PROJECT INFORMATION DOCUMENT (PID) CONCEPT STAGE

Report No.: AB4056

	Report No.: AD4050
Project Name	SÃO PAULO METRO LINE 4 (PHASE 2)
Region	LATIN AMERICA AND CARIBBEAN
Sector	General transportation sector (100%)
Project ID	P106390
Borrower(s)	STATE OF SAO PAULO
Implementing Agency	CPTM – Companhia Paulista de Trens Metropolitanos
Environment Category	[X] A [] B [] C [] FI [] TBD (to be determined)
Date PID Prepared	September 10, 2008
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Appraisal Authorization	
Estimated Date of Board	July 7, 2009
Approval	

1. Key development issues and rationale for Bank involvement

The São Paulo Metropolitan Region (SPMR), with 8000 sq. km, has 18 million inhabitants spread irregularly over 39 individual municipalities which are dominated by the São Paulo Municipality (SPM) with 11 million inhabitants. The SPMR generates roughly 20% of the GNP and is considered the most important economic region of the country. Each day, 39 million person trips take place in the SPMR of which 13 (33%)million are walking trips, 14 (37%) million by individual auto and the rest by public transport (23% by bus, 4.5% by metrorail and 2.5% by suburban rail). Of the 12 million trips by public modes, about one third use more than one vehicle, requiring some sort of modal transfer: 78% of all metro trips, 61% of all train trips and 16% of all bus trips require one or more transfers to be completed. This level of urban transport activity, dominated by the road-based motorized modes has significant impacts on the SPMR's environment (see below).

Despite an existing 315 km rail-based network (see annex 1 with info on São Paulo Metro and Suburban rail-CPTM), the lack of full integration between the metro and the suburban trains discourages more rail trips, in favor of buses and the automobile creating heavy congestion during peak hours thereby significantly increasing home-to-work trip time. The urban poor are the main users of public transport and bear the brunt of these problems: (i) shortage of capacity at peak hours resulting in overcrowded (>8 pass/m2) often inhuman conditions, (ii) long work journeys (2.5 hours/day) from the metropolitan periphery to the urban centers, with often more than two modal transfers; and (c) paying from 15-20% of their income towards fares if not formally employed. Lack of coordination between the 3 levels of government responsible for urban transport, particularly between the State (SSP) and the Municipality of São Paulo (SPM), led in the past to poor tariff and modal integration, lack of coordination hurt the SPMR for several years, but by the end of 2006, the State and the Municipality of São Paulo started to coordinate their transport policies and integrate the municipal buses with suburban rail and metro.

The recent introduction of the Bilhete-Único, an integrated tariff which allows a user to buy a single ticket which costs less than the sum of individual tickets and can be used in several modes within a certain period of time, was one of the major victories of the previous and present administration which benefited considerably the low-income segments of the population. But it also increased considerably (by 12% in one year) the demand on rail-based systems which therefore need to increase very quickly

the supply of trains at peak hour, so that this surge in demand is transported with a level-of-service that is acceptable and safe and with frequencies which reduce the waiting time at stations. Doing so will also attract more users from road to rail with positive impact on the environment and on containing or reducing congestion. Not doing so will discourage people from using the rail system and go back to road based systems, thereby increasing congestion. Having the additional stations in place will certainly shorten the itinerary of the buses which will feed those stations and will also increase the accessibility by foot and by car of the São Paulo inhabitants that live in the catchment areas of those stations.

The Line 4 Project is a priority undertaking within the Integrated Urban Transportation Plan (PITU) for the SPMR. The Project will (i) serve as a "bridge" between Metro's Line 5 and CPTM 's West commuter line to the Metro network, (ii) interconnect with all three existing Metro lines to provide a grid flexibility to the Metro network which does not exist with the present radial configuration, and (iii) interconnect two CPTM commuter rail lines. At the end of the project, the whole metrorail network will be interconnected thereby facilitating access to most of the sectors of the SPMR.

Key Development issues: So, in short it can be stated that the key development issues continue to be:1) Improvement of accessibility, availability, acceptability and affordability of public transport services particularly for the low-income segments of the population. These are the main factors to measure the quality of urban transport; and 2) increase in the number of transfer nodes in the Metro network to facilitate modal integration and therefore decrease the length of trips by road-based modes. The completion of Phase 2 stations is expected to reduce the number of vehicle-kms by road-based modes mainly buses which will shorten their itineraries by feeding the stations. This reduction in vehicle-kms will reduce also vehicle-emissions due to public transport.

Rationale for Bank's Involvement: The Bank's assistance strategy in Brazil is to support policies and investments that will encourage economic growth and social development in a context of macroeconomic stability. Our emphasis is on efficient resource allocation, increased efficiency in the public sector and the appropriate targeting and delivery of support systems to the poor. The proposed project is consistent with the Bank's Country Partnership Strategy (CPS) endorsed by the Bank on May 1, 2008. This CPS will continue to support the same four main pillars namely equity, sustainability, competitiveness and sound macro economic management endorsed in the previous CAS. The proposed project objectives are in line with Brazil Department and Infrastructure Division objectives, namely: (i) to promote financial viability of public enterprises and their reform, including decentralization to various levels; (ii) to contribute to poverty alleviation; and (iii) to reduce Government subsidies through better tariff policies and improved financial management. Through its involvement, the Bank has already helped in the decentralization process from Federal to State and is now assisting the State in the consolidation of its rail-based systems and in the tariff and modal integration process. The proposed project is also a follow-up to the efforts started with (see Table 1): a) the São Paulo Metropolitan Transport Decentralization Project (Ln. 3457-BR), which succeeded in the decentralization and modernization of the federally-owned CBTU to the State and laid the foundations for metropolitan coordination and a long-term strategy; b) the Barra Funda-Roosevelt Project which allowed the physical interconnection of the ex-CBTU and ex-Fepasa (state owned)systems with the creation of CPTM and a considerable improvement in the Luz and Brás stations; c). the ongoing Phase 1 of São Paulo Metro Line 4 (due to be in operation in 2009) project which is going to increase the interconnection between the existing metro and suburban rail network and was the first PPP signed in the country; and d) The São Paulo Trains and Signaling project which was approved in May 2008 and which will finance trains and signaling systems for both rail-based systems of the SPMR. The State has followed as much as possible a strategy of improving metropolitan coordination, designing, updating and implementing an urban transport, land use and air quality strategy (PITU), looking for financing mechanisms other than government budgets and progressively promoting the participation of the private sector in operations

and investment in the sector. The main beneficiaries of the above projects have been primarily the lowincome users who make up more than 50% of the rail-based system users. The State has shown commitment and has given priority to urban transport Bank-financed projects even in times of budget restrictions.

2. Proposed objective(s)

The main objective of the Line 4 (Phase 2) project is to build and enter in operation five Line 4 stations not completed in Phase 1 of the project and build one new station at the Vila Sónia yard. These stations could not be included in Phase 1 of the project due to the debt limits imposed on the State of São Paulo by the Republic of Brazil at the time Phase 1 was launched. As such, when Phase 1 was approved, it had already been decided that a Phase 2 of the project would be needed to build the remaining stations, as soon as the State would be able to secure the necessary guarantees from the Republic of Brazil to obtain a loan for the construction of the remaining stations.

This objective will be met by (i) financing the civil works and equipment required to complete the existing shells prepared in Phase I for those stations and build a new station at Vila Sónia yard and its access 1.5 km tunnel (ii) financing the project management oversight consultant and supervision consultants required to oversee and manage the works.

The stated main objectives of the Line 4 project were : a) to improve the quality and longterm sustainability of urban transport in the São Paulo Metropolitan Region (SPMR) by interconnecting the existing subway, commuter rail and bus networks through the construction of Metro Line 4; b) to improve the accessibility of the low-income population of the areas served by Line 4 to employment centers and health and education facilities; c) to seek private sector participation in the development of Line 4. The Project Development Objectives will remain the same in the proposed Phase 2 loan.

3. Preliminary description

The project would comprise two components:

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(a) **an Infrastructure and Equipment** component to help complete 4 stations (São Paulo-Morumbi, Fradique Coutinho, Oscar Freire and Higienópolis-Mackenzie) for Line 4 initiated in Phase 1, build one new station (Vila Sónia) and its access tunnel (1.5kms) and acquire and install the necessary equipment to operationalize those stations. This component represents 97% of the project costs; and (b) <u>a **Technical**</u> <u>Assistance</u> component to help in the project management oversight and project supervision of the works of Phase 2 as well as specific studies or assessments required during the execution of Phase 2. This component represents about 3% of the total project cost.

4. Safeguard policies that might apply

The Line 4 (phase 1) project had a full environmental assessment which was approved by the Board prior to its appraisal. Subsequently, after the Pinheiros station accident and as a prerequisite for the Add. Financing loan, the Bank required a detailed social assessment and periodic monitoring of those affected by the accident and also an environmental impact of the accident. Both were posted in the Infoshop. For Phase 2, the original Environmental Assessment stands but will require an addendum for the 1.5km tunnel and the new Vila Sônia station because they were not included in that EA. Metro has already applied for a "preliminary license" (Licença Prévia) for those two new structures. The original

resettlement plan included 11 commercial properties which were not expropriated in phase 1 at the request of the judge who would only allow their expropriation once phase 2 was officially authorized by the State. Now that the State has already authorized Phase 2, the expropriation process can be launched.

5. Tentative financing		
Source:		(\$m.)
Borrower		130
International Bank for Reconstruction and Development		130
JAPAN: Japan Bank for Internaitonal Cooperation (JBIC)		130
	Total	390

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