



SECOND WORKSHOP ON Public-Private Partnerships (PPP's)

Local financing of PPP projects: The Chilean experience

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Infrastructure PPP's in Chile (Concessions)

- Started by the Chilean Ministry of Public Works in 1993.
- Stems from the need to revert the historic shortage of infrastructure of the country.
- Until August 2005, the concessions system involved investments for US\$7.1 billions in 48 projects.

| Concession | Investment <i>(US\$ billions)</i> |
|---------------------------|---|
| Highway "Route 5" | 2.3 |
| Other interurban projects | 1.9 |
| Airports | 0.3 |
| Urban highways | 2.1 |
| Other | 0.5 |
| Total | 7.1 |

Source: Public Finances Report 2006 – Ministry of Finance

Infrastructure PPP's in Chile (Concessions)

- The main financial aspects of concessions are:
 - The fixed assets involved are non-transferable.
 - The project life spans range from 20 to 30 years.
 - The different players (sponsors, concessionaires, insurance companies, investors, banks, independent consultants, rating agencies) who participate in the process have to agree in the financing model.
 - They require a deep and developed capital market capable of providing a long term financing.

Chilean Capital Market Features

- Deep and diversified capital market.
- Availability of long term financing.
- The stock of financial instruments in the market amounts to US\$177 billions (*march 2005*):
 - Stocks (market value): US\$118 billions
 - Corporate Bonds: US\$13 billions
 - Central Bank Issuances: US\$21 billions
 - Other (government instruments, other private bonds, etc.): US\$25 billions
- Daily transactions of fixed income instruments at the Santiago Stock Exchange average US\$500 millions.
- Pension funds manage a US\$61 billion portfolio, while insurance companies hold US\$18 billions (*2004*).

Sources: SVS, SAFP

Adjustments to the Normative

Related regulations were adjusted to facilitate the financing of this type of projects.

■ General Banking Law (DFL N°3) (1997)

- Art. 84 N°1.- Banks are allowed to grant loans for up to 15% of their effective net worth for the purpose of financing state public works carried out through the method of concession. Additionally, banks may grant such loans up to 25 % of such net worth, if the excess over 5 % is backed by real guarantees, stand by notes from reputable banks or other documents that meet specified requirements.

Adjustments to the Normative

■ Pension System's Law (D.L. N°3.500) (1994)

- Art. N°45.- Allows the pension funds to invest in stocks issued by open real state corporations.

■ Insurance Companies' Law (D.F.L. N°251) (1994)

- Art. N°21.- Allows insurance and reinsurance companies to invest in stocks issued by concessionaire companies, for technical reserve and risk equity purposes.

Adjustments to the Normative

■ Securities Market Law (Law N°18.045) (1999)

- Art. 135.- Allows the securitization companies to acquire credits and rights over cash flows from public works or from the concessions of these assets or works.

■ Tax matters:

- VAT Law: VAT recovery in stages of construction and exploitation.
- Tax on earnings law: Adds special rules about amortization of assets and calculation of the taxable base amount of the concessionaires.

Financing

- There are three types of local financial players that can participate in the financing of public-private partnerships (PPP):
 - Investment Companies: as partners with construction companies.
 - Banks: providing short term financing for the construction and try-out stage.
 - Institutional investors: Buying infrastructure bonds or shares on investment funds, or acquiring direct participation as shareholders .



Financial Sources

- Capital.
- Bridge loans: paid with the proceeds of the placement of bonds.
- VAT recovery from the Ministry of Public Works.
- Bonds.
- Toll fees.
- Subsidies.

Financial Sources

| Source | Concession 1 | | Concession 2 | |
|------------------|--------------|-------|--------------|-------|
| | (MMUS\$) | % | (MMUS\$) | % |
| Bond Issues | 552 | 58,4% | 442,5 | 65,6% |
| Capital | 87 | 9,2% | 72,2 | 10,7% |
| Subordinate Debt | 121 | 12,8% | 91,1 | 13,5% |
| Financial Income | 3 | 0,3% | 6,3 | 0,9% |
| Toll fees | 159 | 16,8% | 51,3 | 7,6% |
| VAT | 24 | 2,5% | 11,3 | 1,7% |
| Total | 946 | | 674,7 | |

Source: Concessions prospects.

Distribution of Project Risk

- Risk is distributed among the various agents involved: State, concessionaire, creditors.
- If the risk is non-diversifiable, then the State assumes part of the risk
- The main risks are:
 - Cost overrun
 - Time overrun
 - Reduced level of demand (diminished revenues)
- The State can reduce project risk and make these projects more attractive in two ways:
 - Potential subsidies.
 - Sharing risk. The Chilean State has chosen this option through compensations and guarantees.

Guaranties

■ Guaranteed Minimum Income

- This state-given guaranty is triggered when the annual income projections by the concessionaire do not meet the amount agreed upon in the bidding prospect.
- When the project yields are higher than those stated in the contract, the concessionaire must share the excess with the State.
- Another alternative is to use mechanisms of minimum income bands.
- The net value of future fiscal commitments reaches US\$174 millions for the whole set of current concessions.



Guaranties

■ Exchange Hedging Mechanism

- It is a guaranty that helps concessions to handle the volatility in the exchange rate.
- The mechanism limits the exchange risk faced by the concessionaire, transferring to the State the profits or losses.
- Presently, only two concessions are covered by this mechanism.
- The present value of these flows reaches US\$37 millions in favor of the State.



Bonds

- Instrument issued by the concessionaire and purchased by institutional investors (AFP's, insurance companies).
- The bond's risk rating is critical, since AFP's can only invest in assets classified as "investment grade". (rating better than or equal to BBB-).
- The issue can be made in the pre-operative period ("project finance"), or when the concession is in operation.

Bonds

- A typical bond issue is characterized by:
 - Issuer: concessionaire.
 - Use of funds: payment of bridge loan; bond issuing and allocation expenses; construction, maintenance and operation costs of the project.
 - Acceptable Risk Rating allowing AFP's to invest.
 - Financial insurance for bonds.
 - Guaranties: special second grade pledge supporting the fiscal public work, legal guaranty, commercial guaranty.
 - Causes of early maturity: bankruptcy, failure of the issuer or the insurer.
 - Full payment of the bond in advance: By expropriatory action or by event that produces total or partial loss.

Bonds

- Characteristics of projects getting investment grade rating:
 - ☐ Short term of construction.
 - ☐ Low technological risk.
 - ☐ Conservative construction calendar.
 - ☐ Adequate experience from contractors and suppliers and good capacity for fulfilling their obligations.
 - ☐ Easiness to get permits and expropriations.
 - ☐ Country's political stability.
 - ☐ Low environmental impact.
 - ☐ Adequate legal structure.
 - ☐ Proper insurance coverage.

Bonds

Structure of Bonds Demand

| Type of Investor | Demand | Weight in investor's portfolio |
|--------------------------------|--------|--------------------------------|
| AFP's | 47% | 1,4% |
| Insurance companies | 44% | 3,8% |
| Other (Investment Funds, etc.) | 9% | |
| Total | 100% | |

Bonds

- To improve the credit profile of the issue, third parties can join through:
 - Capital insurance
 - Accepting the risk of no payment in exchange for a commission. This allows a better risk rating for the bond.
 - At the present time, all issues, with only one exemption, are supported by this type of guaranty.
 - Securitization
 - Isolates the risk of assets or rights from the risk of the owner of those assets or rights.
 - Securitizable rights: cash flows from toll fees and subsidies from State.
 - Presently, there is only one bond securitization issue, associated to the Penitentiary Infrastructure Group 3 project, for US\$140 millions.

Bond Allocations

| ALLOCATION DATE | ISSUER | RATING | MATURITY (YEARS) | AMOUNT (US\$ millions) | INSURER | INTEREST RATE |
|-----------------|----------------------|--------|------------------|------------------------|--------------------------|---------------|
| November – 98 | Talca – Chillán | AAA | 9.5 | 152,9 | MBIA Insurance | 8.15% |
| December – 98 | SCL | AAA | 14.0 | 213,0 (*) | MBIA Insurance | 6.95% |
| August – 00 | Ruta de la Araucanía | AAA | 20.0 | 199,3 | XL Insurance | 7.42% |
| March – 01 | Autopista del Bosque | AAA | 20.5 | 208,0 | XL Insurance | 6.38% |
| August – 01 | Autopista del Maipo | AAA | 21.0 | 421,0 (*) | MBIA Insurance | 7.37% |
| April – 02 | Rutas del Pacifico | AAA | 12.0 | 25,0 | Financial Assurance (**) | 5.5% |
| April – 02 | Rutas del Pacifico | AAA | 23.0 | 261,0 | Financial Assurance (**) | 6.02% |
| May – 02 | Autopista del Sol | AAA | 16.0 | 138,2 | Financial Assurance | 6.35% |
| April – 03 | Los Libertadores | AAA | 14.0 | 49,8 | XL Capital Assurance | 5.78% |
| April – 03 | Los Libertadores | AAA | 7.0 | 37,3 | XL Capital Assurance | 4.00% |
| July – 03 | Variante Melipilla | AA | 21.8 | 15,8 | -.- | 6.49% |
| December – 03 | Autopista Central | AAA | 23.0 | 367,0 | MBIA Insurance | 5.3% |
| December – 03 | Autopista Central | AAA | 23.0 | 250,0 (*) | MBIA Insurance | 6.22% |
| December – 03 | Costanera Norte | AAA | 21.0 | 220,2 | Ambac Assurance (**) | 5.67% |
| December – 03 | Costanera Norte | AAA | 12.0 | 48,0 | Ambac Assurance (**) | 5.22% |
| June - 04 | V. Norte Express | AAA | 24.5 | 427,7 | MBIA insurance | 5.22% |
| October – 04 | Autopista del Maipo | AAA | 21.0 | 159,6 | MBIA Insurance | 4.69% |
| November – 04 | Vespucio Sur | AAA | 24.0 | 146,2 | XL Capital Assurance | 4.6% |
| November – 04 | SCL | AAA | 15.0 | 86,9 | MBIA Insurance | 4.19% |
| June - 05 | Talca – Chillán | AAA | 14.5 | 170,7 | MBIA Insurance | 3.04% |

(*) Issue currency: USD. All other issues are in UF (Chilean inflation-readjustable money unit).

(**) Sponsored by the Interamerican Development Bank.