



# **REPUBLIC OF KENYA**

**MINISTRY OF ROADS AND PUBLIC WORKS**

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**ON**

**THE DEVELOPMENT AND MANAGEMENT OF  
THE ROADS SUB-SECTOR FOR SUSTAINABLE  
ECONOMIC GROWTH**

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## **CHAPTER 1: OVERVIEW**

Economic recovery and sustained growth is acknowledged as the mechanism by which the lives of Kenyans will be improved and the indicators identified in the Millennium Development Goals achieved.

A functioning transport sector is a key pillar of economic growth. In Kenya, road transport is the predominant mode of transport. The road network is currently not in the condition that is required if it is to play its role of promoting economic growth.

The prevailing poor state of our roads is a result of many years of inadequate financing and maintenance. Various studies indicate that the financial and administrative needs of the road network, which have increased steadily over the years, have outgrown the framework in which the sector is currently managed.

The key objective of this policy paper is to bring about adequate and consistent maintenance and development of roads by creating a conducive environment for all players to contribute effectively. This in turn will ensure that road transport fulfils its role in the attainment of sustainable economic growth.

The policies contained herein will address the needs of all stakeholders including road users, investors and financiers and recognise that the roads sub-sector requires wide-ranging reform that can best be put into practice through the adoption of a more businesslike approach to management.

The Government, having reviewed the various options over recent years now intends to implement a complete and immediate restructuring of the roads sub-sector. Three new road authorities will be established to implement roadworks on highways and in urban and rural areas.

The outcome of the reforms will be an operating context in which roads development, rehabilitation and maintenance take place within a suitably supportive framework, is appropriately funded and is thus optimised to support economic growth.

## **CHAPTER 2: INTRODUCTION**

### **2.1. NATIONAL POLICY FRAMEWORK**

The Economic Recovery Strategy for Wealth and Employment Creation for 2003-2007 (ERS 2003-2007) sets out the broad principles through which the economy of Kenya is being set on the path to fulfilling its economic potential. The ERS projects that annual GDP growth will be raised from the 1.1% observed in 2002 to 7% in 2006.

The ERS acknowledges the need for a functional transport sector as the third pillar of the economic recovery effort which is expected to tackle such challenges as reduction of poverty by half by the year 2015 and the achievement of newly industrialized country status by 2020.

With regard to financing of roads infrastructure the ERS states that increased investment through public and private sector involvement, such as concessioning, is necessary. In relation to rural roads, the ERS highlights the use of local resources including labour through the Roads 2000 maintenance strategy.

Transport is achieved through various modes. The transport sector in Kenya comprises roads, rail, air, maritime and inland waterways and pipeline transport modes. Road transport accounts for around 90% of land freight and passenger traffic in the country, the balance being carried by the railways.

A draft Integrated National Transport Policy that looks at all transport modes and how these can be synergized has been developed by the Ministry of Transport.

This Sessional Paper defines the policies that have been developed by the Government through the Ministry of Roads and Public Works for the roads sub sector in line with the ERS.

### **2.2. ROAD NETWORK IN KENYA**

When Kenya attained independence in 1963, the country had approximately 45,000km of roads of which a mere 2,000km were paved and the rest were earth and gravel roads which were subject to closure during the rainy season.

The network had insufficient geographical reach for the attainment of the development objectives of the people of independent Kenya and had a focus on the transport interests of the settler community.

In the 1960s, emphasis was laid on upgrading of the principal highway arteries in the trunk road system. This was followed by the improvement of the primary road network through selective bituminisation of heavily trafficked segments. At the same time feeder roads were constructed within the former settler areas.

In the 1970s, as outlined in the 1974-78 National Development Plan, emphasis shifted towards the construction of feeder and minor roads. In line with this, the Government of Kenya with the support of development partners successfully implemented the labour based Rural Access Roads Programme (RARP) and the equipment based Graveling Bridging and Culverting (GBC) programme which improved the rural roads network.

In the 1980s the Government continued to implement the rural-oriented road development programmes through the successful Minor Roads Programme. During this time it was observed that the primary and secondary roads had started to deteriorate due to lack of maintenance.

In the 1990's despite an initial effort to raise funds through tolls followed by the introduction of the RMLF in 1993, the aging main roads continued to deteriorate. The available resources were used to rehabilitate, upgrade and gravel mainly rural roads, neglecting periodic and routine maintenance on a network basis. This situation was further worsened by waning external support.

The Local Government Reform program, an initiative launched in the early 1990's aimed at addressing issues hindering effective delivery of services by local authorities identified the poor state of urban roads as one such hindrance. The Kenya Urban Transport Infrastructure Project, a road rehabilitation and maintenance plan targeting 26 municipalities which had GoK and development partner support, was carried out in an attempt to deal with the problem.

In summary, the following has been achieved through the various Government efforts since independence:

- The paved road network has been expanded from 2000 km in 1963 to 11,600 km in 2006. All provincial headquarters are now connected to Nairobi by bitumen roads. Kenya is connected to Uganda and Tanzania by bitumen roads at multiple border points. The Kenya – Sudan Road is bitumenized up to a point 26km from the border.

Current road network details are as summarised below.

| TYPE    | CLASSIFIED ROADS [KM] |                       | UNCLASSIFIED ROADS [KM] |        | TOTAL [KM] |
|---------|-----------------------|-----------------------|-------------------------|--------|------------|
|         | MAIN<br>A,B,C         | RURAL<br>(D,E, OTHER) | RURAL                   | URBAN  |            |
| Paved   | 7,100                 | 2,000                 | 0                       | 2,500  | 11,600     |
| Unpaved | 7,200                 | 47,000                | 100,000*                | 12,000 | 166,200    |
| Total   | 14,300                | 49,000                | 100,000*                | 14,500 | 177,800    |

\* Estimate, detailed Inventory under way

Despite these tangible achievements, Kenya's road network is characterised by poor pavement surfaces of all types, with consequent adverse effects on service levels and vehicle operating costs.

Only 40% of paved roads are in good condition, the balance being fair, poor or very poor. For unpaved roads the situation is worse with only 14% in good condition.

### **2.3. CHANGES IN ROAD MANAGEMENT**

The Public Works Department (PWD) was established by the Colonial Government in 1896. The Roads Branch of PWD was charged with the responsibility of developing and managing national roads, while Local Authorities were responsible for urban and rural roads under their jurisdiction.

Reform attempts undertaken in the roads sub-sector began in 1950 when the Colonial Government published Ordinance No 64, which provided for the establishment of a Roads Authority and a Roads Fund. The Authority and Road Fund were however never established. In 1956 the PWD became a fully-fledged Ministry of Works and at independence it was renamed the Ministry of Works, Communications and Power.

In 1966 the Roads Branch was elevated to a full Department of the Ministry of Works, Communications and Power. In 1970, about 10,000km of rural roads were transferred from County Councils to the Roads Department. The urban roads and unclassified rural roads continued to be managed by Local Authorities.

Between 1979 and 1988, the Department was renamed Roads & Aerodromes Department and placed under the Ministry of Transport & Communications. In 1988 the road sector departments were moved back to the Ministry of Works. The MOTC retained the overall transport sector policy management role while the latter (MOW) took charge of development, maintenance and rehabilitation of all classified roads in Kenya.

In 1993 the Road Maintenance Levy Fund (RMLF) Act was enacted to provide for sustainable funds for road maintenance. This Act initially excluded local authorities, and thus unclassified roads, from RMLF funding.

The GoK undertook a road sector institutional reform study in 1995 as a result of which Kenya Roads Board was established in 1999 through an Act of Parliament. The main objective of KRB is to manage the Road Maintenance Levy Fund (RMLF) for maintenance, repairs and rehabilitation. The KRB Act designated certain large towns and the UDD as sub agencies eligible to receive RMLF funds, hence making the fund available for the maintenance of the unclassified roads that are managed by these organisations. Around the same time a Strategic Plan for the Road Sector was developed and published in 1997.

Despite these initiatives, the condition of the road network continued to deteriorate due to inadequate maintenance arising from insufficient funds and an inappropriate institutional framework for sector management. National development was hampered by the dilapidated road network.

At present, the roads subsector is managed as follows:

- The Ministry of Transport is responsible for overall multimodal transport sector policy.
- The Ministry of Roads and Public Works is responsible for formulation and coordination of road subsector policy. The Roads Department of MOR&PW is the implementing agency for road works on classified roads.
- The Ministry of Local Government is responsible for policy formulation for Local Authorities who in turn are implementing agencies responsible for urban and unclassified rural roads.
- The Kenya Wildlife Service under the Ministry of Tourism and Wildlife is the implementing agency for roads in National Parks and Reserves.
- The Kenya Roads Board, a statutory body under MORPW, funds and coordinates all maintenance works through the Road Fund which includes

funds from the RMLF. The following road agencies and sub agencies are recognised by the KRB act:

- Roads Department for class A, B and C roads.
  - District Roads Committee's for Class D, E, SP and unclassified roads.
  - Nairobi City and all Municipalities for urban roads.
  - KWS under Ministry of Tourism and Wildlife for roads in National Parks and Reserves.
- The Forest Department under the Ministry of Environment and National Resources manages roads within designated forests

#### **2.4. CHALLENGES IN THE ROADS SUB-SECTOR**

The key challenges facing the road sub-sector can be summarised as follows:

- There is a large backlog of road rehabilitation and maintenance that requires attention as a matter of priority. This requires large amounts of funding.
- Funding for road development, rehabilitation and maintenance is inadequate. There is over-dependence on development partner assistance.
- There is severe vehicle congestion on roads within large towns and a lack of sufficient parking
- Due to the low performance of the railways sector, the main roads have to carry a larger proportion of heavy cargo than would otherwise be the case.
- Axle load enforcement and rules relating to configuration of heavy vehicles both need to be improved.
- In the past, the procedure for road investment prioritisation has not been adequately structured or clear to stakeholders.
- The institutional framework is unsuitable and too cumbersome for efficient and effective delivery of road works.
- There is inadequate local contracting capacity.
- There is no mechanism for private sector investment in the funding of road development or maintenance.
- At present, laws applicable to the roads subsector are not consistent and therefore need to be consolidated.
- Road reserves are not adequately protected and some have been encroached on.
- Stakeholder involvement and participation is insufficient.



### **CHAPTER 3: POLICY OBJECTIVES**

The goal of the policies outlined in this Sessional Paper is to attain an efficient road sector that supports and promotes economic growth through the cost effective provision and maintenance of infrastructure that is necessary for safe and reliable road transport.

The key objectives of the policies are:

- To reduce transport costs and travel time by improving the condition of roads, including reducing congestion on urban roads by increasing capacity.
- To increase accessibility
- To optimise use of available resources
- To increase the resources available for investment in the road sector
- To enhance preservation of existing road assets
- To create a conducive environment for increased private public partnership
- To enhance road safety and cater adequately to the needs of Non Motorised Traffic (NMT)
- To enhance ownership through stakeholders participation in the road sector
- To achieve an optimal institutional framework for effective implementation

## CHAPTER 4: RATIONALE FOR POLICY

### 4.1. ENHANCE ECONOMIC GROWTH

From independence up to the mid- 1980's, the condition of the road network was not considered a major impediment to economic growth. However, cutbacks in recurrent funding for road maintenance which began in 1975 took their toll by the 1980's and throughout the 1990's. The present condition of road network is characterised by widespread existence of sections whose economic life has been exhausted and which are imposing high transport costs and longer travel times on road users both within the country and the Great Lakes region.

The Government through the ERS has put into place an ambitious programme for economic growth and sustainable development in all sectors with a special focus on agriculture, industry, tourism and regional trade. These plans will not be realised without an effective road network to achieve the following among others:

- Lower the transport costs by reducing vehicle maintenance costs and fuel costs
- Increased ease of access to road transport by Kenyans

There is therefore a need to put in place road subsector policies to form the basis for implementation of the ERS.

### 4.2. STREAMLINE MANAGEMENT OF THE ROADS SUB-SECTOR

As the size of Kenya's population and economy has increased, the Government has adapted and reshaped the mechanisms for the exercise of its functions in various sectors.

In the roads sector, maintenance and development of roads has hitherto been implemented by the Roads Department of MOR&PW and Local Authorities using either force-account or by contract. The above organisations also have policy, fund allocation and monitoring responsibilities.

From studies carried out by Road Management Initiative (RMI) of the World Bank in Sub-Saharan African Countries (SSA), it has been established that for a country's road sector institutional arrangement to be functional and sustainable, certain basic principles must be satisfied. These are termed the Four Basic Building Blocks – necessary requirements for effective road management.

They are:-

- **Ownership** - involving road users in the management of roads and thereby winning their active support.
- **Clarified Responsibility** – a clear mandate and legal identity for each organization involved with the road sector.
- **Stable Financing** - Secure, adequate and stable flow of funds to the road sector.
- **Commercialised Management** - Providing an effective and businesslike approach to road management.

The establishment of the RMLF in 1993 to provide stable financing and KRB (along with DRC's) in 1999 to provide ownership were a step towards fulfilling two of the basic building blocks. However this process requires to be carried to its conclusion by establishing autonomous road authorities to implement roadworks in order to clarify responsibilities and manage roads in a businesslike manner.

#### **4.3. CREATE A CONDUCTIVE ENVIRONMENT FOR INCREASED INVESTMENT**

In the past, road sector investment has been limited to internal government funding supplemented by external funding in the form of soft loans or grants. Both sources have been inadequate and subject to fluctuations caused by both external and internal factors.

In 1993 the Government addressed the issue of diminishing recurrent funds for road maintenance by establishing the Road Maintenance Levy Fund. Although this has increased the available funds for road maintenance the fund only covers 60% of the maintenance requirements if the road network was in a good maintainable state. The Fund is therefore not sufficient to cater for both the maintenance of the good maintainable roads and the extensive amount of backlog maintenance – roads that require reconstruction.

Recent studies show that the backlog maintenance requires Kshs 150 Billion and subsequent annual maintenance requires Kshs 15 billion per year. These figures do not include required investments for the urgent need to expand the road network in urban areas and other high potential areas as well as regional roads to enhance the economic growth of Kenya.

In order to close the financing gap, increased investment from the Government should be secured. In addition, new financing mechanisms such as the use of public private partnerships need to be applied to finance, develop and manage road infrastructure.

One of the aims of this Sessional paper is to provide a framework to facilitate private sector participation in development and management of road infrastructure services through private/ public partnerships.

#### **4.4. ATTAIN INCREASED STAKEHOLDER PARTICIPATION**

Experience gained in other sectors as well as the District Roads Committees indicates that stakeholder involvement and feedback is an important input into optimal decision making.

There is a need to incorporate stakeholders more directly into decision making in the roads sub sector by having stakeholders represented on the Boards of institutions managing roads infrastructure and the Road Fund.

#### **4.5. PRIORITISE ROAD INVESTMENT**

In the recent past both internally and externally funded road investments have been planned and justified on a project to project basis not taking into account the overall road network priorities.

The MOR&PW – Roads Department Strategy prepared in 1997 included an overall prioritisation plan of road maintenance works based on a cost benefit analysis. Unfortunately this plan was generally not implemented.

There is a growing acknowledgement that in order to receive best value for money the entire road network, including upgrading and expansion has to be based on sound asset management concepts which includes looking at the life cycle costs and providing maintenance at the opportune time.

Development partners are moving away from the project to project approach to sector wide and budget support. A prerequisite for such support is a comprehensive road investment plan that covers maintenance, upgrading and expansion. Such a plan can be used to secure additional external as well as internal funding.

There is thus an urgent need to develop and maintain a road investment plan for both urban and rural roads.

## **CHAPTER 5: POLICIES FOR THE ROADS SUB-SECTOR**

### **5.1. PROVISION AND MAINTENANCE OF ROADS**

#### **5.1.1. Providing an appropriate road network**

##### Context

Over the years, there has been inadequate assessment of and investment in road transport needs. The amount of time and money spent while travelling has increased due to worsening road conditions, increasing congestion levels and poor accessibility in both urban and rural areas.

Recent studies of the road subsector have shown that the prevailing situation has greatly contributed to high costs of inputs and outputs in the manufacturing, processing and other industries.

Generally, roads in Kenya have not been planned, developed and maintained to adequately meet the needs of communities they serve.

##### Policy Statement

*Road development shall be in accordance with the economic and social objectives determined by the Government as published in policy documents. In particular, road development will be focused on improving accessibility, increasing the variety and quality of affordable urban and rural transport and improving accessibility for the development of key economic sectors.*

*Future road development will be guided by the following principles in order of priority:*

- *Bitumenise all international (Class A) roads*
- *Bitumenise economically viable major urban arterial roads*
- *Bitumenise all economically and socially viable Class B and C roads*
- *Bitumenise all roads connecting district administrative centres, major urban centres and important tourist facilities.*
- *Bitumenise economically viable urban arterial roads, especially where these serve low income neighbourhoods*
- *In support of the Millennium Development Goals, to work towards eventually providing all season road access within 2 kms for Kenyans.*

*In order to achieve the above the Ministry responsible for roads shall develop, implement and periodically update a Road Investment Plan*

#### **5.1.2. Road Maintenance**

##### Context

A significant proportion of the road system is in a poor condition and thus requires backlog maintenance instead of routine maintenance. This backlog

rehabilitation is costly and competes for limited available funding with routine maintenance. In turn, the limited availability of funds for routine maintenance is liable to result in reduced levels of service and is not conducive to maximising the economic lifespan of pavements.

The predicament of backlog maintenance is currently the subject of a concerted effort that includes funding for rehabilitation from RMLF and Development Partners. However the network that requires backlog maintenance is extensive and the backlog must be cleared within 5-10 years to avoid losing pavements which are currently in poor condition. Delay in carrying out this backlog maintenance will result in extensive costly reconstruction.

Road transport infrastructure represents a significant portion of the Government's total financial investment in fixed assets and there is a need to protect this investment by ensuring comprehensive and timely routine and periodic maintenance.

#### Policy Statement

*Having made a substantial investment in roads, the Government through the Ministry responsible for roads is determined to ensure that all roads in maintainable condition receive timely routine and periodic maintenance before any deterioration of service levels. Those roads that are not in a maintainable condition and which satisfy appropriate economic and social criteria shall be restored to the standards for which they were intended and properly maintained thereafter. To restore the road network to a maintainable condition, backlog periodic maintenance and rehabilitation shall be carried out. This backlog rehabilitation shall have priority over new developments.*

### **5.1.3. Technical Standards**

#### Context

Geometric and pavement design standards have not been updated in line with changing circumstances and emerging technologies. Standards for urban roads have not been fully developed. Similarly, standards for the provision of roadside amenities along major highways are lacking. Strategies to address the impact of road realignments on major highways on affected communities are required. Standards for international routes are not harmonised with those of neighbouring countries. There is inadequate research and development.

#### Policy Statement

*The Minister responsible for roads shall, through designated agencies, ensure that design standards for both rural and urban roads are regularly reviewed and updated to take into account new technologies, changes in traffic characteristics and changes in the needs of road users and communities. Steps shall be taken to ensure that design standards for international routes will be harmonised with those used elsewhere in the region.*

#### 5.1.4. **Non-Motorised Transport (NMT)**

##### Context

Non-motorised transport includes bicycles, hand and animal drawn carts, pedestrians and pack animals. When these share the same space with motorised transport, NMT severely constrains the efficiency of motorised transport and creates conflicts and accidents. However, although NMT is generally affordable and environmentally friendly, it receives little attention, and its infrastructure is inadequate. Despite its importance, appreciation for NMTs is not in evidence and there is lack of respect and accommodation for NMT by motorists, and disregard by planners. There is a distortion in the allocation of resources against transport demands, with a large proportion of resources being allocated to motorised transport as compared to NMT.

##### Policy Statement

*Extensive use of non-motorised transport (NMT), including pedestrian movement, is a vital feature of the Kenyan transport sector. The Government shall develop NMT infrastructure and facilities where sufficient demand exists. This will include establishing design standards, provision of separate cycle-ways, tracks and footpaths and ensuring safe crossing places where NMT streams intersect with motorised traffic.*

#### 5.1.5. **Traffic Management**

##### Context

Urban centres such as Nairobi and Mombasa are experiencing chronic congestion due to heavy traffic flows during peak hours, and competition and conflict for limited road space by road users. The reasons for traffic congestion are many but include inadequate road infrastructure development in urban areas and inadequate parking spaces. Congestion is aggravated by inadequate and ineffective traffic management systems and inadequate capacity at road junctions. Poor road conditions and non-operational traffic lights exacerbate the problem.

##### Policy Statement

*Measures will be taken by the Government to provide bypasses, missing road links, improved junctions, dedicated bus lanes/corridors, public service vehicle terminals, parking spaces, carriageway capacity improvement, service roads and improved traffic information in order to reduce traffic congestion in urban areas and along highways, and improve the quality of the travelling environment for all road users including NMT.*

### 5.1.6. **Road Safety**

#### Context

There is inadequate consideration and coordination of road safety issues in the planning, design, development, and operation of road infrastructure and services.

The Ministry of Transport has completed a Road Safety Action Plan that outlines an integrated approach to road safety with the involvement of all stakeholders. The Action Plan states that the Road Safety Council shall be re-established and a Road Safety Authority shall be formed at a later date.

There is a need to improve road safety aspects of all road infrastructure development and maintenance including road furniture, traffic calming measures and children's traffic parks.

#### Policy Statement

*The Government will put in place procedures to ensure that road safety issues are fully incorporated in road infrastructure planning, design, development and maintenance. Safety auditing of highways shall be mandatory including, as one of its aims, the reduction of conflicts with NMT. Road infrastructure shall be maintained in order to ensure safety standards are complied with. Special attention shall be given to identified accident prone road sections.*

### 5.1.7. **Roads and Land-Use Planning**

#### Context

Ineffective incorporation of transport planning into land use has led to sub optimal allocation of land resources for road infrastructure. Inadequate enforcement of the existing laws (Lands Act, Public Roads and Roads Access Act, Local Government Act, Traffic Act and Physical Planning Act amongst others) regarding the road reserve and/or non-provision of land for future route development especially in urban areas, has led to high costs for upgrading and new road projects. There is also a need to secure natural water ways and provide wayleaves for drainage.

#### Policy Statement

*The Government shall ensure compliance with land use and development plans in accordance with existing laws and ensure that all land previously inappropriately allocated shall revert to its intended road use in order to optimise road and parking space provision. In addition, the Government shall reduce encroachment within the highway boundary of unauthorised businesses and obstructions and finally ensure that land identified for future road infrastructure is secured from any other development.*



### 5.1.8. **Axle Load Compliance**

#### Context

Overloaded Heavy Goods Vehicles (HGV) contribute to road destruction which consequently affects the operating conditions of all vehicles. Existing controls of axle load and of gross vehicle weight (GVW) require improvement. The level of service at weighbridge sites is poor while the weighbridge equipment and infrastructure is in poor condition. The current penalties are not directly linked to the damaging impact on road pavements. Vehicle specifications, including the addition of a 4<sup>th</sup> axle to trailers are out of step with those used in other parts of the region and encourages operators to overload. The government is currently in the process of rehabilitating and upgrading the weighbridge equipment and infrastructure along the Northern Corridor and carrying out a best-options study to identify the optimum legal and management framework for axle load control.

#### Policy Statement:

*The government is determined to strictly enforce axle load regulations in order to protect the roads from damage and premature failure. Administrative and other operational weaknesses in axle load control shall be identified and eliminated. Increased private sector participation will be adopted with a view to improving axle load management. In addition, the Government will harmonise vehicle specifications and axle load limits in Kenya with those of other countries within the region. The Minister responsible for roads shall assume overall control of GVW and axle load enforcement, ensuring that fines are in proportion to the damaging effect of overloading. Weigh-In-Motion equipment shall be introduced and the existing static weighbridges modernised. The public will be sensitised on the need to adhere to axle load limits.*

## 5.2. **INSTITUTIONAL AND LEGAL FRAMEWORK**

### 5.2.1. **Legal Framework**

#### Context

The existing legislation consists of various legislative instruments which are in some cases overlapping and fragmented. For example the KRB Act states that the District Roads Committees shall manage unclassified roads which is in contravention with the Local Authorities act which states that Local Authorities shall manage all roads apart from the main roads (Class A, B and C). There is also a need to have road classifications and the complete road inventory, including road reserves, published and disseminated.

#### Policy Statement

*The Government is aware that the various items of legislation relating to roads need clarifying and harmonising, particularly with respect to the statutory responsibility for roads. All roads are owned by the State, and the Minister responsible for roads can assign statutory powers to other bodies. The various statutory instruments, especially legislative Acts on roads and*

*road transport, will be revised as result of this and other policy changes. The Ministry responsible for roads will ensure that all public roads are gazetted and will resolve any conflicts relating to statutory responsibility. The various statutory instruments relating to roads will be revised and ambiguities removed.*

## **5.2.2. Institutional Framework**

### Context

The management of roads needs to be more effective and efficient. The needs of the road sector have outgrown the organisation structure applied since independence in which key functions were implemented under traditional civil service bureaucratic procedures. These procedures are not optimised for the road sector and there is thus a need to allocate certain key functions into separate specialised organisations that will pursue their designated individual mandates, leaving the policy formulation and harmonisation tasks to the Ministry responsible for roads.

### Policy Statement

*The Government remains committed to the building blocks of the Roads Management Initiative namely ownership, financing, responsibility, management and transparency. The Government will require that all organisations involved in the delivery of roads be customer-focused and adopt best management practices.*

*To this end, the Government shall reform the Roads Sub sector as follows:*

*The Ministry responsible for roads shall continue to provide the regulatory framework, coordination, oversight, supervision, liaison with other Ministries and any services necessary for the smooth functioning of the reformed roads subsector. The Local Authorities under the Ministry of Local Government and the District Roads Committees shall continue to carry out prioritisation and monitoring roles.*

*The Government shall establish the following autonomous statutory road authorities:*

- (1) Kenya National Highways Authority (KeNHA)  
to be responsible for the development and management of major roads (Class A, B,C)*
- (2) Kenya Rural Roads Authority (KeRRA)  
to be responsible for development and management of rural and small town roads (Class D,E & others)*
- (3) Kenya Urban Roads Authority (KURA)  
to be responsible for development and management of roads in cities and municipalities*

*In addition, the Government shall re-align the functions of the following existing organisations:*

- (4) Kenya Roads Board (KRB) to fund maintenance of all public roads*

*(5) Kenya Wildlife Service (KWS) to be responsible for development and management of roads in national parks and national reserves*

*The following service departments of the Ministry of Roads And Public Works will be restructured as follows:*

*(6) Mechanical and Transport Department*

*M&TD to be restructured into a SAGA responsible for provision on commercial basis of equipment to the road agencies and private sector for development and maintenance of road infrastructure*

*(7) Materials Testing & Research Department:*

*Materials Department to be restructured so as to meet its mandate for materials testing and research more effectively.*

*(8) Kenya Institute of Highways & Building Technology (KIHBT)*

*KIHBT to be restructured into a SAGA with responsibility for training public and private sector staff for road development, rehabilitation and maintenance*

### **5.2.3. Human Resources**

#### Context

Human resource is the most important resource in any organisation. It is, therefore, important that an organisation be adequately staffed with well-qualified and motivated personnel if it is to be efficient and effective in its operations.

The Roads Department, the Urban Development Department and the roads units of Local Authorities are departments of the Ministry of Roads and Public Works, Ministry of Local Government and various Local Authorities respectively. As such, their staff are subject to the terms and conditions of service in the Civil Service. Despite the commendable efforts made by Government to harmonise terms and conditions of service in the public sector, the salaries and allowances in the Civil Service are still relatively low compared to those in the private sector and are therefore demotivating. As a result, there is a shortage of engineers and other technical personnel who have left the service in search of greener pastures, thereby leaving the service with inadequate capacity to deliver expected results.

In addition, training and human resource development have in the past not been accorded the importance they deserve irrespective of the fact that a training budget is available for public sector staff and the legal provision of a training levy to be paid by contractors. The working conditions are also generally poor and the operational procedures are subject to the Civil Service bureaucracy, which can be slow and frustrating.

#### Policy Statement

*The Government recognizes the importance of adequately staffing its institutions with well-qualified and motivated personnel for improved*

*service delivery. The Government further recognises the need to enhance efficiency. In this regard, the Government will grant adequate autonomy to the various Roads Authorities and SAGA's once established, to enable them reduce the bureaucracy involved in decision making and, therefore enhance efficiency. The Authorities will also be granted autonomy to enable them recruit staff competitively. Further, the Government will provide training opportunities to staff in the roads sub-sector to fill performance and skills gaps. In addition, the Government will ensure that the contractor training levy is applied to the cause it is meant for.*

#### **5.2.4. Public Awareness and Stakeholder Involvement**

##### Context

Road users and stakeholders are represented on the Kenya Roads Board and in District Roads Committees. In addition to the participation offered in the MTEF budgeting process, it is now recognised that there would be benefits in further increasing the involvement of stakeholders in the provision and management of roads. Although there is public consultation when constructing major new roads, there is insufficient consultation with stakeholders in the provision of other road infrastructure. Little attention has been given to public relations and, in the past, road users have been given little information about road plans or progress in achieving these. Users are not fully aware of their rights and of what to reasonably expect with respect to roads.

##### Policy Statement

*The importance of public awareness and involvement in the administration and management of road is recognised. All bodies in the road sub-sector will take steps to create public awareness about the importance of roads for national social and economic development, and will publicise measures that are being taken to improve the quality of the road network. New authorities shall have stakeholder representation at Board level. The Ministry responsible for roads, the Kenya Roads Board and road agencies will promote participation of road users in the provision and management of roads by providing effective consultation mechanisms in the planning process both at national and local level. Road users will be encouraged to contact KRB and road agencies to receive up-to-date information on the road network and to make comments and report feedback.*

### **5.3. CROSS CUTTING ISSUES**

#### **5.3.1. Environment**

##### Context

Environmental issues have in the past not been fully incorporated in the design and implementation of road works. Environmental legislation exists but is not being enforced rigorously.

### Policy Statement

*The potential negative impacts of road works shall be minimised through incorporation of environmental mitigation measures in the design and implementation of all works projects in accordance with environmental legislation and as prescribed by the National Environmental Management Authority (NEMA).*

### **5.3.2. HIV/AIDS**

#### Context

The HIV/AIDS endemic has been declared a national disaster by the Government. It is recognised that both the construction and the use of roads has contributed to the spread of HIV and that sufficient counter measures were not carried out.

#### Policy Statement

*The Government will mainstream the fight against HIV/AIDS in all sectors including the roads sub sector. HIV/AIDS counter measures shall be included in all road works contracts and programmes. In addition the Government's HIV/AIDS policies relating to prevention and treatment shall be pro-actively applied to all public sector employees within the roads sub sector.*

### **5.3.3. Gender**

#### Context

In the past, few women have taken the opportunity to seek a professional or managerial career in the roads subsector. Applications from female students for enrolment in training institutions leading to careers in the roads sector are low, despite the female students possessing equal qualifications to male counterparts. In addition, statistics relating to unskilled jobs have been notable for the extremely low participation of women.

#### Policy Statement

*Both genders have an equal right to fully participate in the roads subsector. The Government shall mainstream gender issues throughout the roads sub sector to ensure and actively promote equal opportunities to achieve gender parity.*

### **5.3.4. Special interest groups**

#### Context

The design standards for road infrastructure do not currently adequately address the needs of special interest groups including vulnerable groups such as the physically challenged.

### Policy Statement

*The Government will update road design standards to incorporate the needs of the special interest groups and ensure that implementation when rehabilitating, upgrading or developing road infrastructure caters for special interest groups.*

### **5.3.5. Governance, Ethics, Transparency and accountability**

#### Context

The roads sub sector has in the past been perceived by the public as inefficient, opaque and allowing for the participation of poor quality contractors. Various agencies responsible for funding or executing road works have not been able to complete technical and financial audits within the specified time. Dissemination of information to the public about disbursement details and ongoing projects has been slow or non-existent. The funding agency has not applied sanctions available for non-compliance within its procedures. Road funding and disbursement procedures are slow and there are incompatible and un-harmonised accounting procedures between funding and implementing agencies.

#### Policy Statement

*The Government will promote and uphold ethics, transparency, fiduciary duty, social responsibility, accountability and overall good governance in the provision of roads and will rigorously implement a policy of zero tolerance to corruption. All organisations within the roads subsector shall endeavour to improve their efficiency and effectiveness and shall account in accordance with internationally accepted accounting rules.*

## **5.4. DELIVERY OPTIONS FOR ROAD WORKS**

### **5.4.1. Contracting and force account options**

#### Context

In road works, contracting and force account (direct labour) have been used as delivery options.

In the past not enough road contracts have been completed both on time and within budget. Both employers and contractors concur that there is need for improvement in the area of contracted road works. For the contracting entities, tender sums tend to be at variance with pre-tender budget provisions and cost estimates. The quality of work varies and total costs for road works often increase leading to undesirable cost overruns. Long delays between contract preparation and implementation, which leads to changes in the quantity and scope of works that are not captured in the tender documentation, have been experienced. Contractors are at times not paid on time, sometimes due to inadequate budget provision. Incidents of underestimated tender costing by some contractors have been recorded, with consequent difficulties in completing the assignments on schedule.

The force account system is inappropriate and inadequate for most roadworks. It is generally acknowledged that force account does not reflect

its full cost and should gradually be replaced by contracting. However, it may be necessary to retain a basic capacity for force account for emergency works and for carrying out holding maintenance on roads that are awaiting rehabilitation.

#### Policy Statement

*Implementation of road-works through contracting is supported by the Government, but it is recognised that improvements are needed. To this end, the Ministry responsible for roads shall ensure that appropriate procedures for the execution of road works are in place and rigorously applied, including registration of contractors, contract preparation, procurement, supervision, payment and reporting. The Ministry shall exercise discretion in applying alternative forms of contracting to provide the most cost-effective solutions to road maintenance and development including, though not limited to, performance-based contracts, area maintenance contracts and concessions. The Ministry shall, if so required, take steps to rightsize public direct labour resources, ensuring that force account is only used as an alternative to contracting where it can be proved to be cost-effective, for holding maintenance and for emergencies. The Ministry shall take such steps as are necessary to strengthen capacity of both the road construction industry and professional engineering institutions, and their regulation.*

#### **5.4.2. Utilization of local resources**

##### Context

Kenya successfully implemented labour based road works in the 1970's and 1980's through the Rural Access Roads (RAR) and the Minor Roads Programme (MRP). In the 1990's a new labour based strategy termed the Roads 2000 road maintenance strategy (R2000 Strategy) was developed which included the development of small and medium scale local contractors as well as use of locally manufactured equipment. These programmes were all initiated and supported by development partners and the Government was not able to sustain or further develop these programmes after the end of the development partner support.

A Roads 2000 road maintenance strategic plan 2005 - 2010 has been approved as the implementation strategy for the low volume network to be financed through the KRB Road Fund and with support of several development partners.

##### Policy Statement

*The Government will promote the use of local resources and labour based methods, wherever these are cost effective, including the development of small and medium scale contractors through the implementation of the Roads 2000 road maintenance strategy in order to maximise the poverty reduction impact of road works. The maximisation of employment creation component of the R2000 Strategy will be applied to the entire network. All road works implementation on the low volume network shall follow the R2000 Strategy.*

## 5.5. **FUNDING AND FINANCING**

### 5.5.1. **Funding and Financial Principles**

#### Context

The KRB Road Fund (which includes RMLF) is insufficient for maintenance of the public road network. Road rehabilitation and development is too dependent on development partner support. The Government has insufficient funds for rehabilitation, upgrading and new construction. Additionally, finance is insufficient for safety, environmental control and traffic management. There is currently no comprehensive policy for financing the road sector.

At present only approximately 20 Billion Kshs, which is about 1.5% of GDP, is allocated for maintenance, rehabilitation and development of the road network.

It is estimated that backlog maintenance alone requires approximately Kshs 150 Billion, which if implemented over a 7 year period equates to 21.4 Billion Kshs per year. Periodic and routine maintenance requires an additional 15 Billion Kshs per year.

In addition urgently needed network expansion and capacity enhancement will also require substantial funding. The recent Nairobi Master Plan Study recommends an investment in new infrastructure of approximately 5 Bill Kshs per year. Urgent upgrading and development in other major towns as well as main and feeder rural roads as outlined in policy no. 5.1.1 requires an additional 10 Billion per year.

An improved road network to facilitate the economic growth of Kenya would thus require approximately 51.4 Bill Kshs per year. Currently Kenya's GDP is approximately 1,300 billion Kshs and the requirements are thus approximately 4% of GDP. This relates well with the World Bank recommendation of using 7% of GDP for infrastructure (this includes, rail and air transport as well as the water sector). As stated in Policy 5.5.2 and 5.5.3 this funding will not be provided solely from Government revenue and user charges. However the Government will facilitate the provision of these funds from all available sources.

#### Policy Statement

*Road transport infrastructure is considered a strategic asset, the provision of which is the responsibility of the Government. The principle that the user pays as directly as possible for the services received will be applied to the road sector without compromising the government's social responsibility. The operation and maintenance of road infrastructure is to be funded through such user charges, special levies, licences and transit tariffs as deemed appropriate by the Government.*

*To meet the economic development needs of the country the Government shall facilitate the increase in funding for road infrastructure maintenance, rehabilitation and development to a minimum of 4.0% of GDP in order to maintain the network, eliminate the backlog maintenance and carry out the subsequent network expansion.*



### **5.5.2. Public Financing Instruments**

#### Context

Public financing of road infrastructure has hitherto been confined to revenues from the Road Fund, assistance obtained from development partners and budgetary allocations. The possibility of tapping long term capital from the private sector, including pension funds, to finance road infrastructure has not been explored. Similarly, there is a window of opportunity to float road bonds and other financing instruments.

#### Policy Statement

*The Government will increase its financing of road infrastructure through user charges and budgetary allocations from government revenue. The Government shall also endeavour to attract more Development Partner funding. In addition the Government will establish a framework of financing road development and rehabilitation through road bonds and other financial instruments.*

### **5.5.3. Private/Public Sector Participation**

#### Context

Private sector finance has not been used in Kenya for road investment in the past. Currently the Government is encouraging the tapping of private financing and is implementing the Nairobi urban toll road concessioning project.

#### Policy Statement

*The Government shall encourage public/private partnerships (PPP). To this end, an appropriate legal framework shall be established to support PPP for roads infrastructure financing and development. The Government shall facilitate private sector participation in road asset financing and management.*

#### 5.5.4. **Management of funds**

##### Context

The current system of road fund management can be improved to meet more specifically the needs of the road network, since each group of roads or programme may have different objectives, prioritisation criteria and other rules. This will also improve transparency and accountability.

For example the Road Fund is principally for road maintenance but has largely been used for rehabilitation leaving limited funds for routine and periodic maintenance.

##### Policy Statement

*The Government shall establish appropriate funding arrangements for development and maintenance of roads. Criteria and regulations for the application and use of these funds shall relate to the specific objectives for which the finance is intended. In order to ensure that Road Fund financing is used for maintenance, funding for rehabilitation and development shall not exceed 10% of the fund.*