Cost of Capital for Private-Sector Toll Roads

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One argument raised by some critics of private toll roads financed under long-term concession agreements is that their cost of capital *must be* dramatically higher than that of public-sector toll roads. Public-sector toll roads are financed solely by debt, mostly or entirely tax-exempt toll revenue bonds. Private-sector toll companies use a mix of debt and equity—typically 20-25% equity and the rest debt. So the critics argue that since equity providers require a much higher rate of return than debt providers (they take on more risk, after all), and since the private sector can only issue taxable debt (which carries a higher interest rate than tax-exempt debt), the weighted-average cost of capital (WAAC) will be much higher for a private-sector toll road.

This argument was raised earlier this year by defenders of the status quo arguing against the possible long-term lease of the Pennsylvania Turnpike. And it was raised last year in Texas by those arguing against the development of SH 121 toll road in Dallas via a long-term concession rather than by the local public-sector toll agency. In the Pennsylvania case, a report by three academics that Peter Samuel and I criticized (see www.reason.org/pb70.pdf) estimated the private-sector's WACC at 7.75% compared with the Turnpike Authority's 5.23%. In the Texas case, critic Dennis Enright initially compared a hypothetical private-sector WAAC of 6.98% with a public-sector figure of 4.44%. But after reviewing the final proposals actually made for the SH 121 project, he found a much smaller difference: 6.17% for the private sector vs. 5.0% for the public agency.

The big reduction in the private-sector figure came from the ability of the private bidder to make use of subordinated, tax-exempt debt under the federal TIFIA program. That is one of two measures enacted by Congress in recent years to encourage private-sector investment in highway infrastructure. The second was the private activity bond (PAB) provision in SAFETEA-LU that permits state agencies that work with the private sector to develop road projects under long-term concession agreements to issue tax-exempt revenue bonds on behalf of the project. And that can make an additional difference in the private-sector's WAAC.

This difference was dramatically illustrated last month, when \$589 million worth of PABs were issued as part of the Transurban/Fluor project to add HOT lanes to the Capitol Beltway (I-495) in northern Virginia. The interest rate on this senior debt was just 4.97%. When combined with the \$587 million TIFIA loan at 4.45%, the weighted average cost of debt is just 4.71%. To be sure, 22.9% of the project cost is coming from Transurban and Fluor's equity investment. Assuming a high single-digit (e.g. 9%) rate of return on that, the overall WAAC for this project is 5.69%.

Last year the Pennsylvania Turnpike issued \$176 million in tax-exempt revenue bonds at 4.89%. But it also issued \$68 million of federally taxable bonds at 6.11%. The WAAC for the Turnpike's 2007 financing was thus 5.23%.

My point is that today's financing opportunities for private-sector toll roads enable them to come very close to the weighted average cost of capital that is available to long-established public-sector toll agencies. Positing a major difference in cost of capital between the two options should no longer be taken seriously as an argument. What should be considered instead are the trade-offs involved.

Whether it's a brand-new ("greenfield") toll road or an existing ("brownfield") one, there may be significant risk transfer to the private-sector partner, especially where major construction or reconstruction is involved. There are also differences between "system" financing and project financing. A large existing toll road system may be able to cross-subsidize a new toll road for a number of years, whereas the private sector typically finances each project solely based on its own revenues. System financing has its pluses, but if the new toll road has larger than expected losses, the toll agency will have to raise tolls on the rest of its system to meet its debt-service obligations. Under a long-term concession, toll rate increases on that road are generally capped; hence, if traffic and revenues are below forecast on the new road, the company has to absorb the losses. (That's what risk-transfer means!)

Those are the kinds of issues we should be debating when there is a choice between using the private sector or an existing toll agency. Yes, the private sector will likely have a slightly higher cost of capital. But the benefits may well be worth it.

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