International Seminar on Strengthening Public Investment and Managing Fiscal Risks from Public-Private Partnerships

Budapest, Hungary

March 7-8, 2007

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Five ways governments can control spending commitments in public-private partnerships

Timothy Irwin¹

17 October 2006

¹ Infrastructure Economics and Finance Department. This draft has benefited from discussions about public–private partnerships and fiscal management with officials in many countries, including Australia, Britain, Hungary, Korea, and South Africa—as well as with many colleagues in the World Bank and the International Monetary Fund.

Draft

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Summary

- 1. Many governments now use public–private partnerships to procure roads, buildings, and other assets. Instead of borrowing to pay for the construction of an asset, the government contracts with a firm that pays for the construction. In exchange, the government makes a commitment to pay the firm enough, over the life of the asset, to cover the firm's expected costs.
- 2. Public–private partnerships, or PPPs, allow governments to defer spending without deferring its benefits. This can be especially attractive to governments bound by restrictions on their current spending, but unrestricted in their ability to promise future spending. By making a single firm accountable for providing the service the government ultimately wants, PPPs may also lower the cost of procuring some services.
- 3. Commitments to future spending can of course create as many problems as current spending. Critics ask whether PPPs merely disguise fiscal problems, ultimately making the problems worse, and whether the appeal of PPPs as a disguise means they are used even when they are more expensive than the alternative of a publicly financed project.
- 4. This note sets out five things governments can do to improve their control over spending commitments in PPPs and thus allay these concerns:
- (i) Having a good framework for comparing the cost of PPP commitments with the cost of publicly financed projects
- (ii) Incorporating the commitments in fiscal monitoring
- (iii) Improving the reporting of commitments in accounts and budget documents
- (iv) Strengthening procedural controls on commitments, such as allowing the ministry of finance to veto them
- (v) Imposing substantive limits on commitments, such as that their present value not exceed *x* percent of GDP.

Introduction

- 5. In the last two decades, many governments have started using longterm service contracts to ensure the financing of assets such as roads, schools, prisons, hospitals, dormitories, and office buildings—or, more precisely, to procure services provided with the aid of those assets. In these arrangements, the government specifies the service it wants, and then selects a firm to supply the service. The chosen firm must build the service-producing asset using its own capital and borrowing and then maintain and operate the asset to supply the service. In exchange, the government agrees to make payments to the firm, over the life of the asset, that are expected to be sufficient to cover all the firm's costs. The government doesn't have to pay if the firm fails to supply the service, but it cannot avoid paying just because it determines later that it no longer needs the service. In some arrangements, the firm provides the service (such as a road to drive on) directly to the public. In others, the firm supplies "building facility services" to the government, which in turn supplies services to the public. For example, the firm might build and maintain a school, and ensure that the classrooms are properly heated, ventilated, and cleaned, while the government is still responsible for the teaching.
- 6. The arrangements are commonly described as instances of private finance and contrasted with public finance. They are also called public-private partnerships, or PPPs. There are, however, other arrangements involving private finance, also called PPPs, such as privately financed toll roads, in which the firm gets its revenue from users, not the government. We don't consider these arrangements here.² The payments the government makes go by several names, including service fees, availability payments, and unitary charges (this last name serving to emphasize that the payment is for a single service, and is not a collection

² References that are relevant to fiscal management and PPPs with user fees as well as, in most cases, PPPs of the kind considered here include Brixi and Schick (2002), International Monetary Fund (2004a), International Monetary Fund (2004b), Irwin 2006, John Quiggin (2004), and many reports on the websites of governments that have pioneered their use, including Britain (www.hm-treasury.gov.uk), South Africa (www.hm-treasury.gov.uk), South Africa (www.hm-treasury.gov.uk), and the State of Victoria in Australia (www.partnerships.vic.gov.au).

of payments for the various inputs that go in to supplying the service). In this note, we use "PPP" and "private finance" to refer just to the arrangements under consideration in which it is the government that pays, and we use "availability payments" to refer to the payments.

- 7. The line ministries in charge of roads, schools, prisons, and other assets don't necessarily prefer PPPs to public finance. For one thing, PPPs require them to develop new skills in specifying outputs, drafting contracts, and monitoring contractors. PPPs also limit their flexibility: they have to specify now the services they want in 20 or 30 years. When circumstances change—when new health-care techniques are invented, for example, or new views about teaching become popular—a ministry might like to get a somewhat different service from the firm. That requires renegotiation of the contract, however, which may be difficult and costly, since at that point the ministry has already chosen its "partner" and can no longer rely on competition between firms to get good service at low cost.
- 8. Yet PPPs, and even their inflexibility, also have advantages for a line ministry. If the government is struggling to reduce its cash deficit this year, and its forecast deficit in the following couple of years, the ministry may be denied the budget to construct new assets. Even if the ministry gets approval, it can't be sure the government will later provide enough money to maintain the asset—or even to complete construction. Entering into a long-term service contract solves both problems: the ministry gets the asset without having to spend anything much in the short term (payments are due only when the asset is built and the service is being provided); and the contract commits the government to spending enough to ensure proper maintenance. Thus, line ministries may use PPPs to lock the government into spending—whether or not that makes sense for the government as a whole.
- 9. PPPs may also appeal to other ministers who want to say the government is tackling fiscal problems, but are wary of upsetting taxpayers or expenditure beneficiaries by actually tackling them. Under traditional government accounting, commitments to pay for services aren't treated as public debt, and they don't increase the measured deficit in the year they are made. Thus PPPs allow a government to get investment now without immediately running a bigger deficit, raising taxes, or cutting other spending.

10. Ministers may realize that PPPs limit their future fiscal flexibility and that, despite accounting differences, have a fiscal effect similar to that of public finance. They may even think that PPPs are more expensive than public finance. But at times, as when an election looms, they may feel they have little to gain by dwelling on such issues. Eventually, though—perhaps just after the election—concerns about PPPs are likely to rise to the surface. For some people, the main worry will be that private finance is raising the costs of providing public services. For others, especially those in the ministry of finance, the main concerns may be that PPPs are being used to bypass expenditure controls and that the government is failing to track its real fiscal position.

11. The issue will be particularly complex for governments that have agreed to meet Maastricht-style fiscal targets, but which, left to themselves, would choose looser targets. Any government making commitment to its lenders might be in this position, but the issue is probably most pressing for European governments subject to the Maastricht rules themselves. These rules require governments to limit their cash deficits to 3 percent of GDP and their gross public debt to 60 percent of GDP. Like traditional government accounting standards, the relevant European standards have the effect that signing a PPP contract doesn't initially increase the government's measured deficit or debt.³ If the government would, in the absence of its Maastricht promises, choose to run a cash deficit of more than 3 percent of GDP, or let gross public debt exceed 60 percent, it will use private finance as a way of getting its desired investment while keeping its promise—even if it believes private finance to be a little more costly than public finance. (Whether it is prudent to let broader, "PPP-inclusive" measures of the deficit and debt exceed 3 and 60 percent of GDP, respectively, is not an issue we consider here. Nor is whether the European Union should measure debts and deficits in this way.)

12. Although such governments will want to use PPPs, they have the same reasons for wanting to understand and control the PPP

³ To be precise, PPPs don't initially increase the debt or deficit for Maastricht purposes so long as the firm bears construction risk and either availability risk or demand risk: that is, if the firm takes the loss if construction costs more than expected and either if the asset is unavailable for use or if demand is lower than expected. In the PPPs discussed here, the firm typically bears construction risk and availability risk.

commitments they make. Even though they will want to use PPPs, they won't want to use them without limit, and even though they will want to report lower deficit and debt numbers to the European Union, they will want to have a full understanding of their fiscal position for their own purposes.

1 Having a good framework for comparing the costs of PPPs and public finance

13. The first thing governments can do to control the costs of PPP commitments is to ensure they can properly compare the costs of those commitments with the cost of a publicly financed projects. It is sometimes said that this comparison is a matter of weighing the "private-sector efficiencies" in construction and maintenance against the higher interest rates that private firms pay on their borrowing. This conception of the choice is too simple, though: the real advantages or disadvantages of private finance are different and subtler.

14. To start with, consider the role of private firms under public and private finance (Figure 1). Under private finance, the firm with which the government contracts is likely to subcontract construction and operations to separate, though possibly related, firms (called ConCo and OpCo in the figure). Under public finance, the government can do the same. It can contract out the construction of the asset to a construction company; and once the asset is built, it can contract out maintenance and operation to another firm or, perhaps better, to a series of firms under a series of short-term contracts.⁴ The contracting out by government of operations and maintenance is perhaps less common than the contracting out of construction, but there is nothing to stop it happening under public finance: it is not dependent on the use of private finance. Under both public and private finance, then, all the construction, operations, and maintenance can be done by private firms.

⁴ It could also write one contract for construction and operations, even it was financing the service, but it couldn't then tie its payments to delivery of services.

Public finance Private finance Gov't Gov't Operating OpCo OpCo contract contract contract Operating Construction Finance Construction Firm contract contract providers Finance ConCo ConCo providers

Figure 1 Comparing public and private finance

Source: Brixi, Budina, and Irwin (2005).

15. As Figure 1 makes clear, the real difference between the two options is the structure of the contracting. Under public finance, the government must arrange financing and then contract for construction and operations (assuming it contracts out these functions). It must be expert at coordinating the construction and operations contracts, since construction choices affect the costs of operations and maintenance. If something goes wrong, the government must also know how to work out whether the problem lies with construction or operations, knowing that the construction firm will be tempted to blame the operating firm, and vice versa. Under private finance, a single firm is accountable for the service, so the government doesn't need to coordinate the contracts or work out who is at fault when something goes wrong. But the government must specify the services it wants for the next 20 or 30 years. So it must be expert at predicting its future demands and specifying the outputs it wants precisely and measurably, knowing that if it changes its mind, the renegotiation may be difficult and costly.

16. But what of borrowing costs? It is true that a government can usually borrow for less than firms in the same country, and that the difference in interest payments may be large. If the government pays 5 percent and the firm 8, and both borrow \$1 billion to be repaid in equal annual installments over 15 years, the firm ends up paying \$300 million more than the government over the life of the loan. Yet differences in

borrowing rates turn out to have little bearing on the relative costs of public and private finance.

17. To see why, it may help to start by considering Figure 1 again and to ask whether the differences between the two contracting structures could really be associated with such large differences in expected costs. It may also help to consider a consequence of assuming that differences in borrowing costs really do reflect differences in the cost of undertaking a project: financially strong governments would be the natural financiers of *all* assets, not just those used to provide public services. If the conclusion seems unlikely, it's because the premise is wrong.

18. For a government, as for everyone, the cost of money invested in a project is its opportunity cost.⁵ That is the return the government could get by investing the money in the best alternative investment. Expressed as an annual rate, the cost is the expected rate of return on the best alternative investment—or, more precisely, since investments have different risks, the expected rate of return on the best alternative investment of the same degree of risk. That rate can be estimated by starting with the risk-free interest rate (which may be close to the government's borrowing rate if the government has very good credit) and then adding a risk premium that depends on the investment's risk.

⁵ For fuller discussions, see Brealey, Cooper, and Habib; Fleming and Mayer; and Klein (all 1997). Another way of looking at the issue is note that governments have low borrowing costs because they have diversified sources of revenue and the option to increase taxes: taxpayers stand behind their governments' borrowing, offering a kind of repayment guarantee. When a government borrows to pay for a new project, its decision affects the interest rate it must pay on all new borrowing and/or the cost to taxpayers of their guarantee. If the project doesn't offer an expected return high enough to offset the project's risks, the cost of the government's borrowing and/or the implicit cost of the taxpayer guarantee will rise. Again, the cost of investing exceeds the borrowing cost.

Diversified firms with good credit are in a similar position, and like governments, must try to avoid the temptation to finance too many projects. One way they do this is to undertake projects by creating special-purpose companies that borrow without giving the lenders recourse to the credit of the parent. Another is to appraise projects by reference to an estimate of the cost of capital that depends (at least primarily) on the project's risks, not on the firm's borrowing costs. A third possibility, discussed by Merton and Bodie (1993), is for the firms to charge a guarantee fee to divisions that make use of corporate borrowing.

Thus, the cost of investing money in a project is the same for all investors and independent of their borrowing rates.

19. Accordingly, to compare the cost of private and public finance (a PPP and a "public-sector comparator"), a government does not need to compare borrowing costs. Rather, it needs to compare its own payments under the two options. And in calculating the payments under public finance, it can focus on its capital and operating expenditure, and set aside the question of how it finances the expenditure.

20. To compare the cost of the two alternative payment streams, the government needs to calculate the present values of the streams, taking account of the time value of money and any relevant differences in the degree of risk associated with the payments. The safest way of doing this is to separate the adjustments for risk from the adjustments for the time value of money. (Certain investments can reasonably be valued by combining the two adjustments in a risk-adjusted discount rate, but this approach doesn't work in all cases.) Specifically, we can proceed as follows:

- a. Estimate *expected* operating and investment cash flows under each option (treating all cash flows to the firm in the typical PPP as operating cash flows, and noting that expected cash flows are not necessarily the same as planned or most-likely cash flows)
- b. Adjust any cash flows subject to big *systematic* risks (that is, cash flows that vary not just idiosyncratically but with the state of the economy) to get certainty equivalents⁶
- c. Discount the expected payments or certainty equivalents at the risk-free interest rate or, better, a risk-free yield curve the best estimate of which may be the government's borrowing rates.

21. Estimating the present value of commitments to a PPP may not be too hard once bids have been received, for the bidders will probably have been asked to specify the real (that is, inflation adjusted) annual

⁶ On certainty equivalents, see Brealey, Myers, and Allen (2006, chapter 9).

availability payment they require for providing the service. True, the government will make this payment only if the firm supplies the service according to the contract's performance standards. Yet it may be reasonable to assume that the firm will meet the performance standards (at least if the calculation of the cost of the public-sector comparator assumes that the same performance standards are met). If so, the requested availability payments can be assumed to be expected payments. Moreover, these payments probably need no adjustment for risk, because they are probably not subject to any significant systematic risk.⁷

22. If we make these assumptions, we can then discount the requested availability payments at the appropriate risk-free interest rates (say, the rate for one-year zero-coupon borrowing, the rate for two-year zero-coupon borrowing, and so on). We could forecast the government's nominal payments, by means of a forecast of inflation, and then discount the nominal payments at the nominal risk-free rates. Alternatively, we could discount the real payments at an estimate of the real risk-free rates. Sometimes, bidders require payments in foreign currency. These payments should be discounted at the risk-free rates in the relevant foreign currency.

23. Estimating the cost of private finance before bids are received will of course involve much more guesswork. So too will estimating the cost of the public-sector comparator, unless the government actually gets bids from construction and operating firms under the assumption of publicly financed contracts. Although risk adjustments may sometimes be important and difficult,⁸ the biggest problem is likely to be the basic one

⁷ The alternative would be to estimate expected payments based on an estimate of the probability distribution of possible payment deductions for less-than-complete availability of the service, perhaps gleaned from experience with previous contracts. Even though the payments would be treated as uncertain, they probably still wouldn't need to be adjusted for risk, because the risk probably wouldn't be systematic.

⁸ In the case of the public-sector comparator, for example, the government may have the asset operated and maintained under a series of contracts, each a few years long. The cost of those contracts will tend to rise and fall with the state of the economy: if the economy does particularly well, resources will be scarce, and the government will have to pay more; if the economy does poorly, the government will probably pay less. If the risk works in the government's favor in this way, the certainty equivalents are less than the expected payments.

of estimating expected payments. Even if an analyst suspects that an estimate of some cost is optimistic, for example, he or she probably doesn't know what adjustment to make. Studies of earlier projects can help,9 but can't replace difficult judgments.

24. For these reasons, quantitative comparisons of the likely costs of public and private finance won't help much if the people doing or supervising the analysis have a strong prior preference for one option: the analysis can too easily be manipulated to get the desired result. Quantitative comparisons may still have *some* value in this case—especially if made public and subject to criticism—but they will be most valuable when decision makers are genuinely uncertain about which option is best. But even then, quantitative comparisons should supplement rather than replace judgments about which contracting structure is likely to best.

2 Incorporating PPP commitments in fiscal monitoring

25. Commitments to make availability payments can also be incorporated in the government's routine fiscal monitoring.

26. First, the present value of PPP commitments can be calculated and tracked over time. As with debt, the government may want to express the present value of the commitments as a fraction of current GDP or current government revenue, to get a sense of the macroeconomic significance of the payments. The government may also want to monitor the combined present value of debt and PPP commitments, and track the combined value as a fraction of GDP or government revenue. (This wouldn't change the data a government reported to others, such as the European Union, when those data were prepared according to specific accounting standards.)

27. Second, forecast availability payments can be included in mediumand long-term fiscal forecasts (covering the next, say, 3 and 30 years, respectively). Many governments forecast expenditure for two or three years after the budget year, and it is a simple matter to incorporate

⁹ Two interesting references are Skamris and Flyvbjerg (1997) and Flyvberg, Skamris and Buhl (2002).

availability payments in those forecasts. Although this is useful, the payments may stretch over several decades, so medium-term forecasting is not sufficient to capture their impact. Long-term fiscal forecasting is also necessary.

28. A few governments, including those in Australia, Britain, and New Zealand, have long-term fiscal forecasts, but many do not. If a government has no long-term forecast, it might want to start by forecasting legally unavoidable payments (in the form of Table 1, for example). Such a forecast could include payments made under long-term service contracts as well as debt-service payments and perhaps other potentially large commitments, from leases or multi-year construction contracts. It would help give the government a sense of its future fiscal flexibility and vulnerability to shocks that affect the payments. The forecast could subsequently be extended to include tax revenue and discretionary expenditure, an extension that would be necessary to get a full picture of whether the commitments the government is making now are likely to cause fiscal problems later.

Table 1 The form of a possible forecast of legally unavoidable government payments

	2007	2008	2009	2010	2011	
Economic assumptions						
Inflation						
Price of euro in local currency						
•••						
Debt-service payments						
Nominal fixed-rate debt						
Inflation-indexed debt						
Fixed-rate euro debt						
PPP payments						
Inflation-indexed payments						
Euro-indexed payments						
Termination payments						
Other commitments						
Total payments						

- 29. The government's availability payments may be relatively predictable if the contract continues until its scheduled end. But the contract may end early, obliging the government to make a compensating termination payment. The obligation to make a termination payment doesn't necessarily increase the present value of the government's total obligations, since a termination payment *replaces* future availability payments, and its amount is unlikely to exceed, and may be less than, the present value of the avoided availability payments. Yet a sudden demand for a large sum of cash may cause a liquidity problem for the government.
- 30. A ministry of finance on top of the main task of forecasting availability payments and tracking their present value might want to spend a little time analyzing termination-payment risks. One simple approach is to assume that each contract has a constant probability of termination each year if it hasn't already terminated, and to guess at this probability, in part by reviewing the record of such contracts at home and in other countries with experience of PPPs. A more-complex approach would allow for a higher termination rate before construction was finished. In either case, the analysis would be most useful as part of a broader analysis of fiscal risks, such as one that generated results in the form of Table 1.

3 Improving the reporting of PPP commitments

- 31. The public reporting of commitments can also help. If the reporting requirements are well designed, the preparation of the reports encourages the government to scrutinize its fiscal situation. And publication of the reports allows outsiders to question the government and make informed criticisms of its approach. Four kinds of reporting are relevant.
- 32. The first is the reporting of government financial statistics. Reporting according to the aforementioned Eurostat standards is an example. So is reporting according to the International Monetary Fund's *Government Finance Statistics Manual* 2001. Such reporting has many advantages, since it requires the presentation of a balance sheet showing government assets as well as government liabilities and an income statement as well as a cash-flow statement. At present, however, the standards don't

necessarily ensure very useful reporting of commitments in long-term purchase contracts. As noted earlier, Eurostat's guidance on PPPs means that governments don't report any liability as a result of signing a typical PPP.

33. The second kind of reporting is financial reporting, which is usually audited and required by law. It may be annual or more frequent. Most governments' financial reporting presents only cash expenditures and cash revenues, and selected financial assets and financial liabilities. Commitments in PPPs aren't included in the selected financial liabilities. But governments can choose to report according to more-demanding modern accrual accounting standards, which require the presentation of a full balance sheet and an income statement, as well as a statement incorporating the cash flows presented in traditional accounting. Governments, such as those in Australia and Britain, that have already adopted modern accrual accounting often recognize a liability on their balance sheet when they enter into a PPP (as well as a corresponding asset). Thus, they can generate a measure of their liabilities that incorporates the obligations created by at least many PPPs, as well as a narrower measure that excludes such obligations. Even when the standards don't require a liability to be recognized on the government's balance sheet, they tend to require the disclosure of relevant information about the commitments.

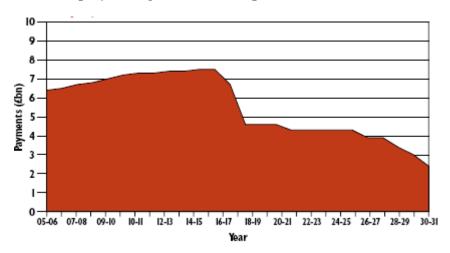
34. Governments wanting to adopt modern accrual accounting can adopt a version of local generally accepted accounting principles—GAAP—modified to suit governments (as early government adopters did). They can also adopt a modified version of International Financial Reporting Standards, the standards now used by firms in many countries around the world. The International Public Sector Accounting Standards Board has produced such a modified set of standards, which are called International Public Sector Accounting Standards, in and the South African government's Accounting Standards Board, to take one example, is currently promulgating standards based on IPSAS. (It has also published additional draft guidance on accounting for PPP that would ensure that most South African PPPs were recorded on the government's

¹⁰ See http://www.ifac.org/PublicSector/.

balance sheet).¹¹ Australian governments report according to Australian IFRS (IFRS modified locally to ensure applicability to public as well as private bodies).¹² Though neither IFRS nor IPSAS yet say anything specifically about long-term service contracts or PPPs, their rules on financial leases tend to require the recognition by government of liabilities for at least some PPP.

35. Adopting a set of modern accrual accounting standards is a task of many years, and in the short term, governments can also improve the reporting of PPP commitments in a third kind of report—annual budget-related documentation—without overhauling their accounting systems. Hungary, for example, includes a table on PPPs in its budget report that gives estimates of the present value of future availability payments for all its PPPs. Britain also reports forecast availability payments under its "private finance initiative" in its budget-related documents (Figure 2).

Figure 2 Britain's reporting of forecast payments to PPP firms (in real terms for projects signed under the private finance initiative)



Source: United Kingdom's "Pre-Budget Report" (www.hm-treasury.gov.uk).

A fourth kind of reporting is the publication of the contracts themselves, perhaps with a summary of their main terms and conditions (and

¹¹ See http://www.asb.co.za/.

¹² Information on governments' plans to adopt IPSAS can be found on http://www.ifac.org/PublicSector/.

perhaps excluding certain clauses that are genuinely commercially sensitive). This ensures that outside analysts can check that the government's disclosures are plausible. In Victoria, for example, departments must publish all contracts with a value of more than 10 million Australian dollars (\$8 million), though they may withhold certain information in compliance with the *Freedom of Information Act*.¹³

4 Strengthening procedural controls on PPP commitments

36. Calculating and reporting the cost of commitments is helpful, but exercising control over them also requires imposing rules on line ministries. In particular, governments can ensure that line ministries' decisions to enter into PPPs are reviewed and approved by a body with a stronger interest than the line ministry in fiscal management.

37. One way to do this is to have the ministry of finance approve planned PPPs at each of several stages in their preparation. In South Africa, for example, a ministry pursuing a PPP must seek the Treasury's approval at four separate stages: completion of the feasibility study, distribution of bidding documents including draft contract, selection of the preferred bidder, and signing of the contract. A lighter-handed approach, in which the ministry of finance approved progress at two or three stages, might also work. In some countries, the minister of finance may also sign the contract, alongside the line minister. (As well as being good for fiscal control, such measures may assure investors that the government will honor its comments).

38. The ministry of finance need not be a decision maker. An alternative is for the cabinet (or council of ministers) to make the decisions, having received advice from both the line ministry and the ministry of finance. In Victoria, Australia, for example, the Cabinet approves proposed contracts before expressions of interest are sought and again before bidding documents are sent to short-listed bidders.¹⁵ The parliament

¹³ See information on the government's "contract publishing system" and the contracts themselves at http://www.vgpb.vic.gov.au/.

¹⁴ The regulation is included in the National Treasury's PPP manual, available at http://www.treasury.gov.za/organisation/ppp/.

¹⁵ See the Partnerships Victoria policy document, available at http://www.partnerships.vic.gov.au/.

might also have a role in approving large PPPs (not just in annually rubber-stamping unavoidable expenditure under existing PPPs). In Hungary, the government must seek parliament's approval before signing any contract creating multi-year payment obligations of more than 50 billion forint (\$230 million) as a present value.¹⁶

39. As this example suggests, the rules might involve delegations that vary by the amount of the contract. Line ministers might be able to approve contracts with a present value of less than x, the minister of finance those between x and y, and cabinet those greater than y. The New Zealand government hasn't entered into contracts described as PPPs, but its ministries do enter into leases, which raise similar concerns. The leases are called finance leases if the accountants conclude they transfer to the government substantially all the risks and rewards of ownership; otherwise they are called operating leases. Ministerial chief executives have the authority to enter into operating leases with a value up to 7 million New Zealand dollars (\$5 million). Responsible ministers have authority up to 15 million New Zealand dollars. Beyond that, the cabinet must make the decision. The same limits apply to the purchase of assets, while the rules for finance leases are somewhat stricter, because finance leases are considered to involve public borrowing.¹⁷

40. Some ministries of finance have specialist PPP units whose main role is to promote high-quality PPPs. Such a unit probably has the skills to understand the costs of proposed contracts, but may not have a strong interest in monitoring and controlling the costs of PPPs. If so, the finance ministry's decisions should draw not only on the expertise of the PPP unit, but also on that of groups responsible for budgeting and debt management (as happens, for example, in South Africa).

5 Imposing substantive limits on PPP commitments

41. The last option we consider is to limit the maximum permissible volume of outstanding commitments under PPPs. Hungary's public-finance law, for example, limits the total nominal value of multiyear

¹⁶ Act 38 of 1992, on Public Finance, article 22.

¹⁷ See Cabinet Office Circular 7 of 1999 (http://www.dpmc.govt.nz/Cabinet/circulars/) and Treasury Circular 10 of 2005 (http://www.treasury.govt.nz/circulars/).

commitments in PPPs that may be assumed in any year to 2 percent of total government expenditure in that year. Brazil's federal law on PPPs states that the "government may enter into a public-private partnership contract only when the sum of the current expenditures derived from the partnership contracts already signed has not exceeded, in the previous year, 1% (one per cent) of the net current revenue of the fiscal year, and the annual expenditures of the contracts in effect, in the 10 (ten) subsequent years, do not exceed 1% (one per cent) of the net current revenue forecast for the respective fiscal years." It would also possible to limit the present value of PPP commitments to *x* percent of current GDP, and to allocate the total limit among departments, to help each plan its own PPP program.

42. Such limits are not entirely satisfactory: if PPPs are cheaper than, and replace, publicly financed projects, why limit them independently of limits on other public expenditure? But if the government doubts its ability to make prudent decisions about PPPs, as it might reasonably do given traditional accounting and budgeting rules, such limits can ensure its PPP program doesn't grow too large too quickly.

43. In the long run, it may be better to incorporate PPP commitments in broader fiscal targets. For example, a limit on the present value of PPP commitments could be subsumed in a limit on the present value of economic liabilities (including debt and PPP commitments). Along similar lines, the Victorian government has an attractive-sounding practice of approving a PPP only if the line ministry already has budgetary approval to pay for construction under public finance.

44. This approach wouldn't work for a government that wanted more investment than was possible under a Maastricht-type commitment. But such a government could set itself an additional fiscal target regarding the ratio to GDP of the *sum* of debt and PPP commitments. If it thought a debt-to-GDP ratio of 60 percent was too low, for example, it might set itself an additional target of keeping the ratio to GDP of debt plus PPP commitments below, say, 65 percent. (No judgment is made here about the appropriate ratio; it might of course be less than 60 percent.)

¹⁸ Act 38 of 1992, on Public Finance, article 12. PPPs approved according to the 50-billion-forint rule and those worth less than 1 billion forint are excluded from the cap.

¹⁹ See Act 11.079 of 30 December 2004, article 28.

45. None of these measures ensures good decisions about the use of private finance. But a combination of a good framework for comparing the cost of public and private finance, systems for incorporating PPP commitments in fiscal monitoring, good standards for reporting of the obligations to the public, rules strengthening the hand of the ministry of finance in decisions, and fiscal targets that incorporate the government's commitments to PPPs—a combination of these things should help governments to choose private finance when but only when it offers greater benefits than public finance.

References

- Brealey, Richard A., I. A. Cooper, and M. A. Habib. 1997. Investment appraisal in the public sector. *Oxford Review of Economic Policy*, Volume 13, Issue 4.
- Brealey, Richard. A., Stewart C. Myers, and Franklin Allen. 2006. *Corporate Finance*. Eight edition. McGraw-Hill.
- Brixi, Hana Polackova, and Allen Schick (editors). 2002. *Government at risk: Contingent liabilities and fiscal risk*. World Bank and Oxford University Press.
- Brixi, Hana Polackova, Nina Budina, and Timothy Irwin. 2005. Managing fiscal risks in PPPs. in *Current issues in fiscal reform in Central Europe and the Baltic States*, edited by Thomas Laursen.
- Flemming, John, and Colin Mayer. 1997. The assessment: Public-sector investment. *Oxford Review of Economic Policy*, Volume 13, Issue 4.
- Flyvberg, Bent, Mette Skamris Holm, and Soren Buhl. 2002. Underestimating costs in public works projects: Error or Lie? *APA Journal*, Volume 68.
- International Monetary Fund. 2004. Government guarantees and fiscal risk.
- International Monetary Fund. 2004. Public-private partnerships.
- Irwin, Timothy C. 2006, Government Guarantees: An analysis of the allocation and valuation of risk. Draft.
- Klein, Michael. 1997. The risk premium for evaluating public projects. *Oxford Review of Economic Policy*, Volume 13, Issue 4.
- Merton, Robert C., and Zvi Bodie. 1992. On the management of financial guarantees. *Financial Management*.
- Quiggin, John. 2004. Risk, PPPs, and the public sector comparator. *Australian Accounting Review*.
- Skamris, Mette K., and Bent Flyvbjerg. 1997. Inaccuracy of traffic forecasts and cost estimates on large transport projects. *Transport Policy*, Volume 4.