

POLICY ON THE PROVISION OF ROAD TOLLS IN THE CITY OF CAPE TOWN

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POLICY ON THE IMPOSITION OF ROAD TOLLS IN THE CITY OF CAPE TOWN

BELEID OOR DIE HEF VAN PADTOLGELD IN DIE STAD KAAPSTAD

(TT 26 P)
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10 June 2003

1 EXECUTIVE SUMMARY

This report outlines the policy on the imposition of road tolls in the City of Cape Town. The policy is based on a thorough investigation in which the benefits of raising revenue for road construction and maintenance by means of road tolls are weighed against the disadvantages. This means of raising the necessary revenue is contrasted with the alternative funding sources available. The legal context is explored and commented upon as well as the background regarding the present under-funding of the transport system despite the substantial revenue collected by provincial and national spheres of government from vehicle license fees and the levy on fuel respectively.

The principles of road pricing and user charging are outlined. Road tolling can be applied for two distinctly different purposes. Firstly, it can be used as a charge to manage the demand for use of a particular road link or on a number of road links leading to concentrations of employment, and then constitutes a "user charge". Secondly, it can be imposed to finance the construction and maintenance of a particular road link. The two unsolicited toll road bids impacting on Cape Town, which are presently being developed by private sector consortia for consideration by the South African National Roads Agency Limited, belong in the second category.

The report concludes that, in Cape Town, the disadvantages of the imposition of road tolls for the purpose of raising early finance for the construction, operation and maintenance of specific routes outweigh the benefits. It is proposed that route specific tolling should preferably be used exclusively for travel demand management and the creation of recreational/tourist attractions within the City. If sufficient funding cannot be raised from vehicle licence fees, levies on vehicle fuel and other user charges to provide a satisfactory level of service and safety on the transport system, then road pricing primarily to ration road space should be introduced in the form of a "shadow toll" collected at service stations located within the City. That will be far more cost efficient and more equitable than route specific tolling and would result in fewer adverse effects.

Comment [e1]: [State whether this report deals with the formulation of policy or by-laws. The Executive Summary should contain the essence of the report and should not be longer than half a typed page. The summary should summarise the recommendation, namely: The report is submitted for consideration, adoption, information or noting.]

2 **BUSINESS PLAN REFERENCE**

Directorate: Transport, Roads & Stormwater
Department: Transport Planning
Business Plan Heading: 2.3 Key Strategies – Legislative Requirements – Develop and review transport policy as well as related policy in other corporate sectors.

Comment [e2]:
Compulsory Heading is self-explanatory

3 **COMPLIANCE WITH STRATEGIC OBJECTIVE**

A good integrated transport network is a key factor in the City's ability to become/remain attractive to visitors and investors as well as to ensure access to desirable activities for all. Sustained economic development will require development and maintenance of a transport network that meets the needs of the full range of economic activity. In supporting economic development, a well-designed and maintained transport network will support achievement of the City's ten-point strategy outlined as the foundation of its strategic direction in November /December 2003.

The policy on the imposition of road tolls in the City of Cape Town will assist with poverty reduction, economic development, tourism promotion and appropriate physical infrastructure development, sustainable employment creation, good governance at the lowest level of competence, financial sustainability, partnerships as well as ensuring adequate communication at local government level.

Comment [e3]:
Compulsory State whether this report complies with the Priorities and Manifesto Pledges set out in Councils' vision Statement adopted on 14 February 2001, namely:
1) Crime; 2) HIV – AIDS;
3) Tourism; 4) Free Lifeline Services

4 **DELEGATED AUTHORITY**

The proposed City of Cape Town policy on road tolling will substantially impact on job creation; tourism; funding strategies/options; transport policy on planning, design, construction, maintenance and operation of the metropolitan road system; travel demand and access management; infrastructure planning and budgeting; etc. This obviously impacts on many sections of the document "Functions and Delegation of Powers of Councils Political Structures" and should thus ultimately be approved by Council on the recommendation of the Executive Committee. In particular, section 4.1.2 reserves the general power by Council to determine "overall strategic policy applicable to the municipality as a whole which gives macro direction to its executive and which guides the formulation of all other policies".

Comment [e4]:
[Compulsory] The relevant section of the Document "Functions and Delegation of Powers of Councils' Political Structures" is to be quoted e.g. 4. Powers Reserved by Council; 4.1.1 Passes By-Laws. Indicate whether the policy is to be approved by the Executive Member, the Executive Committee or Council.]

5 **ANNEXURES/ADDENDA**

Annexure A: Towards a Policy on the imposition of Toll Roads in the City of Cape Town (8 August 2002). Reported for noting to TR&S and Planning & Environment Portfolio Committees

Comment [e5]: Heading is self-explanatory

6 **COUNCIL POLICY: STATUS QUO**

The City of Cape Town has not yet adopted a definitive policy on road tolls within its boundaries. The report entitled "Towards a Policy on the imposition of Toll Roads in the City of Cape Town" dated 8 August 2002 was submitted to the TR&S and Planning and Environment Portfolio Committees for noting. This report is attached as Annexure A. It summarizes the resolutions on the previous reports to the erstwhile CMC over the past four years and outlines the legal issues involved.

Earlier versions of the report entitled "Policy on the imposition of road tolls in the City of Cape Town" were respectively presented at a combined workshop of the Planning and Environment, Economic Development & Tourism, Finance as well as Transport Roads and Stormwater Portfolio Committees on the 5 Sept 2002 and to each of these committees separately between the 2nd and 7th October 2002. At the latter meetings it was decided that a further combined meeting of these portfolio committees was required before the City could adopt an appropriate policy on road tolling. It has taken over 7 months to organise this 2nd combined meeting. As the City could shortly be presented with a notice of intention to toll the N1 and N2 routes by SANRAL and the NDOT, it would be very helpful for the City of Cape Town to adopt a policy upon which to base its response to this imminent notice and possible additional notices for other routes in the future.

In order to better inform the debate and in view of the two unsolicited bids for toll roads currently lodged with SANRAL in terms of Act No 7 of 1998, an eminent consultant transport economist was commissioned on 27 November 2001 to execute a study to assist in the formulation of a policy towards urban toll roads.

In brief the study outline comprised the following:

- An examination and comprehensive explanation of the economic and financial considerations that should underlie the adoption of a policy to impose road tolls in the City of Cape Town.
- An analysis of the benefits and disbenefits of tolling major roads in the City of Cape Town, taking specific account of the socio-economic features of its political economy. Included will be an examination of existing toll road schemes in South Africa and their applicability in the City of Cape Town.
- An investigation of the existing proposals for road-tolling in the Western Cape with comment on the socio-economic consequences that may require mitigation for the communities, income groups, commuters and employers, likely to be affected such toll road schemes.

This study was completed in March 2002 and has served as one of the informants for the compilation of this policy for the City of Cape Town on **road tolls**.

Comment [CoCT6]: [Quote or summarise the existing policy/and or position statement under this heading as well as the approving authority and date on which it was approved

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Note : If the policy is too lengthy, attach a copy to the report.]

The origin of this policy on toll roads stems from the realization within Transport Planning that **the adoption of a policy on road tolling** within the boundaries of the metropolitan area of the CCT, in order to raise revenue for road construction and maintenance, **needs to be preceded by a thorough investigation in which the benefits of that funding arrangement are weighed against:** -

- the possible inefficiency of route specific tolling;
- the institutional disbenefits;
- the costs of the distortion in resource utilization including transport costs;
- the effect on socio-economic welfare including short term and long term income redistribution, and the possibility of any profits arising there from being expatriated out of South Africa;
- the inequity of toll road schemes;
- the possible effect on land-use and environment;
- the alternative funding sources available which may be based on the "user pays principle".

7 NATIONAL / PROVINCIAL POLICY

7.1 In the past, legislation provided for only the National Department of Transport to build and operate toll roads. The new Constitution allows provinces to utilise toll roads, but specific provincial legislation must be enacted. To this end the Western Cape Toll Roads Act, 1999 (Act 11 of 1999) was promulgated. The Western Cape Toll Roads Policy followed this in April 2001.

7.2 National and Provincial policy on the implementation of road tolling is based on the premise that these spheres of government cannot afford to finance all the construction and maintenance required to satisfy the demand for these facilities. The imposition of road tolls within the City of Cape Town is dependent on the planning, design and management of these facilities being in accordance with the approved transport plan for the area as well as conformance with other applicable legislative requirements such as the National Environmental Management Act No. 107 of 1998 for example.

8 LEGAL REQUIREMENTS

8.1 Section 152 of the Constitution states that a municipality must strive, within its financial and administrative capacity to achieve the objects of local government, which are –

- (a) to provide **democratic** and **accountable** government for local communities;
- (b) to ensure the provision of services to communities in **sustainable** manner (i.e. people must pay for services);
- (c) to promote **social** and **economic development**;

- (d) to promote a **safe** and **healthy environment**; and
- (e) to **encourage** the **involvement** of **communities** and **community organisations** in the matters of local government.

Owing to the severe financial constraints and the pressures of rapid urbanisation, population growth and under-employment of job seekers, the City of Cape Town has been struggling to fulfil these responsibilities in respect of the transport system including the provision of roads and the maintenance thereof for the past two decades.

8.2 Section 153 of the Constitution sets out the development duties whereby a municipality must –

- (a) structure and manage its administration and budgeting and planning processes to give priority to the basic needs of the community, and to promote the social and economic development of the community; and
- (b) participate in national and provincial development programmes.

8.3 Section 154 addresses the issue of co-operative government as follows –

- (1) The national government and provincial governments, by legislative and other measures, must support and strengthen the capacity of municipalities to manage their own affairs, to exercise their powers and to perform their functions.
- (2) Draft national or provincial legislation that affects the status, institutions, powers or functions of local government must be published for public comment before it is introduced in Parliament or a provincial legislature, in a manner that allows organised local government, municipalities and other interested persons an opportunity to make representations with regard to the draft legislation.

8.4 Act No 7 of 1998, entitled “The South African National Roads Agency Limited and National Roads Act 1998” sets out the functions, powers and responsibilities of SANRAL in Chapter 3 thereof which is attached as Addendum E of the report dated 8 August 2002. It is in terms of this Act that SANRAL is currently considering two unsolicited bids to provide toll roads on the N1, N2 as well as the R300 and extensions thereof to Muizenberg and to Melkbosstrand. In terms of Chapter 4 of this Act, SANRAL may be granted loans by the State from monies made available by Parliament, and must repay these loans with the interest being determined by the Minister of Transport. SANRAL may also raise loans from any other source to perform certain functions in respect of any national road subject to written permission of the Minister of Transport with the Agreement of the Minister of Finance. SANRAL is part funded and provided with capital from

"levies on petrol and distillate fuel to be paid to the Agency in compliance with or in terms of any law by or in terms of which that levy is imposed "as well as "all toll payable to the Agency in terms of Chapter 3". It is interesting to note that in terms of Section 26 of Chapter 3, the Agency is competent "at the request of a municipality or the Premier of a province, and with the Minister's approval, to perform any work in connection with any road (whether a national road or a road of which that municipality or province is the road authority), including the planning, design and construction of such a road, or to have it done under its supervision, for the account of that municipality or province. The Agency may charge a fee for any service rendered under this paragraph."

8.5 The Western Cape Toll Roads Act (Act 11 of 1999) provides for the tolling of provincial public roads in the Western Cape and for the planning, design, declaration, construction, operation, management, control, maintenance and rehabilitation of provincial toll roads; and to provide for matters related thereto". In terms of Section 13, the member of the Provincial Cabinet of the Western Cape Province responsible for transport affairs may conclude an agreement with SANRAL in terms of which –

- (a) that Agency may do work in connection with a toll road, including the planning, design, construction and management of such a road or of a toll plaza, or have the work done under its supervision, for the account of the Province, or the Province will do such work for the account of the Agency, or otherwise in terms of the agreement;
- (b) the Province will manage or maintain a toll road belonging to that Agency, or the Agency will manage or maintain a toll road declared under this Act, in which case the agreement may provide for the sharing of tolls and costs.

Section 14 permits joint ventures in regard to "provincial toll roads or infrastructure and other roads or infrastructure" between road authorities or private persons or bodies who own or control or will own or control other roads or infrastructure.

8.6 It appears that the enactment of the legislation empowering the national sphere of government to toll certain roads is focussed almost exclusively on using this strategy as a means of obtaining an income stream for the purpose of repaying a loan (and interest thereon), which is raised in order to construct new roads and/or to improve existing roads. The reason that this has become necessary is because the grants from the national treasury from taxes including the fuel levy are insufficient for the purpose of building, operating and maintaining an adequate national road network. The same malaise is affecting the provinces such as the Western Cape where the income from vehicle registrations and licensing is not spent exclusively on the provincial transport system.

- 8.7 Research has indicated that sufficient funds are presently raised from the fuel levy and vehicle license fees alone to satisfactorily plan, design, construct, operate and maintain the entire national, provincial and local road network **if this income were to be spent exclusively for these purposes.** Public transport could also be subsidised from these existing sources of income, from concessions, advertising and development on land (and air rights over the land) located at public transport interchanges.
- 8.8 The Western Cape Toll Roads Policy was published on 20 April 2000. The goals and the policy objectives to achieve them contained in this document have been discussed and are outlined in the attached Annexure A. It is important to note that in terms of section 3.1.5. of the provincial policy *"It is a policy objective to carry out the IEM process and, prior to declaring toll roads to pursue the consultation process provided for in the Western Cape Toll Roads Act, which latter sets out the appropriate procedures which may be supplemented by regulations."* Furthermore, the Province clearly states in section 3.1.6. that "The policy towards establishing a toll facility must be considered as part of the integrated transport plan for the area or areas of jurisdiction in which the road is located. The planning, impacts and financial implications of such toll roads must therefore meet with the acceptance and approval of the planning authorities responsible for the transport plan, as well as the Minister, who is responsible for approving such plans."
- 8.9 Other legal requirements pertaining to the provision of municipal services, such as adequate public rights of way including roads, are contained in Act No. 32 of 2000: Local Government: Municipal Systems Act, 2000.\
- 8.10 The Urban Transport Act No 78 of 1977 and the National Land Transport Transition Act No 22 of 2000 both contain sections, which govern the responsibilities of the three spheres of government with respect to planning, provision, operational management and funding of transport infrastructure. The Urban Transport Act (section 21) makes specific provision for a local authority to impose travel demand management levies in accordance with any applicable approved transport plan. These levies can be imposed on "(a) specified classes of motor vehicles entering specified portions of the metropolitan transport area...at specified times; (b) land or buildings, except in so far as they are used or intended for private dwelling purposes and land or buildings of which the State is the owner... (c) the parking of motor vehicles in any buildings or premises in specified portions of the metropolitan transport area...(d) parking-places for motor vehicles in such portions...(e) places where goods are off-loaded from or loaded onto motor vehicles in such portions."
- 8.11 The Provincial Tax Regulation Process Act No. 53 of 2001 has recently been promulgated "To regulate an intergovernmental process that must be followed by provinces in the exercise of their power in terms of section 228 of the Constitution to impose taxes, levies and duties, and flat-rate surcharges on the tax bases of

any tax, levy or duty imposed by national legislation; and to provide for matters connected therewith.”

9 **BACKGROUND/INTRODUCTION**

- 9.1 Sustained economic development and improvement in the quality of life requires the provision, management and proper maintenance of a transport network that meets the needs of the full range of desirable human activities in Cape Town. In order to achieve this, it is evident that additional expenditure is required in order to maintain and adequately improve the City of Cape Town's transport system. While road tolling has been proposed by both the National and Provincial spheres of government as one of the alternative means of funding, the City of Cape Town considers that the adoption of a policy on road tolling within its boundaries should be preceded by a thorough investigation in which the perceived benefits of that funding arrangement are weighed against the disbenefits.
- 9.2 The National Government has identified transport as one of the five main priorities for South Africa, while the vital role of transport is emphasised in a World Bank publication entitled: "Development in Practice: Sustainable Transport: Priorities for Policy Reform": This states that "Transport is central to development. Without physical access to jobs, health, education and other amenities, the quality of life suffers; without physical access to resources and markets, growth stagnates and poverty reduction cannot be sustained..." Unfortunately, insufficient funds are being allocated in all three spheres of government to improve metropolitan transport to satisfactory levels of service and safety.
- 9.3 An emerging policy towards the funding of public facilities and services that is gaining wide acceptance is that it should preferably be based on the "user pays" principle. Thus one of the better methods of financing roads is the imposition of a charge on users of these facilities, which have traditionally been regarded as public goods to be provided free of charge. A user charge, which is roughly proportional to the impact of the users on roads, is an additional levy (or a "shadow toll") on the sale of liquid fuel for transport purposes. That could be regarded as road-use pricing because more fuel per kilometre is used in congested conditions than in free flow conditions, although it is doubtful whether it rations the use of road space, as a proper user charge should do. Heavy vehicles, which have a greater adverse impact on traffic flow as well as on the road pavement structure, also use more fuel per kilometre than light vehicles. (In South Africa the present fuel levy totalling about R1 per litre is regarded as a tax and is used by national government for general expenditure. Less than 50% of the amount collected is currently spent on transport.)

Comment [e7]: [Indicate where the request for proposed policy/by-law originated from: whether this was a request from the Executive Member, Portfolio Committee member, the administration, etc. as well as the motivation for such a request. If the matter has already served before council or one of its committees or the Executive Member, reference should be briefly made to this. Quoting or summarising a previous resolution (item/paragraph and date) is essential. If the historical run of events is of any importance, it should also be dealt with here. Indicate whether this is the first, second, third, etc. report to the committee, dealing with the same matter and at what stage the deliberations are at.]

- 9.4 There are many applications of the use of toll systems on roads, road tunnels and road bridges throughout the world. Such facilities have restricted access and payment is usually made at a tollgate or a toll booth in a toll plaza in the form of cash, a previously purchased ticket, a stored value read/write card which is read by remote sensing or vehicle registration numbers are read by camera and the owners are sent computer generated accounts or the costs are deducted from their bank accounts.
- 9.5 The income stream derived from a toll road can be used to repay the capital construction costs (in part or in full), as well as the operating costs, including administration, toll collection costs, investors' profits and maintenance of the facilities. When the toll road is privately funded, its financial viability will depend on the total cost of financing and on the actual net revenues from toll collection. Often the toll charges would then be set so as to maximise the net revenue. If the toll fee is set too high, motorists will tend to use the alternative routes, which are usually available in urban areas. However, the principle behind toll roads has always been that they should achieve savings and add value for the motorists and commuters that use them.
- 9.6 Tolls are often regarded as a form of road user charge that can be applied for two distinctly different purposes. Firstly, they can be used as a means of managing the demand for use of a particular road link or on a number of road links leading to concentrations of employment, in which event they are properly user charges. For that purpose, it is required that vehicles display prepaid tokens (or carry smart/read/write cards) to enter a defined area during certain hours of the day. Monitors on those road links record the registrations of all vehicles which do not display the necessary prepaid tokens or which do not carry the smart cards. Accounts are sent to the owners of those vehicles, which do not comply with those regulations. Secondly, they can be used to help finance the construction and maintenance of a particular road link.
- 9.7 In the City of Cape Town there is an increasing travel demand resulting from a growing population and car ownership. The manifestation of that growing demand has resulted in increasing travel times between many origin/destination pairs, especially during peak periods, which are becoming longer while the off peak utilisation measured in volume to capacity ratios, is also growing. The congestion causes increased transport costs, increased pollution and loss of productive time. Notwithstanding the congestion, investment in new transport infrastructure has not grown in real terms over the past fifteen years except for the R192 million (plus interest) of special funding granted by the national government for the 1996/97, 1997/98 and 1998/99 financial years for the Priority Olympic Development Projects. The insufficient allocation of public funds to provide transport facilities has also an adverse effect on marginalized communities due to lack of ability to provide access to less-privileged areas.

9.8 Given these circumstances, it is widely recognised that in order to be able to maintain and improve on the existing levels of service for public transport users and private, business and goods vehicle users, it will be increasingly necessary to raise new finance for the construction, operation and maintenance of transport facilities from users of the facilities. It has also been fairly widely accepted that the "user pays" principle should be applied insofar as possible and politically acceptable. That principle is based on the user paying for the benefits obtained through the use of the facility.

9.9 Additional multiplier benefits will result from the provision of new transport facilities and both direct and indirect employment opportunities will be created, while accessibility for tourists and opportunities for new land-use developments will be improved.

9.10 The purpose of developing a policy on road tolling for the City of Cape Town is to facilitate informed response to any unilateral attempts to provide tolled roads within the municipal boundary, as well as to ensure informed action to increase the utilization of public transport and reduce peak period delays on the major road network.

10 DISCUSSION/ASSESSMENT OF THE IMPOSITION OF ROAD TOLLS IN THE CITY OF CAPE TOWN

10.1 CONSIDERATIONS UNDERLYING THE ADOPTION OF A TOLL ROAD POLICY FOR THE CITY OF CAPE TOWN

10.1.1 Economic theory of charging for road use

Congestion charges (taxes)

Economic theory supports charging for the use of a public road, only when the charge will eliminate traffic congestion through its effect of rationing the use of road to those who have the highest need to travel at the time when the congestion will otherwise occur.

10.1.2 Pragmatic justification for road tolling

(a) Practical motivation

Toll road schemes in practice should be based on their advantages for obtaining funds for roadworks more speedily than otherwise, only when that necessity outweighs the many drawbacks.

(b) User-pays principle

Comment [e8]: [Please select one option from the heading and delete the rest. discussion of main policy objectives to be addressed in proposed Policy/By-law, is to be set out under this heading. When developing policy, one of the main focus areas of the committee must be the involvement of the public in generation of such policy. Indicate what public participation process is to be embarked on in terms of the public participation processes agreed to by the Executive Committee and indicate the financial implications of such a process and record the vote number, confirm the amount and availability of the money on the budget as well as the date when this confirmation was given. The Executive Director: Finance should only comment if the item is not provided for in the budget or has major financial implications. If assistance is required from the Executive, then indicate whether the Executive member is required to give evidence, what professional input is required during the formulation process, whether technical reports are to be compiled and by whom, and whether officials are required to attend the deliberations of the Committee.]

The notion that the imposition of road tolls conforms to a *user-pays principle* whereby road users through their payments determine the road facilities required, is not valid and cannot be advanced in the support of the unsolicited toll road schemes.

(c) Procurement of funds

The procurement of funds for roadworks through toll road schemes is far more costly for road users than the use of public funds obtained through taxation or the imposition of a fuel levy (or shadow toll), but this may enable the funds to be obtained sooner. Depending on their credit rating, the cost of finance could vary for public or private borrowing institutions/entities.

If the road authority is prevented from borrowing large amounts for whatever reason, it may contract the private sector to raise the required capital to implement the scheme and to maintain and operate the road over the contract period of say 25 or 30 years. The concessionaire can then be repaid by means of directly tolling the users or by regular payments from the Road Authority in the form of a "shadow toll" from other sources of income. These sources could include a levy on fuel and/or vehicle licence fees, business levies and sales tax etc.

This latter means of funding has been used for the M-45 Expressway near Madrid in Spain. This 36,2 km long six-lane freeway equipped with ten multi-level interchanges cost over US\$400 million and was opened to traffic in March 2001. There are no toll plazas (and thus no diverted traffic away from the freeway) as vehicles are counted by loops in the roadway in order to calculate usage in terms of vehicle/kms. The contract between the Community of Madrid and the concessionaires specifies a ceiling on the number of vehicles to be billed. The resulting figures are then multiplied by the unit price charged by the concessionaire in order to obtain the shadow toll fee billed to the administration.

The advantage of this kind of scheme is that payment for costly transport infrastructure can be spread throughout the concession period to the private consortium, which carries the full load of the debt in its company accounts. Thus the road authority can deliver essential transport projects as and when they are justified. The users are not delayed at toll plazas and there is no need for expensive electronic fare collection systems. Some savings are thus achieved and there is a minimisation of the inequitable effect of route-specific tolling. (World Highways/Routes Du Monde May 2002)

(d) Dedication of funds

Toll road contracts enable the revenue collected to be dedicated to expenditure on the scheme and so avoid political intervention in its allocation. It is unlikely, however, that the metropolitan authorities could ignore the additional costs of the

imposition of tolls for the use of some local roads when deciding on the levels of other taxation. Toll financing of certain road projects may thus adversely influence the allocation of public funds for other road purposes

(e) Privatization of roads

The concessioning of toll roads in terms of BOT-contracts does not constitute the privatization of roads, but rather the privatization of the financing of roadworks and requires the public authority to balance the interest of road users against the profit motives of the concessionaires.

(f) Foreign investment

As toll roads schemes are regarded as lucrative businesses for investors and really constitute regulated monopolies, they readily attract foreign investment, but it is doubtful whether the fruits of such investment have local multiplier effects, as it is unlikely that the profits are invested locally.

10.1.3 Disbenefits of toll roads for local authorities

Institutional drawbacks

- (a) The finance of a road project by the imposition of road tolls commits a road authority responsible for the scheme to ensure that the scheme remains viable until the end of its lifetime - if the scheme fails, taxpayers or local ratepayers may have to bear the financial burden of all the outlay cost.
- (b) Although funds for road development can be raised far sooner through toll road schemes than by reliance on public revenue, far less will be available for that purpose over the long term if road tolls must be taken into account together with other taxation when the amount of public revenue needed is decided.

Distortion in resource utilization

- (c) The economic justification for toll road schemes should be determined through cost-benefit analysis in which the present value of the net benefits of providing the improvements, without resorting to any toll road scheme, are compared with the net benefits of the scheme, taking into account that the improvements may be completed sooner through the scheme.
- (d) The consequent marginal increase in the net benefits attributable to their realization sooner than otherwise should then be compared with the

increase in the costs to road users if the toll scheme were to be implemented.

- (e) The economic justification for the project as determined without the toll road scheme, should also be compared with the economic justification for the scheme taking all its costs into account and, if both are adequately viable, the economic justification for the earlier completion of the project in accordance with toll road scheme, as reflected in the marginal analysis, should provide the criterion for deciding whether the toll road scheme should proceed.
- (f) When projecting the stream of costs in the analysis of the project without the toll road scheme, improvements likely to be carried out with public funds in any event should be included.
- (g) When comparing the net present benefits of projects without tolling and with tolling, it should be borne in mind that it is in the financial interest of private toll scheme developers to undertake roadworks to the extent of what tolls road users would be willing to bear, while lesser roadworks without toll-financing may be adequate. (See also consideration (l)).

Inequity

- (h) Inequity occurs when, as an outcome of a toll road scheme, road users are burdened with additional cash expense without choice. This may occur when an existing road is tolled or a new toll road added to the network precludes trip makers from following pre-existing routes.
- (i) Road users obliged against their choice to use toll roads which according to theoretical calculations reduce their imputed trip costs commensurately more than the toll charge, are not spared inequity if that charge exceeds their out-of-pocket or cash savings.
- (j) Serious inequity is likely to occur when only a few of the existing roads used by commuters in the metropolitan network are tolled, as the burden of their additional cash expense will be arbitrarily imposed.
- (k) It is unlikely that an equitable method exists for tolling selected metropolitan roads in current use and consideration should thus be given to limiting toll road schemes to new roads which otherwise would not be built (or closed roads which otherwise would not be opened) provided the use of the existing network is not disrupted.
- (l) The willingness of well-off road users to bear road tolls in return for perceived benefits which appeal to them (for example, such as safety

from rock-throwing or hi-jacking) does not justify the inequity of imposing those tolls, or the alternative expense resulting from severance of access, on others less well-off who may not perceive those benefits as material to themselves.

Effect on land-use and environment

- (m) The tolling of the major metropolitan roads leading towards the CBD of the CCT and the major transverse route may separate the metropolitan area into inner and outer areas in which the effect is to promote densification in the inner area and dispersal of development in the outer area as people attempt to avoid paying road tolls. Furthermore, the tolling strategy could lead to the unnecessary duplication of certain routes in order to capture traffic that would otherwise have used alternative arterial routes. This may have additional adverse effects on sensitive environments.

Public transport

- (n) If the main purpose of tolling major roads in the metropolitan area is to raise the funds, which will enable the capacities of those roads to be expanded, then those funds cannot be easily used to improve the public transport system, which could reduce the demand for those road capacity increases.
- (o) Whether toll road schemes, which will have enduring land-use effects, will hinder the improvement of public transport (so indispensable to sustainable development in the long run) also needs consideration.

Debt risk

- (p) The risk of the debt incurred to finance a toll road scheme is largely dependent upon the realism with which the tollable traffic has been forecast, and careful consideration needs to be given to the forecast when predicting the financial viability of a scheme. When doing so, it should be borne in mind that the only urban toll road scheme in South Africa, the (N17), has not been a financial success, mainly because of the choice of untolled routes available to road users.

10.1.4 Economic justification for toll road schemes

- (a) A toll road scheme should properly be justified through cost-benefit analysis whereby the net present value of the scheme including all the costs involved is compared with the net present value of continuing without the scheme, but taking into account the improvements, which would then be implemented. The marginal benefits of the toll road scheme, as against continuing with the development of the road without tolling (which are likely to stem mainly from its sooner implementation), should then be compared with the increase in the costs of the toll road scheme.
- (b) The cost savings which result from road improvements in the form of reductions in the risk of accidents, travel time and vehicle operating costs, are resource savings imputed for the purpose of economic evaluation and should not be used to justify the amount of a toll, which requires a cash outlay i.e. resource savings benefit the economy while the out-of-pocket expense of road tolls are experienced directly by individual road users and affect their personal welfare.
- (c) Consideration should thus be given when imposing road tolls to ensuring that *all* road users are willing to pay the tolls and so rate their benefits as being worthwhile, which implies that toll road schemes are more likely to benefit those who can readily afford the tolls and disadvantage those who cannot – see also 10.1.3 (g and l).
- (d) As road tolls imposed in BOT-schemes must necessarily cover not only the cost of loans to finance the improvement to the road, but the costs of developing the scheme, building and equipping toll plazas, collecting tolls, maintaining the road, managing and operating the scheme, and the profits of the developers, it should be considered whether the resort to such schemes in order to build and improve roads really affords users value for their money.

10.1.5 Provision of alternative routes

South African law does not require an alternative route when a road is to be tolled. Although the cost of maintaining two routes when one could suffice may seem to result in a waste of resources, the practical elimination of a choice of alternative routes when roads are tolled is undoubtedly inequitable. Consideration should, therefore, always be given to ensuring that existing mobility is not inhibited by a lack of choice of routes when a toll road is opened.

10.1.6 Socio-economic considerations

Income redistribution

- (a) As the benefits of metropolitan toll roads schemes will be greatest for those whose time is highly valued and whose death or injury on road accidents incurs a high-risk premium, it follows that the toll revenue required to improve a road will benefit the well-off more than the poor in terms of the imputed savings - consideration thus needs to be given to income-redistribution effects of toll roads, which tend to be the reverse of the re-distribution effects of non-tolled roads.
- (b) In view of the much higher expense to road users of providing roads through toll financing and the incentive for BOT-developers to incorporate spending on the scheme to the limit of what the toll payers are likely to bear, in order to raise their return, careful consideration should be given to the actual need for the roadworks envisaged.
- (c) As toll financing is not in the public interest if funds are available or could be forthcoming from traditional revenue sources, such sources should be fully explored before resorting to toll road schemes.
- (d) The claim that toll-financing is a means of releasing public funds for spending on other purposes than roadworks confutes the contention that an enormous backlog of such works exists, especially as the backlog applies to many roads which are unlikely to be tolled – consideration thus needs to be given to the real consequences for the road network if toll-financing deflects public funds intended for roadworks to other purposes.

Employment benefits

- (e) When considering the employment benefits of toll road schemes, care should be taken not to count successive temporary employment as additional permanent jobs, nor should the deflating effect of subsequent unemployment be overlooked when estimating the multiplier effect of spending on schemes. The employment of administrative staff to collect tolls does not create wealth nor does this save the travelling public money.

Socio-economic sustainability

- (f) Although the National Environmental Management Act 1998, requires that development must be socially, economically and environmentally sustainable in order to be acceptable, no criteria are given for social and economic sustainability – consideration should thus be given to the extent to which inequitable income re-distribution stemming from toll road schemes renders the schemes socially unsustainable, while the economic

sustainability should be determined through cost-benefit analysis, the documentation of which should be publicly available in the EIA's.

10.1.7 Existing toll road roads in South Africa

Three basic categories of toll roads exist in South Africa at present.

(a) State Toll Roads

Ten State toll roads totalling about 1000km are currently managed by private undertakings on behalf of SANRAL. The value of the assets employed in these routes was about R4, 4 billion in 2000. Funds for the improvement of these existing State toll roads are borrowed as required in the capital market and are allocated to specific routes on the principle that the net revenue from tolls after the cost of management, operation and maintenance must be sufficient to repay the debt and interest charged.

(b) BOT Concessions

Build, Operate and Transfer (BOT) agreements with private undertakings cover the N3 Toll Road in Natal over a distance of 373km, the N4 Maputo Development Corridor as well as the N4 Platinum Highway Development, which is partly still under construction. These toll roads are financed by concessionaires (usually a consortium) through the investment of their own funds and loans from banks and other financial institutions. These institutions often insist that the net revenue from tolls after deductions for managing, operating and maintaining the roads must exceed the annual cost of servicing the loans by about 30% or more. Concessionaires may also seek some relief of risk from the road authorities.

(c) Proposed Toll Road Schemes

Seven unsolicited toll road proposals have to date been given Scheme Developer Status by SANRAL since December 1999. In addition to the two which impact on the City of Cape Town, the others are the N2 Garden Route between George and Port Elizabeth (297km), the John Ross Highway between Empangeni and Richards Bay, the N2 Wild Coast Toll Road between East London and Durban and the Super Highways Scheme of toll roads between Johannesburg and Pretoria.

Various Consortia are proceeding with the necessary investigations including Scoping Studies, EIA's and are in dialogue with Interested and Affected Parties. Public opinions, suggestions and recommendations must

be obtained and addressed by the scheme proposers to the satisfaction of SANRAL and the Minister of Transport.

The City of Cape Town is clearly more than just an Interested and Affected Party in respect of the two unsolicited toll road schemes, which impact within the municipal boundary. If the proposed schemes conflict with the City's policies and plans and the Minister of Transport or SANRAL choose to overrule any objections the City may lodge, implementation of these schemes may be found to be in conflict with the Constitution as well as other legislation.

10.1.8 Proposed toll road schemes within and close to the City of Cape Town

Chapman's Peak Drive is to be reopened as a toll road in terms of a 30- year concession agreement. Frequent users will be afforded a discount. It has been estimated that less than 30% of potential traffic may be diverted from using Chapman's Peak Drive owing to it being tolled. Tourist and recreational traffic will benefit from the reopening of the route and the safety improvements being made.

An important issue concerning toll road schemes within and close to the City of Cape Town is the Fire, Emergency Services and Disaster Management considerations. It is essential that Disaster and Emergency Management Plans be prepared and approved by all the relevant authorities. The contractual, financial and legal obligations and responsibilities in connection therewith must be clearly identified prior to the awarding of the toll road contracts. Access for emergency services onto or across toll roads to attend to accidents and other emergencies on or beyond the toll roads must be permitted with minimal obstruction, additional cost or delay.

The following comments are focused on the main issues affecting the development of the City's policy towards unsolicited toll road bids. Once the proposals are formally submitted to the City for a specific response, all the detailed routing, environmental impact and tolling strategy issues can be more fully addressed. Maps indicating the extent of the two toll road schemes located within and close to the City of Cape Town can be found in Annexure A of this report. It is noteworthy that the Penway Scheme, which is proposed to be declared a national road, is located entirely within the boundary of the City.

Penway scheme

(a) The important considerations seem to be: -

- Whether Phases 1 to 3 are essential at present for the development of the metropolis; whether toll financing is then the only resort; and whether that will be successful only if the existing R300 is also tolled. It is noteworthy that parts of Phases 1 (Durbanville to Melkbosstrand) and 3 (Vanguard Drive to Steenberg Road) are not proclaimed National Roads and cannot be tolled by SANRAL until they have been so declared.
- Whether the tolling of the existing R300 (N21) in order to render the scheme financially viable will penalize road users in the lower income groups to the benefit of road users in higher income groups; and
- Whether the income redistribution which that implies is really justified by the benefits of the scheme; and more specifically
- Whether the inequity of imposing tolls for the use of the existing R300 (N21), especially for the households in low-income groups located alongside the road, but also for road users undertaking trips from origins further away, is unavoidable.
- Whether the Penway scheme together with the effect of the Protea scheme will separate the metropolitan area into an inner and outer area and result in higher densities of land-use in the inner area, but dispersed development in the outer area.
- Whether the tolls payable directly and indirectly by commuters will be affordable, especially by those in the lower income groups, including users of mini-bus taxis; and
- Whether the effect on incomes will cause a multiplicative reduction in consumer spending; and
- Whether the tolls will cause a significant rise in the cost-of-living in the metropolitan area.
- Whether it is necessary from a transport planning perspective to duplicate Vanguard Drive and Spine Road south of the R300 as is necessitated by the tolling strategy being proposed by Penway Consortium.

Protea scheme

- (b) The disadvantages of the Protea scheme, which seem to warrant consideration, are as follows: -
- That the N1 and the N2, which serve different purposes, will be tolled as one scheme and inevitably some cross-subsidization will ensue between the individual road schemes and between the sections of the schemes inside and outside the metropolitan area.
 - That long stretches of the existing roads will be tolled, although the current users are unlikely to perceive benefits for themselves stemming from the tolls paid, nor are there likely to be any savings in resource costs, except to the extent that the proposed improvements may ease traffic congestion, where that occurs for short periods at several places.
 - That many of the regular users of the existing roads, including commuters, will not derive any benefit from the proposed major improvements i.e. the construction of a new section of road through Helderberg and the commissioning of the second bore of the Huguenot Tunnel.
 - That the tolls collected from many of the road users will thus be disproportionate to the benefits they receive and will be tantamount to a selective tax with an unfair incidence in relation to the purpose it serves.
 - That more specifically, it will be inequitable to require commuters using road transport in the metropolitan area to contribute to funds required for road improvements outside that area on sections of road they may not use.
 - That the flow of traffic on sections of the roads varies greatly, which implies that it will be difficult to avoid imposing tolls, which are inequitable for the distances, travelled by some users and not commensurate with any benefits they derive.
 - That the imposition of tolls for commuters accustomed to using the existing N1 and N2 will be difficult to justify if commuters using other major routes in the metropolitan area are not subjected to tolling, especially when the toll-payers do not receive commensurate out-of-pocket savings in return.

- That the tolling of the N1 and N2 will have social and economic consequences for a substantial number of households in the metropolitan area and, as no alternative routes at equivalent cost are available for many of the journeys undertaken, tolling will reduce their mobility; thus some decline in social and economic activity will be inevitable, especially among low-income groups.
- That trip-making for economic purposes, especially daily trips to deliver supplies and undertake services, will become more expensive to those communities served by the roads and raise their costs-of-living relative to the costs-of-living in other communities in the metropolitan area.
- That the communities served by the roads can well query the inequity of having to pay tolls, as well as the taxes, which enable untolled roads serving other communities to be improved and maintained.

10.1.9 BOT financial arrangements

- (a) If the road authorities, who wish to impose route specific tolls within the boundaries of the City of Cape Town, cannot be persuaded to use the innovative method of procurement of funds for roadworks outlined in section 10.1.2 (c) of this report, then consideration should be given to measures whereby the metropolitan authorities must be consulted when discounts on toll fees are granted, in order that the income redistribution effects are taken into account in the implementation of local social policy.
- (b) In view of the enduring effect of national toll road schemes within the metropolitan area on the welfare of local road users, it is advisable for the metropolitan authorities to have insight of the financial models of BOT-contracts to be concluded for national or provincial toll roads within the metropolis.

10.2 JUSTIFICATION FOR TRAVEL DEMAND MANAGEMENT TOLLING

From international and local experience it is clear that it will not be cost effective nor will it be affordable to attempt to provide sufficient road capacity to cope with peak hour travel demands at high levels of service throughout the City of Cape Town. The solution to the problem of increasing peak period travel delays and increasing environmental costs of transport is multifaceted but must include a form of congestion charging. The argument for the imposition of road tolls for the

purpose of managing the demand for travel on particular routes or through particular areas has been proposed in section 8.2.1 of this report.

It is advisable that the City of Cape Town should consider following the example of Singapore in respect of tolling vehicles entering a cordon around the Central City Area during the peak morning and evening periods. This initiative will have to be supported by a vigorous and adequately funded programme to improve the public transport serving the Central City Area as an alternative to paying the travel demand management road tolls.

Each proposal will require careful analysis prior to implementation in order to avoid any adverse unintended consequences.

10.3 CONCLUSIONS FROM THE MAIN ARGUMENTS ON THE IMPOSITION OF ROAD TOLLS IN THE CITY OF CAPE TOWN

10.3.1 Imposition of road tolls by SANRAL or by Province on certain sections of some major roads within the municipal boundaries for the purpose of financing the construction, operation and maintenance thereof, **will probably result in the earlier provision of some essential major road network improvements than if conventional funding sources were to be sought.** In some cases traffic could be attracted away from non-tolled routes, especially where there is a travel cost or time advantage involved. However, the application of these route specific tolls will result in the following **adverse impacts** especially if toll plazas are erected: -

10.3.1.1 Traffic will be diverted to less desirable through routes, mostly municipal roads.

10.3.1.2 Elements of the toll road schemes will either be built or not built owing to the need to maximize the net toll income. This is likely to lead to sub-optimal infrastructure provision for which both users and non-users will pay.

10.3.1.3 Investment priorities of SANRAL, Province and the City are not always well aligned. This can only be resolved by the creation of one Transport Authority for the City of Cape Town. Long-term toll road contracts, which are signed prior to this occurring, could be prejudicial.

10.3.1.4 Isolated toll road schemes and internal cross-subsidization will result in inequitable user charging.

10.3.1.5 The procurement of funds for roadworks through toll road schemes is far more costly (up to about 35% higher) for road users than if they paid therefore by a levy on fuel, a shadow toll or by other means of taxation.

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- 10.3.1.6 Existing law does not permit income from toll roads managed by SANRAL to be used to improve public transport alternatives to those roads.
- 10.3.1.7 In order to raise sufficient funds without imposing excessive toll charges, it appears that the higher traffic volumes within the city boundaries is to be captured by means of applications by SANRAL to declare municipal and provincial routes as national roads in order to toll them.
- 10.3.1.8 If the main reason for consideration of road tolling is to raise capital for the implementation and maintenance of particular routes, then the best way of procuring the schemes will be by requesting tenders from private concessionaire consortia to fund and provide the facilities and to repay them in terms of a contract over an extended period. The road authority, which owns the infrastructure, pays the concessionaire the tolls that would have been paid by the users had the road been privately financed and tolled directly. These payments are made in accordance with the usage in terms of vehicle/km multiplied by the unit price tendered and charged by the concessionaire. A ceiling is agreed between the road owner/authority and the concessionaire on the number of vehicles for which to be billed and payment is made from other income sources available to the roads authority such as a fuel levy, vehicle licence fees, value added tax, business levies or rates income etc. This innovative financing method has the advantage that payment by the road authority is spread over the contract period and the debt is carried on the books of the concessionaires. Road users are not diverted from their routes of choice by toll plazas because none are required. Only vehicle counting loops are required to be installed as part of these schemes.
- 10.3.2 The following **legal issues** may influence the City's policy on road tolling: -
- 10.3.2.1 It appears that the promulgation of Act No 7 of 1998, entitled "The South African National Roads Agency Limited and National Roads Act 1998" may not have been published in a manner that allowed organized local government, municipalities and other interested persons an opportunity to make informed representations with regard to the draft legislation. Clearly, the declaration of national roads, which are wholly or partly within the municipal boundaries, and the imposition of tolled routes controlled by a national agency could negatively effect the capacity of municipalities in the management of their own affairs, to exercise their powers and to perform their functions. If this is so, then the promulgation of Act No 7 of 1998 may well have been in conflict with Section 154 of the Constitution.
- 10.3.2.2 In terms of section 7.4 of this report, it is legally possible for the City of Cape Town as well as the Premier to request SANRAL to undertake the Tender Process, Construction and Maintenance of any road of which that municipality

or province is the road authority. The Agency may charge a fee for any such service rendered.

10.3.2.3 In terms of Section 21 (1(a) of the Urban Transport Act 78 of 1977 as assigned on 1 October 1995 to the Provinces, it is already within the power of any of the Metropolitan Local Councils comprising the Cape Metropolitan Transport Area or the Cape Metropolitan Council to impose levies, in their areas of jurisdiction, as determined or approved by the Premier of the Western Cape Province on specified classes of motor vehicles entering specified portions of the Cape Metropolitan Transport Area. The amounts received by the authority imposing and collecting these levies (or toll fees) must be paid into the Cape Metropolitan Transport Fund once in a month in terms of Section 21 (2)(a) of the Urban Transport Act. This legislation enables these levies (or toll fees) to be used as a means of attempting to manage the demand for travel as described above.

These levies should be imposed only if the income derived there from will exceed the cost of collection and/or if the imposition of these levies reduces the generalised cost (including the cost of the levies to the motorists) of transport in the Cape Metropolitan Transport Area.

11 **STAFF AND FINANCIAL IMPLICATIONS**

Comment [e9]: [Staff implications are to be stipulated under this heading]

Financial Implications

All three road-tolling schemes located within or close to the City of Cape Town presently being considered by the province or SANRAL involve improvements to and/or realignments of existing roads. The Penway scheme for the R300 route also involves extensions to an existing route. This means that certain sections of these public roads are effectively being privatised for 30 years in order to capture sufficient affordable toll income to render the projects commercially viable.

The total cost of building, operating and maintaining these privatised routes will be more than if they were built, operated and maintained by the public authorities (owing to the costs of tolling, unnecessary infrastructure and private profit). If the City is successful in persuading SANRAL and the central government to repay the successful tendering concessionaire for any toll road within the City boundaries by means of the "shadow toll" proposed in section 10.1.2 (c), then the amount of additional costs to the travelling public and City ratepayers will be considerably reduced.

The proposed initial toll charges on Chapman's Peak Drive were published in the Cape Town newspapers on the 18th September 2002. For example, frequent car users will have to pay R7 per trip to use the 11km long improved route. Occasional car users will have to pay R18 per trip. If a "shadow toll" of say 50c per litre (on top of the approximately R1 per litre fuel levy which the toll payers must also pay in addition to the toll charge) were to be imposed, these car users would pay only 50c extra per trip to use the improved road. The proposed toll charges on the R300, N1 and N2 routes have not yet been made public.

If a "shadow toll" of 50c per litre were to be charged at fuel sales points in the City of Cape Town, over R700m per year would be collected. If this additional income were to be used to maintain, improve and extend the transport network, in cash as well as interest and redemption payments, the City could supplement the existing sources of income for transport to enable adequate facilities to be provided. It would not be necessary to toll roads for other purposes than travel demand management.

Investment in desirable and economically justified transport improvements will result in substantial benefits to the local economy and create much needed employment opportunities. The converse is unfortunately also true.

Staff Implications

If the City requests SANRAL, in terms of Section 26 of Chapter 3 of Act No 7 of 1998, to perform certain functions on its behalf on the entire major road network for example, it should be possible to re-deploy some municipal staff, who are currently involved in the provision of those services. The full staff and financial implications will have to be fully assessed before any decisions in this respect are taken.

12 COMMENTS FROM OTHER DIRECTORATES

Comments have been sought from Legal Services, Planning & Environment, Economic and Social Development as well as Finance Directorates.

- 12.1 The comments received from the Environmental Management Department of the erstwhile CMC focus on the need to provide and promote an improved public transport alternative to the further development and improvement of capacity of the major road network. The transport aspects of the Integrated Metropolitan Environmental Management Policy (IEMP) adopted by the City must be adhered to. It appears that the environmental impact assessments required by SANRAL do not require a full evaluation of the alternatives to the provision of a toll road nor is the economic impact of the tolling strategy likely to be a core issue in the current environmental impact assessments. These are potentially serious shortcomings of the process. Although the National Environmental Management Act No.107 of 1998 (NEMA) requires that development must be socially,

Comment [e10]: Error! Main Document Only. [If applicable, under this heading, the names of directorates and administrations consulted are mentioned. Should any of the directorates concerned disagree fundamentally with the recommendation, it should be mentioned here]

i.e The name and telephone number of the responsible official who has provided the comment of his/her Directorate, is to be included in this paragraph, e.g.:

1.1 Blaauwberg Administration
Transportation & Traffic: (Mr F Forbes - 418 2645)

The proposed intersection does not pose any threat to the safety of motorists and I therefore support the proposal.

1.2 Tygerberg Administration
Transport & Traffic: (Mr R Eathen - 487 2354)

This directorate has no objection in principle to the proposed closure of the road provided that the conditions set out below, are adhered to.]

economically and environmentally sustainable in order to be acceptable, current and past approaches to EIA's on toll road proposals have and will continue to exclude the impact of tolling on the receiving environment. In addition, the consideration and assessment of the alternative method of acquiring the necessary funds for improving existing networks are not addressed. In terms of existing environmental legislation, both NEMA and the Environmental Conservation Act No 73 of 1989 (ECA) and the regulations governing EIA's, these exclusions represent fatal flaws in the approach to the EIA's.

It is recommended that any process to assess the environmental impacts of proposed toll roads, especially within the municipal area, include strategic and specific assessments of the impacts of **tolling the proposed route** on

- the existing road network
- the socio-economic environment (including all road users, business activities in receiving and affected environments)
- the sense of place of the affected municipal network and immediately adjacent environment.

It is recommended that a Strategic Environmental Assessment (SEA) be undertaken by the proponent and that the outcomes of the SEA form part of the considerations in the decision making process. This SEA is to be funded by the proponent and the process administered by an integrated nominated committee that represents the proponent, SANRAL, local government and relevant stakeholder representation. The City of Cape Town will not support any toll road proposal in the absence of the SEA as described above.

Toll plazas are likely to impact adversely on the environment owing to the additional land requirement, increased noise and air pollution and visual intrusion when compared with a conventional road.

12.2 Comment from Jane Prinsloo of Economic and Social Development supported that each proposal for road tolling needs to be considered on its own specific merits and potential impacts. The issues are complex and decisions need to be made within an integrated management plan for the entire metropolitan transport system. Issues of equity, sustainability and foregone development opportunities especially for previously disadvantaged communities need to be taken into consideration. Evaluations need to consider the direct and indirect impact on current users, potential users, the environment and the efficiency of the transport network as a whole. Given that our economy is not resource rich, the City needs to seek the most cost efficient and sustainable solution that will free up maximum public and private sector productive energy and resources. While tolling may appear to offer short-term access to cash, its overall impact may limit both public and private resource flow. Tolling specific routes, especially where there is no convenient alternative route, may severely limit the mobility of poorer individuals and small business entrepreneurs.

- 12.3 The valuable comments received from Legal Services as well as from Fire and Disaster Management Services have been taken into account or incorporated in the redrafting of this policy report.

13 **PUBLICITY IMPLICATIONS**

The Communications Directorate has been informed and is being consulted on the potentially high publicity implications of this policy on the imposition of road tolls in the City of Cape Town.

Comment [CoCT11]: [The Communications Directorate must be consulted on potential publicity implications.]

14 **RECOMMENDED POLICY ON THE IMPOSITION OF ROAD TOLLS IN THE CITY OF CAPE TOWN**

It is recommended that:

- 14.1 The City of Cape Town must retain control over the functions of transport planning, design, access management, prioritisation and budgeting in respect of its road system as a vital part of the transport system owing to the importance of transport to development and the overall quality of life and cost of living.
- 14.2 The City of Cape Town strongly articulates the concern that the revenue from existing fuel levies and vehicle licence fees collected by national and provincial spheres of government from the City's road users is not spent on transport services in the City in sufficient proportion relative to the amount collected as well as the need for such expenditure. As toll financing is not in the public interest if funds are available or could be forthcoming from traditional revenue sources, such sources should be fully explored before resorting to toll road schemes.
- 14.3 If the national and provincial spheres of government cannot be persuaded to reallocate their income to improve the City's vital but deteriorating transport system, then road pricing should be introduced preferably in the form of a "shadow toll" per litre of petrol or diesel sold at service stations within the City. This is more cost efficient and more equitable than route specific tolling and would result in fewer adverse effects. Province is permitted to impose this levy in terms of the Provincial Tax Regulation Process Act No. 53 of 2001. A contractual agreement would then have to be concluded between the relevant road authorities to facilitate collection of the "shadow toll" and payment for the facility to be built and maintained by the concessionaire. This would require true co-operative governance prior to the establishment of the desired Transport Authority for the City of Cape Town.
- 14.4 The City of Cape Town accepts that road pricing is an acceptable means of charging road users for the provision, operation and maintenance of road infrastructure which operates at a satisfactory level of service and safety. However, the most equitable and cost efficient means of collection of these user

Comment [e12]: [Here, the desired decision should be accurately stated. The wording should correspond, as far as possible, with the wording of the Executive Committee/Council resolution desired and should be formulated in such a manner that they Committee Secretariat use them, unaltered, in the minutes. In cases where a report merely serves for information purposes, the recommendation may read: "That Council/Exco note ...". In the recommendation, references such as "guidelines as set out in paragraph 3.2 of the report" should not be made. Please repeat relevant paragraph in full in the recommendation, if at all possible.]

charges would be in the form of the levy on fuel or a "shadow toll" paid at service stations.

- 14.5 If the goal is to use the imposition of this kind of road user charge to increase the utilization of public transport, then the transport authorities must ensure adequate comfort, safety, capacity and frequency of those public transport services, which provide the alternative to the road routes, which will become subject to the levies. In order to ensure that these policies lead to sustainable provision of transport facilities and services, the transport authorities must ensure that the overall transport and environmental costs of travel demand management and "public transport first" strategies will be less than the status quo costs.
- 14.6 Route specific tolling should preferably be used exclusively for travel demand management or recreational/tourism purposes within the jurisdictional area of the City of Cape Town and only in accordance with an approved Transport Plan, which is part of an Integrated Development Plan. The City is empowered in terms of Section 21 of the Urban Transport Act to impose certain travel demand management levies.
- 14.7 These levies should only be imposed if the income derived there from will exceed the cost of collection and/or if the imposition of these levies reduces the generalised cost (including the cost of the levies to the motorists) of transport in the City of Cape Town. This form of road pricing or congestion charging can be used to reduce peak hour travel demand on certain routes by a few percent, which could reduce delays by a substantial amount.
- 14.8 If central and provincial governments proceed with the imposition of road tolls within the boundaries of the City of Cape Town, despite the above conclusions and recommendations, it is then recommended that;
- 14.8.1 In view of the much higher expense to road users of providing roads through toll financing and the incentive for BOT-developers to incorporate spending on the scheme to the limit of what the toll payers are likely to bear, in order to raise their return, careful consideration must be given to the actual need for the road works envisaged when considering approval of the toll provision contract. The innovative financing method used by the Community of Madrid for the M-45 Expressway described in sections 10.1.2 (c) and 10.3.1.8 of this policy is the desirable way forward for any toll roads imposed by other spheres of government within the boundaries of the City of Cape Town.
- 14.8.2 In this innovative way of funding imposed toll road schemes is not adopted, then the City of Cape Town must be consulted when discounts on toll fees are granted within the City boundary, in order that the income redistribution effects are taken into account in the implementation of local social policy.

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- 14.8.3 In view of the enduring effect of national toll road schemes within the metropolitan area on the welfare of local road users, it is advisable for the City of Cape Town to have insight of the financial models of BOT-contracts to be concluded for national or provincial toll roads within the metropolis.
- 14.8.4 Although South African Law does not require an alternative route when a road is tolled, consideration should always be given to ensuring that existing mobility is not unduly inhibited by the lack of choice of routes when a toll road is opened.
- 14.8.5 Although the National Environmental Management Act 1998, requires that development must be socially, economically and environmentally sustainable in order to be acceptable, no criteria are given for social and economic sustainability – consideration should thus be given to the extent to which inequitable income re-distribution stemming from toll road schemes renders the schemes socially unsustainable, while the economic sustainability should be determined through cost-benefit analysis, the documentation of which should be publicly available in the EIA's.
- 14.8.6 Each proposal for road tolling will require careful analysis prior to implementation in order to avoid any adverse unintended consequences.
- 14.9 With regard to the possible but undesirable imposition of road tolls within its area of jurisdiction by other spheres of government, the City of Cape Town approves the adoption of the way ahead as described in section 14.10 of this policy.

14.10 The way ahead on the imposition of road tolls in the City of Cape Town

It is important to understand that the road system serving the City of Cape Town consists of a network of interdependent links. Different links and elements of this network perform different functions. Uninterrupted-flow roads usually carry trips of longer distances than the slower interrupted-flow arterials and the local roads. However, most trips involve the use of most of the different types of element of the road network in order to provide door-to-door services. Tolling only certain elements of the network usually results in inequitable charging because the tolled elements would not attract much traffic if the remainder of the road network is not in place or if it did not function properly. Unless the use of the entire system is "tolled", traffic will be diverted from the logical routes of choice by the imposition of tolls on only certain links. The easiest links to toll are the freeways and expressways as they have limited points of access.

As can be ascertained from the arguments and issues highlighted in this policy document, it appears that three main courses of action are available to the City of Cape Town if it is deemed desirable for the City to retain planning, design, prioritisation and budgeting control over its vital transport system as well as achieve the desirable level of service and balance of utilization of the city's road and public transport systems.

- 14.10.1 The City can request SANRAL and/or the Province of the Western Cape to fund any proposed improvements or additions to the national or provincial road network within the City boundaries from a "shadow toll" levied at the fuel sales points located throughout the City of Cape Town. This could be levied by SANRAL in terms of Act No. 7 of 1998 or by Province in terms of the Provincial Tax Regulation Process Act No. 53 of 2001 in order to pay the tendering concessionaire consortia, which develop these schemes in terms of an agreement with the appropriate road authority. (Refer to section 10.1.2 (c) for more detail) This proposal has the advantage of avoiding most of the adverse impacts outlined in section 10.3.1 above. In addition it could solve the chronic problem of under-funding of transport as well as having overall cost efficiency advantages. This proposed arrangement does not conflict with the creation of a single Transport Authority for the City of Cape Town. In fact it requires the close liaison of all three spheres of government for this course of action to succeed.
- 14.10.2 Alternatively, the City could reluctantly accept the imposition of road tolling on roads within the City boundaries by SANRAL as well as the Province on condition that: -
- (a) toll road facilities and the management thereof conform in all respects with the Transport Plan for the City of Cape Town as amended from time to time and that
 - (b) SANRAL assumes financial responsibility for conducting a Strategic Environmental Assessment of the impact of tolling specific routes, mitigating the adverse effects on the environment and funding the required improvements on any roads affected by diverted traffic from the tolled routes and that
 - (c) SANRAL ensures that all the important considerations outlined in section 10.1.8 of this report are adequately addressed. (The City of Cape Town will negotiate with the toll road providers in order to obtain the best possible outcome)
- 14.10.3 If neither of the above two courses of action are acceptable to all of the relevant authorities, the City could challenge the validity of the Act No 7 of 1998 in the Constitutional Court and/or object strongly to the Notice of Intent to Toll specific routes.

- 14.10.4 As part of the Transport Plan, the City must prepare a strategy of road pricing concurrently with a strategy of public transport system improvements in order to reduce the unacceptable costs and environmental degradation of the growing demands for travel and access to opportunities. It is recommended that a Strategic Environmental Assessment (SEA) be undertaken during the preparation of the transport plan and that the outcomes of the SEA are properly considered in the formulation of the transport plan.

14. AANBEVELINGS: BELEID OOR DIE HEF VAN PADTOLGELD IN DIE STAD KAAPSTAD

Daar word aanbeveel dat:

- 14.1 Met inagneming van die belangrikheid van vervoer vir ontwikkeling en die algemene lewensgehalte en lewenskoste, moet die Stad Kaapstad steeds beheer uitoefen oor die funksies van vervoerbeplanning, -ontwerp, -toegangsbestuur, -prioritisering en –begroting ten opsigte van sy padstelsel as 'n belangrike komponent van die vervoerstelsel.
- 14.2 Die Stad Kaapstad spreek sy groot kommer uit dat die inkomste uit die bestaande brandstofheffings en voertuiglisensies wat deur die nasionale en provinsiale regeringsfere van die Stad se padgebruikers verhaal word, nie op vervoerdienste in die Stad bestee word in voldoende verhouding tot die bedrag wat ingesamel word en die behoefte aan sodanige besteding nie. Indien fondse beskikbaar is of uit tradisionele inkomstebronne verkry kan word, is tolfinsiering nie in die openbare belang nie en sulke bronne moet deeglik ondersoek word voordat die toevlug tot tolpadskemas geneem word.
- 14.3 Indien die nasionale en provinsiale regeringsfere nie oorreed kan word om hul inkomste her toe te wys om die Stad se belangrike, maar verslegtende vervoerstelsel te verbeter nie, moet padprysvasstelling ingestel word verkieslik in die vorm van skadutolgeld per liter petrol of diesel wat by diensstasies in die Stad verkoop word. Dit is meer kostedoeltreffend en billiker as tolgeld vir spesifieke roetes en sal minder nadelige gevolge hê. Provinsie kan hierdie heffing instel ingevolge die Wet op die Reguleringsproses van Provinsiale Belasting No.53 van 2001. 'n Kontraktuele ooreenkoms sal dan tussen die tersaaklike padowerhede aangegaan moet word om die insameling van die skadutolgeld en betaling vir die fasiliteit wat opgerig en in stand gehou moet word deur die konsessiehouers. Ware samewerkende regering sal die stigting van die verlangde vervoerowerheid vir die Stad Kaapstad moet vooruitloop.

- 14.4 Die Stad Kaapstad aanvaar dat prysvasstelling 'n aanvaarbare manier is om padgebruikers te laat betaal vir die verskaffing, bedryf en instandhouding van padinfrastruktuur wat op 'n bevredigende diens- en veiligheidsvlak bedryf word. Die billikste en kostedoeltreffendste manier om hierdie koste van die gebruikers te verhaal, is in die vorm van die heffing op brandstof of 'n skadutolgeld wat by diensstasies betaal word.
- 14.5 Indien dit die doel is om die heffing van dié soort padgebruikersgelde te gebruik om die gebruiksfrekwensie van openbare vervoer te verhoog, moet die vervoerowerhede die gerief, veiligheid, kapasiteit en frekwensie van daardie vervoerdienste verseker wat ander padroetes bied en wat onderworpe sal wees aan heffings. Ten einde te verseker dat hierdie beleid tot die volhoubare verskaffing van vervoergeriewe en –dienste lei, moet die vervoerowerhede verseker dat die algemene vervoer- en omgewingskoste van die reisaanvraagbestuur en die strategieë vir "openbare vervoer eerste", minder is as die bestaande koste.
- 14.6 Tolgeld op bepaalde roetes moet verkieslik uitsluitlik vir reisaanvraagbestuur of vir ontspannings-/toerisme-doeleindes in die jurisdiksiegebied van die Stad Kaapstad gehef word, en slegs in ooreenstemming met 'n goedgekeurde vervoerplan wat deel uitmaak van 'n geïntegreerde ontwikkelingsplan. Artikel 21 van die Wet op Stedelike Vervoer magtig die Stad om sekere reisaanvraagbestuurheffings te hef.
- 14.7 Hierdie heffings moet ook slegs ingestel word as die inkomste wat daaruit verkry sal word, die invorderingskoste oorskry en/of as die instel van dié heffings die algemene vervoerkoste (waaronder die koste van heffings vir motoriste) in die Stad Kaapstad verminder. Hierdie vorm van padprysvasstelling of die koste van verkeersopeenhopings kan gebruik word om die reisaanvraag tydens spitsverkeer op sekere roetes met 'n paar persent te verminder wat op sy beurt weer oponthoude aansienlik kan verminder.
- 14.8 Indien die sentrale en provinsiale regerings voortgaan met die hef van tolgeld binne die grense van die Stad Kaapstad ten spyte van die bogenoemde gevolgtrekkings en aanbevelings, word daar aanbeveel dat:
- 14.8.7 Met inagneming van die baie hoër uitgawes vir padgebruikers as paaie deur tolfinansiering verskaf word en die aansporing vir BBO-ontwikkelaars (bou-, bedryf- en oordrag-) om besteding aan die skema te inkorporeer tot die limiet wat die tolbetalers waarskynlik sal kan betaal om hul opbrengs te verhoog, moet deeglike oorweging geskenk word aan die werklike behoefte wat vir die padaanleg wat in die vooruitsig gestel word as oorweging geskenk word aan die goedkeuring van die tolverskaffingskontrak. Die innoverende finansieringsmetode wat deur die gemeenskap van Madrid vir die M-45-snelweg gebruik word soos beskryf in artikels 10.1.2 (c) en 10.3.1.8 van hierdie beleid is

die aangewese pad vorentoe vir enige tolpaai wat deur ander regeringsfere binne die grense van die Stad Kaapstad ingestel word.

- 14.8.8 Indien hierdie innoverende manier om tolpadskemas te befonds nie aanvaar word nie, moet die Stad Kaapstad geraadpleeg word as afslag op tolgeld binne die Stad se grense toegestaan word sodat die gevolge van die verspreiding van inkomste in ag geneem word by die inwerkingstelling van die plaaslike maatskaplike beleid.
- 14.8.9 Met inagneming van die blywende uitwerking wat nasionale tolpadskemas in die metropolitaanse gebied op die welsyn van die plaaslike padgebruikers kan hê, is dit raadsaam dat die Stad Kaapstad insae het in die finansiële modelle van die **BOT**-kontrakte wat ten opsigte van nasionale en provinsiale tolpaai in die metropool aangegaan word.
- 14.8.10 Alhoewel Suid-Afrikaanse wetgewing nie 'n ander roete vereis as tolgeld op 'n pad hef word nie, moet oorweging altyd daaraan geskenk word om te verseker dat die bestaande beweeglikheid nie te veel beperk word omdat daar 'n min keuse tussen verskillende roetes is as 'n tolpad oopgestel word.
- 14.8.11 Alhoewel die Wet op Nasionale Omgewingsbestuur 1998 bepaal dat ontwikkeling volhoubaar moet wees op maatskaplike, ekonomiese en omgewingsgebiede om aanvaarbaar te wees, word geen maatstawwe vir maatskaplike en ekonomiese volhoubaarheid verskaf nie. Oorweging moet dus geskenk word aan die mate waartoe onbillike inkomsteverspreiding voortspruitend uit tolpadskemas die skemas op maatskaplike gebied onvolhoubaar maak, terwyl die ekonomiese volhoubaarheid deur 'n kostevoordeelontleding bepaal moet word. Dié dokumente moet vir die publiek in die OIA's ter insae wees.
- 14.8.12 Elke voorstel oor padtolgeld moet noukeurig ontleed word voor dit in werking gestel word ten einde enige onopsetlike nadelige gevolge te vermy.
- 14.9 Ten opsigte van die moontlike maar onwelkome hef van tolgeld deur ander regeringsfere binne die jurisdiksiegebied van die Stad Kaapstad, keur die Stad die pad vorentoe goed ooreenkomstig die uiteensetting in 14.10 van hierdie beleid.

14.10 Die pad vorentoe betreffende die instel van padtolgeld in die Stad Kaapstad

Dit is van belang om te begryp dat die padstelsel wat die Stad Kaapstad bedien, uit 'n netwerk van interafhanklike skakels bestaan. Die verskillende skakels en elemente van hierdie netwerk voer verskillende funksies uit. Langer afstande word afgelê op paaie waar die verkeersvloei nie onderbreek word nie, terwyl die verkeersvloei onderbreek

word op die stadiger hoofweë en die plaaslike paaie. Die meeste reise behels egter die gebruik van die meeste van die verskillende soorte of elemente van die padnetwerk ten einde deur-tot-deur-dienste te lewer. As tolgeld slegs op sekere elemente van die netwerk gehef word, lei dit tot onbillike koste, want die elemente waar tolgeld gehef word, sal nie so baie verkeer dra indien die res van die padnetwerk nie bestaan nie of as dit nie behoorlik funksioneer nie. Tensy tolgeld op die hele padnetwerk gehef word, sal verkeer van die logiese roetes van keuse weggekeer word deur die hef van tolgeld op net sekere skakels. Die maklikste skakels waar tolgeld gehef kan word, is die deurpaaie en die snelweë omdat hulle beperkte toegangspunte het.

Voortspruitend uit die standpunte en kwessies wat in hierdie beleid beklemtoon is, blyk dit dat die Stad Kaapstad drie keuses het indien dit wenslik geag word dat die Stad steeds beheer bly uitoefen oor die beplanning, ontwerp, bepaling van voorkeure en begroting vir sy belangrike vervoerstelsel, en ook om die gewenste diensvlak en gebruiksbalans vir die Stad se pad- en openbare vervoerstelsels te handhaaf.

14.10.1 Die Stad kan SANPAB (Suid-Afrikaanse Nasionale Padagentskap Beperk) en/of die Provinsie van die Wes-Kaap versoek om enige voorgestelde verbeteringe of byvoegings tot die nasionale of provinsiale padnetwerk binne die stadsgrense te befonds uit 'n "skadutolgeld" gehef by brandstofverkooppunte dwarsdeur die Stad. SANPAB kan dit hef ingevolge die Wet op die Regulering van Provinsiale Belasting No. 53 van 2001 om die konsortia van konsessiehouers wat tenders indien en wat daardie skemas ontwikkel, te bepaal kragtens 'n ooreenkoms met die toepaslike padowerheid. (Verwys na artikel 10.1.2(c) vir meer besonderhede. Die voordeel van dié voorstel is dat dit die meeste van die nadelige gevolge soos uiteengesit in artikel 10.3.1. hierbo vermy. Bykomend daartoe kan dit die kroniese probleem van die onderbefondsing van vervoer oplos en dit hou ook voordele vir kostedoeltreffendheid oor die algemeen in. Hierdie voorgestelde reëling is nie teenstrydig met die skepping van 'n enkele vervoerowerheid vir die Stad Kaapstad nie. Die noue samewerking van al drie regeringsfere is nodig vir die sukses van dié handelswyse.

14.10.2 Die Stad kan andersins teensinnig aanvaar dat SANPAB en die Provinsie padtolgeld hef op paaie binne die stadsgrense op voorwaarde dat:

- (b) Tolpadfasiliteite en die bestuur daarvan in alle opsigte voldoen aan die Stad Kaapstad se vervoerplan soos af en toe gewysig, en dat
- (c) SANPAB die finansiële verantwoordelikheid aanvaar om 'n strategiese omgewingsassessering (SOA) oor die uitwerking van die heffing van tolgeld op bepaalde roetes te onderneem, die nadelige uitwerking op die omgewing te verminder, en die vereiste verbeteringe te befonds vir enige paaie wat beïnvloed word deur die verkeer wat van die tolpaaie weggekeer word.

(c) SANPAB verseker dat voldoende aandag aan al die belangrike oorwegings uiteengesit in artikel 10.1.8. van hierdie verslag geskenk word. (Die Stad Kaapstad sal met die tolpadverskaffers onderhandel om die beste resultate te lewer).

- 14.10.3 Indien nie een van die bogenoemde handelswyses aanvaarbaar is vir al die tersaaklike owerhede nie, kan die Stad die geldigheid van Wet No. 7 van 1998 in die Grondwetlike Hof betwis en/of sterk beswaar aanteken teen die kennisgewing van voorneme om tolgeld op bepaalde roetes te hef.
- 14.10.4 Die Stad moet as deel van die vervoerplan 'n strategie van verbeteringe aan die openbare vervoerstelsel voorberei ten einde die onaanvaarbare koste en agteruitgang van die omgewing as gevolg van die groeiende aanvraag na reis en toegang tot geleenthede. Daar word aanbeveel dat 'n strategiese omgewingsassessering (SOA) gedurende die voorbereiding van die vervoerplan onderneem word en dat die resultate van die SOA deeglik oorweeg word as die vervoerplan opgestel word.

15. REFERENCES

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