

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35 PhilJac Study estimates
23. **Quality of urban rail and train operation and capacity could be improved.** With the increase in fuel prices, rail ridership has further increased – especially for urban light rail systems. Operating with the same amount of rolling stock, urban rail lines have experienced congestion in terminals and train cars carry people above their capacity. MRT Line3, one of the three main lines in Manila, has a maximum capacity of 22,500 passengers per peak hour per direction but demand has now increased to 26,500 passengers. The maximum load of 22,500 was breached in 2004. The current fare setting policies however do not allow the operators to work around the capacity limitations.

24. **Metro Manila has three urban rail lines and getting from one rail transit line to another is less than seamless.** While Light Rail Transit Lines 1 and 2, which are both operated by LRTA, have convenient access between them, their linkages with Metro Rail Transit Line 3 are less so. In addition, passengers do not enjoy the benefits of a single ticketing system.

**Overall assessment of the transport infrastructure network and services**

25. **The Philippines ranked 65 out of 150 countries in the 2007 logistics performance index (LPI), behind neighboring Thailand (31), China (30), Indonesia (43), and Vietnam (53).** The performance and quality of the transport network in a given country can be assessed on how well it facilitates the movement of goods and services. The logistics performance index summarizes the performance of countries in seven areas:

   (a) Efficiency of the clearance process by customs and other border agencies.

   (b) Quality of transport and information technology infrastructure for logistics.

   (c) Ease and affordability of arranging international shipments.

   (d) Competence of the local logistics industry.

   (e) Ability to track and trace international shipments.

   (f) Domestic logistics costs.

   (g) Timeliness of shipments in reaching destination.

26. **The Philippines has performed below its neighbors in almost all of the areas, as shown in Table 6.** The overall LPI of 2.69 for the Philippines is the lowest in the region and the Philippines can be seen as one of the worst-performing countries in the field of logistics.

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36 The 2007 Logistics Performance Survey is the first report presenting the Logistics Performance Index (LPI) and indicators. The survey will be conducted each year to improve the reliability of the indicators and to build a dataset comparable across countries and over time.
Table 6: Logistics Performance Index 2007

<table>
<thead>
<tr>
<th>Country</th>
<th>LPI</th>
<th>Customs</th>
<th>Infrastructure</th>
<th>International Shipments</th>
<th>Logistics Competence</th>
<th>Tracking and tracing</th>
<th>Domestic Logistics Costs</th>
<th>Timeliness</th>
</tr>
</thead>
<tbody>
<tr>
<td>Singapore</td>
<td>4.19</td>
<td>3.9</td>
<td>4.27</td>
<td>4.04</td>
<td>4.21</td>
<td>4.25</td>
<td>2.7</td>
<td>4.53</td>
</tr>
<tr>
<td>Malaysia</td>
<td>3.48</td>
<td>3.36</td>
<td>3.33</td>
<td>3.36</td>
<td>3.4</td>
<td>3.51</td>
<td>3.13</td>
<td>3.95</td>
</tr>
<tr>
<td>Thailand</td>
<td>3.31</td>
<td>3.03</td>
<td>3.16</td>
<td>3.24</td>
<td>3.31</td>
<td>3.25</td>
<td>3.21</td>
<td>3.91</td>
</tr>
<tr>
<td>China</td>
<td>3.32</td>
<td>2.99</td>
<td>3.2</td>
<td>3.31</td>
<td>3.4</td>
<td>3.37</td>
<td>2.97</td>
<td>3.68</td>
</tr>
<tr>
<td>Indonesia</td>
<td>3.01</td>
<td>2.73</td>
<td>2.83</td>
<td>3.05</td>
<td>2.9</td>
<td>3.3</td>
<td>2.84</td>
<td>3.28</td>
</tr>
<tr>
<td>Vietnam</td>
<td>2.89</td>
<td>2.89</td>
<td>2.5</td>
<td>3</td>
<td>2.8</td>
<td>2.9</td>
<td>3.3</td>
<td>3.22</td>
</tr>
<tr>
<td>Philippines</td>
<td>2.69</td>
<td>2.64</td>
<td>2.26</td>
<td>2.77</td>
<td>2.65</td>
<td>2.65</td>
<td>3.27</td>
<td>3.14</td>
</tr>
</tbody>
</table>

Note: Scale of 1-5, 5 being the highest

27. **Looking at the infrastructure aspect of logistics, the Philippines ranked 86 out of 150 countries in terms of infrastructure quality.** Though this index also looks at the quality of information technology, a closer look at the survey of logistics professionals in the country reveals that the crux of the problem is quality of the transport infrastructure – roads, ports (Table 7 below). Around 67% of survey respondents indicated that transport infrastructure quality is low or very low. On the operational environment for international logistics, 67% of the respondents have indicated that port/airport charges are high/very high and for rail transport rates all have responded that they are very expensive. There are other contributing factors (including governance and customs procedures) that lead to the low performance of the logistics network in the Philippines. But the shortcomings of the transport network are markedly evident and a major reason for the high logistics costs overall. More respondents indicated that costs are high for transport compared to responses to overall logistics costs. Moreover, less than half of the respondents have indicated that the situation has improved the last three years.
Table 7: Results of Survey of Logistics Professionals in the Philippines

### Logistics operational environment - Based on your experience in international logistics, please select the options that best describe the logistics operational environment in your country of work (Percent of respondents answering high/very high)

<table>
<thead>
<tr>
<th>Service/Charge</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Port/Airport charges are high/very high</td>
<td>67%</td>
</tr>
<tr>
<td>Overall, logistics costs (e.g. port charges, domestic transport, agent fees), are high/very high</td>
<td>50%</td>
</tr>
<tr>
<td>Warehousing service charges are high/very high</td>
<td>33%</td>
</tr>
<tr>
<td>Rail transport rates are high/very high</td>
<td>100%</td>
</tr>
<tr>
<td>Less than full truck load services rates are high/very high</td>
<td>33%</td>
</tr>
<tr>
<td>Full truck load rates are high/very high</td>
<td>67%</td>
</tr>
</tbody>
</table>

### Quality of infrastructure - Evaluate the quality of infrastructure in use for logistics operations in your country of work (Percent of respondents answering low/very low)

<table>
<thead>
<tr>
<th>Infrastructure</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Telecommunications infrastructure and services</td>
<td>0</td>
</tr>
<tr>
<td>Fixed transport infrastructure (e.g. ports, roads, warehouses)</td>
<td>67%</td>
</tr>
</tbody>
</table>

### Level of competence of professions - Evaluate the level of competence of the following professions in your country of work (Percent of respondents answering high/very high)

<table>
<thead>
<tr>
<th>Profession</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Trade and transport related associations</td>
<td>0</td>
</tr>
<tr>
<td>Freight forwarders</td>
<td>67%</td>
</tr>
<tr>
<td>Consignees or shippers</td>
<td>100%</td>
</tr>
<tr>
<td>Warehousing and distribution operators</td>
<td>0</td>
</tr>
<tr>
<td>Air transport service providers</td>
<td>0</td>
</tr>
<tr>
<td>Rail transport service providers</td>
<td>100%</td>
</tr>
<tr>
<td>Road transport service providers</td>
<td>33%</td>
</tr>
<tr>
<td>Customs brokers</td>
<td>33%</td>
</tr>
</tbody>
</table>

### Evolution of factors over the past 3 years – Evaluate the evolution of the following factors in your country of work, over the past 3 years (Percent of respondents answering better/much better)

<table>
<thead>
<tr>
<th>Factor</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Overall business environment</td>
<td>33%</td>
</tr>
<tr>
<td>Good governance and eradication of corruption</td>
<td>0</td>
</tr>
<tr>
<td>Regulatory regime</td>
<td>33%</td>
</tr>
<tr>
<td>Availability of private sector services</td>
<td>33%</td>
</tr>
<tr>
<td>Quality of telecommunications infrastructure</td>
<td>33%</td>
</tr>
<tr>
<td>Quality of transport infrastructure</td>
<td>33%</td>
</tr>
<tr>
<td>Other border crossing-related government agencies clearance procedures</td>
<td>0</td>
</tr>
<tr>
<td>Customs clearance procedures</td>
<td>33%</td>
</tr>
</tbody>
</table>


Note: This World Bank Logistics Index builds on interviews undertaken in 2007. The methodology is further explained on the Logistics Index website (www.worldbank.org/lpi).

28. Overall the international perception of the quality of Philippines transport infrastructure is that there is a considerable potential for further improvement. The Philippines is ranked 94th of the 134 countries on overall quality of infrastructure surveyed in the Global Competitiveness Report 2008-09. The Philippines ranked 94th for roads, 85th for railroads, 100th for port infrastructure and 89th for airports. For all types of infrastructure, the Philippines consistently falls below the average score for all countries surveyed (Figure 6).
Figure 6: Transport Infrastructure Rankings in the Global Competitiveness Report, 2008-09

Note: 1 indicates poorly developed and inefficient, 7 indicates among the best in the world. Rankings are shown for developing East Asian economies (darker bars), and advanced East Asian economies (lighter bars). Vertical line is the average for all 125 surveyed countries, both within and outside of East Asia.
RECOMMENDATIONS

29. **Focus should be on upgrading the quality and capacity of existing ports, roads and airports rather than an expanding the coverage of the networks.** While the quantity of transportation infrastructure in the Philippines compares favorably with that in other countries in the region, the quality lags behind and this deficiency decreases the competitiveness of Philippine businesses.

30. **Focus should be on upgrading the quality of railway tracks and services and then – possibly – on expansion of the network.** Rail ridership is increasing, but without upgrades the existing logistical and infrastructure limitations will prevent efficient and effective use of resources.
3. TRENDS IN INFRASTRUCTURE EXPENDITURES

**Key Findings**

- By international comparison, public spending on infrastructure (transportation, water, power, sanitation) in the Philippines has been low the last 10 years. While Thailand spends 15-16 percent, Vietnam 10 percent and China 7-8 percent of GDP on infrastructure, the Philippines has spent between 2 and 3 percent of GDP. [37]

- With the exception of water infrastructure, expenditure on infrastructure in the Philippines in general and transportation infrastructure in particular has been falling as a share of GDP since the Asian financial crises. However, the national budget for transportation infrastructure increased markedly in 2007 and 2008.

- Funding available for maintenance of transport infrastructure assets continues to be inadequate after years of under-investment.

- Private sector investment peaked in 1998 at 255 billion pesos (in 2006 prices) or about 6 percent of GDP but has since declined to close to zero.

**Key recommendations**

- The authorities are planning to increase spending on infrastructure in general and transport infrastructure in particular. This commitment should be upheld despite the challenging global financial situation.

- To meet the overall long-term maintenance needs of the sector and reduce the gap between maintenance needs and available funding, three sources of additional funding could be considered. The first is higher budgetary allocations for the sector through the General Appropriations Act. The second is levying tolls on expressways indexed to the price level, as is broadly the case in privately financed facilities. The third is to increase the contributions of road users to supplement the Special Road Support Fund from the current Motor Vehicle User’s Charge. The growth in annual Motor Vehicle User’s Charge revenues will not meet the needs at present rates.

**FINDINGS**

Total infrastructure expenditure

31. **Total infrastructure investments**[38] in the Philippines the last 20 years as a percentage of GDP has been characterized by a dramatic increase between 1985 and 1996 followed by an equally dramatic decline between 1997 and 2006. In real terms (2006 prices), the level of total infrastructure expenditure rose from 59 billion pesos in 1985 to 363 billion pesos in 1998. In 2006, the level had fallen to approximately 186 billion pesos. Transportation infrastructure followed the general trend for infrastructure starting at 24.5 billion pesos in 1985 peaking at 97 Billion pesos in 1997 and falling to

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[38] Total infrastructure investments include capital outlays expenditure in transport, water supply, energy, telecommunications and other works.
66.4 billion pesos in 2006. GDP rose by 3.44 percent annually on average during this period.

**Figure 7: Total infrastructure and Transport Infrastructure Investments**
(Billion pesos, 2006 prices, public and private)

Sources: Data from the Department of Finance, Department of Budget and Management, Philippines National Statistics Coordination Board, Manila Water Company, Inc., Maynilad Water Services, Inc, Optel, Ltd., and the World Bank.

32. **Infrastructure investments, at 3.10 percent of GDP, in 2006 were only slightly above the share in 1985. Public investments as percentage of GDP peaked in 1994 and have declined since.** The noticeable fluctuations in overall investment levels between 1994 and 2006 were caused by a boom-bust cycle in private sector investments. The level of expenditure as a share of GDP in recent years is slightly higher than in neighboring Indonesia (2.7 percent) but lower than in China (7 percent), Vietnam (10 percent) and Thailand (15 percent) which all have enjoyed higher growth rates than the Philippines.
Figure 8: Public Infrastructure Investments as a Share of GDP, Capital Outlays, 1985-2006

Figure 9: Public Expenditure on Infrastructure, Share of GDP, various years

Sources: Department of Budget and Management; Department of Finance; Commission on Audit; Maynilad Water Services, Inc.; Manila Water Corporation, Inc.; Optel Ltd.; and World Bank.

Source: World Bank, Connecting East Asia (2005); Philippines data updated
Box 2: What is the Right Level of Infrastructure Investment?

In 2004, developing country public sector spending on infrastructure was between two percent (middle income countries) and four percent (low income countries) of GDP on average. In many countries, this represented a significant decrease from previous decades, in part because of an expectation that the private sector would increase its investments in the sector. However, private investment increases did not equal the decrease in public spending on infrastructure.

One World Bank estimate\(^{39}\) indicates that the annual investment, operations and maintenance requirements for infrastructure would equal 6.5-7.7 percent of GDP, across all developing countries – indicating that there is a large financing gap between actual and required investment for infrastructure. While the financing gap is smaller for middle income countries than for the poorest, the gap remains significant globally.

**Figure 10: Annual Expenditure on Infrastructure as Percent of GDP**

Faster-growing countries in the region, such as China, Vietnam and Thailand, have been investing over seven percent of GDP in infrastructure in recent years.

Countries with significant private investment may not need to fund infrastructure costs entirely through public sector budgets, and should trade-off increases in infrastructure spending (and the associated economic growth) against other budget priorities. Research indicates that the efficiency of infrastructure projects is key in promoting growth. While the evidence is clear that increasing stock of infrastructure will lead to economic growth, it is less clear that increasing expenditures on infrastructure will always lead to growth. Inefficiency in spending and corruption may cancel out the positive effects of infrastructure development.

Sources:  

Spending on transport infrastructure

33. The share of transport infrastructure expenditure out of total public expenditure on infrastructure in the Philippines recovered in 2006 but was still only around 35 percent compared to a peak of nearly 60 percent in 1989. In the meantime telecommunications, and in recent years water infrastructure, have increased their shares of infrastructure expenditure.

Figure 11: Transport Infrastructure Public Investments as Share of Total Infrastructure Investment, 1985-2006, percent

Figure 12: Composition of Public Investments on Infrastructure, 2006, percent

34. Although there has been an increase in private sector participation, the bulk of the investments are being undertaken by the national government. In 2006, National Government accounted for 69% of the total spending on infrastructure outlays in the transport sector.

Table 8: Sources of Investments on Transport Infrastructure 1998-2006
(2006 prices, Billion pesos)

<table>
<thead>
<tr>
<th></th>
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<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>National Government</td>
<td>41.82</td>
<td>57.66</td>
<td>46.40</td>
<td>42.62</td>
<td>27.74</td>
<td>29.32</td>
<td>28.03</td>
<td>21.91</td>
<td>45.52</td>
</tr>
<tr>
<td>Local Government</td>
<td>9.05</td>
<td>10.95</td>
<td>13.04</td>
<td>11.11</td>
<td>8.15</td>
<td>9.82</td>
<td>8.85</td>
<td>8.02</td>
<td>7.93</td>
</tr>
<tr>
<td>Government owned and controlled corporations</td>
<td>9.05</td>
<td>4.32</td>
<td>5.13</td>
<td>4.79</td>
<td>8.25</td>
<td>11.83</td>
<td>6.33</td>
<td>6.93</td>
<td>2.74</td>
</tr>
<tr>
<td>Private</td>
<td>0.00</td>
<td>4.46</td>
<td>0.30</td>
<td>25.24</td>
<td>1.89</td>
<td>7.53</td>
<td>0.00</td>
<td>0.00</td>
<td>10.26</td>
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<tr>
<td>Total</td>
<td>59.91</td>
<td>77.39</td>
<td>64.86</td>
<td>83.75</td>
<td>46.02</td>
<td>58.51</td>
<td>43.20</td>
<td>36.86</td>
<td>66.45</td>
</tr>
</tbody>
</table>

Sources: Department of Budget and Management; Department of Finance and Commission on Audit.

35. Between 1990 and 2005 infrastructure spending in the Philippines fell faster than drops in tax revenues, GDP and the aggregate level of public expenditure and failed to increase correspondingly in times of growth. In all, infrastructure spending grew by 0.5 percent a year between 1997–2005 while real revenues grew by 7.1 percent and GDP by 10.7 percent. Between 1990 and 2005, the average growth of national
infrastructure spending was 4.3 percentage points below nominal GDP growth and 3.5 percentage points below total tax collection growth.

Figure 13: Transport Infrastructure Spending, 1985-2006
(Billion Pesos, 2006 prices)

Note: Data for private sector reflect private sector commitments
Sources: Department of Budget and Management, Department of Finance, Commission on Audit and the World Bank PPI Database

Transport infrastructure maintenance spending

36. Government maintenance expenditure amounted to about 14 billion pesos in 2006, roughly equal to 20 percentage of total Government expenditure on transport infrastructure. From 1997 to 2006, Government spent 12 billion pesos (2006 prices) yearly on average on maintenance of infrastructure assets. In 2006 this equaled less than 1 percent of GDP.
Table 9: Public Expenditures on Transport Infrastructure  
(Billion pesos, 2006 prices)

<table>
<thead>
<tr>
<th></th>
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<tr>
<td><strong>Transport infrastructure maintenance and operations</strong></td>
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<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>National Government</td>
<td>6.24</td>
<td>5.79</td>
<td>5.52</td>
<td>5.69</td>
<td>5.21</td>
<td>5.82</td>
<td>5.76</td>
<td>5.24</td>
<td>5.60</td>
<td>8.39</td>
</tr>
<tr>
<td>GOCCs</td>
<td>3.83</td>
<td>3.85</td>
<td>4.58</td>
<td>6.32</td>
<td>6.66</td>
<td>6.47</td>
<td>5.86</td>
<td>5.33</td>
<td>4.70</td>
<td>5.04</td>
</tr>
<tr>
<td>Local Government</td>
<td>0.74</td>
<td>0.90</td>
<td>1.02</td>
<td>0.99</td>
<td>1.05</td>
<td>0.23</td>
<td>0.68</td>
<td>0.59</td>
<td>0.45</td>
<td>0.51</td>
</tr>
<tr>
<td>Total</td>
<td>10.81</td>
<td>10.54</td>
<td>11.12</td>
<td>13.00</td>
<td>12.92</td>
<td>12.52</td>
<td>12.31</td>
<td>11.16</td>
<td>10.75</td>
<td>13.94</td>
</tr>
<tr>
<td><strong>Total capital outlays for transport infrastructure</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>National Government</td>
<td>57.16</td>
<td>41.82</td>
<td>57.66</td>
<td>46.40</td>
<td>42.62</td>
<td>27.74</td>
<td>29.32</td>
<td>28.03</td>
<td>21.91</td>
<td>45.52</td>
</tr>
<tr>
<td>GOCCs</td>
<td>3.77</td>
<td>9.05</td>
<td>4.32</td>
<td>5.13</td>
<td>4.79</td>
<td>8.25</td>
<td>11.83</td>
<td>6.33</td>
<td>6.93</td>
<td>2.74</td>
</tr>
<tr>
<td>Local Government</td>
<td>12.21</td>
<td>9.05</td>
<td>10.95</td>
<td>13.04</td>
<td>11.11</td>
<td>8.15</td>
<td>9.82</td>
<td>8.85</td>
<td>8.02</td>
<td>7.93</td>
</tr>
<tr>
<td>Total</td>
<td>73.15</td>
<td>59.91</td>
<td>72.93</td>
<td>64.56</td>
<td>58.52</td>
<td>44.13</td>
<td>50.97</td>
<td>43.20</td>
<td>36.86</td>
<td>56.19</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>83.95</td>
<td>70.46</td>
<td>84.05</td>
<td>77.56</td>
<td>71.44</td>
<td>56.66</td>
<td>63.28</td>
<td>54.36</td>
<td>47.61</td>
<td>70.13</td>
</tr>
<tr>
<td>Maintenance and operations as percentage of Total</td>
<td>22.39</td>
<td>23.45</td>
<td>19.28</td>
<td>23.30</td>
<td>23.04</td>
<td>26.86</td>
<td>23.10</td>
<td>22.99</td>
<td>23.76</td>
<td>19.88</td>
</tr>
</tbody>
</table>

Notes:  
(1) Preliminary estimates for Government owned and controlled corporations.  
(2) Local Government figures from 2003 to 2006 are estimated using 3-year moving average.  
Source: Department of Public Works and Highways, Department of Budget and Management, Commission on Audit for Local Government until 2002

37. Fiscal management by asset erosion is common in countries where sustained fiscal discipline remains a challenge. Infrastructure spending is most at risk during economic downturns because the negative effects will materialize in the medium to long term whereas the benefits of spending cuts materialize immediately. Governments in developed and developing countries save in times of crisis by cutting maintenance and new infrastructure projects. The Philippines is no exception in this regard.

Road maintenance spending

38. Funding shortages since the Asian financial crisis in 1998 are a primary cause of the quality problems of the road network today. To address the shortfall, a Motor Vehicle User’s Charge (MVUC) was introduced in 2001 to raise additional and earmarked resources for road maintenance, safety, and vehicle pollution control. Collected funds are allotted into four special accounts in the National Treasury - including a Special Road Support Fund (SRSF) for the maintenance of national roads - by a formula established under the implementing rules and regulations of Republic Act 8794. Program allocations are managed by the semi-independent Road Board.
39. Annual financing from the Special Road Support Fund (SRSF) increased between 2002 and 2004 but - as to be expected in times of financial pressure - the allotted resources from the General Appropriations Act (GAA) fell by an almost equal amount. As a result, there was no net increase in the financial resources allocated to the national roads during that period. Over the past few years, the budgetary allocations to the sector have increased considerably, with financing from the Special Road Support Fund growing gradually as the economy has recovered.

Figure 14: Road Maintenance Funding 1997-2008, current prices

![Chart showing road maintenance funding from 1997 to 2008](chart.png)

Source: Department of Public Works and Highways

40. The available Motor Vehicle User’s Charge special fund for national road maintenance has equaled 4–6 billion pesos a year in the last four years, covering 21–32 percent of the annual estimated maintenance needs of about P 19 billion. In 2007, General Appropriations Act funds of P4 billion for national road maintenance supplemented the Motor Vehicle User’s Charge. Even in a reduced (low) case scenario where only 75 percent of the sector’s needs for asset preservation for national roads in the short and medium terms were to be met, the overall gap would still be P8.6 billion, about 57 percent of the asset preservation needs. In a base scenario, there is a gap of P30 billion between the sector’s projected needs and the resource allocation for 2007. Under a reduced-case scenario—with only 75 percent of the sector’s needs for asset preservation and network expansion is met in the short and medium terms—the gap is P9 billion, about 16 percent of the proposed allocations.  

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40 The Department of Budget and Management, Budget Strategy analysis, World bank staff
41. **The funding gap for road maintenance is unlikely to be reduced significantly over the next few years.** The funds generated from the Motor Vehicle User’s Charge are still not sufficient to cover all maintenance needs, while the available higher Special Road Support Fund revenues will to a large extent be offset by higher general prices.

**Box 3: Use of Road Funds for Road Maintenance**

Road maintenance in developing countries has been consistently under-funded over the last two decades. Road Funds are one approach to mitigating this problem, as, in theory, they provide dedicated funds for maintenance costs outside of the general budget by raising revenue from users through fuel taxes, vehicle registration fees, tolls or other user fees. Because they have their own revenue stream, Road Funds are theoretically immune to general budget constraints, which should ensure that road maintenance continues even if other programs need to be cut. When maintenance costs are covered through general budgets, the revenue streams are often unpredictable, and fluctuate according to the economic environment and other budget needs. These fluctuations may reduce the efficiency of road maintenance because it is more difficult to retain workers and fulfill contracts in an uncertain budget environment. Separating funds intended for maintenance from those for investment can also be useful, as there is often a tendency to prioritize investment at the expense of maintenance.

However, from a macro perspective, Road Funds limit the flexibility of the government to make trade-offs in allocating funds, particularly in the context of already fragmented developing country budgets. Road Funds may also limit the ability of the government to raise revenue, as fuel taxes are often one of the more reliable revenue sources in poor countries. In addition, from a practical perspective, Road Funds are rarely truly insulated from politics and budget constraints, and without a strong political commitment to using the funds for roads they are likely to be at least partially diverted for other purposes.

“Second-generation Road Funds” appear to have been successful in a number of African countries. User charges, paid directly into the funds, provide revenue, and the funds are managed by boards that include user representatives. The relative stability of these funds can significantly reduce costs. Ghana’s Road Fund provides a successful example of cost reduction: the stability of the funding source improved planning and reduced unit costs by 15 to 20 percent. However, it appears that it may be the strong commitment to ensuring consistent funding for road maintenance, rather than the mechanism of a Road Fund, that is the key factor in improving road maintenance. The Ugandan government has not used a Road Fund, but has been able to meet maintenance requirements through its regular budget process and has committed to sustain that level of funding even after donor support ends.

**Sources:**  

42. **Funding shortages are not the only reason for road deterioration. A high share of maintenance funding is being used to fund employment-generating roadside maintenance programs.** In 2003, 25 percent of the Motor Vehicle User’s Charge were allocated to roadside maintenance while the share had increased to 35 percent of routine maintenance funds in 2005 but decreased to 28 percent in 2007 (see table 16 below). Roadside maintenance — sweeping, beautification, planting — is labor intensive, with up to 10 workers per kilometer in Metro Manila, although the average is 1 worker per km in the entire country.
Table 10: Releases from Motor Vehicle User Charges for Maintenance of National Roads (million pesos)

<table>
<thead>
<tr>
<th></th>
<th>Routine Maintenance</th>
<th>Preventive Maintenance</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Carriageway</td>
<td>Roadside</td>
<td>Sub-Total</td>
</tr>
<tr>
<td>2002</td>
<td>700</td>
<td>0</td>
<td>700</td>
</tr>
<tr>
<td>2003</td>
<td>3,000</td>
<td>1,000</td>
<td>4,000</td>
</tr>
<tr>
<td>2004</td>
<td>3,464</td>
<td>1,217</td>
<td>4,681</td>
</tr>
<tr>
<td>2005</td>
<td>2,350</td>
<td>1,289</td>
<td>3,639</td>
</tr>
<tr>
<td>2006</td>
<td>3,145</td>
<td>1,000</td>
<td>4,145</td>
</tr>
<tr>
<td>2007</td>
<td>2,878</td>
<td>1,372</td>
<td>4,250</td>
</tr>
</tbody>
</table>

Source: Department of Public Works and Highways and Road Board, 2008.

43. At the heart of the problem appears to be the politicization of project-resource allocation. The Road Board has not been effective in reducing political influence on maintenance allocations and implementation. Its administration has been subject to external pressures that have resulted in delays and diversion in the release of funds. Despite the availability and use of the planning tools like the Highway Development Management tool (HDM-4) to identify priority projects based on objective technical and economic criteria, the actual allocation of Motor Vehicle User’s Charge (MVUC) funds in several instances did not always follow the HDM-4 generated list. For example, in 2005 only about 38% of the MVUC-funded preventive maintenance projects were drawn from the original HDM-4 list based on needs; in addition, many districts received a fixed allocation regardless of road maintenance needs, and realignments were made to accommodate other projects considered urgent and to support special events.

Expenditure by organization

Overview

44. As in most other countries, the allocation of responsibilities for investment and maintenance in the transport sector in the Philippines is complex. The two main national government agencies are the Department of Public Works and Highways (DPWH) and the Department of Transportation and Communications (DOTC). Chapter four includes more details on the division of responsibilities between these two agencies. There are also a large number of independent regulatory bodies and several Government-owned and controlled corporations (GOCCs). In addition, local governments and the private sector (through public private partnerships) play a significant role.

45. However, expenditure by national government still accounts for more than 60 percent of transport investments. In 2006, National Government outlays on transport infrastructure were 45 billion pesos, equal to roughly 0.75 percent of GDP. Local Governments’ share of transport investments increased after the devolution in 1990 but investment has been relatively steady since 1995, averaging 8 billion pesos per year from 1985 to 2006. Spending by GOCCs has been slightly lower than spending by local governments while private investments exhibit peaks and troughs.
Figure 15: Transport Infrastructure, Funding Share by Source, percent, 1998-2006

Note: Data for private sector reflect private sector commitments
Sources: Department of Budget and Management, Department of Finance, Commission on Audit and the World Bank-PPIAF PPI Database

Department of Public Works and Highways

46. The infrastructure budget for the Department of Public Works and Highways is 62.6 billion pesos in 2008 (current prices). From 1998 to 2008, the infrastructure budget averaged about 70 billion per year. This budget covers capital expenditure items for national roads, local roads, flood control, water supply, special projects and national buildings. Congressional allocations are also included. These are earmarked for legislators’ identified projects which will be implemented by the Department of Public Works and Highways.

41 This includes capital outlays under the General Appropriations Acts and does not include road maintenance funds under the Motor Vehicle User’s Charge (MVUC) which is treated separately.
47. **Expenditures by the Department of Public Works and Highways have been dominated by national roads and congressional allocations.** National roads accounted for an average of about 64 percent of the department’s budget in 2007. This category consistently took the largest share of the infrastructure budget in the Department of Public Works and Highways over the last 16 years. Funds have been allocated mainly for the concreting or asphalting of unpaved road sections, rehabilitating damaged paved sections, and rehabilitating and building bridges. Resources dedicated to the rehabilitation or construction of new national roads dropped significantly between 1999 and 2004. Congressional allocations are mostly directed towards local projects, identified by members of Congress. They are the second highest expenditure item in the budget of the Department of Public Works and Highways, accounting for more than 30 percent of total spending on average (figure 17). In 1998, a post-election year, they accounted for 27 percent of the budget in the Department. They peaked in 1997 (a pre-election year before the Asian financial crisis) at 45.7 percent of the budget of the Department of Public Works and Highways, and again in 2002 at 46.7 percent. In 2005 they dropped to 18.0 percent of the budget of the Department of Public Works and Highways, but increased again to 23.4 percent in 2006 (11.02 billion pesos). For 2007, the National Expenditure Program set aside P5.86 billion for congressional allocations, but the General Appropriations Act doubled this to P12.04 billion, or 18.1 percent of the budget of the Department of Public Works and Highways.
Congressional allocations are lump-sum funds that permit legislators to implement “pet” projects either through a line agency (such as the Department of Public Works and Highways) or the local government unit within their district. Congressional allocations may be classified under a number of rubrics in the General Appropriations Act. Examples include the Countrywide Development Fund, the Rural Urban Development Infrastructure Fund, the Food Security Fund, and the Project Development Assistance Fund (PDAF) – which are appropriated outside the budget of the Department of Public Works and Highways and appropriations for Various Infrastructure including Local Projects and Urgent Infrastructure including projects for which are included in the budget of the Department of Public Works and Highways. Congressional allocations are typically spent on public works projects of local impact, such as barangay roads and multi-purpose buildings, but can also be spent on the purchase of equipment, financial assistance to indigents and students, and support to livelihood projects and delivery of social services.

Figure 17: Congressional Allocation as a Share of the Budget for the Department of Public Works and Highways, 1990–2006 (percent)

Source: Budget statements for the Department of Public Works and Highways.
Table 11: Congressional Allocations by Sector, in Million pesos, 2003 and 2005

<table>
<thead>
<tr>
<th>Sector</th>
<th>2003</th>
<th>2005</th>
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<tbody>
<tr>
<td>TOTAL</td>
<td>24,172</td>
<td>12,228</td>
</tr>
<tr>
<td>EDUCATION</td>
<td>608</td>
<td>661</td>
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<tr>
<td>HEALTH</td>
<td>442</td>
<td>315</td>
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<tr>
<td>SOCIAL WELFARE</td>
<td>393</td>
<td>825</td>
</tr>
<tr>
<td>INFRASTRUCTURE</td>
<td>446</td>
<td>344</td>
</tr>
<tr>
<td>- Roads &amp; Bridges</td>
<td>281</td>
<td>185</td>
</tr>
<tr>
<td>- Farm to Market Roads</td>
<td>75</td>
<td>50</td>
</tr>
<tr>
<td>- Other Roads</td>
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<td>3</td>
</tr>
<tr>
<td>- Multi-Purpose Pavement</td>
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<td>1</td>
</tr>
<tr>
<td>- Flood Control</td>
<td>80</td>
<td>97</td>
</tr>
<tr>
<td>- Drainage/ Canal</td>
<td>9</td>
<td>8</td>
</tr>
<tr>
<td>- Heavy Equipment</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>- Various/Urgent Infrastructure</td>
<td>18,004</td>
<td>6,965</td>
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<tr>
<td>Local Projects (under DPWH)</td>
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<tr>
<td>WATER SUPPLY</td>
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<td>IRRIGATION</td>
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<tr>
<td>OTHER STRUCTURES</td>
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<td>109</td>
</tr>
<tr>
<td>OTHERS</td>
<td>4,180</td>
<td>2,987</td>
</tr>
</tbody>
</table>

Note: PDAF and Department of Public Works and Highways congressional allocations
Source of basic data: Commission on Audit and Department of Public Works and Highways.

49. Expenditures channelled though the Department of Public Works and Highways for infrastructure dropped by half between 1990 and 2005 if compared to GDP. From 1.57 percent of GDP in 1990, they peaked at 1.70 percent in 1997. Concurrent with the economic crisis that struck Southeast Asia in the late 1990s, they fell sharply in 1998 to 1.27 percent. The budget for the Department of Public Works and Highways has since continued to slide to its 2005 level of 0.71 percent of GDP. With the increased priority given by the government to infrastructure, however, the Department of Public Works and Highways budget rose to 0.76 percent in 2006 and 0.92 percent in 2007, still below the 1.70 percent peak in 1997.

Department of Transportation and Communications

50. The budget for the Department of Transportation and Communications equals a total of 2.9 billion pesos in 2005 (current prices). From 1998 to 2005, the budget covers airport and navigation facilities, ports and lighthouses, telecommunications and postal related expenses, MRT and budgetary support to Government owned and controlled corporations such as Philippine National Railways and LRTA.
51. **After the Government disengaged from the telecommunications sector in 2003, the main expenditures of the Department of Transportation and Communications have been for airports, air navigation and various rail projects.**

(a) **Airports and air navigation facilities** are the main expenditure item. Expenditures on airports peaked at 3.6 billion pesos with the improvement of the Mactan (Cebu) International Airport but later dropped to about 54 percent of that in 2006. Expenditures on airports and air navigation facilities averaged 41 percent of the Department’s budget from 1990 to 2006. These include major national airports as well as several small community airports serving little traffic.\(^{42}\)

(b) **Ports and lighthouses** accounted for 16 percent of the budget of the Department of Transportation and Communications on average between 1990 and 2006. These involve mostly small works in numerous feeder and municipal ports, which are in principle devolved to local government. Some major foreign-assisted fishing ports were also funded toward the late 1990s. The Department of Transportation and Communications budget excludes national ports, which fall under the Philippine Ports Authority.

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\(^{42}\) In 1994 airports and ports were managed together.
(c) For rail between 1997 and 2006, about 30 percent of the budget of the Department of Transportation and Communications was dedicated to the foreign-assisted Light Rail Transit (LRT) Line 1 (expansion) and Line 2, as well as to the operation of the Mass Rail Transit (MRT) Line 3, implemented under a build-operate-transfer scheme operated by the government. An interagency committee report (June 2006) estimated that, based on annual revenues of P2.1 billion and annual expenses of P8.9 billion, the subsidy transferred to the MRT-3 operators by the government for the next 20 years will be about P6.8 billion a year.

(d) Telecommunications accounted for about 16 percent of the department’s budget until 2003. Since then, the government policy has been to disengage from direct investments in this sector and instead leave investments to the private sector in a competitive environment.


52. In 2005 the budget of the Department of Transportation and Communications was lower than 15 years before when measured against GDP. Infrastructure expenditures in the department rose from 0.08 percent of GDP in 1990 to their peak of 0.31 percent of GDP in 1998 and later declined to 0.07 percent in 2006. The privatization and deregulation of the telecommunications sector in 1998 is the main reason for the drop.

Government Owned and Controlled Corporations

53. Government transfers to Government owned and controlled corporations have been a significant component of public expenditures in the last 10 years. In transport, the bulk of investments by government owned and controlled corporations have been directed at the urban rail system in Manila. In the last six years, transfers to railways have become more prominent than to the power sector.
54. **National government transfers to Government owned and controlled corporations have dropped as a result of privatization, better management, and improvements in their financial status.** While many Government owned and controlled corporations are now financially solvent and require few or no transfers from government, some of those in the transport sector (particularly Philippine National Railways and the Light Rail Transit Authority) remain a heavy burden.

55. **As a result of the devolution program of 1991, local government expenditure expanded relative to GDP and to national Government expenditure.** Aggregate total local government expenditure grew six-fold from 23.7 billion pesos in 1991 to 159.8 billion pesos in 2002. Local government spending as a proportion of GDP more than doubled from an average of 1.6 percent in 1985–1991 to 3.6 percent in 1993–2002. The increase was particularly rapid in 1993–1995 but started to taper off in 1998. Expenditure at all levels of local government (except cities) declined relative to GDP in 1998 and 1999, with the fiscal difficulties brought about by the Asian financial crisis. It bounced back in 2000 but contracted once again in 2001 and 2002.

56. **The share of total local government infrastructure spending in total local government capital outlays contracted from 59.6 percent in 1985–1991 to 34.6**
percent in 1993–2002. The investment component of total infrastructure expenditure of all local governments combined grew by 6.4 percent yearly in real terms between 1990 and 2001, and local government infrastructure investment rose from 0.16 percent of GNP in 1985–1991 to 0.23 percent in 1992–2002. But the total capital outlays of the local governments grew by only 12.5 percent, so the share of infrastructure spending fell.

57. **Local government spending on economic services expanded only minimally, from 0.7 percent to 0.8 percent of GNP.** The infrastructure sub-sectors bore the brunt of this relative contraction in the budget share. Despite the assignment of local infrastructure provision to local governments, the combined share of the infrastructure sub-sectors in total local government expenditure dipped from 26.9 percent of the total in 1991 to 11.1 percent in 2002—because no transfer of personnel or facilities accompanied the mandate. Total local government spending on all the infrastructure sub-sectors stagnated at about 0.5 percent of GNP in 1993–2002 from an average of 0.4 percent of GNP in 1985–1991.

58. **National government continued involvement in local transport infrastructure.** Although Section 17(b) of the Code categorically assigns the provision of local infrastructure to local government, the central government (primarily through the Department of Public Works and Highways) continues to play a major role in this area because it did not devolve personnel or budgets under the 1992/1993 devolution program. Some 22 percent of the Department of Public Works and Highways budget in 1997–2001 was for local infrastructure projects, typically funded out of congressional allocations under various rubrics such as *Various Infrastructure including Local Projects* and *Urgent Infrastructure including Local Projects*. Aside from the Department of Public Works and Highways budget, the Countrywide Development Fund, Project Development Assistance Fund, Rural Urban Development Infrastructure Fund, and Food Security Fund under the General Appropriations Act are also substantially used for local infrastructure projects. The Department of Public Works and Highways allocation for local infrastructure is effectively larger (127 percent) than the total local government infrastructure investments during the period. The presence of these funds could act as a disincentive for local government to engage in the provision of local infrastructure.

59. **The overall effect of the delegation of responsibility for local transport infrastructure to local governments has thus been less dramatic than might have been expected.** While the share of all local governments in total general government spending (net of debt service) doubled from 12.6 percent in 1991 to 25.6 percent in 2001, the share of local governments in general government spending on transportation and communication rose only from 15.8 percent to 21.5 percent, and their share in general government capital spending on infrastructure rose from 11 percent in 1991 to 14 percent in 2001.

**Private Sector Investments**

60. **Private sector spending picked up in the early 1990s and dramatically dropped after the Asian financial crisis.** It has since followed cycles of increases and decreases. Peaks in private investments in 1993-1994 and 1998 can be attributed to investments in energy and transport respectively. These sharp increases were due to the liberalization of the telecom sector and a reaction to a crisis in the energy sector during the early 1990s
and in the water sector in 1995. After the cyclical drop in 2002, private sector investment remained below pre-Asian crisis levels, at a level below 2 percent of GDP in 2006.

Figure 20: Composition of Private Infrastructure Investments (Billion pesos, 1990-2006, 2006 prices)

Note: Data reflects private sector commitments except for the Water in 1997-2002 and Telecom in 1993-2002
Sources of basic data: WB-PPI Database; MWCI, MWSI and OPTEL

61. Private sector investments for transport are in roads and seaports and were mainly concessions and green field projects.

Table 12: Private Sector Investments in Transport Infrastructure, 1990-2007

<table>
<thead>
<tr>
<th>Sub-sector</th>
<th>Number of Projects</th>
<th>USD Million</th>
</tr>
</thead>
<tbody>
<tr>
<td>Airports</td>
<td>1</td>
<td>520</td>
</tr>
<tr>
<td>Railroads</td>
<td>1</td>
<td>NA</td>
</tr>
<tr>
<td>Roads</td>
<td>4</td>
<td>1,509</td>
</tr>
<tr>
<td>Seaports</td>
<td>5</td>
<td>946</td>
</tr>
<tr>
<td><strong>Total Transport</strong></td>
<td><strong>11</strong></td>
<td><strong>2,975</strong></td>
</tr>
</tbody>
</table>


62. Overall, new public-private partnership projects have dropped in recent years. Over the last ten years investments in public-private partnership projects averaged USD 2.18 billion a year, or 1.9 percent of GDP, a little above public investment of 1.6 percent...
of GDP for 2006. In the last three years, however, private investments slowed to an average of only USD 1.4 billion a year or 1.4 percent of GDP. Recent 2006 data show investments have started to increase. The Philippines’ improved fiscal situation might have slowly encouraged private sector interest but it remains to be seen if this will be sustained in the coming years.

63. The decline in public-private partnerships in the Philippines does not dramatically differ from developments in East Asia overall. Private infrastructure investments in East Asia continue to be sluggish at the aftermath of the Asian financial crisis while other regions have seen increasing trend in the past three years.

Figure 21: Global Investments in Public Private Partnership Investments, USD thousand, 1990-2006

![Graph showing global investments in public-private partnerships from 1990 to 2006 for different regions (East Asia and Pacific, Europe and Central Asia, Latin America and the Caribbean, Middle East and North Africa, South Asia, Sub-Saharan Africa).](image)


Government plans for future spending

64. The Medium Term Philippine Development Plan (MTPDP) sets out the goals of the Government and usually coincides with the term of the President. The MTPDP 2004-10 was formulated based on the 10-point agenda of the Arroyo Administration:
65. **Based on the Medium Term Philippine Development Plan, the Government then draws up the Medium-Term Public Investment Program (MTPIP)** which provides the desired allocation of investment resources to implement the Medium-Term Public Investment Program. The latest Medium-Term Public Investment Program has estimated P2.9 billion for 2006-2010 (see table 12), of which more than half is allocated to infrastructure projects. Around P650 billion is allocated to transport-related projects, or 38 percent of total infrastructure allocation. The bulk of this (74 percent of transport-related projects) is related to improving the urban beltway, particularly those linking to Metro Manila – the country’s premier growth area. A previous analysis done on the results of the previous Medium Term Philippine Development Plan with its infrastructure-related targets shows that while there were targets achieved or close to being achieved, many of the expected outcomes have yet to be attained.⁴³

<table>
<thead>
<tr>
<th>Table 13: Medium Term Public Investment Program, 2006-2010</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>P Billion</strong></td>
</tr>
<tr>
<td>INFRASTRUCTURE</td>
</tr>
<tr>
<td>TRADE &amp; INVESTMENT</td>
</tr>
<tr>
<td>EDUCATION</td>
</tr>
<tr>
<td>BASIC NEEDS</td>
</tr>
<tr>
<td>OTHERS*</td>
</tr>
<tr>
<td>TOTAL MTPIP</td>
</tr>
</tbody>
</table>

Note: Others cover projects to achieve fiscal strength, job creation, automated elections, pursue the Mindanao peace process and necessary reforms to improve the bureaucracy and political stability.

Source: National Economic and Development Authority

**RECOMMENDATION**

**Increasing funding for transport infrastructure investments**

64. The Philippine government has wisely chosen to increase infrastructure investments. Given the current financial crisis, it may be tempting to reduce these investments.
investments, but the government should maintain its increases as these will be important to sustaining growth through the crisis.

Additional funding for maintenance

66. To meet the overall long-term needs of the sector and reduce the budget gap, three sources of additional funding could be considered. The first is to increase the contributions of road users to supplement the Special Road Support Fund from the current Motor Vehicle User Charges; the growth in annual Motor Vehicle User Charge revenues, at present rates, will not meet the road maintenance needs. The second is higher budgetary allocations in the interim for the sector through the General Appropriations Act. The third is to index tolls on expressways to the price level, as is broadly the case in privately financed facilities.

67. Funding of road maintenance needs greater security in the short term. As an interim measure to bridge the funding gap for road maintenance and meet the targets of the medium-term asset preservation program, funding through the General Appropriations Act could continue to be tapped to augment—but not to substitute for—the Special Road Support Fund. In the long run, this arrangement is not sound, running counter to the government’s policy that road maintenance costs could be funded wholly by road users. Measures to increase the road special funds could be considered through legislation or executive issuances, such as a surcharge on fuel. It is recognized that this is a sensitive political issue and it will be difficult if not impossible to introduce a fuel charge in the midst of rising food and fuel prices. However, it is advisable to keep this option open and consider it when the opportunity is there for implementation. It is common worldwide to use a fuel charge to raise money from road users because fuel consumption is proportional to road usage. Another measure is to increase the Motor Vehicle User’s Charge for trucks which are currently charged disproportionately much less than the cost of damage that they inflict on the roads.

Box 4: Options for increasing Motor Vehicle User’s Charge

The annual maintenance needs for national roads is about Php 20 billion (2008 prices), based on an earlier World Bank-assisted study at the Department of Public Works and Highways. The available special funds from the Motor Vehicle User’s Charge amount to only about Php 8 billion. Although this fund is estimated to increase at about 5 percent (following the growth in the number of motor vehicles), so will the cost of maintenance increase due to normal inflation. The funding gap is, therefore, about Php 12 billion a year.

To bridge this gap, and in accordance with the user’s pay principle advocated by the government, the following options could be considered:

1. A surcharge on fuel is common world-wide as a method to raise money from road users. Fuel consumption is proportional to the road use by the vehicle. Based on an estimated fuel consumption of 12 billion liters in 2008, a surcharge of Php 1.00 per liter would close significantly the financing gap of Php 12 billion, assuming for this indicative calculation a zero-elasticity of demand. This surcharge would be around 2.5 % of the current retail price of vehicle fuel.

2. Adjust and increase the present Motor Vehicle User’s Charge rates. The present rates have been fixed since 2004, although there is a provision in the Motor Vehicle User’s Charge Motor Vehicle User’s Charge law (Section 3, RA 8794) allowing the President to adjust the rates once every five years not to exceed the consumer price index rates. The rates could be revised and increased to reflect the cost of road damage caused by each vehicle type. In particular, the rates for trucks and trailers could be raised as they are too low – about one third to one-half of what is required - to recover the cost of the damages they cause on the roads.
3. Meanwhile, as an interim measure, continue to fund the financing gap for maintenance from the General Appropriations Act, particularly by giving top priority to maintenance of existing roads over new construction and other road works, since the returns from maintenance/asset preservation are very much higher than from new investments.

The first two measures will require legislation. This will require an effective advocacy based on sound institutional reforms which would clearly show, especially to the road users, that the present Motor Vehicle User’s Charge funds contributed by them are being allocated and spent efficiently for road maintenance, resulting in significant and tangible improvements in road conditions which translate into much cheaper, faster and more comfortable travel, and that these benefits would be enhanced with the additional funding.

Without legislation, the President may exercise the power under Sec. 3 of R.A. 8794 to increase the present Motor Vehicle User’s Charge rates which shall not exceed the annual rates of the Consumer Price Index.

68. Other transport infrastructure agencies, e.g., Philippine Ports Authority and Civil Aviation Authority of the Philippines, could consider enhancing their respective systems for asset preservation and maintenance. These systems could draw from the Department of Public Works and Highways experience and, thus, give the highest priority to maintenance of the transport assets, including the development of guidelines, criteria and formula to allocate routine, periodic and preventive maintenance funds.
3. INSTITUTIONAL SET-UP FOR TRANSPORT INFRASTRUCTURE PROVISION

Key Findings

- As in many other countries, the institutional set-up for planning, budgeting, building and operating transport infrastructure is complex. The main challenge in the Philippines is that there is no institutional anchoring of overall integrated planning for multi-modal transport infrastructure.
- Regulatory and operational responsibilities are mingled with a number of sectors including national roads, ports, mass transit and airports.
- Responsibility for local transportation infrastructure (roads and ports/harbors) is both formally and in practice split between local government units and departments at the national level. Congress, through project-related appropriations executed by the Department of Public Works and Highways, adds further complexity to the decision making process. This dilutes accountability, complicates coordination, and weakens incentives for local government to take responsibility for local transport infrastructure.
- The governance arrangements for the government-owned and controlled corporations are unclear and result in weak transparency and accountability around the de facto subsidies provided to these companies through the state budget.

Key Recommendation

- One option in the medium to long term would be to strengthen the policy making and supervisory capacity of the Department of Transportation and Communications with a view to making this Department the center for transport policy and coordination within the sector. This would involve clarifying and strengthening the role of the Department as the “owner’s agent” of government owned and controlled corporations within the sector. In addition, the Department would be the sector focal point for budgeting and planning and thus the main counterpart to the National Economic and Development Authority, the Department for Budget and Management and the Department of Finance. Given capacity building needs, this is likely to be a medium to long term recommendation.

69. This chapter provides an overview and recommendations related to the overall institutional set-up for provision of transport sector infrastructure in the Philippines. Subsequent chapters provide a more detailed discussion of each of the institutions.

FINDINGS

70. In most respects the overall formal institutional set-up for infrastructure provision in the Philippines does not fundamentally differ from what is seen in many other countries. An overview of responsibilities is included in annex 2. The Department of Public Works and Highways anchors the policy making, design and regulation of the national road system. The Department of Transportation and Communications anchors policy making, design and regulation of international and national airports, railways and ports and for regulating transport operations. For each major transport sector other than roads, government owned corporations and companies with independent boards are responsible for operating and managing the facilities, and to some extent for financing. As is seen in some other countries, the Department of Public
Works and Highways has a large staff engaged in actual road maintenance activities. The private sector is primarily involved in design and construction, in joint ventures for the five toll roads and in the port area (Annex 3). Challenges in the institutional set-up relate to overlapping mandates and unclear anchoring of overall sector budgeting and planning.

Policy-formulation, Budgeting and planning

71. The main anomaly in the formal institutional set-up is that there is no institutional anchoring of overall multi-modal transportation infrastructure policy formulation, planning and budgeting. The planning process described in chapter 5 below is intended to provide for overall societal planning and budgeting for all sectors in the Philippines, including transportation infrastructure. In most sectors, one line department is responsible for providing coordinated sectoral input to this process. In the transportation infrastructure area, the responsibility is split between Department of Public Works and Highways and the Department of Transportation and Communications. In addition, the Government owned and controlled corporations, although formally attached to Department of Highways and Public Works or the Department of Transportation and Communications, act independently in their policy formulation, planning, budgeting and implementation activities. The Government owned and controlled corporations liaise directly with the Department of Budget and Management and the Department of Finance in the budget process and the transport Departments play limited roles.

72. As a result of this lack of institutional anchoring, policy coordination is not institutionalized, and in this environment it is difficult if not impossible to put together an integrated approach to transport. Existing sectoral plans are useful in identifying priority projects on roads, rail, and airports, but except for the three nautical highway routes, the multi- and inter-modal linkages in transport planning and operations are still weak.

Regulatory and operational responsibilities

73. For the main transport infrastructure sectors, regulatory functions and responsibility for the provision of services are integrated. It is good practice to separate the provision of services or operation from regulatory functions and policy making to ensure that the public goods intended to be provided through regulation is taken care of independently of private operating interests. This principle has not been implemented in the Philippines in the following areas and in various forms and degrees:

(a) The Department of Public Works and Highways is both the regulatory authority and operator of national roads.

(b) The Civil Aviation Authority of the Philippines (formerly Air Transportation Office) acts as both the regulator and the operator of national airports.

(c) The Department of Transportation and Communications is both the regulator and the operator of Metro Manila LRT-3.

(d) The Light Rail Transit Authority is both the regulator and the operator of light rail in Manila.
(e) The Philippine Ports Authority is both the regulator and the operator of national ports.\textsuperscript{21}

74. This means that the institutional set-up does not in itself provide checks against the influence of operational interests in the regulation and policy making processes. Government owned and controlled corporations are further discussed in chapter 7.

Provision of local transport infrastructure

75. Before the implementation of the new Local Government Code in 1991, provision of local transport infrastructure was provided by the Department of Public Works and Highways (local roads and city streets) and the Department of Transportation and Communications (local ports/harbors). The functions assigned to local governments were limited to levying and collecting local taxes, issuing and enforcing regulations governing the operation of business activities in their jurisdictions, and administering certain services and facilities like garbage collection, public cemeteries, public markets, and slaughterhouses. Local governments played only a secondary role in construction and maintenance of local roads. Under the new Local Government Code, provinces are now assigned functions that involve the inter-municipal provision of services including provincial roads, while municipalities and cities are generally responsible for the delivery of frontline basic services including local roads. The city and municipal sub-units (the Barangays) do not have transport infrastructure responsibilities. Mismatches between revenue and expenditure assignment for all local governments in the aggregate and across different local government levels is, in principle, compensated for by mandated transfer of a share of national taxes to local governments - the Internal Revenue Allotment.\textsuperscript{44}

76. Local governments are now the primary unit responsible for local roads, city streets and municipal ports/harbors. The 1991 Local Government Code assigned functions across different levels of government, transferring responsibility for local social service and infrastructure provision and maintenance to local governments. It also transferred some resources and taxing powers. The devolution program transferred over 70,000 personnel from selected national government agencies to local government, and the budgets of most of these agencies were initially cut by 20 to 60 percent.

77. However, the Local Government Code is ambiguous in regard to local transport infrastructure. Although Section 17(b) provides an explicit and clear delineation of functions across levels of governments, Section 17(c) provides for central government agencies to continue to implement devolved public works and infrastructure projects and other facilities, programs, and services—if these are “funded by the national government under the annual General Appropriations Act, other special laws, pertinent executive orders, and those wholly or partially funded from foreign sources.”

\textsuperscript{21}Aside from the Philippine Ports Authority, the Cebu Ports Authority also operates public ports and regulates both public and private ports in Cebu province. It has 47 government ports and 67 private ports under its jurisdiction.

\textsuperscript{44}The Local Government Code provides that the share of local governments in national taxes be equal to 40 percent of the actual collections of the Bureau of Internal Revenue in the third year prior to the current year. Under the previous legislation the Internal Revenue Allotment was set a maximum of 20 percent of collections by the Bureau of Internal Revenue.
Furthermore, Section 17(f) allows the central government or the next higher level of local government unit to provide or augment the basic services and facilities assigned to a lower level of local government when such services or facilities are not made available or, if made available, are inadequate to meet the requirements of its inhabitants.

78. **Section 17(f) also allows members of Congress to insert provisions in the General Appropriations Act to augment funds that can be released only for “projects that are identified by members of Congress.”** In practice many of the devolved national government agencies sees it as their responsibility to guide local government behavior in support of national objectives, Section 17(f) of the Code. In effect, therefore, Sections 17(c) and (f) permit a three-track delivery system where members of Congress, national government agencies, and local government can all initiate devolved activities. This provides for a mix of responsibilities that weaken transparency and accountability.

79. Local government provision of transport infrastructure is further discussed in chapter 6.

**Government owned and controlled corporations**

80. **Government owned and controlled corporations have activities in transport, water, power, housing, food stabilization, education, health, and other sectors.** The Department of Finance estimates that there are 736 Government owned and controlled corporations with missions that range from land reclamation to regional economic development of former military bases.45

81. **Several Government owned and controlled corporations have broad powers under their charters, which enable them to engage in a wide range of activities beyond their core missions.** They compete with each other and with line agencies to control infrastructure investments by extending their activities beyond their core missions. One example is toll roads, where the Philippine National Construction Corporation, the Philippines Reclamation Authority, the Bases Conversion Development Authority, the National Development Corporation and the Toll Regulatory Board are all aiming for a lead role in toll road construction, operations and regulation. Another example is ports, where there are overlaps between the Philippine Ports Authority and various local or regional entities. In metropolitan mass rail transit, the Bases Conversion Development Authority, the Philippines National Railways and the Light Rail Transit Authority are competing for a lead role as railway operator and regulator.

82. **The wide ranging activities of Government owned and controlled corporations, and the myriad contracting structures available to them, provide opportunities for political interference in the procurement of infrastructure investments.** This often leads to procurement arrangements that begin, in the identification phase of the project cycle, as public-private partnerships, with substantial private investment, but during project tendering and award are boosted by significant government loans and private equity return guarantees. As the initial private investment projects sponsored by Government owned and controlled corporations and unsolicited public-private

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partnership proposals shift toward greater public investment, the number of public and private stakeholders increases, including competing line agencies and Government owned and controlled companies vying for control of the projects. This may result in a more politicized procurement process and further delays.46

83. While most of these commercial corporations are in principle off-budget, many of them impose contingent obligations on the government budget. These obligations are greatest for the two major rail operating agencies (table 12). The Philippine National Railway provides long distance intercity, commuter rail, and freight service over its network of approximately 1,000 kilometers; of this, only the commuter line from Caloocan to Calamba, 56 km long, is operational. Part of the government’s Metro Manila Decongestion Strategy is to use the network of the Philippine National Railways to improve commuter and urban rail services. The Light Rail Transit Authority is responsible for the government-owned and -provided rail services in Metropolitan Manila. The Light Rail Transit Authority is able to continue operating with Department of Finance “net lending” and other operating subsidies. It cannot retire its outstanding debt with operating revenues unless it increases fares substantially. But even with fare increases, it is highly unlikely that it can continue current operations without continuing national government support. It depends heavily on budgetary support for its project loan outlays and advances (net lending) by the Bureau of Treasury for servicing its debts. The Light Rail Transit Authority has reached its borrowing limit, and its capital stock has been fully subscribed.

Table 14: National Government Budgetary Support to Government Owned and Controlled Corporations (million pesos)

<table>
<thead>
<tr>
<th></th>
<th>2005</th>
<th>2007</th>
<th>2005</th>
<th>2007</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Budgeted</td>
<td>Un-programmed</td>
<td>Total</td>
<td>Budgeted</td>
</tr>
<tr>
<td></td>
<td>Subsidy</td>
<td>Project loan</td>
<td>Conversion a)</td>
<td>Total</td>
</tr>
<tr>
<td>Light Rail Transit Authority</td>
<td>5,544</td>
<td>14</td>
<td>5,558</td>
<td>3,986</td>
</tr>
<tr>
<td>Philippines National Railways</td>
<td>135</td>
<td>135</td>
<td>135</td>
<td>135</td>
</tr>
<tr>
<td>National Electrification Administration</td>
<td>260</td>
<td>500</td>
<td>760</td>
<td>302</td>
</tr>
</tbody>
</table>

Note: a) of Conversion of national government advance
Source: Department of Budget and Management (Fiscal Planning Bureau); Budget of Expenditure and Sources of Financing for 2005 and 2007.

84. It is not uncommon internationally for Governments to subsidize transportation infrastructure investments and their operation through the budget. This is the case even though the infrastructure is provided at arms-length through agencies or companies owned by the Government. However, if subsidies are indeed

46 Public Expenditure Review: Enhancing Transport infrastructure investments in government owned and controlled corporations and PPPs in the Philippines, Background Report by Benjamin Darche for the World Bank, January 2007
provided, it would be important that the rationale be clear and specific about whether it is for affordability reasons, in response to market failures or to address specific negative externalities. The subsidies provided must be made in accordance with the principles of good governance, i.e. in a transparent, accountable manner.

**The private sector**

85. The Philippines has turned to the private sector to complement financing for the delivery of infrastructure services. This follows the pattern of many other countries in the region. The government realized very early on that it cannot alone provide public funds to meet all the infrastructure requirements to support the accelerated growth agenda. And it has repeatedly tried to bring in the private sector to complement public resources. The Philippines was a frontrunner in establishing private participation in infrastructure in Asia: its build-operate-transfer (BOT) law of 1994 was the first in the region. Examples of public-private partnership arrangements in the Philippines are included in annex 3.

**Figure 22: Public Private Partnerships 1990-2006, USD million**

Sources of basic data: WB-PPI Database; MWCI, MWSI and Optel Ltd

86. Public-private partnerships boomed in the 1990s and for many years the value of privately financed infrastructure investments exceeded that of publicly financed projects. Most private participation was initiated through unsolicited proposals rather than government-sought public-private partnership financing for strategic projects (table 11). This raises problems in ensuring efficient allocation and use of resources. Public private partnerships are further discussed in chapter 8.
Box 5: Institutional Set-up for Transport Infrastructure in New Zealand

Since the early 1970s, New Zealand has transformed the management of its transport sector, making it more flexible, competitive and efficient. The main reforms came in two waves, first in the early 1970s and then a bigger wave within a framework of overall public sector reform, commencing in the mid-1980s. These reforms were intended to address a lack of information on the cost of outputs and the inability to assess the benefits for users, an absence of clear agency accountability, conflicting sector objectives, and undue influence of public and private interests. The main goal of the reforms was to establish institutions whose purposes were clear and accountable through performance agreements.

As a result, most of the transport sector, with the exception of the public infrastructure associated with road transport, some airports, some seaports, and Auckland rail, is now privately owned and funded. Central and local governments continue to fund and operate the land transport network although most of the design, construction and maintenance works are undertaken by the private sector.

The government transport sector includes the Ministry of Transport and seven “Crown entities”. The two key functions of the Ministry of Transport are policy development and contracting and monitoring government transport agencies’ performance. The Crown entities are relatively autonomous organizations overseen by government-appointed boards of directors, with chief executives hired by the board. These entities are funded through the general budget, the National Land Transport Fund and user charges.

The Crown entities are:
- Civil Aviation Authority, including the Aviation Security Service (AvSec)
- Land Transport Safety Authority
- Maritime Safety Authority
- Transfund New Zealand
- Transit New Zealand
- Road Safety Trust
- Transport Accident Investigation Commission

Civil Aviation Authority, Land Transport Safety Authority, and Maritime Safety Authority develop and administer standards and rules for entry, participation and exit for their respective transport modes in consultation with sector users and service providers. Land Transport Safety Authority also manages motor vehicle registration and revenue management. Running these functions involves the collection and refund of motor vehicle registration and licensing fees, road user charges and fuel excise duties.

Transfund New Zealand’s role includes funding for construction and maintenance of state highways and local roads; funding for passenger transport services, e.g. commuter trains, buses and ferries; and funding for rail freight and barging. It also includes walking and cycling projects, and funding of regional development projects. Transit New Zealand organizes the maintenance and development of New Zealand’s state highways, a portion of local roads, and alternative to roads including passenger transport. The Road Safety Trust provides modest funding for road safety research and projects at both the national and community levels. Funding comes from royalties on the sale of personalized number plates. The Transport Accident and Investigation Commission is a government-funded independent air, maritime and rail accident investigation agency.

Each of the Crown entities is held accountable for the outputs described in performance agreements through established quantity, quality and timeliness performance indicators.

The local authorities have a number of regulatory roles in the transport sector and ownership interests. Regional councils develop regional land transport strategies and fund public transport in conjunction with Transfund New Zealand. District councils own and operate most of the local road network. Local authorities have significant powers and responsibilities through the Resource Management Act to manage the environmental effects of land transport. They are also owners of airports, many of which are leased from the government, and in some cases are owners of seaports.

RECOMMENDATIONS

87. The institutional set-up for policy formulation, planning, budgeting and delivery of transport infrastructure in the Philippines needs strengthening to provide for better coordination and thus an improved network of infrastructure across the different modalities (road, rail, mass transit, ports, airports, etc.). The elaborate national planning process and the subsequent annual budget process can be adjusted and supplemented to this effect as discussed in Chapter 5.

88. In the medium to long term, the policy making and supervisory capacity of the Department of Transportation and Communications can be strengthened with a view to making this department the center for transport policy and coordination within the sector. This would involve clarifying and strengthening the role of the Department as the “owner’s agent” of government owned and controlled corporations within the sector and the sector focal point for budgeting and planning and thus the main counterpart to the National Economic and Development Authority, the Department of Finance and the Department for Budget and Management. This recommendation would involve formally revising the governance framework for the Government owned and controlled corporations reporting to the Department of Transportation and Communications and possibly revision of the Budget Code regulating the roles of the different Departments and agencies/corporation in the budget process. More importantly, and prior to any revision of the formal set-up, capacity and the internal structure of the Department of Transportation and Communications would need to be aligned with the possible future role and mandate.

89. Recommendations on government owned and controlled companies, public private partnerships and local government provision of infrastructure are included in subsequent chapters.
Box 6: Framework for National Transport Policy Planning

Good National Transport Strategies share some fundamental features:

- Basic objectives;
- Principles to guide the efforts to meet these objectives;
- Assessment of the adequacy of existing arrangements in the sector in relation to the above;
- Strategies for addressing shortcomings and meeting the objectives in accordance with the policy principles, and within the funding and institutional constraints that are expected to prevail;
- A set of prioritized actions that are key steps in implementing the strategies;
- Procedures to be used to check whether the strategies and plans are implemented in ways that are conducive to achieving the objectives in accordance with the policy principles, defining the level of involvement of central government at the sub-national level.

Ideally, even for countries with quite different administrative structures, the National Transport Strategy should represent a consensus of views on the way forward: the views of national-level governments on the basic objectives and principles of sector policy; the views of lower-level governments on the most suitable ways of meeting the needs of their constituencies; and the views of the different stakeholders at each level. The strategy should also include transparency and consultation with all interested parties—industry associations, transport service providers and their customers, non-transport ministries (those responsible for, e.g. planning, regional development, trade, industry, competition, environment, social welfare), local governments, academia and other stakeholders—preferably through a permanent consultative body such as an advisory council. The strategy should also address procedures for monitoring and evaluation.

Policy principles guide the pursuit of objectives and should be capable of answering the following types of question:

1. Role of public and private sectors
2. Organization of government function
3. Criteria for public investments
4. Controls on private sector investments
5. Role of regulations governing infrastructure and operations
6. Protection of public safety, infrastructure and the environment
7. Enforcement of regulations
8. Principles for tariff setting and taxation; price controls for private sector services
9. Cost recovery for public infrastructure
10. Pricing and inter-modal competition
11. Subsidy policy

4. PLANNING, BUDGETING AND PROJECT SELECTION

Key Findings

- The credibility of the national planning processes can be improved as regards transport infrastructure. Plans are being made with limited budgetary consideration and prioritization of projects. The quality of project proposals needs improvement. Proper cost-benefit and technical analyses of projects are not undertaken on a routine basis.
- The various national planning documents and processes are not intended to provide for technical multi-modal infrastructure planning nor for sectoral planning.
- The varying quality of the different parts of the planning documents reduces their usefulness for prioritization and guidance in the unified budget preparation process anchored in the Department of Budget and Management and the Department of Finance.

Key Recommendations

- The process and criteria for project entry into the Comprehensive Integrated Infrastructure Plan and the Medium Term Public Investment Program could be strengthened by issuing guidelines and setting quality thresholds for project proposals and submissions. Improving the quality of project proposals and appraisals is the sine qua non to improving the planning and budgeting processes.
- A process for strengthening the transport planning function in Government could be initiated with a view to making it an integrated multi-modal multiyear transportation infrastructure strategy and investment plan for the Philippines. The purpose of this process would be to provide input to the political debate and to illustrate the value and challenges of such a plan. A short to medium term recommendation is the formulation of a national multi-modal transport policy framework and plan that would synchronize the different transport modalities, investments and operations.
- The credibility of the planning process can be strengthened through one of several initiatives aimed at strengthening prioritization and realism without jeopardizing the unified budget process anchored at the Department of Budget and Management. The options include ranking the projects and/or assuming non-binding budgetary sector ceilings in the planning process.
- The Department of Budget and Management could continue the preparation of the implementation of its long term ambition of developing a Medium Term Expenditure Framework.

90. The Philippines has a long tradition for national planning anchored by the National Economic and Development Authority. Previously, the National Economic and Development Authority was responsible for planning and budgeting in regard to capital expenditure whereas the Department of Budget and Management was responsible for the budget process in regard to recurring expenditures. The Department of Finance was responsible for macro fiscal management, debt servicing, financing and accordingly for setting of the overall budget envelope and ceilings. Today the budget is unified and the Department of Budget and Management is anchoring the preparation of the entire budget within the macro fiscal framework prepared by the Department of Finance which has largely has retained its role. The National Economic and Development Authority is now anchoring the planning process feeding into the annual budget process.
The current President made a policy statement at the beginning of her term in 2004; the “10 Point Agenda” which is mainstreamed into a cascading series of planning and budgeting documents. The Medium Term Philippines Development Plan (MTPDP) further develops the agenda for the presidential terms and is intended to be a guide for annual planning and budgeting. The Medium Term Philippines Development Plan is a fixed seven year plan outlining an overall vision for the presidency and includes a number of high profile investment projects including in the transport infrastructure area. Annually, the President makes a State of the Nation Address (SONA) to Congress outlining general priorities for the coming budget year and listing specific investment projects to be included in the annual budget. The State of the Nation Address forms the basis for the annual update of the Medium Term Public Investment Program (MTPIP). The Medium Term Public Investment Program is a rolling seven year planning document identifying investment projects across all sectors (e.g. rural development, social sectors, infrastructure). In addition to being informed by the 10 Point Agenda, the Medium Term Philippines Development Plan and the State of the Nation Address, the Medium Term Public Investment Program is informed by the Comprehensive Integrated Infrastructure Program (CIIP) which is a list of the entire population of investment projects (including public private partnership and Official Development Assistance (ODA) projects) being considered by line Departments, Agencies and Government owned and controlled corporations. In principle, projects above an estimated value of 500 million pesos in the Comprehensive Integrated Infrastructure Program could be evaluated by the Investment Coordination Committee (ICC) of the National Economic and Development Authority and projects approved after such appraisal should be included in the Medium Term Public Investment Program/Comprehensive Integrated Infrastructure Program as projects proposed to be initiated in the first of the seven years covered by that plan. In practice, only projects funded by foreign Official Development Assistance or loans are evaluated by the Investment Coordination Committee (ICC), and the National Economic
Development Authority uses less formal criteria for drafting the Medium Term Public Investment Program.

92. **The annual budget process uses the Medium Term Philippines Development Plan as an input to the annual Paper on Budget Strategy.** This paper includes i) the macroeconomic and fiscal outlook, ii) a report on Progress on the Implementation of the Medium Term Public Investment Program and the Medium Term Philippines Development Plan, iii) suggested priorities for the coming budget year and iv) preliminary sectoral budget ceilings based on forward estimates. The Paper on Budget Strategy is also informed by the nascent Medium Term Expenditure Framework being developed by the Department of Budget and Management. The Paper is used within government as an internal document in the preparation of the annual budget in the form of a draft General Appropriations Act presented to Congress. As such the Paper forms the basis for sectoral allocations and for the subsequent process of making budget proposals for each department.

93. **National planning processes, designed to cover all sectors, do not provide a solid technical basis for transport infrastructure planning.** Sectoral planning relies on comprehensive analysis and deep technical discussions in the transport infrastructure professional community and with the wider community of stakeholders which cannot be accommodated in national annual planning processes. Such national processes, therefore, cannot substitute sectoral planning.

**Project Preparation**

94. **Cost-benefit and technical analyses of projects are not undertaken on a routine basis and are not required to be taken into account during project selection in the multiyear planning processes and the annual budget process.** Databases and project preparation in line agencies and the National Economic and Development Authority to support proposed infrastructure projects in the Medium Term Public Investment Program/Comprehensive Integrated Infrastructure Program have the following characteristics:

(a) Either line agencies do not have systematic project files (fiches, profiles) or do not submit all materials to the National Economic and Development Authority.
(b) Few feasibility studies are being carried out, even for high profile projects.
(c) For Public-Private Partnership (PPP) projects, broad assumptions have been made on whether the project qualifies for private sector participation, and on the shares of public and private financing, based on an adequate risk analysis.
(d) No project-specific information is being collected on sustainability criteria as environment, traffic safety, and social impact.
(e) Most agencies do not give priority to and provide adequate funding for project preparation, i.e., feasibility studies and engineering.

95. **Accordingly, the quality of project preparation and the information provided in project proposal submissions to the Comprehensive Integrated Infrastructure Program vary greatly. The capacity to assess investment project proposals from line agencies is limited.** The possible exception is the Department of Public Works and
Highways, which has instituted and used modern IT-based road planning systems and tools. The National Economic and Development Authority serves as the secretariat of the Investment Coordination Committee. Few resources are dedicated to appraisal of project proposals and the varying format and quality of proposals make the task daunting. Insufficient project data preclude a consistent screening of project feasibility, ranking, and scoring of preparedness—within and across agencies and sectors. Because of this, the National Economic and Development Authority checks mainly whether the projects are generally consistent with the Medium Term Philippines Development Plan, the State of the Nation Address and the 10-Point Agenda and whether required information is complied with (costs, financing source, and the like). The result is that the credibility of the Comprehensive Integrated Infrastructure Program as well as the Medium Term Public Investment Program is questioned by key stakeholders, which in turn limits the usefulness of the planning process and documents for the budget process.

**Budgeting**

96. The planning processes preceding the Paper on Budget Strategy are undertaken without regard to overall or sectoral budget ceilings. While individual projects proposed in the Medium Term Public Investment Program/Comprehensive Integrated Infrastructure Program include cost estimates, the projects are not prioritized; nor is there any indicative or likely budget ceiling or constraint. The priority ranking of projects within a budget ceiling in year one of the Medium Term Public Investment Programs is not used as a criterion for approval or rejection of a given project by the Investment Coordination Committee. The subsequent budget process is informed by the plans but the lack of prioritization by the Infrastructure Committee and the Investment Coordination Committee and the unconstrained nature of the plans/programs mean that they do not provide focused guidance for project prioritization in the budget process.

97. The problems with the quality of investment project proposal preparation in the planning process are duplicated in the annual budget process. Aligned with international best practices, the preparation of the unified budget is anchored by the Department of Budget and Management. The technical and economic viability of a given budget proposal is only one of several factors in preparing a national budget. The quality of investment project proposals at present does provide a good point of departure for giving the technical and economic aspect of a proposal the needed attention in decision making. Similarly, capacity is an issue. First, because staff in the Department of Budget and Management will have to make additional probes into technical and economic aspects of projects already appraised by the Investment Coordination Committee. Second, because the same staff will have to make assessment of projects below 500 million pesos which are not evaluated by the National Economic and Development Authority. Again, quality of proposals and lack of guidelines, criteria and requirements place an unrealistic burden on budget examiners in the Department of Budget and Management.

98. As discussed in chapter 3 congressional allocations make up a substantial share of the budget for transport infrastructure. These allocations are undertaken without regard to the planning systems further undermining their relevance for the budgeting process.
99. The Department of Budget and Management has initiated a number of reforms to improve the budget process. Reform activities include the preparation of a Medium Term Expenditure Framework (MTEF) and Organizational Performance Indicator Framework (OPIF). Incorporating the forward estimates in a Medium Term Expenditure Framework is intended to provide predictability of funding and bring a medium-term perspective to budgeting. The Department of Budget and Management intends estimates to cover all ongoing and approved policies and programs for the Departments and their associated Government owned and controlled corporations. The Department of Budget and Management intends to apply the framework down to the level of the executing agency to ensure that cost estimates, present and future, are realistic. Both initiatives (OPIF and MTEF) are being designed and developed with a view to improving processes anchored by the Department of Budget and Management and are intended to strengthen the link between planning/programming and budgeting.

**Box 7: Transport Infrastructure in a Medium Term Expenditure Framework**

A Medium Term Expenditure Framework is a good starting point for comprehensive multiyear planning for transport infrastructure. A Medium Term Expenditure Framework would include funding for existing programs (using the forward estimates) and any new programs, supported by additional resources from the allocable fiscal space.

**Existing program funding**

- As set out in the Medium Term Philippine Development Plan (MTPDP), forward estimates would include the maintenance and rehabilitation of existing infrastructure (asset preservation), to prevent early deterioration or loss of the facilities and to maximize their benefits to users.
- Forward estimates would include the continuation or completion of ongoing or unfinished infrastructure projects that meet MTPDP priorities.
- Forward estimates would also include projects needed to make existing projects fully functional or usable. An access road to a roll-on-roll-off port to be funded in 2007–2009, for example, should be included in the forward estimates for an existing nautical highway.
- Forward estimates of line agencies would include the capital outlays of their Government owned and controlled corporations as well as the likely national government subsidies for operations and maintenance of existing and proposed infrastructure.
- The Budget Management Bureaus would review agencies’ forward estimates to ensure that they meet the guidelines and standards established by the Department of Budget and Management.
- The forward estimates for existing programs would be indexed for inflation.

**New funding**

On top of the forward estimates for existing funding—and within the overall expenditure ceiling for the budget year—the government would provide new funding for infrastructure, including public-private partnerships that require government support. This new funding would have to be consistent with the estimated fiscal space.

**Figure 24: Fiscal Space in a Medium Term Expenditure Framework**

![Fiscal Space Diagram]
RECOMMENDATIONS

100. Efforts to improve planning, budgeting and project selection are likely to be medium to long term efforts. However, the recommendations below suggest a number of smaller initiatives that in themselves are likely to contribute to better planning, budgeting and project selection irrespective of whether only one or all recommendations are implemented. The highest yield is likely to come from improved project preparation in line Departments because (i) they will lead to better projects, and (ii) better project preparation will improve budgeting and planning processes whether these are reformed or not.

Overall Planning

101. In the short to medium term, a process could be initiated towards formulation of a national multi-modal transport policy framework and plan that would synchronize the different transport modalities, investments and operations. The purpose of the proposed process would be to i) provide input to the national planning and budget processes including project selection, ii) inform and guide sub-sector planning and iii) provide input to the political process. This work could be anchored in the Infrastructure Committee of the National Economic and Development Authority and could be undertaken in conjunction with sub-sector strategies. Led by the Infrastructure Committee, this effort could be an interagency undertaking, with the Department of Transportation and Communications as the lead executing agency, and involving the National Economic and Development Authority, the Department of Public Works and Highways, the Department of Budget and Management, the Department of Agriculture, the Department of Trade and Industry, and regional development councils. The national transport policy framework and plan could frame a package of strategic and complementary investments in roads and road transport services, seaports/roll-on-roll-off and maritime transport services, airports and air transport services, and processing and storage facilities for agricultural and industrial products, among others. This measure is supported by the recently completed study to develop a methodology and framework for National Transport Policy and Planning (NTPP) under the Philippine-Australia Partnership for Economic Governance Reform (PEGR). The National Transport Policy and Planning advocated a coordinated incremental planning approach which consists of i) the formulation of an overarching national transport policy framework covering all modes, to be undertaken by the Department of Transportation and Communications with the Department of Public Works and Highways through the National Economic and Development Authority, including consultations with key stakeholders, and with the recommended policy framework to be embodied in an Executive Order from the President and/or a Transport Policy Act of Congress; and ii) the preparation of medium-term plans by the concerned transport agencies which would be governed by the approved national transport policy framework and be submitted for review to the Department of Transportation and Communications to ensure inter-modal coordination and consistency with the framework.

99. In the Department of Public Works and Highways, the national roads planning process embodied in the Highway Planning Manual could be enriched by (a) linking
it with the national transport policy framework to be formulated, as mentioned in
the preceding paragraph, for better inter-modal coordination, and (b) including the
planning of toll expressways and urban national roads in the process.

102. In addition to providing a better technical basis for planning, the current
national processes can be strengthened by i) improving the quality of project
preparation (discussed below) and ii) introducing indicative budget ceilings in the
annual planning process. The case for a unified budget formulation process is very
strong and, correspondingly, there is a strong case for not making planning processes
binding on the annual budgets. Accordingly, the current division of labor between the
Department of Budget and Management and the National Economic and Development
Authority in regard to budgeting and planning is sound and should not be jeopardized.
However, the lack of any resource constraints in the planning process undermines its
credibility and relevance for annual budget decisions. A possible quick win in this regard
could be to introduce indicative resource considerations in the processes in one of the
following ways: the Department of Finance or the Department of Budget and
Management could provide indicative sectoral or aggregate ceilings for the coming
financial year. Or the Infrastructure Committee of the National Economic and
Development Authority could make the annual plans and programs under its own
assumptions on sectoral ceilings. Or the Infrastructure Committee, in coordination with
the Investment Coordination Committee, could rank (individually or in clusters) all
approved investment proposals in the annual Medium Term Public Investment Program/
Comprehensive Integrated Infrastructure Program. With any of these options, the
credibility and relevance of the plan for the budget process would increase without
posing binding constraints on prioritization and allocation in the budget process.

Project selection

103. The process and criteria for project entry into the Comprehensive Integrated
Infrastructure Plan and the Medium Term Philippines Investment Plan could be
strengthened. Doing so will require building capability and introducing modern planning
systems and tools in line agencies as well as within the National Economic and
Development Authority. Together with the line agencies, the National Economic and
Development Authority could develop common guidelines, methodologies, and minimum
standards. As prerequisites for projects entering the Plans, these guidelines and standards
would be used by the line agencies in infrastructure project selection, pre-feasibility and
feasibility studies, evaluation, and prioritization. They could include basic feasibility
indicators, details on engineering and costs, and use of multi-criteria analysis (MCA) in
screening and ranking projects within the agency or sector, among others. A simple
multi-criteria analysis could be developed and used to screen, appraise, and prioritize line
agency projects across agencies and sectors. The multi-criteria analysis may adopt such
criteria as economic feasibility; suitability for private finance, leasing, concessions,
outsourcing, and the like; consistency with safety, environmental sustainability, poverty
reduction, regional development, and national integration; and the readiness of the
implementing organization and the potential speed of implementation. International good
practice gives much guidance on the weights and ratings to rank projects across sectors
and agencies.
To this effect, appropriate planning and programming systems and tools could be embedded in agency processes over time. Infrastructure agencies can use ICT-aided systems and tools to rationalize selection, priority-setting, scheduling, and fund allocation for infrastructure maintenance and construction projects, using objective technical and economic criteria, as is being done at the Department of Public Works and Highways. Similar planning and programming systems could be established at the Department of Transportation and Communication, especially for port, rail, and airport projects.

The capability of line agencies could be strengthened in regard to pre-feasibility and feasibility studies, project selection, evaluation, and prioritization in accordance with guidelines from the National Economic and Development Authority and standards, supplemented by agency or sector-specific planning systems. They could provide regular and adequate funding, out of their budget ceilings, for pre-feasibility/feasibility studies and engineering for priority projects identified in their medium-term transport infrastructure programs. They could also develop and exercise their oversight role over attached Government owned and controlled corporations in reviewing and appraising programs of these corporations. A project preparation facility could be considered to guide line agencies in designing and overseeing the preparation, approval, and implementation of infrastructure programs and projects.

Budgeting

Budgeting for transport infrastructure will improve with better project preparation and a more credible planning process including project screening as suggested above. Improved budgeting for infrastructure would therefore start with improvements of processes outside the core budget process. In addition, further development of the MTEF reforms already underway in the Department of Budget and Management would contribute to better budgeting for infrastructure.

Introducing the Medium Term Expenditure Framework would require better capacity at the Department of Budget and Management to evaluate agency budget proposals and guide agency training on the new multiyear cost estimate concepts and the increased oversight required. Capacity improvement could include:

(a) Basic IT-based methodologies to screen major projects and programs, particularly those costing between 100–500 million pesos, proposed by agencies, and included in the Comprehensive Integrated Investment Plan. This change will enable the Department of Budget and Management to better verify the targeted project outputs, costs and benefits, preparedness for implementation, and construction and funding schedules, among others. It will also enable the Department of Budget and Management to carry out ex-post performance monitoring and evaluation.

(b) Systems for monitoring and evaluating performance compared with targets for major projects and programs.

(c) Databases on major projects and programs for budget review and preparation, linked to those of the agencies and the National Economic and Development Authority.
(d) Training and coaching of the staff of the Department of Budget and Management on the methods and systems, including providing appropriate IT hardware and software.

108. **Systems and capacity building programs could be undertaken.** This could occur in parallel for the Department of Finance, the National Economic and Development Authority and the secretariat of the Infrastructure Committee and the Investment Coordination Committee (responsible for evaluating projects costing P500 million or more), the Department of Budget and Management, the Department of Transportation and Communications, and the Department of Public Works and Highways (to enhance existing systems), in order to facilitate and harmonize project appraisal, programming, and budgeting.

**Strengthening Planning-Budgeting Links**

109. **To improve capital programming and improve the link between planning and budgeting, the following measures could be considered**

(a) The Department of Budget and Management and the National Economic and Development Authority could form a budget-planning task force, possibly under the National Economic and Development Authority Infrastructure Committee, to maximize avenues for cooperation such as sharing information on past and ongoing projects to include capital programming and formulation of Forward Estimates, and sharing expertise in monitoring and evaluation of projects.

(b) The National Economic and Development Authority and the Department of Budget and Management could harmonize their timetable so that medium-term programming and project evaluation work at the National Economic and Development Authority will interface with the budget preparation, including informing the Paper on Budget Strategy and prioritizing projects for the fiscal space.

(c) The National Economic and Development Authority and the Department of Budget and Management could agree on an operational plan to strengthen linkages in capital programming by setting a firm capital funding framework for planning future capital requirements, project appraisal and approval, and processing in the Forward Estimates a provision for future capital.

110. **In this regard, the proposed Executive Order seeking to harmonize planning and programming of infrastructure projects under the Comprehensive Integrated Infrastructure Program with the budgeting process, prepared by the National Economic and Development Authority which is pending in the Office of the President, could be revisited in the light of the above comments and related findings and recommendations in this report.**

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47 These recommendations are adapted from the recommendations of an on-going Philippine-Australia Partnership for Economic Governance Reform project.
5. IMPROVING LOCAL GOVERNMENT INFRASTRUCTURE PROVISION

Key Findings

- The 1991 devolution of responsibilities moved resources, taxation and staff from central government to local government units but not to a degree corresponding to the devolved responsibilities.
- Local government units have the authority to levy a number of taxes but limited room to maneuver regarding the setting of rates and thus to determine their own revenue stream. In addition, tax administration remains weak at the local level and the revenue streams do not provide sufficient funding for infrastructure investments.
- Local government units have access to borrowing but the credit market is monopolized and does not provide credit as needed.
- Differences in tax capabilities account for an urban bias in the funding of local government units.
- The quality of planning and budgeting in local government units could be improved, as could the planning link between levels of government in the transport infrastructure area.

Key Recommendations

- Access of local government units to private credit could be increased, the effectiveness of local government tax administration could be improved and local government units could gradually be given increased freedom in the setting of tax rates for taxes collected locally.
- Increased access to own generated revenue would improve accountability, which could be further strengthened by increased use of participatory budgeting by local government units and by strengthening the planning process.

FINDINGS

111. The passage in 1991 of a new Local Government Code represented a major shift in local governance in the Philippines. It consolidated and amended the Local Government Code of 1983, the Local Tax Code (Presidential Decree 231), and the Real Property Tax Code (Presidential Decree 464). The Code includes far-reaching provisions affecting the assignment of functions, revenue sharing and taxation between the five levels of government in the Philippines (national government, 80 provinces, 132 cities, around 1,500 municipalities and 42,000 villages (Barangay)). One of the more important responsibilities transferred to local government units under the Code is local infrastructure provision and maintenance. While local government units in the aggregate have made some gains in developing local infrastructure, the overall progress is far from satisfactory. In fact, the infrastructure spending of provinces and municipalities in the aggregate contracted in the post-Code period.

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48 This chapter is an adapted and abbreviated version of a paper on Infrastructure and Decentralization commissioned by the World Bank and drafted by Rosario G Manasan from Philippine Institute for Development Studies, 2003 (unpublished).

**Financing – Tax**

The Philippine tax assignment is consistent with the economic efficiency criterion. Two of the more important sources of tax revenue for local governments, the real property tax and the community tax, are taxes on immobile factors. At the same time, local governments are given wide latitude on the amount of fees and other user charges they may levy which, in principle, could enable them to relate the revenues they collect with the benefits that their constituents derive from the local governments’ expenditure responsibilities. However, while the Code authorizes local governments to levy 11 different taxes, most of them, with the exception of the real property tax and the local business tax, have narrow bases and limited yield prospects.

**Table 15: Tax Assignment in Cities, Provinces, and Municipalities**

<table>
<thead>
<tr>
<th>Subject</th>
<th>Cities</th>
<th>Provinces</th>
<th>Municipalities</th>
<th>Villages</th>
</tr>
</thead>
<tbody>
<tr>
<td>Real Property Transfers</td>
<td>√</td>
<td>√</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Business of Printing and Publication</td>
<td>√</td>
<td>√</td>
<td></td>
<td></td>
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<tr>
<td>Franchise</td>
<td>√</td>
<td>√</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Sand, Gravel and other Quarry Resources</td>
<td>√</td>
<td>√</td>
<td>a)</td>
<td>a)</td>
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<tr>
<td>Amusement Places</td>
<td>√</td>
<td>√</td>
<td>a)</td>
<td></td>
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<tr>
<td>Professionals</td>
<td>√</td>
<td>√</td>
<td></td>
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<tr>
<td>Delivery Vans and Trucks</td>
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<td></td>
<td></td>
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<tr>
<td>Real Property</td>
<td>√</td>
<td>√</td>
<td>a)</td>
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</tr>
<tr>
<td>Idle Lands</td>
<td>√</td>
<td>√</td>
<td></td>
<td></td>
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<tr>
<td>Business</td>
<td>√</td>
<td>√</td>
<td>√</td>
<td>√</td>
</tr>
<tr>
<td>Community Tax</td>
<td>√</td>
<td>√</td>
<td>√</td>
<td>a)</td>
</tr>
</tbody>
</table>

Note: a) Shares in proceeds of levy of province

The current tax assignment scores low in terms of the autonomy criterion. Although the Local Government Code authorizes local government units to levy a good number of taxes, it limits their power to set local tax rates. Thus, Philippine local government units have limited power to control the amount of revenues they receive at the margin so as to be able to fund the services they prefer. In this sense, subnational governments do not have “to face the full marginal tax price of the spending decisions for which they are responsible.” The Code fixes the tax rate of some taxes assigned to local governments (the Additional Levy on Real Property for the Special Education Fund (SEF) real property tax and the community tax), sets floors and ceilings on the tax rates they may impose, and mandates that tax rates can be adjusted only once in five years and

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49 While revenue sharing with the central government has the potential to provide local government units with adequate resources to finance their expenditure responsibilities, this scheme does not provide fiscal autonomy because subnational governments do not have the power to affect the amount of shared revenues they receive.

by no more than 10 percent. These adjustments do not allow local governments to maintain the real value of their revenues.

115. **There is a misalignment between the revenue powers and expenditure responsibilities of local governments following the 1991 devolution of responsibilities.** Variations in net resource transfers as a consequence of the reforms across levels of local government are substantial.\(^{51}\) Provinces absorbed 37.0 percent of the cost of devolved functions, municipalities 38.5 percent, cities 5.7 percent, and villages 18.8 percent. Contrast this with the mandated share of local governments in the Internal Revenue Allotment: provinces 23 percent, cities 23 percent, municipalities 34 percent and villages 20 percent. Urbanization gives cities access to broader tax bases that support urbanization’s greater demand for infrastructure.

**Financing – Internal Revenue Allotment (IRA)**

116. The difference between revenue and expenditure assignment for local government units in the aggregate and across different levels of local government is compensated for by the mandated increase in the share of national taxes. The degree to which the Internal Revenue Allotment compensates for the difference between financing ability and assignments varies over time.

**Financing – Borrowing**

117. The local government financing framework developed by the Department of Finance in 1996 envisions greater participation for the private capital market in local government financing. Before 1991 local governments were restricted in contracting loans to finance their capital requirements. The Local Government Code allowed local governments greater flexibility in tapping various sources of credit financing—bank credit, bonds, and build-operate-transfer arrangements. But local government access to private capital remains limited, despite some gains in private sector participation and bond market development.

118. Nevertheless, government financial institutions and the Municipal Development Fund Office continue to be the dominant source of local government financing, accounting for 76 percent and 7 percent, respectively, of local government borrowing in 2000. To date, local governments have been unable to access private bank lending. The inability of private banks to become depository banks for local governments appears to be the main impediment to private finance’s entry into the local government credit market. Together with Government Financial Institutions’ access to overseas development assistance, the depository bank privilege has allowed them to maintain a competitive advantage over private lenders. The Land Bank of the Philippines and the Development Bank of the Philippines appear reluctant to relinquish their monopoly over

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\(^{51}\) For the purpose of this chapter, the net resource transfer for any given year is computed as the difference between the Internal Revenue Allotment for that year, on the one hand, and the sum of the adjusted cost of devolved functions, the cost of other mandates including the provision for the 20 Percent Development Fund and sectoral representation, and the 1992 Internal Revenue Allotment, on the other. Cost adjustments were made to take into account population growth and inflation.
the more creditworthy local governments because this segment has emerged as a profitable part of their portfolios.\textsuperscript{52}

119. \textit{Meanwhile, the Municipal Development Fund Office is burdened by a lack of personnel, resources, and capacity, impeding its ability to move funds for lending to local governments}. At the same time, the lower effective rate of interest charged by the Municipal Development Fund Office (because of the bundling of grants with loan components of on-lent funds from official development assistance) creates a disincentive for even the more creditworthy local governments to access private funds. And many local governments are still unable to borrow from private banks because they are not creditworthy. Overall, cities are better positioned to access credit financing, accounting for 53 percent of local government borrowing in 2000–2001. The provinces accounted for 26 percent, and municipalities 21 percent. Sixteen provinces were, however, able to access loans from various sources in 2001.

\textbf{Urban bias}

120. \textit{Arrangements favor the more urbanized local governments in infrastructure investments}. Variations in net resource transfer across levels of local government are substantial.\textsuperscript{53} Provinces absorbed 37.0 percent of the cost of devolved functions, municipalities 38.5 percent, cities 5.7 percent, and barangays 18.8 percent. Contrast this with the mandated share of local governments in the Internal Revenue Allotment: provinces 23 percent, cities 23 percent, municipalities 34 percent and barangays 20 percent. The mismatch in the resources transferred and the expenditure responsibilities devolved is clear. Urbanization gives local governments access to broader tax bases that support urbanization’s greater demand for infrastructure.

121. \textit{A bias towards urban areas can be partly attributed to tax capabilities}. The taxing powers of provincial governments are inferior to those of city and municipal governments, which are allowed to levy taxes at higher rates and assigned the more productive local taxes. The maximum basic real property tax rate provinces are allowed to levy (1 percent) is lower than that of cities (2 percent).\textsuperscript{54} Because provinces are not permitted to levy local business taxes, outside of the real property tax, the taxes assigned to provinces do not yield much revenue. And provinces’ share in the proceeds of the real property tax (35 percent) is smaller than those of cities (70 percent) and municipalities (40 percent).

\textbf{Local planning and budgeting}

122. \textit{The budget and investment program processes are largely separate with one track for recurrent programs and another for the local development fund}. Three

\textsuperscript{52} In 2003 Land Bank of the Philippines’ outstanding loans to local governments were P12 billion while the Development Bank of the Philippines’ were P1.8 billion.

\textsuperscript{53} The net resource transfer for any given year is computed as the difference between the IRA for that year, on the one hand, and the sum of the adjusted cost of devolved functions, the cost of other mandates including the provision for the 20 Percent Development Fund and sectoral representation, and the 1992 IRA, on the other. Cost adjustments were made to take into account population growth and inflation.

\textsuperscript{54} Similarly, cities are allowed to fix tax rates that exceed the maximum rates allowed for provinces or municipalities by 50 percent or less, except for professional and amusement taxes.
provisions of the Local Government Code are central to the implementation and financing of the local development plan. These are:

(a) Local government units are required to have a comprehensive multi-sectoral development plan which should be initiated by its Local Development Council and approved by the elected council (Sanggunian). (Section 106)

(b) Local budgets should operationalize local development plans. (Section 305 - i)

(c) Local government units should appropriate in its annual budget no less than 20% of its annual Internal Revenue Allotment for development projects. (Section 287)

123. These provisions have been interpreted to mean that the Local Development Fund can only be spent on projects identified in the local development plan. Furthermore, as a matter of practice, the term “plan” is taken to refer to the Annual Investment Plan (AIP). Consequently, the Annual Investment Plan is at the core of the planning-budgeting linkage as only projects listed in the plan are assured funding.

124. In principle, the preparation of the municipal Annual Infrastructure Plan starts earlier, and its approval should precede that of the provincial budget. In practice, the Annual Infrastructure Plan and the budget follow parallel tracks and are prepared at about the same time in most municipalities. Work on the Annual Infrastructure Plan and the local development fund allocation is led by the local Plan Development Officer and the local Development Council, and the final output is approved by the municipal council. Work on the budget is led by the local Budget Officer, and the appropriations ordinance is passed by the municipal council. In preparing the local budget, the allocation for the local development fund is initially included as a lump sum. When the Annual Infrastructure Plan is approved, the individual projects in the local development fund are added to the final budget.

125. This two-track system of preparing the annual budget weakens the link between capital investments and their maintenance. This practice may compromise project sustainability over the medium term as inadequate funds are allocated to maintenance. And for local governments with relatively large budgets that can accommodate allocations for new projects outside the local development fund, this process may not be the most efficient way of prioritizing. While the Local Finance Committee straddles both processes and should ensure their consistency, it is not functional in all provinces. In such cases, two disjointed processes rank the projects independently.

126. In practice, less than 70 percent of local governments have up-to-date local development plans and Local Development Investment Programs. Even for local governments with updated Local Development Plans, the preparation of the Annual Investment Plan is essentially political, independent of the Local Development Plan and the Local Development Plan. In preparing the Annual Investment Plans, local government officials typically do not set program targets and seldom, if ever, is there an explicit assessment of costs and benefits. At best, some qualitative assessment of the projects is made based on urgency, need, relevance to sector concerns, and alignment
with the governor’s priorities. The programs and projects in the Annual Investment Plan thus bear little resemblance to those in the Local Development Plan and Local Development Investment Plans. As a result, oversight by the Department of Budget and Management refers exclusively to the Annual Investment Plan (rather than the provincial development plan or the provincial development infrastructure plan) when checking the use of the provincial development fund. The Department of Budget and Management does not check the consistency of the Annual Investment Plan with the provincial development fund—and neither does the Department of the Interior and Local Government or the National Economic and Development Authority.

127. While planning at the provincial, city and municipal levels is covered by guidelines issued by the National Economic and Development Authority, the Department of Interior and Local Government, the Department of Budget and management, there are no such guidelines for metropolitan areas. This is a major gap in the planning system which needs to be addressed systematically, since metropolitan areas – which consist of several local government units – are fast emerging and account for the highest concentration of economic output in the country. With this, however, these areas also experience rapid and uncontrolled growth and urban sprawl, which spawn metrowide problems which include traffic congestion, inadequate road network and public transport system, and pollution.

**Links Between Local and National Planning and Budgeting**

128. The main cause of the split between local government activities on transport infrastructure and national strategies is the absence of an effective plan hierarchy. The local development plans are often formulated independently of regional and national plans. Conversely, regional development plans are often formulated independently of local plans because they are meant to focus on inter-provincial projects.

129. The Regional Development Plan formulated by the Regional Development Council is seldom, if ever, taken into consideration by the lower levels of government. Many local government officials complain that national government agencies do not adequately consult with the local governments in the planning and implementing programs and projects in their jurisdictions. Many projects are reported to be inconsistent with perceived local needs. The national line agencies are not obliged to follow the Regional Development Investment Program-based regional budget. Consequently, the regional development plans usually reflect the national government line agencies that have the budget to fund the projects.

130. The regional plans have no champions in central discussions on the Medium Term Philippines Development Plan, reducing the prominence of regional plans against sector plans. Local government officials note that they have little influence on the deliberations on the Medium Term Philippines Development Plan after regional plans

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are submitted to the central level. While the regional development councils endorse projects to the national government, they fail to establish a strong link between the local governments and the national government agencies. This failing is linked to the inability of the regional councils to secure funding for the programs and projects in the regional development plan.

**RECOMMENDATIONS**

131. **Local government can improve its role in transport infrastructure provision by getting better access to financing, improving planning and budgeting and strengthening the links between local and national planning.** Access to borrowing and strengthening the link between local and national planning require a concerted effort and are likely to be medium to long term efforts. Local planning and improved financing through improved tax administration reform can be undertaken by individual local governments. However, the overall impact on national transport infrastructure of such initiatives is likely to be limited.

**Financing**

132. **Reforming the local government credit market to remove bottlenecks to private participation in local government lending is desirable.** Easing the fiscal constraint would encourage better links between the Provincial Development Plan/PDIP and the Annual Investment Plan by enabling local governments to undertake more lumpy investments. Two measures can be considered:

   (d) Better implementation of a policy for local governments to graduate from Government Financial Institutions to private sources.

   (e) Repealing the rules that give Government Financial Institutions a monopoly over local government Internal Revenue Allotment accounts.

133. **In the medium term, the tax autonomy of local governments could be increased by assigning greater taxation powers to local governments.** These changes would enhance the accountability of local officials to communities and encourage local governments to raise more revenues to finance infrastructure investments. At the same time, there is a need to realign tax and expenditure assignments and to revisit the distribution of the Internal Revenue Allotment pool to the different levels of local government. Doing so would give local governments their own revenue sources—and the power to control the revenues they receive. Subnational governments would then have to face the full marginal tax price of their spending decisions. These changes would also mitigate the political nature of the Annual Investment Plan formulation. These changes would require an amendment of the Local Government Code.

134. **At the same time, interventions could be made to help local governments increase own-source revenue.** In the short term, technical assistance to help local governments improve tax administration through computerization and adding more tax collection agents would contribute to this end.
Local Planning and Budgeting

135. Incentives for efficiency are weak in local government finance. The mismatch between revenue and the expenditure assignments under the Local Government Code does not provide strong internal incentives for a long-term view in local planning and infrastructure spending. It is thus important to look at other mechanisms for accountability, and greater downward accountability could be promoted. The experience of the USAID Governance and Local Democracy project and the CIDA Local Government Support Program in strengthening local planning suggests that the keys to success are the early engagement of local elected officials in plan preparation and the meaningful participation of a broad-based, multi-sector group to give local communities greater voice and to promote greater accountability on the part of local officials. To reestablish a link between the local community and the plans and to garner external funding for local projects, the multi-sector planning group could include representatives from both the local community (local government officials, nongovernmental organizations, and the wider population) and national government agencies. Although the quality of the guidance in the Executive Agenda Manual on the technical aspects of planning may not be the best, the manner by which that process engages local chief executives has worked well. Following the same strategy, the link between the PDP and the Annual Investment Program may be strengthened by educating local elected officials (both local chief executives and members of the municipal council) on the importance of medium term planning and by promoting the early engagement of local elected officials in the planning, following the executive agenda process.

Box 8: Participatory Budgeting in Porto Alegre, Brazil

Participatory budgeting provides citizens with the opportunity to provide more direct input into budget allocation decisions than they do through typical budget processes. Participatory budgeting can take a number of forms including, for example, focus groups, neighborhood councils, citizen advisory boards, public strategic planning sessions and trainings or public education campaigns to inform citizens about the budget process. Accordingly participatory budgeting range from consultative processes that allow citizens to voice their opinions on the budget to inclusive decision-making processes that give citizens legal authority over budget decisions.

The city of Porto Alegre, Brazil pioneered the use of participatory budgeting. Successes there were in part responsible for the spread of participatory budgeting processes across Latin America. Porto Alegre’s goals for its participatory budgeting program included (i) promoting citizen education and activism, (ii) improving equity through better targeting of policies and resources allocation, and (iii) reforming the administrative apparatus. In Porto Alegre, the process includes a requirement for public reporting on progress on the previous year’s budget as well as estimates for the upcoming year’s revenues and expenditures. After the reporting session, citizens vote at local plenaries for their top priority thematic areas and elect representatives. Between 1992 and 2002, the top three priority areas consistently included road paving and land use regulation, along with housing and basic sanitation. The elected delegates then review municipal officials’ projections in more detail, conduct site visits to assess potential projects, and review and prioritize projects under each theme. The city Participatory Budget Council then meets with city officials to “harmonize” priorities on projects and thematic areas, and submits the results to the mayor and city council.
According to a recent assessment of participatory budgeting in Brazil, “the opportunity to participate in decisions regarding the allocation of public funds for projects has fostered a shift in the local political culture from confrontational tactics and corrupt political bargaining to constructive debate and civic engagement in governance. It has triggered changes in the relations between the poor and their municipality as each side develops a better understanding of needs, constraints and mutual roles and responsibilities.” The process has also improved levels of participation among women and the poor.


136. To address the transport institutional and planning needs of metropolitan areas, the government might consider the preparation of a framework and methodology for metropolitan transport policy formulation and planning. This could be initially piloted to a metropolitan area outside of Metro Manila, such as Metro Cebu, Metro Davao, or Metro Naga. The approach could follow the methodology adopted for the recently completed National Transport Policy and Planning project under the Philippine-Australia Partnership for Economic Governance Reform (PEGR).

Links Between Local and National Planning and Budgeting

137. The links between local and national planning and budgeting could also be tightened through the Regional Development Council. This Council, composed of Governors and City Mayors and Regional Directors of line department, could strengthen and institutionalize its role as the convenient forum to interface provincial/city/municipal infrastructure plans and programs with each other and with national infrastructure plans/programs (e.g., packaging secondary/feeder and arterial roads on a network basis), to form coherent parts of the regional development plan and program which both national agencies and local government units could adopt.
6. RESTRUCTURING SELECTED GOVERNMENT OWNED AND CONTROLLED CORPORATIONS

Key Findings

• A number of Government owned and controlled corporations in the transport infrastructure sector have large and growing financial deficits. Operational and regulatory functions are integrated in most areas of transport infrastructure.

• Mass transit is being subsidized through servicing of debt of Government owned and controlled corporations via annual allocations in the budget. This is not an effective or transparent approach to providing subsidies.

• Government owned and controlled companies make plans and programs independently of their respective line Department undermining coordination.

Key Recommendations

• In the short term, there are significant potential gains to be achieved by restructuring a few Government owned and controlled corporations whose limitations have the largest negative impact on transport infrastructure provision in the Philippines. The Philippines National Railways, the Philippines Ports Authority and the Light Rail Transit Authority could be considered for such an effort.

• In the medium to long term, the overall management, governance arrangements and approach to providing subsidies for services provided by Government owned and controlled corporations could be strengthened. This would, inter alia, involve the Department of Transportation and Communications, the Department of Public Works and Highways and oversight agencies coordinating and prioritizing the investment programs of the Government owned and controlled corporations.

• Subsidies for mass transit could be made more transparent. Over time, the cost recovery principle for operations and management for Government owned and controlled corporations could be gradually introduced.

138. As discussed in chapters 3 and 4, government owned and controlled companies play an important role in infrastructure provision in the Philippines. Challenges in this regard relate to the way these companies are subsidized, how they are dealt with in the national planning and budgeting processes and governance set-up and issues specific to selected Government owned and controlled companies.

FINDINGS

Government Subsidies and Agency Debts

139. Globally, government subsidies to mass transit and railway construction, maintenance and operation have been the norm in developing as well as developed countries. The Philippines is no different in subsidizing rail and mass transit but the form and governance of these subsidies are not recognized as such. The subsidies system primarily takes the form of debt and deficit servicing.
The Philippine National Railways

140. The Philippine National Railways (PNR) relies on ongoing government contributions. In addition to its financial problems, service has also declined over the years, and it has become a question whether its assets (including valuable land and other properties such as restaurants and hotels) are being put to the most efficient use. The reasons for Philippine National Railways traffic and revenue losses include:

(a) Operating service decline caused, in part, by deteriorating infrastructure and rolling stock due to deferred maintenance.
(b) Continuous decline in traffic as PNR has little or no comparative advantage in long-distance passenger and freight services vis-à-vis buses and trucks using the improved highway network.
(c) Destructive typhoons exacerbating maintenance and operation problems.
(d) Rapid growth of informal settlements encroaching on the right-of-way, creating track maintenance and other operating problems.
(e) Technical capacity and management weaknesses.
(f) Poor financial management and substantial debt overhang:58 i) Over P4.4 billion outstanding,59 primarily official development assistance loans from Japan and Australia related to the Mainline South project and wagon rehabilitation. ii) Erroneous classification and unreconciled balances of long-term debt with the Bureau of Treasury. iii) Other financial management issues including cash advances stated under plant, property, and equipment costs; long-term outstanding loans to employees, unreconciled balances of cash in bank accounts, unpaid property taxes, and unpaid health, social security, and pension liabilities.

59 Philippine National Railways, Notes to 2005 Financial Statements.
A policy decision should be made in the near future as to what the future role of railways should be in the Philippines. The governance, financing operation and quality of services rendered by the Philippines National Railways are not sustainable. Depending on the decision, a short term reform program can be established. Options range from phasing out incrementally non-core operations over privatization to restructuring of the current corporation.

In Brazil, Argentina and Mexico railways have been revitalized through privatization and concessions. Competitive tendering ensures discipline and creates incentives for internal efficiency. Closing down a national railway system would be a very unusual and likely a controversial step. Given high operating costs, the bad condition of the infrastructure, the corresponding large investments needed to make the network functional, the value of Philippines National Railways assets (land) in Manila - and given that rail transportation does not play a significant role in present transport planning, a case for closing down Philippines National Railways could be made in theory. However, given the political realities and sensitivities around the Philippine National Railways, this option would be difficult if not impossible to implement. A more realistic way forward would be to redefine the role of Philippine National Railways and follow successful examples of railway revitalization in Argentina, Brazil and Mexico and based on that refit and scale the Philippine National Railways to an appropriate level.
Box 9: Examples of Revitalization of Railways: Argentina, Brazil and Mexico

The Argentine railroads were restructured and privatized beginning in 1990, when Argentina was on the verge of fiscal collapse. The government could no longer afford to support the railways, which were the largest state enterprises contributing to the deficit. The railways were losing $600 million per year, and although existing staff levels were excessive there would have been social and political consequences to outright downsizing. The government decided on a privatization scheme involving concessioning of about 60 percent of the rail network in km and the establishment of a new railway regulatory agency. Bidders for each of the five rail freight concessions paid the government a fee for a 30-year concession; the bids were evaluated through a complicated formula that was based on expected payments to government, but also included consideration of the number of government employees who would be retained and the expected investment. After transfer to the winning bidders was complete, about 92 percent of the former employees were laid off (with severance packages for laid-off workers) and government outlays fell to below USD 150 million per year. While there have been continuing problems with the rail system, with rail operators unwilling to retain as many employees as originally proposed in their bids (which were known to be overoptimistic, in line with the incentives created in the bidding formula), and lower amounts of physical infrastructure investment than initially anticipated, the quality and level of service has risen, with rail freight shipments more than doubling. In addition, all of the former suburban passenger services and the Buenos Aires Metro (Subte) were concessioned. Though there have been financial problems with many of these concessions, particularly as a result of the broader problems of the Argentine economy, most of them have survived, and traffic has grown significantly.

In Brazil, the government had attempted to reform and revitalize the state-owned railroads without success. The rail network was running at low capacity, the railroad companies were overstaffed, and lack of investment had left significant sections of rail infrastructure obsolete. Following Argentina’s and also Mexico’s successful examples, the government included the railroads in a broader national privatization program. The government conducted a public competitive bidding process in 1996-1997 for the six 30-year concession packages. After privatization, railroads increased their share of the transportation market by 4.5 percent in 1997 and 13 percent in 1998, and estimated savings to the Federal Government from reduced subsidies and concession fees total $300 million per year. In addition, the companies significantly reduced their labor levels and costs, and five out of six of the companies were able to cover their operating expenses within two years of taking over operations. The Government of the State of Rio de Janeiro also concessioned the suburban passenger services and the Metro in Rio using an approach similar to the national railway concessioning. Results have been equally positive.

An equally significant example of concessioning was in Mexico, which had a rail system that carried much more freight traffic than Argentina and had a network on the same scale as Brazil. The Government created three state-owned enterprises holding concessions in advance, and then auctioned off the shares in the enterprises. Payments to the Government for the concessions (USD2.3 billion) exceeded those in Brazil (USD1.7 billion) and Argentina (USD173 million). Traffic in Mexico has grown strongly and two of the three major concessions have been quite profitable. The Government has also moved to create suburban rail passenger concessions in the Mexico City area, the first of which began operations in early 2008.

Sources:  
The Light Rail Transit Authority

143. The debt burden of the Manila Light Rail Transit Authority has grown beyond its financial capacity because of high construction costs and low revenues from low fares. Based on the 2005 financial report, without structural improvements in operations or revenues, the Light Rail Transit Authority will need more than 65 years to pay off the liabilities with present net income from operations (P68 million in 2005). The fares of 12–15 pesos per ride only covers operational expenses, not significant debt servicing. The result is more borrowing by the Light Rail Transit Authority from the Department of Finance in the form of Bureau of Treasury advances. Although the Light Rail Transit Authority charter allows it to increase fares, political intervention has made fare increases difficult, if not impossible, to implement.

144. There is a short term need to restructure the finances and governance of the Light Rail Transit Authority. Although in principle the government is guaranteeing the debt service of the Light Rail Transit Authority, due diligence on the development costs of Lines 1 and 2 revealed that the whole debt burden for rolling stock and structures had been made the responsibility of Light Rail Transit Authority. Debt restructuring of an estimated P30 billion will be required for the Light Rail Transit Authority to sustain debt servicing. This amount accounted for about 50 percent of the total liabilities as of the end of 2006, matching near 50 percent of the company’s fixed assets (buildings and structures). Furthermore, instead of increasing the fares, outsourcing operations and maintenance might solve the financial situation in a sustainable manner.

The Philippine Ports Authority

145. The government-owned seaport agency, the Philippine Ports Authority (PPA), poses problems mainly because of its combination of regulatory and operational responsibilities as discussed in chapter 4. Before the early 1990s, the Philippine Ports Authority had jurisdiction over almost all ports and therefore could make consistent port development plans. But there are now many other government organizations that can undertake port development including the Department of Transportation and Communications (DOTC), the Cebu Ports Authority (CPA), the Phivedec Industrial Authority (PIA), the Bases Conversion Development Authority (BCDA), the Subic Bay Metropolitan Authority (SBMA), and the Cagayan Economic Zone Authority (CEZA). Moreover, because the Philippine Ports Authority focuses more on the profitable larger ports in the Metro Manila area, it does not allocate sufficient funds for the maintenance and development of the smaller ports under its control, except the projects identified in the State of the Nation Address of the President as part of the government’s policy to link islands through the Roll-On-Off Transport System, and these smaller secondary ports are neglected as a result. Aside from operating public ports, the Philippines Ports Authority also regulates and charges fees from private ports—an unfair situation which makes the latter less competitive and viable, thereby restraining private financing and port management.

146. The Philippine Ports Authority could be reformed to separate its operational and regulatory functions. The JICA Port Master Study has argued that the government should maintain the regulatory function and let the private sector spearhead port
development and management. It therefore recommends that a reformed Philippines Ports Authority become the Philippine Port Administration Agency (PPAA), with the following functions:

(a) Formulate basic policies for port development and management.

(b) Make regulations and guidelines, such as technical and safety standards.

(c) Coordinate all major port development plans, including public and private ports.

(d) Draft the national plan for port development.

(e) Cooperate with foreign countries on port-related issues.

147. The Philippine Port Administration Agency would not be involved directly in selecting port concessionaires and operators. The JICA Study also recommended a national plan for a port development council as a neutral body to coordinate the various port development agencies—and to formulate long-term master plans and short-term development plans. However, as privatization might not be feasible to start with, the two functions could be separated into two clearly separate entities to address the most pressing need for separation of regulatory and operational responsibilities.

Box 10: Ports Management – Landlord Model

The landlord model falls between fully public and fully private port administration, and aims to reach a balance between the two. Under this model, a public ports authority regulates port services and acts as a landlord, while a private company is responsible for port operations. The port authority retains ownership of the land and infrastructure and leases these to a private company, often for a fixed amount per square meter per year. This fee can be indexed to inflation. The private operator constructs and maintains buildings and additional equipment as necessary. Strengths of this model include the private company’s ability and expertise in dealing with market conditions and, with long term contracts, incentives for investments. However, the landlord model sometimes leads to misjudgments by the private contracts in timing of capacity increases.


The Civil Aviation Authority of the Philippines

148. The new Civil Aviation Authority of the Philippines (CAAP) has just been organized as a government-owned corporation to assume the functions of the Air Transportation Office (ATO) and to oversee safety regulations. The corporation is given fiscal autonomy to reduce requirements for national government financing, and mobilize more funding for the sector. Through the creation of subsidiary corporations under the proposed Civil Aviation Authority of the Philippines, private sector participation in civil aviation development might also be increased.

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The combination of regulatory and commercial functions is now smaller, but still important, problem for airports. Airports are established as independent commercial entities. The public sector institutions for civil aviation are the CAAP and the Civil Aeronautics Board. While the Civil Aeronautics Board is the economic regulator, the CAAP is both the technical regulator and a commercial service provider.

**RECOMMENDATIONS**

**Restructuring selected Government owned and controlled corporations**

150. There are significant potential gains to be achieved by restructuring a few Government owned and controlled corporations whose limitations have the largest negative impact on transport infrastructure provision in the Philippines. The Philippine National Railways, the Philippine Ports Authority and the Light Rail Transit Authority could be considered for such an effort.

**Subsidies**

151. A first step could be to introduce a policy of cost recovery for operations and management for Government owned and controlled corporations operating in the transport sector. As a simple rule, user fees or tariffs for revenue-earning projects could be set to cover at least operations and maintenance costs. For rail transport, the national government could consider funding the fixed assets—land and rights of way, carriageways, tracks, viaduct, and the like—while the project proponent could finance the rolling stock and operations and management, recovering the costs from users. This would put railways on a par with roads, where the national government funds the infrastructure and motorists finance vehicles and contribute road user fees.

152. A more generic solution could be developed for all Government owned and controlled corporations. It need not be automatically presumed that any deficits that a Government owned and controlled corporation incur will fall on the public budget. What is needed is to assess their roles, their potential external or spinoff benefits, and their economically sustainable budget support. Even if these activities merit public support, that support most likely could be more efficiently injected through a competitively tendered franchise or concession rather than through simple deficit financing, which comes usually at a relatively higher cost to government.

**Governance and Management of Government Owned and Controlled Corporations**

153. There is a case to be made for increased oversight of the Government owned and controlled corporations, particularly in regard to decision making on public-private partnership projects so that they cannot independently enter into such arrangements. This oversight could include as a minimum the assessment, and incorporation into the budget, of any government support for such projects. Government owned and controlled corporations’ plans and programs are often prepared independently of their respective line Departments. Lack of oversight often results in insufficient financial planning of such projects. The result has been wrong assumptions on facility use, for example in rail transit ridership and fares that are insufficient to allow Government owned and controlled corporations to pay their debts from their revenues. Lack of prior discussion and approval by the Department of Finance of plans and programs for public
private partnerships and incomplete financial feasibility studies thus result in later requests for approval by the Department of Finance of subsidies or guarantees. National government interventions during implementation then often convert debt service into equity or subsidies. This process also affects line agency forward estimates by omitting Government owned and controlled corporations capital outlays or operations and maintenance requirements.

154. To address these problems, the Department of Finance might consider: (a) issuing guidelines to all agencies, especially Government owned and controlled corporations on the criteria and parameters for the evaluation of the fiscal impact of their projects, including public-private partnership projects, particularly on the potential government financial support and contingent liabilities involved in the construction, operation and maintenance, and servicing of debt for their proposed projects, and (b) strengthening its unit to serve as the clearing house for the fiscal impact of these projects. Government owned and controlled corporations would have to clear their project proposals needing government financial support with the Department of Finance before submitting them to the Investment Coordination Committee of the National Economic and Development Authority.

155. One short term solution to improve the governance of the Government owned and controlled corporations is to let the Department of Transportation and Communication and the oversight Departments coordinate and prioritize the investment programs of their respective Government owned and controlled corporations. This oversight would include at a minimum the assessment and incorporation into budget of any government support for projects initiated by the Government owned and controlled corporations.
7. ENHANCING PUBLIC PRIVATE PARTNERSHIPS

Key Findings
- The Philippines has a long and varied history of public private partnerships. There is a strong reliance on unsolicited proposals from the private sector. This reflects issues regarding project preparation and planning discussed in chapter 5 as well as the lack of clear principles and rules for government involvement in such partnerships.
- One consequence of this is that for many public private partnership projects, risks have not been optimally allocated between the private and public partners.

Key Recommendations
- In the longer run, decisions on public private partnerships could be mainstreamed into a strengthened institutional and procedural framework for planning and budgeting for transport infrastructure, as discussed in chapter 4 above. In the shorter term, the oversight role of the Investment Coordination Committee at the National Economic and Development Authority could be strengthened to confirm project quality, ensure transparency and accountability, and provide fair, professional, and predictable review and approval.
- The reliance on unsolicited public private partnerships should be reduced and the process for assessing such proposals strengthened.
- Human resources could be improved in the public sector to increase capacity to plan, assess, negotiate, monitor and implement public private partnerships. This would include addressing the proper allocation of project risks between the parties to a public private partnership.

FINDINGS

Role of PPP in transport infrastructure in the Philippines

156. **The Philippines has a long and varied history of involving the private sector in financing, operating and maintaining infrastructure in general.** The shift in government policy to rely on private investment for infrastructure development began as a result of the power crisis in the late 1980s and early 1990s. The passage of the Build-Operate-Transfer Law in 1990, the first of its kind in the region, signaled government recognition of private sector expertise and resources in infrastructure provision. To this date the Philippines is very much associated with accommodating private sector involvement in the provision of infrastructure. As a result of the government’s sustained drive to attract the private sector, various private sector infrastructure projects have been undertaken in power, water, toll road, port, air and telecommunication sectors. However as part of the varied history there are high exposure examples of projects (e.g. NAIA 3, MRT 3) that were poorly prepared and implemented.

157. **The government intends to continue to involve the private sector in transport infrastructure provision through Public Private Partnerships and expects that about half of infrastructure projects in urban rail transport will be either privately funded or supported by the private sector.** A number of initiatives would have to be taken to reach this goal. The challenge for the government is to further strengthen the institutional,
regulatory, and fiscal framework as well as human resource capacity in government agencies to empower staff and management to deal with private sector counterparts.

Box 11: Lessons from Europe on Public-Private Partnership

The resource book on public-private partnership case studies of the European Commission (June 2004) analyzes successes and failures in public-private partnership projects across Europe and provides four critical lessons from public-private partnerships. In particular all public-private partnership cases highlight the need for:

1. Rigorous preparation and planning to ensure that the public-private partnership delivers value for money and is sustainable.

2. Sustained political and public sector support to the strategic decisions around the public-private partnership. A public-private partnership is a feasible way to attract private finance to infrastructure but successful public-private partnership projects also need parallel public financing.

3. A conducive legal, regulatory and financial framework supporting the development and implementation of public-private partnership. A public-private partnership should be approached in a comprehensive manner.

4. A true understanding by the parties of the needs and objectives of each other. Quality and costs will depend on this understanding.

Risk transfer lies at the heart of effective public-private partnership design. All cases bear out the general principle that risk should be borne by the party best able to manage its cost most effectively. One element that can be identified is that the greater the financial size of the project, the greater the temptation for risk transfer to the private sector. However this must be supported by sound revenue earning potential allowing the private sector to adopt a higher risk profile. Another lesson from public-private partnerships in transport is that given the complexity between service provision and financial viability it is crucial to correctly estimate project parameters. In transport there are a multitude of examples of unsuccessful projects which failed due to poor demand or cost forecasting. Again, rigorous project analysis, undertaken by the government and by the private operator is therefore essential.

Despite the hard lessons encountered during the initial phase of public-private partnership experiments in Europe, public-private partnerships have become accepted as a complementary implementation tool. The application of public-private partnership principles has grown over recent years as the advantages of blending private sector resources and skills with the public ones has become evident. It has also become clear that public-private partnership architectures are complex and that such projects require a detailed understanding of their design and implementation features.


Risk Allocation

A principal benefit of public-private partnerships is a division of responsibilities that allows both parties to a project to be responsible for those risks they are best suited to manage. Risk management in infrastructure agreements with the private sector requires considering each party’s capacity to influence the outcome and their capacity to bear and manage the risk. Typically it is assumed that the public sector is in a better position to mitigate political and regulatory risks whereas the private sector is better able to mitigate demand, commercial, performance and financial risks. Table 17
below maps a range of risk allocations under selected significant public private partnership projects in the Philippines.

Table 16: Allocation of Risks Under Proposed and Ongoing Public-Private Partnerships

<table>
<thead>
<tr>
<th>Project</th>
<th>Political and regulatory Risk</th>
<th>Demand risk</th>
<th>Commercial Risk</th>
<th>Performance risk</th>
<th>Financial risk</th>
</tr>
</thead>
<tbody>
<tr>
<td>Metro Rail Transit Project</td>
<td>Government</td>
<td>Government</td>
<td>Government</td>
<td>Government</td>
<td>Government</td>
</tr>
<tr>
<td>Line 7 (unsolicited)</td>
<td>Government</td>
<td>Private Proponent</td>
<td>Private Proponent</td>
<td>Private Proponent</td>
<td>Private Proponent</td>
</tr>
<tr>
<td>Line 1 extension (solicited)</td>
<td>Government</td>
<td>Private Proponent</td>
<td>Private Proponent</td>
<td>Private Proponent</td>
<td>Private Proponent</td>
</tr>
<tr>
<td>Tarlac – La Union Toll road</td>
<td>Government</td>
<td>Private Proponent</td>
<td>Private Proponent</td>
<td>Private proponent / government</td>
<td>Private proponent / government</td>
</tr>
<tr>
<td>Metro Manila Skyway I</td>
<td>Government</td>
<td>Private proponent</td>
<td>Not applicable</td>
<td>Private proponent / government</td>
<td>Private proponent / government</td>
</tr>
<tr>
<td>North Tollway</td>
<td>Government</td>
<td>Private proponent</td>
<td>Not applicable</td>
<td>Private proponent / government</td>
<td>Private proponent / government</td>
</tr>
<tr>
<td>Southern Tagalog Arterial Road</td>
<td>Government</td>
<td>Private proponent</td>
<td>Not applicable</td>
<td>Private proponent / government</td>
<td>Private proponent / government</td>
</tr>
</tbody>
</table>

159. **For some toll road projects, risks were effectively shared.** The government assumed the political risk (non-impairment of contract, “force majeure”) and the regulatory risk (tariff adjustment for inflation and foreign exchange). The private operator assumed the demand risk (insufficient traffic), the commercial risk (supporting commercial ventures producing insufficient revenue), the performance risk (technical failures in construction and operations and management), and the financial risk (interest payments). The government bore some performance and financial risks through its commitment to providing rights-of-way, normal for build-operate-transfer or public-private contracts. The right-of-way obligation includes the removal and compensation of any informal settlers and the timely delivery—free of any obstructions or encumbrances—of the required right-of-way to the private partner.

160. **However, in some high exposure cases the distribution of risk has been inappropriate.** For example, for Metro Rail Transit System 3, the government assumed all of the risks through guarantees on the private company’s debt and a fixed payment stream to the private developers. That stream does not change even if the project’s annual revenues are far from the initial overly optimistic assumptions. The use of different rates of return in different parts of the private developer’s capital structure, despite identical risk (the government’s credit risk), points to a mis-pricing of the risks. Even completed projects have created significant budgetary problems, leaving the government holding the
liabilities for poorly designed projects. The result has been a steady increase in budgetary costs to complete a contract.

**Box 12: Risk sharing in Metro Rail Transit Project 3 (MRT-3)**

**Political and regulatory risk.** In December 1999 low ridership for MRT-3 (60,000 per day) was determined to be due to the perceived high fares (17–34 pesos per passenger). The government reduced fares to 12–20 pesos in February 2000 and to 9–15 pesos in July 2000. Ridership increased to 180,000 per day and reached 368,000 in 2006. The current fare is 21 percent of the break-even fare of 60.53 pesos per passenger to cover operations and maintenance (including rental fees to the build-lease-transfer contractor and debt servicing), and 61 percent of the 20.42 pesos fare on air-conditioned buses.

**Demand risk.** Under the MRT-3 build-operate-transfer contract, the government guarantees the revenue of the private operator, regardless of expected ridership, throughout the life of the project.

**Commercial risk.** The MRT-3 project viability was designed to be highly dependent on proposed commercial development, but actual revenues have not supported optimistic expectations.

**Performance risk.** A provision for liquidated damages was included to ensure that the MRT-3 project would be completed as required. Subsequent amendments, however, extended the completion date and resulted in zero liquidated damages, despite delays beyond the new completion date.

**Financial risk.** The government assumed all financial risks associated with MRT-3, guaranteeing: (i) monthly equity rental payments calculated to give the contractor an Internal Rate of Return of 15 percent over 25 years on its equity investment of USD179 million; (ii) semi-annual debt rental payments matching the interest and principal owed on three loans of the contractor totaling USD500 million; (iii) monthly maintenance rental payments to cover the costs of the maintenance contract, adjusted for inflation and changes in input prices: USD1.2 million monthly from July 2000, USD1.38 million from July 2004, USD1.43 million from July 2005, and so on until 2010; (iv) contractor staffing and administration costs of USD500,000 per year and other expenses of about USD18.7 million a year.

Source: World Bank staff 2008

**Outcomes**

161. The quality and outcomes of many build-operate-transfer deals have been poor and/or many potential deals have failed, ending up in renegotiations or running into contractual problems. The south extension of the Light Rail Transit Authority’s Line 1 is an example of a potential public-private project involving risks that has resulted in delays, a long project cycle, and deferred service delivery. The efforts to launch the project with private finance are discussed in the box below.

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61 Project cycle refers to the period of time required to identify, tender, award, and monitor a public private partnership contract.
Box 13: The Light Rail Transit Authority Line 1 Extension

In September 2000 the Light Rail Transit Authority entered into an unsolicited joint venture agreement with SNC-Lavalin International, Inc. (SNC) to build a 12-kilometer, 10-station extension of Light Rail Transit Line 1. As a point of departure there was very little design and construction detail other than a broad description and the technology to be used. Fifteen months later SNC agreed to finance, design, and build the civil works and to finance, procure, and install the electromechanical and other systems works. It also agreed to be responsible for the light rail vehicle fleet and workshop. The Light Rail Transit Authority would be responsible for operations. However, the Light Rail Transit Authority did not obtain the government guarantee for its portion of the civil works payment, and SNC presented a notice to terminate the joint venture.

Almost four years later, the parties signed an amended agreement that complied with Build Operate Transfer Law, but the government did not agree to the additional financial support required:

(a) Project revenue guarantee for debt service and equity returns.
(b) Payment of fees required to obtain commercial financing.
(c) Revolving line of credit to back-stop the project revenue guarantee.
(d) Guarantee from the Light Rail Transit Authority for systems integration between the existing Light Rail Transit Line 1 and the extension.
(e) Maintenance payments from the Light Rail Transit Authority to SNC.

The additional security for loans to finance the extension may have been due to the Light Rail Transit Authority’s financial history. In 2004 it had operating losses of 19.4 million pesos and 83.6 million pesos in 2005, with 34.7 billion pesos of outstanding debt.

The lesson is that as more information becomes available and risks become better quantified, the negotiating parties’ expectations change. As the private party learned more about project risks (it took six years to complete the studies), it required a substantial increase in government financial support. In the end, it cost the government several million dollars to terminate the agreement, funds that could have been used for detailed feasibility studies and preparation of a request for proposals with concession agreement to share project risks.

Planning and project selection

162. The planning and procurement framework for private provision of infrastructure and related services suffers from the same challenges as projects funded and managed by the public sector on its own. A large share of private infrastructure projects has been the result of unsolicited proposals from interested private sector promoters. The temptation to accept such proposals is great, particularly if it is suggested that there will be no budget burden. But these proposals carry serious risks.

(a) They may not fit with other developments under consideration and overall infrastructure development plans.

(b) They have typically been pursued through direct negotiations with the soliciting counterpart on the private side with no competitive test that the public sector is getting good value from the arrangement.

(c) Supporting analyses offered by the promoting parties have been biased and solid fiscal impact analyses have not been undertaken.

163. The current institutional arrangement for planning and assessing public private partnerships does not facilitate a proper processing of unsolicited proposals. Delays in implementation have changed the need for government financial support over
the project cycle as more detailed construction, operating, and service demand forecasts become available. The delays have a variety of interconnected causes including:

(a) Shortcomings associated with unsolicited public-private partnerships and the accompanying private sector and government expectations.
(b) Changing government awareness about project risks and their need for government financial support as the projects progress.
(c) Inadequate initial feasibility studies (whether public or private) to identify risks from design, construction cost, resettlement, regulations, government budget allocation, and the like—and the lack of a rigorous competitive process.

Capacity

164. The identified problems suggest that the Build Operate Transfer implementing agencies may not be in a position to properly assess risk, or to structure large Build Operate Transfer projects in line with good practice. It also suggests that the oversight bodies need additional capacity. The third Metro Rail Transit Project (MRT-3), the Light Rail Transit Authority Line 1 extension (LRTA-1), and the Philippine National Railways commuter project demonstrate the financial consequences from lack of competition in project selection.

165. In practice, if subsidiary agencies are not adequately skilled, decentralization and devolution might hinder infrastructure development, rather than promote it. Fewer bankable projects could mean even more reliance on scarce public resources. The main concern is thus that some agencies have neither the capacity nor resources to prepare sound, viable projects that can be brought to the market.

Policy and Regulatory framework

166. The policy and regulatory framework for public private partnership projects was reviewed by a recent study undertaken under the Philippine-Australia Partnership for Economic Governance Reform (PfGGR)\textsuperscript{62}. The PfGGR report states that there are significant delays in progressing public-private partnership toll road projects and identifies the main factors for the delays as a combination of inadequate preparation and institutional complexity. For instance, feasibility studies are inadequate or not complete, the entry to the toll road market is confusing and fractured (i.e. three entry points: the Build Operate Transfer law, Toll Regulatory Board, and charters of Government owned and controlled corporations), right of way acquisition is only undertaken after the award of the concession, the overall road network planning is often ignored\textsuperscript{63}, the institutional complexity around the Philippine National Construction Corporation and the legal status of that entity and the many unsolicited bids and proposals by Government owned and

\textsuperscript{62} Policy Improvement and Capacity Enhancement for Infrastructure Development-PPP Framework for Toll Roads, May 2007, the Philippines Australian Partnership for Economic Governance Reform Facility

\textsuperscript{63} The Department of Public Works and Highways is an exception as its PPP projects are based on road network studies conducted by the Government beginning in 1985 with the Luzon Expressway Systems. Subsequent toll road projects were identified or based on donor-supported technical assistance, e.g., a JICA-assisted Metro Manila Urban Expressway Study was the basis for pursuing the Skyway project and the WB-assisted Metro Manila Urban Transportation Integration Study was the basis for the CALA tollways project.
controlled corporations through non-transparent joint ventures are more usual practice than the exception are all negative factors for causing delays or are hurdles for developing sound public-private partnership toll road projects.

167. The same study undertaken by the Philippine-Australia Partnership for Economic Governance Reform suggests establishing clear policy principles and the most important principle is that competitive tendering of public-private partnership projects should be the norm and the unsolicited approach should be discouraged. The Philippines-Australian Partnership for Economic Governance Reform also recommends institutionalizing one entry point for toll road projects. The entry point would be through the Build Operate Transfer law with the Department of Public Works and Highways, which would then evaluate projects on the basis of road network planning. The packaging of a toll road project should be completed before it goes to the market for bidding. In this context the role of Toll Regulatory Board should be clarified and develop towards becoming the toll road concession oversight agency.

Box 14: Unsolicited Proposals for Infrastructure

In many countries, private sector companies submit unsolicited proposals for infrastructure projects. While these proposals may fit with government objectives, they can also be open to corruption, or the public perception of corruption, if not reviewed properly. At the same time, it is generally in governments’ interest to encourage private sector innovation. A key policy decision is whether to accept any unsolicited proposals or not. Government officials will probably be under political pressure to consider at least some proposals – given this, it is best to have an established process for reviewing proposals, even if the government is not planning to accept many. There is significant variation among countries that accept unsolicited proposals: South Korea accepted 101 projects out of 141 between 1999 and 2006, while Taiwan only accepted 29 out of 193 projects between 2002 and 2006.

Figure 26: Good Practice for Managing Unsolicited Proposals

Good practice for managing unsolicited proposals involves a two-stage process that helps to ensure transparency and allows for competition. First, government officials review incoming proposals against a
set of criteria that usually includes how well projects fit with existing priorities and plans and whether they serve the public interest. In the second stage, the government requests competitive bids for the operation of approved projects. Some governments give a priority or “bonus” to the company that submitted the original idea, offers that company the right to produce a counter-offer after seeing better offers, or provides an opportunity for an additional round of bids for the original proponent and the top bidder. In addition, governments may offer to reimburse some proposal development costs to encourage competition. Within the review process, the government would allow enough time for challengers to understand the project and prepare proposals, but may want to limit the time allowed for the preliminary stage to screen out inappropriate bidders. The timeline between the initial approval of the project and the opening of competitive bidding should not be too long, so that the original proponent does not have excessive time ahead of other bidders. There should also be enough time for the counter-offer period so that bidders can conduct due diligence and develop appropriate business and financial plans.

There are reasons why a government may want to avoid a public bid: the process may be costly or slow, or the project proponent may have intellectual property rights that make the company uniquely qualified to undertake the project. However, even if only the original proponent bids on the project or the timeline is short, an open, publicly-advertised bidding process can significantly improve public perception of the process and increase transparency. There are also ways to avoid some of the other problems associated with competitive bidding. For example, in cases where a company claims to have intellectual property rights over the best method for completing the project, the bidding process can specify outcome requirements rather than a specific technology, so that if others have different technologies that would be equally effective they have the opportunity to compete. In addition, competition may increase the government’s leverage over the proponent and reduce the price of the project. While the bidding and review processes may be time-consuming, especially when the process is first established, once the process is systematized it does not take excessive time – and may end up saving both time and money if the bid process allows for sufficient competition, which should improve quality and reduce costs.


168. A recent analysis of the current Build Operate Transfer Law indicates that there is a need to update and/or amend it to address the various issues at each stage of the project cycle, from entry level to implementation and eventual completion64. Line Departments still lack the capacity for project identification and preparation. This is an area where the Infrastructure Committee of the National Economic and Development Authority has an important role to play. The Infrastructure Committees mandate is to advise the President and the Board of the National Economic and Development Authority on matters concerning infrastructure development. The Infrastructure Committee is meant to set policies and programs consistent with national development objectives and to assist line agencies in the identification and prioritization of projects for government and public private partnership support. The Infrastructure Committee, in coordination with the infrastructure line Departments and the secretariat of the National Economic and Development Authority, formulates and approves the criteria to be used in the Medium Term Public Investment Program/Comprehensive Integrated Infrastructure Program prioritization process. However, the Medium Term Public Investment Program has not been fully operationalized by the line Departments, leading to incomplete ranking and no prioritization of projects. The lack of project identification and prioritization has resulted in an uneven application of the Build Operate Transfer process/law. This has opened up opportunities for the private sector to come forward with its own priority projects. As a

64 USAID, A proposed BOT Bill to Enhance Public-Private Partnership in Infrastructure Development, 2006
result, a very large number of unsolicited proposals are being submitted to the Investment Coordination Committee. It appears that many of these unsolicited proposals are attempts to circumvent competitive bidding and to delist projects from the original list that were originally planned for competitive bidding. This trend needs to be reversed; if not, the BOT law will become irrelevant.

169. A very recent development in addition to this trend of undercutting or circumventing the competitive bidding principle of the BOT law is the application of recently issued Guidelines and Procedures for Entering into a Joint Venture Agreement between Government and Private Entities (2008). The principle of competitive bidding under these Joint Venture Guidelines has not been fully tested and not yet been validated. In this context, the rationale for having these Joint Venture Guidelines is not evident, given the fact that a mature (perhaps not perfect) BOT Law already exist.

RECOMMENDATIONS

170. If public-private partnerships are to be a cornerstone of transport infrastructure provision, three areas of reform could be considered. These recommendations can be initiated in the short term and at limited cost, but are likely only to be effective in the medium term as capacity is built and experience is generated.

171. The institutional framework could be strengthened.

(a) In the longer run, decisions on public private partnerships could be mainstreamed into a strengthened institutional and procedural framework for planning and budgeting for transport infrastructure as discussed in chapter 5 above.

(b) Specifically and in the shorter term, the oversight role of the Investment Coordination Committee at the National Economic and Development Authority could be strengthened to confirm project quality, ensure transparency and accountability, and provide fair, rational, and predictable review and approval. The government could consider guiding the implementation of public private partnerships through a dedicated unit that transfers knowledge and best practice to government users. Such a unit would be most effective in an oversight agency, and an obvious candidate for such a unit would be the National Economic and Development Authority.

(c) The Government should establish as its principal policy that the solicitation and bidding of PPPs can only be done on a competitive basis, and in line with this policy should no longer accept unsolicited proposals.

172. Human resources could be improved in the public sector to increase capacity to plan, assess, negotiate, monitor and implement public private partnerships. The project development capability of the implementing agencies needs to be strengthened to give them greater responsibility and ownership of their priority projects—particularly important if solicited Build Operate Transfer projects are to become the norm rather than the exception. In this vein the Department of Finance could issue guidelines to line agencies and Government owned and controlled corporations on processes and criteria to
be adopted in evaluating the fiscal impact of public private partnerships. The guidelines could address assigning risks, selecting the appropriate procurement modality, and preparing tender documents to reflect these concerns.

173. **Risk analysis could be strengthened.** There is no objective, scientific rule or criteria for risk sharing in public private partnerships. It is difficult to identify, allocate, and quantify risks to be shared by the public and private sectors, and these risks vary from project to project. Allocating risks to the government can improve outcomes if the government identifies and responds to financial incentives from contingent liabilities. But governments are widely regarded as less responsive to such incentives than private organizations. Infrastructure operators will often be best placed to influence returns through their performance, so it is appropriate that they bear some responsibility for managing the risk. The Department of Finance must develop or adapt a project appraisal methodology for public and project finance.

**Box 15: Factors for Successful Public Private Partnership Arrangements**

- **Contractible service quality.** This requires that the government clearly specify the quality of services it wants and translate that into measurable indicators incorporated in a contract that links payments to delivery.

- **Well prepared, bankable projects.** Governments have often taken projects to the market with inadequate project development and preparation or a weak rationale. To provide the best environment for public-private partnership projects, the government side needs to ensure that projects are based on strong justifications, including government priorities and economic rationales; that sound, comprehensive technical and commercial feasibility studies are undertaken on a whole-of-life basis; that bidding is well documented, well managed, and transparent; and that the legal, financial, commercial, and technical advice is incorporated.

- **Competition or incentive-based regulation.** Open bidding for contracts should be common practice, providing an opportunity to foster competition and to ensure formal commitment of concessionaires to the contract terms. Regulation also limits monopoly profits and protects consumers.

- **Adequate commercial risk transfer from the government to the private sector.** This measure is crucial to getting the full benefit from an inflow of private capital and a change in management. Note that sustainable public-private partnership projects are not about maximum risk transfer. Rather, they are long-term contractual relationships between the public and private sectors based on allocating risks to the party best able to manage them.

- **Better monitoring is an essential complement to control policies.** The steady recent build-up in arrears highlights another need: more proactive monitoring—on a continuing basis—of the government’s payment obligations from build-operate-transfer projects. At best, such monitoring is an annual budgeting exercise, and even this procedure does not always function well.
8. IMPROVING PROJECT MANAGEMENT IN THE ROAD SECTOR

Key Findings
• There are a number of indications that project preparation and management can be strengthened in maintenance and construction of road infrastructure. Indications include cost increases, defects, delays and over-staffing.

Key Recommendations
• Project management improvements could be included in a modernization program for the Department of Public Works and Highways. The possible reform agenda remain tall and would need careful sequencing adapted to reform capacity.

FINDINGS

Project Cost Overruns

174. Cost increases are a major concern for all road works in the Philippines. The National Economic and Development Authority monitored 15 major foreign-assisted projects from 2004 to 2006, with an original aggregate cost of 58.9 billion pesos. These projects incurred an average cost overrun of 47.3 percent. The 15th oversees development assistance portfolio review in 2006 by the National Economic and Development Authority shows that implementing agencies’ most cited reasons for these overruns are: (i) additional civil works (changes in scope/variation orders and supplemental agreements); (ii) increases in right-of-way/resettlement costs; (ii) increases in unit costs of labor, materials, and equipment; (iv) high bids above the approved budget for the contract; (v) currency exchange rate movements; and (vi) claims for price escalation.
### Table 17: Cost Overruns of Overseas Development Assistance-Financed Projects, 2004–2006, Million pesos and %

<table>
<thead>
<tr>
<th></th>
<th>Number of Projects</th>
<th>ICC-approved project cost</th>
<th>Revised project cost</th>
<th>Increase in project Cost</th>
<th>Cost overrun (percent)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Energy</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Generation</td>
<td>1</td>
<td>6,880.5</td>
<td>7,836.0</td>
<td>955.5</td>
<td>13.9</td>
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<tr>
<td>Transmission</td>
<td>1</td>
<td>551.0</td>
<td>862.3</td>
<td>311.3</td>
<td>56.5</td>
</tr>
<tr>
<td></td>
<td>1</td>
<td>2,171.7</td>
<td>3,341.6</td>
<td>1,169.9</td>
<td>53.9</td>
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<tr>
<td><strong>Transport</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>National roads</td>
<td>6</td>
<td>34,212.2</td>
<td>53,044.1</td>
<td>18,831.9</td>
<td>55.0</td>
</tr>
<tr>
<td>Feeder ports</td>
<td>1</td>
<td>1,915.7</td>
<td>2,245.7</td>
<td>330.0</td>
<td>17.2</td>
</tr>
<tr>
<td><strong>Irrigation</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>1</td>
<td>1,304.4</td>
<td>2,271.6</td>
<td>967.2</td>
<td>74.2</td>
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<tr>
<td><strong>Flood control</strong></td>
<td>4</td>
<td>11,953.9</td>
<td>17,281.9</td>
<td>5,328.0</td>
<td>44.6</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>15</td>
<td>58,989.4</td>
<td>86,883.2</td>
<td>27,893.8</td>
<td>47.3</td>
</tr>
</tbody>
</table>

Source: Project Monitoring Staff from the National Economic and Development Authority, May 2007.

175. **Excessive variation orders are a common source of spending overruns, especially for foreign-assisted projects.** According to records in the Department of Public Works and Highways, 15 of 37 foreign-assisted contracts completed in the last three years incurred variation orders of more than 10 percent of the original contract cost. The accepted norm of accuracy for detailed engineering is 10 percent—the limit for variation orders under Republic Act 9184/IRR-A and Department Order 204 (dated 28 October 2004). Many of the variation orders extended beyond the contract’s original scope of work. Others were issued to cover physical conditions significantly different from those in the engineering designs—either because the engineering was done years ago and project conditions have changed (further pavement deterioration, for example) or, worse, because the engineering was done so poorly that the designs failed to capture the actual conditions (soil properties, for example).

### Efficiency

176. **The efficiency of the Department of Public Works and Highways can be improved even further.** The Department of Public Works and Highways employs about 35,000 workers of which about 70 percent are deployed to manage the national road network of 29,000 kilometers. The staff level has not changed much despite the recent reduction in the road program, particularly after the devolution of the responsibility for local roads. This translates to a ratio of one employee for every 1.2 kilometers of national roads, which appears very low compared to other countries. The Philippines’ recent rationalization program, discussed below, is intended to increase the productivity of the Department of Public Works and Highways.

177. **Much progress has been made in developing technical and financial information systems for reforming the Department of Public Works and Highways’ internal business processes.** Agency performance indicators have been developed, and some are already in use. Most of the road infrastructure surveys have been completed, and road and bridge information applications have been developed, including infrastructure performance indicators that generate reliable data for decision making. Land acquisition procedures have been developed, with implementation and staff training ongoing. A new contractor billing systems has reduced the average time to pay contractors from 69 days to 30. A modern accounting system, already being used in the
central office and several regions, is being rolled out to the other regions. A traffic accident recording and analysis system is currently being implemented. While a multiyear network planning and programming system was to be in operation by July 2004, the system can be fully operational only after the collection of traffic data, significantly delayed due to technical and administrative factors. A computerized registry of contractors and screening of contractors’ eligibility is now operational; standard and streamlined contract and procurement documents have been prepared. In parallel, human resource capacity is being strengthened to handle the new systems. A plan for the financial and technical sustainability of the new systems, yet to be developed, is critical for success.

Box 16: The Department of Public Works and Highways’ Planning Systems

The significant improvements achieved in the road planning systems of the Department of Public Works and Highways are part of a larger program initiated in the mid-90s under the Road Information and Management System (RIMSS). The Department of Public Works and Highways management understood at that time that, to effectively deal with the planning and management of some 29,000 km of national roads and address the pressures to provide better service at reduced costs to road users, a new strategic approach to road planning and development was needed. This would require (a) emphasis on customer needs, (b) focus on re-engineering the most important processes in the planning and delivery of road services, (c) identifying and prioritizing opportunities to reduce costs and improve efficiency and effectiveness, and (d) use of technology to enable these steps to be taken.

To improve past practices, the Department of Public Works and Highways introduced a new road planning process which is embodied in a Highway Planning Manual (HPM) and involves the following phases: (a) strategic analysis, (b) development of highway network scenarios, (c) development of long-term plan, and (d) preparation of multi-year program and annual program. To implement the new road planning process, over the years since 2001, the Department of Public Works and Highways has developed, installed, and employed the following planning tools and systems, as embodied in the HPM:

- Road and Bridge Information Application: This is the main database on road network inventory and conditions used for the planning and programming processes, e.g. HDM-4, PMS, BMS, etc.
- Road Traffic Information Application: This is the repository of traffic and axle load data used for traffic demand projections and project analyses.
- Pavement Management System: This is a set of tools to find optimum strategies for providing and maintaining pavements in a serviceable condition.
- Highway Development and Management Version 4: This generates optimum short, medium and long-term programs for given budget constraints, including objective prioritization of investments in asset preservation and network development.
- Bridge Management System: This is a system to monitor and record the condition of bridges and to program and rank bridge asset preservation and development works.
- Routine Maintenance Management System: This is a tool for estimating and managing routine maintenance resources for roads and bridges to meet specified results.
- Traffic Accident Recording and Analysis System: This stores and processes data on road traffic accidents to identify blackspots and prioritize road safety measures.
- Multi-Year Programming and Scheduling System: This tool, together with Multi Criteria Analysis, generates multi-year programs as the basis for the medium-term and annual programs.
- Multi-Criteria Analysis: This tool gives value to other criteria aside from economic indices - e.g. project preparedness, environmental and social impact, road network importance, and economic and social development policy.
- Other Planning Systems and Tools: These include (a) Environmental Impact Analysis, (b) Social Impact Assessment, (c) Right-of-Way Acquisition and Resettlement Action Plan, and (d) road classification system, among other planning systems/tools.
The use of the PMS/HDM-4 planning tool and road upgrading criteria have been recognized in the law: the 2008 GAA requires them to be used as the basis for allocating Php 10.1 billion for the rehabilitation of damaged paved national roads and Php 8.0 billion for the upgrading of gravel roads to concrete roads.

Source: Department of Public Works and Highways

178. **Competitive procurement of maintenance has been a positive step.** Preventive maintenance program costs (about P4 million per kilometer) showed significant savings under competitive procurement between 2000 and 2002 but costs have subsequently risen. Investment costs, covering rehabilitation and new construction, have fallen in real terms since the 1990s through stricter procurement and contract management, but significant cost increases are again evident. Resources from the Special Road Fund were sometimes used to finance labor-intensive jobs programs.

**Quality**

179. **The number of quality defects per project remains high, as reported by the Quality Assurance Units in the Department of Public Works and Highways.** A JICA-assisted study from November 2005–January 2006 showed that in many cases, the Department project manager/engineer/supervisor was aware of the regulations on construction management but was lax or negligent in enforcing them because he did not seem to appreciate the importance of the regulations and their likely effects on the roads if he/she neglected them. The same was true of road maintenance. This was attributed mainly to:

(a) Inadequate manuals.

(b) Insufficient training.

(c) Inadequate incentives and sanctions.

(d) Inadequate equipment and budget for inspection.

(e) Undue external/political influence in some cases.

**Delays**

180. **As in most countries, implementation delays in transport infrastructure projects are frequent.** Energy and airport projects have the worst record for project delays, taking almost twice the targeted time to complete (Table 19). National roads and ports projects fare better but still take 50 percent over the targeted time. For 2004–2006, the National Economic and Development Authority reported 24 foreign-assisted projects with original average implementation periods (loan durations) of 67.1 months that entailed delays (loan extensions) averaging 31.9 months—or 47.5 percent per project. The 14th Official Development Assistance (ODA) review identified a number of issues contributing to delays:

(a) Insufficient appropriation and delayed releases of special allotment release orders.
(b) Procurement delays of up to 35 months, against a prescribed 3.2 months.

(c) Insufficient right-of-way acquisition, particularly in providing ample funding.

(d) Increased costs.

Table 18: Delays in Foreign-Assisted Projects, 2004–2006

<table>
<thead>
<tr>
<th></th>
<th>Number of projects</th>
<th>Average original loan effectivity (months)</th>
<th>Average loan extension (months)</th>
<th>Delay (percent)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Energy</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Generation</td>
<td>1</td>
<td>60.0</td>
<td>48.7</td>
<td>81.2</td>
</tr>
<tr>
<td>Transmission</td>
<td>3</td>
<td>66.7</td>
<td>60.1</td>
<td>90.1</td>
</tr>
<tr>
<td><strong>Transport</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>National roads</td>
<td>11</td>
<td>55.6</td>
<td>24.2</td>
<td>43.5</td>
</tr>
<tr>
<td>Airports</td>
<td>1</td>
<td>67.0</td>
<td>60.0</td>
<td>89.6</td>
</tr>
<tr>
<td>Ports</td>
<td>1</td>
<td>72.0</td>
<td>36.0</td>
<td>50.0</td>
</tr>
<tr>
<td><strong>Irrigation</strong></td>
<td>5</td>
<td>79.1</td>
<td>25.2</td>
<td>31.9</td>
</tr>
<tr>
<td><strong>Flood control</strong></td>
<td>2</td>
<td>102.0</td>
<td>24.0</td>
<td>23.5</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>24</td>
<td>67.1</td>
<td>31.9</td>
<td>47.5</td>
</tr>
</tbody>
</table>

Source: Project Monitoring Staff of the National Economic and Development Authority, May 2007

Absorptive capacity

181. The low absorptive and technical capacity of the agencies and Government owned and controlled corporations are a constraint to the efficient implementation of infrastructure projects. In 2005, the Department of Public Works and Highways implemented 10,517 projects, including 750 farm-to-market road projects for the Department of Agriculture and the Department of Agrarian Reform. The Department of Public Works and Highways disbursed only about 70 percent of the funds under its budget that year (P25 billion of P37 billion). Part of this workload consisted of congressional allocation projects worth P6–16 billion a year; many of these projects, numbering several thousand, were identified late in the year and subjected to numerous realignments. Despite this, the Department of Public Works and Highways improved its disbursement rate (disbursed/released) to 80 percent in 2006 (Table 20). In 2007, however, the Department of Public Works and Highways disbursement rate declined to 66 percent as funds actually released exceeded the budget by 51 percent, a substantial part of which went to special projects with inadequate engineering. The Department of Transportation and Communications disbursed only 67 percent of the funds released to it in 2006.

182. While weak planning and management systems may lead to delays, cost overruns and poor quality, solutions in this area will only improve performance when they operate within institutions that are directed towards performance. In some cases, institutions may be directed toward rent-seeking, and in these cases technical solutions that improve management systems will only address part of the problem.
Table 19: Capacity to Execute, 2006

<table>
<thead>
<tr>
<th>Department of Public Works and Highways (roads, flood control)</th>
<th>% Disbursed/Budgeted</th>
<th>% Released/Budgeted</th>
<th>Disbursement Rate (% Disbursed/Released)</th>
</tr>
</thead>
<tbody>
<tr>
<td>% Disbursed</td>
<td>62.6</td>
<td>74.0</td>
<td>79.9</td>
</tr>
<tr>
<td>99.6*</td>
<td>150.6*</td>
<td>66.1*</td>
<td></td>
</tr>
<tr>
<td>Department of Transportation and Communications (airports, ports, rail)</td>
<td>88.9</td>
<td>133.1</td>
<td>67.3</td>
</tr>
</tbody>
</table>

Note: Figures with asterisks are for 2007.
Source: Department of Budget and Management, the Department of Public Works and Highways, and Department of Transportation and Communications

RECOMMENDATIONS

183. **Current reform efforts aiming at improvements in the institutional set-up and project management practices in the Department of Public Works and Highways could be deepened.** Over the last five years, progress has been made through the various business and institutional reforms, including modern road planning and management systems and tools, under the Road Improvement and Management System (RIMSS), as discussed in Box 18. Some of these systems and tools need to be further enhanced and rolled out to the field units to improve the use of road funds and the delivery of road services - such as the road and traffic databases, Pavement and Bridge Management Systems, Routine Maintenance Management System, Road Safety Audit, electronic New Government Accounting System including the budget module, and internal audit. It would also be necessary to pursue the centrally programmed preventive maintenance program and through piloting long-term performance-based contracts that provide comprehensive management of long sections of roads. Expanding and institutionalizing these approaches, including staff capacity enhancement, could be considered to address issues of delay, quality, efficiency and cost overruns.

184. **Further measures are required to tighten project management, including quality assurance.** To assure that projects are implemented according to approved plans, budgets, and schedules, the Department of Public Works and Highways could carry out the following:

(a) Stricter construction and maintenance supervision to enforce compliance with specifications, budgets, and schedules—with prompt action on slippages and other problems.

(b) Establishing a performance management system that will give incentives for good-performing project managers—and sanction poor performers. This step could be supported by performance/project audits by an independent group of international or local experts.

(c) Developing manuals on construction management and road maintenance inspection.
(d) Training and accrediting construction project managers/engineers and road maintenance inspectors.

(e) Creating and training more quality assurance units.

185. A system of official acceptance of completed projects could be considered. Upon project completion, implementing agencies would secure from project developers a certificate of acceptance/rejection from the project end users and stakeholders. The requirements would be agreed on during project design. This will increase the ownership of the facility by the end user and facilitate later maintenance. The Department of Public Works and Highways could provide guidelines and assistance in setting up the acceptance testing for end users and stakeholders for each contract.

186. A quality review and assurance system for engineering designs and estimates is required in the Department of Public Works and Highways. The system will help prevent padding of design quantities and cost estimates and minimize future variation orders, thereby reducing corruption and collusion. The system could provide, along with the computerized Cost Estimation System (CES), the parameters for preparing approved budgets for contracts. The quality assurance system is expected to result in benchmarking of bids of comparable size and complexity over time—and to stabilize bids close to or under the approved budget. The Department of Public Works and Highways also needs to be supported in its efforts to develop capacity in and institute, as part of normal operating procedure, value engineering as a tool to evaluate alternative design schemes, prevent overdesigning, and determine the least cost or most cost effective scheme to achieve the project functions.

187. Construction supervision could be outsourced. To relieve the project supervision burden of in-house staff of the Department of Public Works and Highways, some (but not all) of construction supervision, particularly for locally funded projects, could be considered for outsourcing to private consultants. This step could be taken both for the central and district offices. It will also require building management capacity for planning, fund allocation, project execution, and financial management—and strong internal controls and result-evaluation methodologies.

188. The Department of Public Works and Highways could make more use of existing public- and private-sector capacity. The Department of Public Works and Highways and other line agencies might agree with the Philippine Constructors Association and the National Constructors Association of the Philippines to develop measures that will enable the contractors to improve their performance. The Department could package contracts to attract the private sector, encouraging—where possible—simultaneous work by several contractors and emphasizing performance-based contracts. The Department of Budget and Management could look for ways to ensure that payments to contractors are made promptly to avoid delays being factored into contract prices and to sustain contractors’ cash flow requirements.

189. Improving the usefulness of the Constructors’ Performance Evaluation System (CPES) would raise the quality of the project life cycle. Coordinating with the Construction Industry Authority of the Philippines, the Department of Public Works and Highways might strengthen the Constructors’ Performance Evaluation System to more
precisely reflect the quality of the contractor’s work. The Department could use the System rating in pre-qualification or eligibility screening, post-qualification and contract award, monitoring of works, remedial measures to correct defects, issuance of certificates of completion, blacklisting, and incentives/recognition. The System results may also be used in designing appropriate plans to enhance the capability of constructors.

190. **Road maintenance by contract (MBC) could be extended and Long-term Performance-Based Maintenance approach can be scaled up.** The Department of Public Works and Highways could incrementally increase maintenance by contract for at least 70 percent of the road maintenance budget in 2007, increasing to 80 percent in 2008 and 90 percent in 2009. The Department is considering increasing the number of Long-term Performance-Based Maintenance contracts.

191. **Community beautification, though worthwhile, could be considered separately from road maintenance and funding should not be provided from the maintenance budget.**

192. **To address rampant vehicle overloading, which leads to fast deterioration of roads, the Department of Public Works and Highways could improve its capacity to control transport weight.** Studies of the Department show that overloading takes place everywhere, with truckers blatantly flaunting the law to an extreme degree. About 11 percent of the 3-axle trucks were overloaded and 12 percent of the 4-axle semi-trailers were overloaded. Given this problem, the Philippine-Australia Partnership for Economic Governance Reform (PEGR) is currently undertaking a study to recommend a regime within which the problem of truck overloading within the Philippines can be addressed. The project has identified the following issues that are the leading cause of ineffective enforcement of overloading restrictions:

- The current maximum axle load limit of 13.5 metric tons — already higher than in most developed and developing countries
- The current operations of the Department of Public Works and Highways are not able to enforce the legal axle load limit due to aging equipment, sites not on strategic network, personnel not permanently employed, lack of security and staff of the Land Transportation section of the Department of Transportation and Communications at sites.
- Penalties too low and not deterring abuse of the law.

193. **The conclusion in the study is that the public sector cannot handle the maintenance and operation of the weighbridges.** The government might consider the solution proposed by PEGR that (a) the private sector take over operations through build-operate-maintain contracts, and (b) the Department of Public Works and Highways remain as the apex body for overseeing operations of weighbridges to comply with the law on anti-truck overloading. The weighbridge stations would be increased from the present 23 to 35. Of the existing 23 sites, 15 are recommended for refurbishment. Based on the current vehicle fleet composition, the optimum axle load limit of 13.5 metric tons could be maintained. The basic fine for overloading could be raised to 150% of the registration fee. The benefits from enforcement of loading limits, expressed as Net Present Value is Php 2.0 billion, while the benefit/cost ratio is 1.5. The government
could also consider offering the following incentives to the truck industry to improve its efficiency, thereby minimizing the impact of cost rises:

- Reducing or removing the current import duties on larger multi-axle trucks
- Assisting vehicle owners to convert their vehicles to liquid petroleum gas operation.
- Working with the Bureau of Customs, National Food Authority (NFA) and the Philippine Ports Authority to reduce delays at customs, at ports and at NFA warehouses.

194. **Non-government organizations (NGOs) and private stakeholders might be enlisted to independently monitor resource allocation against needs and norms.** This will complement the measures of the implementing agencies to improve resource allocation and execution. For the Department of Public Works and Highways, the government should fully support its newly formed Bantay Lansangan (Road Watch) partnership with non-governmental organizations, the private sector, and development partners, including road users, service providers, governance advocates, academe, and media. Bantay Lansangan would be an independent monitoring body which aims to promote quality road services responsive to user needs through the efficient, transparent, and corruption-free use of public resources—ensuring value for money and corporate integrity. Areas to be monitored and analyzed are sources and uses of public resources, implementation and service delivery, and the Department of Public Works and Highways’ institutional performance. Tools include a periodic report card. Other transport agencies might consider adopting a similar independent monitoring entity for the other transport modes — ports, rail, and airports.

195. **These project management improvement related recommendations could be included in a formal modernization program for the department.** The proposals are all within the domain of the Department of Public Works and Highways and they can be implemented without regulatory changes.
9. STRENGTHENING GOVERNANCE

**Key Findings**
- The Philippines has generally ranked in the lower quartile of countries in international surveys of perception of corruption.
- Assessments of corruption risks in the Philippines generally and in the transport sector specifically have found a pattern of corruption, collusion and fraud affecting the execution of public expenditure in the road sector, often with links to special interest groups or elected officials outside the sector.
- Substantial initiatives to improve governance and fight corruption are already being undertaken by national government departments, in particular by national government anti-corruption agencies, civil society organizations, and private sector groups.

**Key Recommendations**
- A governance and anti-corruption framework could be introduced that would build on initiatives already being undertaken by the Philippines authorities. Key elements of such a framework would include:
  - Ensuring that anti-corruption mechanisms and controls are in place (e.g., enhances controls in the procurement process);
  - Adoption of sanctions and remedies and increasing transparency (e.g., through dismissal with criminal liability);
  - Empowerment of stakeholders (e.g., through involvement of non-governmental organizations in procurement monitoring).

This could provide guidance to effective actions at the national, sector, departments, and project levels.

196. **Good governance, particularly the development of strong, clean and efficient institutions, not only improves service delivery but also fosters long-term and productive investments necessary for a country’s development and growth.** Government improvements and reform attract and support positive partnerships between government agencies and between the government and the private sector or civil society, which in turn foster efficiency and leverage public resources. The amount and quality of services delivered and the willingness of the private sector to invest are some key outcomes of good governance.

197. **The infrastructure sector is highly susceptible to corruption for a variety of reasons (see Box 17).** Some key areas relevant to the Philippines include: i) presence of natural (and artificial) monopolies, capable of generating large rents, ii) large equipment and civil works contracts, and iii) investments often cannot be re-deployed after implemented and become vulnerable to expropriation.65

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Box 17: Vulnerabilities to Corruption in the Transport Sector

Given the large size of many transport projects, including highway construction, port improvements, airport extensions, railroad upgrades, and other transport infrastructure, the sector is vulnerable to corrupt practices. One article estimates that “collectively strengthening governance and capacity in the transport sector could potentially save 10–40 percent of sector expenditures.” There are a number of typical areas in the transport sector that are especially vulnerable to corruption, and identifying types of corruption appropriately is important for developing the right responses. While institutional or systemic weaknesses do not automatically result in corrupt practices, these weaknesses may allow corruption to thrive.

Areas of transport policy, planning and implementation that are particularly vulnerable to corruption:

**Sector-level corruption**
1) State capture through corrupt appointments of decision-makers and allocation of responsibilities, giving excessive discretion to these officials, or through preferential treatment to a private interest regarding, e.g., natural resource access, in exchange for investment in public infrastructure.
2) Manipulation of contracts and resource allocation
3) Weak institutional controls and accounting, leaving room for officials to use public equipment for private purposes, steal supplies, or inappropriately sell permits or licenses.
4) Weaknesses in procurement processes, quality controls and financial controls.

**Agency-level corruption**
1) Lack of oversight by legislature, judiciary or other bodies
2) Study, design and pre-bid stages of project preparation
   - Collusive bidding practices
   - Change orders to increase prices during implementation
   - Bribes given to officials in order to pass quality standards

While the list of potential vulnerabilities to corruption is long, research also suggests a number of remedies. These include approaches to preventing, detecting, monitoring and deterring corruption. Remedies should address specific types and levels of corruption. For example, addressing state capture may involve reducing the level of individual discretion over revenue expenditure and making budget allocation rules more objective and transparent, improving public access to information, improving oversight bodies, taking coordinated donor action, and publicizing trials of officials involved in corruption. Addressing agency-level corruption may mean reforming procurement systems, setting up a complaints hotline and monitoring performance; and setting up systems to train staff, audit and monitor implementation and use civil society to assist in oversight at the project level.


198. **Substantial anti-corruption initiatives have already been undertaken by national government departments, including the Department of Public Works and Highways.** This chapter discusses the major elements of governance and corruption issues in the Philippines transport sector, with a particular focus on the roads sector as it has seen considerable (and public) corruption problems, and suggests a strengthening of governance and anti-corruption efforts to address potential risks.

**FINDINGS**

199. **In an investment climate survey carried out in 2003-04, Filipino firms listed corruption and regulatory policy uncertainty as among the most serious constraints to doing business, along with macroeconomic instability (which has since been**
International surveys have identified similar governance weaknesses, and the country has ranked poorly in perception surveys and governance indicators relative to its neighbors.

Table 20. Control of Corruption Across Selected East Asian Countries

<table>
<thead>
<tr>
<th>Country</th>
<th>Percentile Rank (0-100)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Singapore</td>
<td>96</td>
</tr>
<tr>
<td>Malaysia</td>
<td>62</td>
</tr>
<tr>
<td>Thailand</td>
<td>44</td>
</tr>
<tr>
<td>China</td>
<td>31</td>
</tr>
<tr>
<td>Vietnam</td>
<td>28</td>
</tr>
<tr>
<td>Indonesia</td>
<td>27</td>
</tr>
<tr>
<td>Philippines</td>
<td>22</td>
</tr>
</tbody>
</table>


Note: The governance indicators presented here aggregate the views on the quality of governance provided by a large number of enterprise, citizen and expert survey respondents in industrial and developing countries. These data are gathered from a number of survey institutes, think tanks, non-governmental organizations, and international organizations. The aggregate indicators do not reflect the official views of the World Bank, its Executive Directors, or the countries they represent.

Risks at Sector Level

200. As discussed in chapter 3, the Road Fund (which uses funds from the Motor Vehicle User’s Charge) and the Road Board were established in 2000, with the objective to insulate public expenditures for maintenance from potential political interference, as funding of routine maintenance had become a favored instrument for congressional discretion. The initial intent was to have annual budget allocations cover routine maintenance and the Road Fund cover preventive maintenance. This way, the latter could be given some space from political pressure, allowing appropriate controls and practices to mature before taking on all maintenance requirements. The Road Board was structured to create checks and balances and enhance transparency and accountability in decision making. Three of the seven-member Board must come from the private sector – one from the public transport sector, one from the commercial transport sector, one from other road users.

201. Despite clear processes and criteria for allocation, the 2005 maintenance allocation approved by the Road Board was subsequently withdrawn. Instead, the maintenance budget was to a large extent distributed evenly across all districts, irrespective of the established processes prescribed by the law. In addition, the Road

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Fund and the Road Board have also had start-up problems, largely due to government fiscal constraints. This has meant that some of the resources collected through user charges appear to have been diverted to general budget support. Initially, out of the P25 billion collected since the Motor Vehicle User’s Charge was introduced, only about half went to the Road Fund. This indicates that the government had difficulty in providing a consistent and reliable source of funds for road maintenance, even after creating a user fee intended to specifically address this problem.

202. The Road Board, while intended to be independent and accountable, appears to have become politicized. The Road Board has funded non-maintenance activities that the executive branch requests for political reasons, and may not be acting as an adequate check on executive branch activities.

Risks at Department Level

203. The organizational structure of the Department of Public Works and Highways is inefficient. In order to meet its mandate of constructing and maintaining national roads, the Department of Public Works and Highways has established regional and district offices throughout the country. Currently it has 16 regional offices and 174 district offices. Because of political pressure, the number of district offices has been increasing over time and inching closer to the number of, and alignment with, congressional districts (there are a little over 200). The proliferation of district offices is inefficient in terms of staffing and equipment, and unsustainable in terms of budget. The average level of staff at the district offices is high at 66 per 100 km of roads but most offices still lack adequately skilled staff to perform key functions like undertaking surveys, data collection, and visual assessments of road conditions.

204. The budgeting process for the Department of Public Works and Highways has been subject to a large number of “Congressional Insertions,” which includes Congressional Allocations as discussed earlier, limiting the degree to which the Department can manage its own funds. Favored initiatives are inserted into the budget proposals of line departments and the Department of Public Works and Highways tends to be the most popular in this regard. In terms of magnitude, these “Congressional Insertions” are in the aggregate much larger in value than the more well-known Priority Development Assistance Fund (PDAF) (which is outside the budget of the Department of Public Works and Highways) and are funds specifically allocated each year to a legislator for use in projects of his or her choice. The Congressional Insertions are not subject to public scrutiny in the budget process. The proactive role that Congress plays in determining how the Department of Public Works and Highways budget is allocated undermines the Departments role as road asset manager as envisaged in the Road Fund legislation of 2000.

205. These insertions are not aligned with the Department’s Business Improvement Implementation Project, which is introducing systems and procedures intended to provide an objective basis for the identification and prioritization of the road preservation and investment needs. These kinds of allocation are not unique to the Philippines but the share, 10 to 40 percent of the budget of Department of Public Works and Highways, is disproportional.
206. **Department-level decisions may also be influenced by high-level officials who have conflicts of interest or can benefit financially from certain decisions.** The Supreme Court found extensive corruption and inappropriate decision-making in the project to open a third terminal at Manila’s Ninoy Aquino International Airport (NAIA 3). A series of high-level officials were found to have either accepted bribes or had a financial stake in companies that were awarded contracts, and to have approved change orders that dramatically altered the financial costs to government and benefit to the contractors.

**Risks at Project Level**

207. **While the inclusion of the survey and design of projects in bid invitations has led to greater transparency, there is still room for manipulation of bid estimates.** The national procurement law mandates that all contracts (with the exception of foreign assisted projects) must have an approved budget ceiling. This requires that the Department of Public Works and Highways accurately undertake a survey, design the project, and prepare the cost estimate that will then become the budget ceiling and be included in the invitation to bid. While this has introduced greater transparency, it does risk usurping market forces. Moreover, the requirement of approved budget ceilings does not prevent manipulation of the engineering survey data, design specifications and the corresponding estimates.

208. **Legislators, district engineers and local contractors have significant influence over the procurement process.** For projects costing P20 million (raised to P50 million effective January 2009) and below, the district office is responsible for the procurement process and implementation. On an annual basis, the number of such procurement processes undertaken by the Department of Public Works and Highways is estimated at 18,000 (for a total number of 30,000 contracts annually). In terms of value, contracts executed at the district level account for 20-25 percent of all contracts in the Department of Public Works and Highways. At the district level, the influence of the Congressman over the district engineer has resulted in opportunities for the legislator, the district engineer, and local contractors to influence procurement outcomes.

209. **Collusion is a significant problem in the bidding process.** The practice of having contractors in a cartel take turns as the favored contractor has been extensively covered in the local and national press and also brought forward through the World Bank’s INT report. Box 17 provides background on Evidence of Collusion and Bid-rigging in Road Contracts. Under a cartel arrangement, all contractors “win” over the long haul. Collusive practices involve the outright rigging of bid prices and the practice of “losing” contractors not submitting bids even if expressions of interest are provided, submitting intentionally high bids, or withdrawing their bids before the final stage of the bidding process when the lowest evaluated bidder is determined. The designated “winning” contractor structures his bid so as to accommodate the payments he will need to make after he is awarded the contract. Pay-off money may already be factored into the Approved Budget for the Contract (ABC) which is padded by collusive department staff who can, for example, distort survey data and designs or understate equipment production rates. The pay-off money may also be distributed to the “losing” contractors, some

government staff, and the project patron who is usually politically connected. Besides collusion among contractors, corruption in the procurement process can also take place through government officials accepting bribes to influence the design or cost estimation process, or through the inconsistent application of pre-qualification/eligibility screening undertaken by the Bids and Award Committee (BAC) of the procuring office.

210. The regional offices of the Department of Public Works and Highways manage the procurement process for projects in the range of P20–50 million (raised to P50-200 as of January 2009). Even though these projects transect several district offices (i.e., members of Congress) and thus would appear to have less scope for direct interference, it is evident that Congressmen nevertheless can influence the process. For contracts exceeding P50 million (now P200 million effective January 2009) and which are handled by the central office of the Department of Public Works and Highways, corruption is less likely. Corruption in such cases is primarily attributed to collusion among contractors and manipulated cost estimates, with the sometimes complicity of some department/government officials. In terms of the evaluation process of civil works proposals done by the bid and awards committees of the regional and central offices, it can be noted that this process has been tightened up considerably with the introduction several years ago of the computerized civil works contractors’ registry and eligibility screening, although processing is still done in the central office using input data submitted by regional offices electronically through the wide area communication network, and by most district offices manually. There are remaining concerns, though, about whether the Department of Public Works and Highways is able to maintain the integrity of the contractor’s registry, especially the accuracy of the input data; this is intended to be addressed by a daily audit of operations.

Table 21. Possible Corruption Arrangements at the Project Level

<table>
<thead>
<tr>
<th>Risk</th>
<th>Risk Description and Examples</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Procurement</strong></td>
<td></td>
</tr>
<tr>
<td>Collusion –</td>
<td>Bidders are manipulated by an ‘arranger’ under the direction of a patron, who for large national or international competitive bidding (ICB) bids is typically a senior politician or elite, and who for regional or District level bids is typically a local politician.</td>
</tr>
<tr>
<td>Bid-rigging –</td>
<td>Bid prices are established by the arranger, with a sufficient margin above the cost estimate (Approved Budget for the Contract) to pay kickbacks to the patrons, cartel participants and some officials. The margin is often high, e.g., 15-36 percent, but appears subject to controls: as the Bank began rejecting high bids in 2003 the margin evident in the bids decreased first to &lt;30 percent and recently to &lt;15 percent. The Patron often requires payment at the time of award recommendation; other payments are usually made from the advance payment.</td>
</tr>
<tr>
<td>Bloated Designs and Estimates</td>
<td>For locally-funded projects which have the Approved Budget for the Contract (ABC) as the cap, the ABC is inflated as it is based on bloated quantity estimates using manipulated survey and design data (such as earthworks and base courses), understated equipment production rates, etc.; actual payments during project implementation would be based on the bloated quantities. The increment (bloated less actual) is used by the preselected winner of the bidding to pay off the patrons, the losing bidders, and government officials. This appears to be done also, though to a lesser extent, to foreign-assisted projects.</td>
</tr>
<tr>
<td>Misrepresentation</td>
<td>Falsification of work history, productivity or financial records. Most elements</td>
</tr>
<tr>
<td>Risk</td>
<td>Risk Description and Examples</td>
</tr>
<tr>
<td>-------------------------------</td>
<td>--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>Risk of Bidder Qualifications</td>
<td>were eliminated through the introduction of the computerized Civil Works Registry of contractors in 2002, but its effectiveness has been limited since by waivers and misuse. Use of discretion by the BAC to pre-disqualify non-cartel members for irrelevant infractions, while glossing over similar or worse infractions to prequalify cartel members.</td>
</tr>
<tr>
<td>Fraud</td>
<td>Falsification of documents.</td>
</tr>
<tr>
<td>Bid evaluation</td>
<td>Manipulation of bid evaluation is relatively rare or minor under recent internal controls, but could re-emerge; for consulting services, manipulation seems common and high.</td>
</tr>
<tr>
<td>Bid process</td>
<td>Interference with bid submission, substitution of documents or mis-reading of bid prices relatively rare in foreign-assisted projects (FAP) due to observer controls, but may occur in locally-assisted projects (LAP) &amp; could re-emerge.</td>
</tr>
<tr>
<td>Contract processing</td>
<td>Bribes to facilitate processing of contract award and subsequent payments are highly probable. The approval process has multiple layers and extended delays occur in key offices, e.g., legal services, construction, executive, PMO.</td>
</tr>
<tr>
<td>Preferred Suppliers</td>
<td>Nomination of preferred agents for key contract services such as bank guarantee, security, indemnity insurance, who provide kickback to project-level officials is common.</td>
</tr>
<tr>
<td>Contract Variations</td>
<td>The size of some variations is inflated through estimates of quantities for pay items which are difficult to confirm or audit, such as repairs, excavation, landslide removal, etc. Also, some items omitted in the designs are reintroduced as variation orders, and the contractor and the implementing office negotiate the prices. Usually results from collusion of contractor with officials, but may also involve collusion of supervising consultant.</td>
</tr>
<tr>
<td>Implementation Quality</td>
<td>Falsification of quality control test results, defect or repair inspections, padding of quantities of work accomplished, etc. through collusion between contractor and supervising officials or consultant. Incidence very dependent on particular individuals and firms, ranging from negligible to modest in most FAP, but minor to serious in LAP.</td>
</tr>
<tr>
<td>Financial Mgt Internal controls</td>
<td>Internal control environment generally weak, e.g. cash advances not liquidated, false invoicing, double-billing, etc.</td>
</tr>
<tr>
<td>Financial Mgt Payment Processing</td>
<td>Certification of invoices for payment may involve delays and bribes to project officials or supervising consultants, but this appears minor and has not been reported to be a major problem in FAP. Once submitted, the invoices are processed electronically in the computerized e-NGAS accounting system, and processing status is queued and published on the agency web-sites of both implementing agency (the Department of Public Works and Highways) and disbursement agency (Department of Budget and Management).</td>
</tr>
<tr>
<td>Fund flow</td>
<td>Weak controls on fund transfers, sub-allotment advices, etc.</td>
</tr>
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Source: Project Appraisal Document, National Road Improvement and Management, World Bank, April 15, 2008, with additional inputs from the Department of Public Works and Highways sources on bloated designs and estimates.
Box 18. Evidence of Collusion and Bid-rigging in Road Contracts

In 2003, the Bank’s supervision identified signs of bid-rigging in the procurement of two roads contracts under NRJMP-1 and rejected award of the contracts. Two further rounds of bidding in 2004 and 2006 revealed similar signs and were also rejected. The Bank’s task team referred the information to the Department of Institutional Integrity (INT) in 2003, which concluded an investigation in 2007 and found that a cartel of contractors had engaged in corrupt and collusive practices in all three rounds of bidding, undermining competition in roads construction in the Philippines and inflating prices by up to 30%. These findings were disclosed to the Government of the Philippines in November 2007 for possible follow-up under Philippines law. In addition, INT initiated the Bank’s internal process for determining whether the practices detected in the investigation merit the application of Bank Group sanctions. This process came to an end in January 2009 and resulted in various lengths of debarment of 7 firms and 1 individual. The investigative findings were also crucial in designing mitigating measures for the new project, described in the box on Key Anti-Corruption Mitigation Measures in NRIMP-2 below.


Ongoing Efforts to Reduce Corruption for the Roads Sector

Presidential Anti-Graft Commission (PAGC) and Integrity Development Action Plans (IDAP)

211. Under the Presidential Anti-Graft Commission (PAGC), Integrity Development Action Plans are being rolled out in 120 various government agencies, including the Department of Public Works and Highways. The Plan for the Department of Public Works and Highways has identified 22 action areas, including monitoring indicators for prevention, education, deterrence, and partnership activities.

212. The Integrity Development Action Plan for the Department of Public Works and Highways could be further strengthened. This is particularly the case in the area of procurement (to include non-foreign assisted project activities); introducing tools to reduce corruption (e.g., value engineering, quality assurance on the accuracy of engineering surveys and designs, improving quantity and cost estimates, new procurement manual); providing capacity building (for procurement professionals); and implementing the Electronic New Government Accounting System (E-NGAS). Several such initiatives are already underway.

213. Also, the Department of Public Works and Highways carried out an Integrity Development Review of their main functions and operations including the Regional Offices. The Department was one of the first set of 5 agencies that undertook this exercise. The outcomes of the Integrity Development Review were incorporated into the Integrity Development Action Plan and the Integrity Development Action Plan were taken as the basis for the Integrity Strengthening Action Plan under the National Road Improvement and Management Program 2. Box 20 provides an overview of the key anti-corruption measures.

Office of the Ombudsman

214. The Office of the Ombudsman is the major anti-corruption agency of the government. Amongst its functions to prevent graft, it has power to investigate,
prosecute and adjudicate cases involving government entities and employees. Accordingly, the Ombudsman has the authority to undertake life-style checks of government employees and, if warranted, remove them from their positions and initiate prosecution. The budget for the Office of the Ombudsman was planned to be doubled over the last two years, allowing for the hiring and training of a significant number of new investigators and prosecutors.

**Government Procurement Policy Board**

215. **As part of the national procurement reform**\(^{68}\), the **Government Procurement Policy Board was established with a strong mandate**. The mandate includes establishing and monitoring procurement performance benchmarks; providing for protest mechanisms; coordinating training within the government and also of civil society organizations who are observers on bid and evaluation committees; and issuing generic and department-specific procurement manuals and related bidding documents.\(^{69}\)

**Financial Management Improvements**

216. **In tandem with procurement reform, the national government has also instituted financial management improvements**. This involves the implementation of the Electronic New Government Accounting System accounting systems and the strengthening of internal (in each department) and external (Commission on Audit) audit functions. While the Electronic New Government Accounting System falls short of desirable features of a public accounting system, it has introduced considerable improvements to a system that has long been considered archaic. However the roll-out of the Electronic New Government Accounting System has been suspended because the Government has decided to adopt a new National Internal Control Standard and the Department of Public Works and Highways has been selected to apply this new standard soon.

**Department of Public Works and Highways reforms**

217. **In addition to participating in national initiatives, the Department of Public Works and Highways has also initiated a series of department-specific reforms**. Many of these reforms are being championed by a change-management team within the Department of Public Works and Highways responsible for the Department’s implementation of the Integrity Development Action Plan. An example is the refocus of the quality assurance unit, which will lead to more professional completion reviews of projects and hence lower corruption risks. These efforts are being complemented by a major business process improvement effort involving the development of the Roads Information Management Support Systems (RIMSS), which focuses on improvements in: precision of technical planning tools; streamlining and making more efficient

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\(^{68}\) The foundation of the reform lies in the promulgation of the Government Procurement Reform Act (RA 9184) in January 2003 and the issuance of its Implementing Rules and Regulations in September 2003.

\(^{69}\) The specific procurement manual for locally-funded infrastructure projects of the Department of Public Works and Highways has been approved by the Government Procurement Policy Board (GPPB) and is now being implemented in the department.
procurement tools; financial management controls; a human resource planning system; performance monitoring system; and proactive public information system. The Department is also initiating the establishment of a quality assurance system for designs and estimates and value engineering to prevent bloated estimates and overdesigning. Noteworthy is significant progress in financial management, accounting, payment, and reporting systems.

218. **As part of a government-wide rationalization program** (Executive Order 366), the Department of Public Works and Highways has prepared a **Rationalization Plan** which will streamline the Department’s functions, reduce staffing levels, and undertake other institutional reforms. The objective is to improve the quality and efficiency of the Department’s core services within a streamlined structure. Part of the plan includes establishing a Bureau of Procurement that will serve as a one-stop shop for processing, hence reducing the number of reviewing units. The Rationalization Plan of the Department of Public Works and Highways has been submitted and is under review by the Department of Budget and Management.

**Civil society involvement**

219. **Reflecting the extensive range and depth of non-government organizations and other groups present in the Philippines, several activities have been initiated by these civil society groups to combat corruption.** For instance, Government Watch (G-Watch) conducted in recent years reviews of 26 projects undertaken by the Department of Public Works and Highways (11 of which were foreign assisted projects). The objective was to promote transparency by providing reliable information on government performance and gaining the Department of Public Works and Highways’ acceptance to involve civil society in project monitoring. The Department of Public Works and Highways responded positively to the findings and agreed to involve civil society in monitoring of projects. G-Watch’s findings also prompted the Office of the Ombudsman to initiate investigations of two cases. Other groups have adopted similar approaches to preventing corruption, such as: the Coalition Against Corruption; Boy and Girl Scouts of the Philippines; Association of Ministers and Ministries in Nueva Ecija; National Conference of the Association of Schools of Public Administration in the Philippines; and Procurement Watch. Road Watch (Bantay Lansangan) has been launched as an independent group to monitor and assess the performance of the national roads sector and ensure corruption-free and value-for-money use of resources for the delivery of quality road services.
Box 19: Lessons from Pakistan

A recent capacity assessment of the infrastructure sector in Pakistan found that the sector was unable to meet high demand for transport infrastructure due to low capacity and poor governance. Key problems included low human resource capacity, extensive political interference, corruption, lack of transparency in contracts and procurement, security concerns and political instability. In addition, the focus on accepting the “lowest” bid for an infrastructure project rather than the “best” bid may discourage higher-capacity foreign firms from attempting to compete in the sector.

Findings suggested that thorough reform of the sector must include anti-corruption measures along with governance improvements and is a very long-term effort, perhaps as long as a decade. Recommendations in the report include: focusing on the “least evaluated bid” rather than the lowest cost to avoid change orders and under-bidding; improving quality by using end product specifications; increasing transparency by collecting and disseminating information on costs of materials, equipment and employees; streamlining audit procedures and improving training of auditors; supporting trade associations to develop human resource capacity and maintain professional standards; enhancing regulatory frameworks to avoid corruption and conflicts of interest that may arise when the government is owner, operator, regulator and financier of infrastructure; clarify and enforce rules to ensure that regulations are applied transparently, consistently and objectively.


RECOMMENDATIONS

220. **Anti-corruption measures initiated at the national level, by civil society, and by the Department of Public Works and Highways itself represent important progress in tackling corruption in the roads sector.** In addition to these national, Department level, and non-government anti-corruption efforts, all World Bank financed projects contain measures related to procurement, financial management, and the supervision of implementation.

221. **In spite of the array of measures being undertaken, however, the perception is that corruption is still pervasive.** The implementation of the second phase of the World Bank-financed National Roads Improvement Management Project Phase (NRIMP2) provides an opportunity to support and strengthen ongoing anti-corruption initiatives, as well as introduce new measures designed to address the high risk areas. The strategy proposed for addressing and mitigation high corruption risks is based on five primary elements, following good practice guidelines for the transport sector70.

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The NRIMP-2 project includes measures to strengthen institutional capacity and governance, fiduciary controls, and demand for good governance from civil society. Many of these measures have been strengthened due to the incorporation of lessons from NRIMP1 and discussions with Government on measures to mitigate systemic risks identified in the NRIMP INT investigation. Key points follow:

- Use of an Independent Procurement Evaluator (IPE) to improve the transparency and integrity of procurement processes, through independent monitoring of key steps of the procurement process.
- Further enhanced procurement controls to ensure the reliability of contract cost estimates, detect over-pricing through bid analysis, enhance supervision control over contract variations and disseminate complaints mechanism in bid documents.
- Adoption by Government of the 2006 Guidelines for Procurement under IBRD Loans and Credits, which include enhanced provisions for combating fraud and corruption.
- Strengthening internal controls and internal audit capacity in the Department of Public Works and Highways in order to address key deficiencies revealed by official audits of the agency. Two conditions of project effectiveness cover: a) internal audit assistance and internal control systems; and b) qualifications and sufficiency of project financial management staff.
- Adoption of Enhanced Business Processes - With increased use of computerized business systems and enhanced processes for procurement and financial management (developed by the Department of Public Works and Highways under NRIMP-1), the efficiency of transaction processing would be improved and the opportunities for interference would be reduced.
- Independent Oversight by Civil Society - A coalition of citizen and road user groups has been established, named “RoadWatch” (“Bantay Lansangan”), to strengthen the voice and influence of citizens in ensuring transparency and proper use of public funds for roads, and to counter corruption at high levels of government and society.

Partnership with the Road Board in Management of the Road Fund - Assistance to the Road Board and its Secretariat to apply strong transparent procedures for administering the special funds, and to produce more efficient, equitable and needs-based expenditure programs.


222. Any further governance and anti-corruption effort would need to encompass three critical and inter-related elements at the sector, department, and project levels.

- Ensure that the appropriate anti-corruption mechanisms and controls are kept in place and will be sustained to increase the ability to mitigate corruption. The foundation for any anti-corruption program is the application of mechanisms and controls that help prevent corruption in the first place. Such mechanisms and controls seek to prevent corruption either indirectly, such as through organizational change and business process improvements, or directly, such as through specific controls related to procurement processes.
- Adopt and keep applying sanctions and remedies such as making project managers accountable for substandard works, cost overruns, and delays for projects under their supervision, with penalties ranging from suspension to dismissal with criminal liability and damages. This will provide the means to enforce controls and make accountable and punish those involved in corrupt and other inappropriate behavior. While preventive mechanisms and controls provide the foundation, without clear accountability and a real threat of punishment if such processes are violated, anti-corruption efforts are unlikely to be successful.
• Increase transparency and empowerment of stakeholders. This will draw attention to corrupt practices and create momentum for anti-corruption reform among all stakeholders. The involvement of civil society in external monitoring of procurement and implementation of projects in the Philippines has had some success. The establishment of *Bantay Lansangan (Road Watch)* is an important step forward.

223. **By establishing this three-tiered framework as a basis for a detailed anti-corruption program for the roads sector**, it is expected that: the proposed mechanisms and controls will make corrupt activities more difficult to do; the risk and penalties will increase for those who engage in corrupt practices; and most significantly the increased level of stakeholder vigilance will make corruption easier to detect, report, and expose.
ANNEX 1: Existing and Required Runway Length and Width, in meters

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## ANNEX 2: Institutional responsibilities for infrastructure delivery in main transportation infrastructure sectors

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<th>Policy formulation and coordination</th>
<th>Funding</th>
<th>Regulatory functions</th>
<th>Infrastructure service and operator</th>
<th>Construction and maintenance</th>
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<tbody>
<tr>
<td>National roads</td>
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</tbody>
</table>

**Department of Public Works and Highways (Road policy, planning, design)**

- Department of Public Works and Highways through the national budget
- Road Board through allocation from the Motor Vehicle User’s Charge for road maintenance.

**Department of Transportation and Communications (Vehicle operations)**

- Department of Public Works and Highways (technical regulations on road design, construction, maintenance, use and vehicle load limits).
- Land Transportation Office (Vehicle registration, rivers’ licensing, and traffic rules)
- Land Transportation Franchising and Regulatory Board (Public transport franchising and fare-setting)

**Department of Public Works and Highways**

- Department of Public Works and Highways (Vehicle operations)
- Department of Public Works and Highways through contracting of private contractors and through in-house staff and equipment
<table>
<thead>
<tr>
<th>Policy formulation and coordination</th>
<th>Funding</th>
<th>Regulatory functions</th>
<th>Infrastructure service and operator</th>
<th>Construction and maintenance</th>
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<td>Toll roads</td>
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<tr>
<td>Local Roads</td>
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<tr>
<td>Local government units</td>
<td>Local government units through Internal Revenue Allotments and local tax revenues</td>
<td>Local government units</td>
<td>Local government units</td>
<td>Local government units through contracting of private contractors and through local government units in-house staff and equipment</td>
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<td>Policy formulation and coordination</td>
<td>Funding</td>
<td>Regulatory functions</td>
<td>Infrastructure service and operator</td>
<td>Construction and maintenance</td>
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<td><strong>National Airports</strong></td>
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<tr>
<td>Department of Transportation and Communications (airport policy and planning)</td>
<td>Department of Transportation and Communication/Civil Aviation Authority of the Philippines through the national budget</td>
<td>Air Transportation Office/ Civil Aviation Authority of the Philippines (technical/safety regulation of airports)</td>
<td>Air Transportation Office</td>
<td>Department of Transportation and Communications/Civil Aviation Authority of the Philippines through contracting of private contractors</td>
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<tr>
<td>Each Government owned company and corporation set up as separate corporation with its own board (?) policy, though</td>
<td>User charges</td>
<td>Civil Aeronautics Board (Economic regulation of airlines)</td>
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<td><strong>International Airports</strong></td>
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<tr>
<td>Department of Transportation and Communications (airport policy and planning)</td>
<td>Airport authorities (Government-owned corporations) - Manila, Mactan, Clark, Subic, San Fernando - through their corporate funds</td>
<td>Air Transportation Office: (technical/safety regulation of airports)</td>
<td>Five airport authorities (government owned corporations) – one for each international airport: Manila, Mactan, Clark, Subic, San Fernando</td>
<td>Airport authorities through contracting of private contractors</td>
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<td>Manila Metro Rail 3</td>
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<td>Department of Transportation and Communication/the Department of Finance through the national budget</td>
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<td>Policy formulation and coordination</td>
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<td>Regulatory functions</td>
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<td><strong>Light rail in Manila</strong></td>
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<td>Department of Transportation and Communications, Light Rail Transit Authority Board and Philippine National Railways Board</td>
<td>National budget</td>
<td>Department of Transportation and Communications and the Light Rail Transit Authority, and Philippine National Railways</td>
<td>Light Rail Transit Authority (Light Rail Transit 1 &amp; 2) Philippine National Railways (commuter lines)</td>
<td>Light Rail Transit Authority and Philippine National Railways through private contractors</td>
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<td>Corporate earnings</td>
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<td><strong>Long distance railways</strong></td>
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<td>National budget</td>
<td>Department of Transportation and Communications and Philippine National Railways Board</td>
<td>Philippine National Railways</td>
<td>Philippine National Railways through private contractors and in-house resources</td>
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<td>Philippine Ports Authority</td>
<td>Philippine Ports Authority Private operators</td>
<td>Philippines Ports Authority through contractors Private operators</td>
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<td><strong>Municipal ports</strong></td>
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<td>Local Governments and Department of Transportation and Communications</td>
<td>User charges</td>
<td>Local governments and Philippine Ports Authority</td>
<td>Local governments</td>
<td>Local government units and Department of Transportation and Communications, through contractors and in-house staff and resources</td>
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<td>Local government charges National budget under the Department of Transportation and Communications</td>
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### ANNEX 3: Examples of various public-private partnership arrangements in the Philippines

<table>
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<tr>
<th>Project</th>
<th>Sector</th>
<th>Modality</th>
<th>Investment commitment</th>
<th>Payments to government</th>
<th>Payments from Government</th>
<th>Contingent liabilities</th>
</tr>
</thead>
</table>
| Southern Tagalog Arterial Road | Road transport | Build operate transfer after bidding, awarded to Star Infrastructure Dev Corp by DPWH  | • P1.5 billion for 20-km, 4-lane expressway  
• Up to P500 million for right-of-way | Taxes                  | Right-of-way: P550 million (exceeding P500 million under SIDC) | Not applicable          |
| North Luzon Tollway | Road transport | Philippines National Construction Corporation (PNCC)-private sector (PS) joint venture (JV) under PNCC franchise | USD370 million for:  
• Rehab, widening, improvement of North Expressway  
• C-5 Expressway  
• Subic Expressway | • Revenue share of PNCC  
• Taxes              | Right-of-way: P750 million             | Not applicable          |
| Manila-Cavite Tollway Expressway | Road transport | Philippine Reclamation Authority (PRA)-PS JV under PRA charter | USD131 million for:  
• R-1 Expressway  
• C-5 Expressway  
• R-1 extension | • Revenue share of PRA  
• Taxes              | Right-of-way: P613 million             | Not applicable          |
| Metro Manila Skyway Stage I | Road transport | PNCC-PS JV under PNCC franchise | USD536 million for:  
• Elevated expressway, Buendia-Bicutan  
• Rehab of at-grade expressway to Alabang | • Revenue share of PNCC Taxes          | • Right-of-way: P300 million  
• 20% equity contribution to joint venture | Default on contract obligations |
| South Luzon Expressway | Road transport | PNCC-PS JV under PNCC franchise | • Rehab of Alabang viaduct  
• Widening and rehab of Alabang-Calamba  
• Construction of Calamba-Sto. Tomas | • Revenue share of PNCC  
• Taxes              | Right-of-way: P369.9 million           | Default on contract obligations |
| MRT 3          | Rail transport | Build-lease-transfer (BLT) by the Department of Transportation and Communications with Metro Rail transit Corp (MRTC) | USD679 million | • Ownership of rail transit after 25-year lease to private partner  
• Development rights | • Equity rental  
• Debt service rental  
• Maintenance rental  
• Private partner’s staff and administrative costs | • Liquidated damages  
• Other private partner expenses |

Source: Department of Public Works and Highways and Build Operate Transfer Center, May 2007.