

TRACER STUDY OF THE URBAN TRANSPORT PROJECT IN SURAKARTA CITY

Conducted by R. Baoy and A. Soegito, April 2017

Background

Surakarta (also known as Solo) is a city located in Central Java with a population of 600,000 and a land area of 46 sq. km. The city serves as a regional center for trade and commerce and attracts a high commuting population from the neighboring regencies that comprise Greater Surakarta whose aggregate population is estimated at 1.5 million. The city also serves as a regional transport hub for Central Java with a number of railway stations located within the city boundaries.

Because of rising incomes, easy credit and low fuel prices, private cars and motorcycles have become the dominant mode of urban transport in Surakarta over the past two decades. This shift towards personal modes of travel has not only resulted in the decline of the modal share of public transport but also increased use of road space by cars and motorcycles to the detriment of public transport and non-motorized vehicles such as becak. This trend particularly affects the poor who depend on public transport and walking to fulfill their daily needs.

PFS period	Oct 2010 – May 2011
Focus sectors	Urban transport
CDIA supported activities	Urban transport infrastructure investment programming; PFS on high priority projects; Linking of PFSs with potential financiers
L2F Status	Funded by local and national budget



Fig. 1: Street scene during a car-less weekend along Slamet Riyadi

Aware of the growing urban transport problems of the city, former Surakarta Mayor and current President of Indonesia, Joko Widodo, formally requested for CDIA assistance in the formulation of an urban transport sector strategy and preparation of a pre-feasibility study of priority urban transport project in Surakarta in December 2009. Following the approval of the request, CDIA dispatched a team of consultants to help the city formulate a strategy and long-term vision for a sustainable urban transport, identify and prepare PFS for high priority and bankable transport

investments and recommend suitable arrangements for institutional capacity development and governance strengthening to manage and maintain the transport sector.

As part of its internal monitoring and evaluation processes, CDIA conducted the tracer study in Surakarta City from April 6 to April 10, 2017 to track progress, effectiveness and results of the completed intervention. Following is a summary of the tracer study findings.

CDIA Intervention

The CDIA consulting team was dispatched to Surakarta from October 2010 to May 2011. As one of the objectives of the intervention is to strengthen the capacity of key institutions managing the urban transport sector, the CDIA team adopted a participatory approach in delivering the technical assistance starting from the formation of Steering Committee and Technical Working Groups until the preparation of final PFS report. Working closely with the Transportation Department (DisHub) under the Office of the Mayor, the consulting team completed the PFS in June 2011.



Fig. 2: Contra-flow implemented in 2016 along Slamet Riyadi

Guided by the Mayor’s vision for the city that is to “Move People Not Cars”, the team recommended an integrated and coherent strategy to solving Surakarta’s urban transport problems through the provision of well-planned and managed bus services at affordable fares and by limiting the use of private vehicles while promoting sustainable and equitable modes of transportation.

Consistent with the above strategy, the PFS team recommended the expansion of the Batik Solo Trans (BST)¹ network through the implementation of BST Line 2 (northwest to south), BST Line 3 (north to south) and BST Line 4 (east to west). In addition, the team recommended key traffic management measures including: i) construction of contra-flow bus lane along the one-way section of Jl Slamet Riyadi, a major spine road in the city center; ii) upgrading of 29 junctions including provision of modern traffic signal equipment; iii) improvement of parking management including construction of off-street car parks; and iv) enhancement of the Central Control Room (CCR) for better traffic control operation.

Progress as of April 2017

The city implemented BST Line 2 between the Airport and terminus in Solo Baru in 2014 as recommended by the PFS. PT Bengawan, a private consortium of five private bus transport operators formed in 2013, operates this route of about 28 km under a 5-year contract with the city government. The firm operates and maintains 16 buses provided to the city by the Ministry of Transportation, 50 drivers and bus conductors and a bus depot at the west-end of Line 2.



Fig. 3: BST bus picking up a passenger from a portable bus shelter along Line 2 for people with special needs



Fig. 4: One of several PWD-friendly bus shelters constructed by the city

Other key PFS recommendations implemented by the city after PFS completion in 2011 include: rationalization of bus routes, implementing the contra-flow in Slamet Riyadi, improvement of non-motorized transport facilities including pedestrian and NMT lanes, regulation of on-street parking in busy streets, development of feeder routes, among others.

Studies have been carried out by the city for the BST to provide service to the entire city in line with original transport sector objective of providing safe, comfortable, affordable and sustainable transportation to city residents. From 4 corridors identified by the PFS in 2011, the city will expand the BST bus routes to 15 corridors, 8 of which are feeder routes to be served by “angkots” or traditional small vans currently plying the bus routes not served by the BST.

¹ Batik Solo Trans is a high quality bus service using new air-conditioned buses with BRT-type high platform stops introduced in Surakarta in late 2010. BST buses are being provided by Indonesia’s Ministry of Transportation to selected cities as part of the national strategy to improve public transportation and reduce emissions from older bus fleets. In 2011, the BST was operating in one route with a fleet of 15 buses and flat fare of Rp3,000.

Intervention Results

The provision of alternative means of transportation that is safe, affordable, timely and comfortable for the city's 600,000 residents is the key benefit from the BST project. Although, the current BST ridership of about 2.5 million annually is still lower than projections, the city officials are very optimistic that ridership will increase in the coming years with the expansion of BST network, rationalization of bus/feeder routes and continuous promotional campaign through leaflet distribution and mass media aimed at enticing the public to patronize the BST service.



Fig. 5: BST buses are equipped with seats for people with special needs

BST commuters interviewed by the team reveal that the additional BST route has improved the accessibility to their work places and to the city center. School children and teenage students who are prohibited by law to drive motorcycles are likewise benefited not only by the safe and timely bus service but also by the 50% discount from the flat fare of Rp4,000.

Among the beneficiaries of the BST are the persons with disability (PWDs) numbering about 23,000 (as of 2015) as well as the elderly people of Surakarta who now enjoy the accessibility features of the new buses and the bus shelters.



Fig. 6: Bus maintenance depot managed by PT Bengawan

City officials revealed that the participatory approach adopted by the PFS team enhanced their urban transport planning skills. These learnt skills proved to be very useful when they prepared detailed plans for expansion of the BST network. Implementation of the BST expansion plan, however, proved to be difficult as the details on how to execute the plans were not specified by the PFS. According to Dr. Budi, local urban transport adviser of DisHub, "although CDIA already prepared the PFS, local transport officials needed to understand the real problems on the ground and make

adjustments. The city had to mobilize local experts to review the socio-cultural implications of the detailed plans."

Conclusion and Lesson Learned

Overall, the tracer study findings indicate that the urban transport project whose preparation was supported by CDIA back in 2011 succeeded in responding to the urban transport needs of Surakarta City. Key to the success of project implementation was good project preparation that was based on long-term vision shared by all stakeholders and the strong support by the local and national government from planning to execution of project plans.

A key lesson from the CDIA experience in Surakarta is the importance of utilizing local knowledge and expertise in addressing urban transport issues. Mr. Hari Prayitno, head of Surakarta City Transportation Office, confirmed this learning when he said that "managing transportation system should be based on local wisdom, not just by replicating or adopting ideas from other countries."