

CHAPTER ELEVEN

TRANSPORT

Transport and Poverty Reduction

Transport is critical to poverty reduction but if inappropriately designed, transport strategies and programs result in networks and services that heighten the conditions of the poor, harm the environment, ignore the changing needs of users, and exceed the capacity of public finances. Transport is capable of generating growth by facilitating trade both nationally and internationally, and by increasing access to social services like health and education.

At the macroeconomic level, investment in transport raises growth by increasing the social return to private investment. Similarly, at the microeconomic level, improvements in transport often lower agricultural input prices and hence the costs of production. In addition access to markets generally improves and hence facilitates the development of the non-agricultural rural economy and tourism. In urban areas, the quality of transport service influences the location of firms and individuals. The cost of labour and the efficiency of the labour market are also determined by transport.

Without an efficient transport system, it is harder and costly to move goods, resulting in loss of market competitiveness and lower economic growth. Further, Zambia can benefit from her central location by serving as a hub of economic development in the region as a transit route. In the rural areas where poverty is more extensive, a cause of poverty is inadequate transport, which leads to restricted access to markets.

The Transport Situation

The main modes of transport in Zambia are rail, road, air and maritime. The rail network work comprises the Zambia Railways, running from the Zimbabwean border in the south to the Congolese border in the north. The Tanzania Zambia Railways (TAZARA), jointly owned by Zambia and Tanzania, links the former to the port of Dar es Salaam. A smaller rail line links Livingstone with Mulobezi and was previously used for ferrying timber. It is now dysfunctional.

Both Zambia Railways and TAZARA were constructed primarily to serve the mining industry. As farming took root along the line of rail, especially along the Zambia Railways, haulage of agricultural produce created extra business. The decline of mining and agriculture has reduced the volume of business available to the railway lines. This has been compounded by lack of maintenance, resulting in inefficient operations and the road sub-sector taking a larger share of business.

The road network is the backbone of the Zambian transport system reaching to remoter areas where other modes cannot. Zambia has a gazetted road network of approximately 37,000 km of which 6,476 km are bituminous and surfaced to Class 1 standard. The gravel and earth roads account for 8,478 km and 21,967 km respectively. In addition there are about 30,000 km of ungazetted community road network comprising tracks, trails and footpaths. A large part of the main road network was constructed between 1965 and 1975. Over the years the country's road

infrastructure has been eroded through lack of maintenance. The main problems have been institutional and financial which relate to:

1. Inadequate and erratic flow of funding;
2. The inadequacy of the institutional framework within which roads were managed;
3. Poor terms and conditions of employment;
4. Lack of clearly defined responsibilities among road management actors;
5. Lack of managerial accountability.

The inadequate institutional framework as well as lack of clearly defined responsibilities is manifested in the present arrangement. The responsibilities for planning, preparing design standards, construction and maintenance of roads are fragmented among the various government institutions. These are the Ministry of Communications and Transport; the Roads Department in the Ministry of Works and Supply; Department of Infrastructure and Support Services in the Ministry of Local Government and Housing; Zambia wildlife Authority (ZAWA) in the Ministry of Tourism and to some extent the Ministry of Agriculture, Food and Fisheries; and the Ministry of Finance and Economic Development for the Social Recovery Project dealing with rehabilitation of community roads.

With respect to air transport, there is need to improve air services to complement other transport modes and to make Zambia a regional Air transport hub.

Water transport in Zambia is presently not significant although it is critical to some places in the Western, Northern and Luapula provinces where it is the only reliable form of transport. The country has abundant navigable lakes and rivers but the development of the sector has been inhibited by lack of technical know-how in the management of inland waterways. The situation has been exacerbated by lack of handling equipment at harbours and inadequate dredging facilities particularly for canals and rivers. There is need to develop Zambia 's lakes, rivers, ports, and harbours to increase alternate use of transport modes and improve trade with neighbouring countries. Development of Mpulungu harbour in Northern province will lead to increased volume o exports through east sea routes.

PRSP Interventions in Transport

The primary goal for the PRSP interventions on transport are first and foremost to support the economy to grow, thereby enabling more resources to be generated for more public interventions in all areas, including transport. For sustainable national development there is need for a national transport policy that requires the development of a comprehensive transport programme which is divided into three priority categories. -

1. Preserving investment already made in Infrastructure roads through maintenance.
2. Establishing infrastructure, which aid economic recovery and poverty reduction.
3. Establishing infrastructure which bring environmental and social benefits, and
4. Instituting effective management systems.

These issues will now be discussed within each transport mode.

Railways

As the mining industry slowly recovers followed by the related sectors the volume of business for railway will also recover, provided they can match the competition from road transport. A well functioning railway system is important for enhancing export competitiveness, economic growth and poverty reduction since railway haulage tends to be cheaper than other modes where speed is not a major consideration.

Government shall therefore focus on the following issues:-

1. Ensuring the rehabilitation and preservation of investment and the continuous improvement of the rail infrastructure
2. Improving railway efficiency through concessioning to the private sector.
3. Make arrangements for new railway connection to areas that will come into new economic production especially large-scale mining.
4. Level the playing field between roads and rail so that it is not economic for very heavy cargo to be transported by roads in order to reduce pressure on roads.
5. Expand and strengthen government capacity to develop supportive regulatory and investor-friendly legislation, monitor compliance with policies and legislation;
6. Standardising practices and procedures in line with SADC member states to provide seamless and predictable service throughout the region;
7. Provide a competitive, cost- effective, commercial, efficient and market-driven railway transport system.
8. Foster inter-modal co-operation between road and rail, especially for the movement of international freight and passengers;
9. Promote co-operation with regional railways to ensure uninterrupted movement of cargo at interchange points.
10. Promote collaboration between Zambia Railways Limited and TAZARA.
11. Evaluate and implement extension of the railway network like Chipata-Mchinji rail link and the Kasama-Mpulungu rail link as part of railway network development strategy;

Although all the above objectives are important, the first five take priority.

Road Transport

Road Infrastructure

Being a large but poor country, Zambia will continue to depend on road transport. There are two major challenges associated with this, however. Firstly, her extensive road infrastructure is in need of rehabilitation and maintenance. A stagnant economy, heavy debt burden and wrong priorities have all contributed to road deterioration. The second challenge is linking this important transport mode with increased overall productivity for the economy.

Over the next three years, Zambia intends to continue putting greatest priority on rehabilitating and maintaining all her road network from feeder to trunk roads. This is important for the following reasons:

1. Delay in maintenance and rehabilitation increases costs eventually.
2. Economic growth and poverty reduction require that the roads and other transport systems are efficient and cost effective and this is not possible with poor roads.
3. Efficient delivery of services including emergency relief requires good roads.
4. Road rehabilitation creates jobs and business opportunities, often at the lower end of the labour market and this has direct impact on reducing income poverty.

Zambia has been undertaking road repair under Road Sector Investment Program (ROADSIP), which is a partnership between road users, the government and donors to promote development through roads. The first phase was launched in 1998. ROADSIP's objective has been to bring a core network of the road to maintainable condition and already positive impact has been registered with the percentage of paved roads in good condition having risen from 20 in 1995 to 44 in 1999 and the paved roads in poor conditions falling from 51 percent in 1995 to 29 percent in 1999. Over the first PRSP period, ROADSIP II will be launched and it will continue with the objectives set out in phase I.

For the size of her economy and the population parameters, Zambia's paved road network is quite extensive, exceeding that of the average for Sub Saharan Africa and even that for Zimbabwe and South Africa. This partly explains the difficulty in keeping abreast with maintenance and rehabilitation. The implication is that Zambia will minimise construction of new paved roads and pay more attention to looking after what she already has including rural feeder roads. Further, economic and social rates of return will be applied for trunk, main and urban roads in the selection of roads for improvements.

Many of Zambia's paved and other roads were not necessarily constructed as part of an organised package to enhance national productivity or capitalise on her central location for trade. With the emphasis now being placed on growth, the roads must be integrated into the overall plan to make this happen. This will be done as follows:

1. Rehabilitation and maintenance of all roads to enhance efficiency.
2. Where new mining areas are to be opened up as anticipated in the Lumwana area in the North-Western Province, appropriate road connections will be done to complement the railway connection
3. In agriculture new farming blocks will be established in rural Zambia to take advantage of the land and water resources to produce high value products. Farm blocks must be near existing roads but where this is not feasible new roads, not necessarily paved, will be constructed.
4. A similar approach will be taken for tourism. In all tourist zones, the minimum intervention will be to ensure continued accessibility through good roads.

Rural Travel and Transport: -

Poverty is said to be highest in most of the Zambian rural areas because of the lack of access to market for agricultural produce as well as productive inputs. This has been worsened by the poor transport systems that exist in rural areas. Therefore, if the poverty situation in rural areas has to be addressed the issue of transport has to be of paramount importance. In order to improve the rural travel and transport, the following measures have been proposed:

- (i) Establish an institutional framework for the development and management of rural transport and travel in the country;
- (ii) Improve the planning, management and financing of rural road transport as well as upgrading the road infrastructure such as community roads, paths, tracks, trails and footbridges through community participation;
- (iii) Facilitate the rural communities with establishment of sustainable approaches to the construction and maintenance of rural transport infrastructure;
- (iv) Facilitate the introduction and promotion of appropriate motorised and non-motorised means of transport aimed at improved mobility in rural areas;
- (v) Encourage the development of industries for the design, manufacture, repair and maintenance of intermediate motorised and non-motorised means of transport for rural areas, and
- (vi) Ensure that gender issues are considered in rural travel and transport.

Institutional and Management Issues in Roads

For the goals outlined above to be realised, the government is aware that a number of institutional and management issues will need to be dealt with. The key issues are as follows:

1. The multiplicity of authorities in the management of roads causes difficulties.
2. Within a rationalised authority for roads, Government's role will primarily be to plan, facilitate, co-ordinate, implement, regulate and monitor developments in the infrastructure and industry. The private sector will do the rest.
3. Create a more credible and sustainable domestic system for financing and managing the road network to gradually reduce dependence on external financing.
4. Institutional reform and human resources development will be undertaken;
5. Promote the road transport growth in the region, by levelling the playing field with other countries and improved traffic handling at border points.

Road Safety

Zambia loses an average of 1,000 lives through road accidents and it is estimated that road accidents in Zambia cost the country about 2.3% of the Gross Domestic Product (GDP) annually. Costs include direct costs such as damage to vehicles, policing and administration costs, medical expenses and insurance costs. In order to reverse this trend, Government will focus on the development of appropriate legislation to ensure

satisfactory safety levels, and the Implementation of efficient and effective law enforcement procedures in line with regional norms.

These issues would be tackled through pursuance of the goal of protecting the lives of road users and property through the introduction of appropriate road safety measures and enforcement of regulations.

In achieving this goal government will put in place the following policy objectives

- (i) Make road safety engineering aspects compulsory in the construction, rehabilitation and maintenance of roads;
- (ii) Improve the awareness of the need for better road safety behavior among the road users through publicity and training; and
- (iii) Improve the enforcement of traffic laws and regulations.

Based on the policy objectives Government shall: -

- (i) Institute safety engineering within the present and future institutional arrangements in the road sector;
- (ii) Collaborate with relevant agencies in a national road transport authority for motor vehicle examination and testing in accordance with regionally accepted standards;
- (iii) Integrate the National Road Safety Council into a national road transport authority for efficient management of the road safety;
- (iv) Improve the reporting and analysis of road accident data in order to better target actions towards priority road safety measures;
- (v) Ensure that the lives of all road users are protected through the introduction of appropriate road safety measures with strict enforcement of road traffic laws and regulations;
- (vi) Improve the co-ordination between institutions involved in road safety activities at national and regional level.
- (vii) Institute arrangements for a more efficient and effective enforcement of traffic regulations.
- (viii) Introduce an insurance safety levy to finance road safety programmes.

Civil Aviation

Liberalising of air transport since 1991 has resulted in the formation of private local airlines. The reasons behind a slow growth in the industry can be attributed to factors such as unattractiveness of the Zambian market caused by small passenger loads, and lack of properly managed tourist destinations.

Currently, there are 144 airports/aerodromes in the country of which National Airports Corporation manages the four major airports. Government or private individuals and organisations manage the rest. National Airports Corporation is providing air Navigation Services throughout the country.

Expansion in the mining and tourism industries will revive air transport demand. Government shall ensure safe and efficient air navigation services in accordance with international civil aviation standards. She will also create a competitive environment so that private companies continue to provide transport services. Further, Zambia will ensure those airports that are critical for commerce and tourism; i.e. the Lusaka, Ndola, Livingstone and Mfuwe are always in good serviceable condition.

In the effort of achieving this, the government shall ensure that the following issues are addressed

- (i) Pursuing legal and institutional reforms aimed at revamping the industry to meet the challenges of a liberalised environment;
- (ii) Promoting civil aviation in accordance with the Convention on International Civil Aviation;
- (iii) Ensuring compliance with regional and international agreements;
- (iv) Educating, training and professional development of human resources in the aviation industry, and
- (v) Attracting international carriers to stimulate tourism and trade.

Maritime and Inland Waterways

Inland waterways are needed especially in areas that are inaccessible by other modes of transport and are accessible by water transport. It has inherent advantage that the services can be operated wherever navigable waters are available without requiring huge investments. Sustainable investments would be required for the improvement and maintenance of navigable rivers, canals and channels and development of terminal facilities at harbours. The Government shall also ensure that water transport operators adhere to communications regulations on lakes and rivers.

In order to achieve the above stated goal, Government shall: -

1. Improve the safety and efficiency of inland water transport system and shipping including promotion of regional co-operation;
2. Promote a safe and clean marine and inland waterways environment.
3. Prepare a comprehensive plan for ensuring proper navigability on all designated waterways in the country including canals;
4. Encourage private sector participation in the operation of water transport services;
5. Develop and improve the infrastructure at the existing ports to the standards of regional ports;