

Submission

Inquiry into the investment of Commonwealth and State funds in public passenger transport infrastructure and services

To: The Secretary
Senate Standing Committee on Rural and Regional Affairs and Transport
PO Box 6100
Parliament House
Canberra ACT 2600
Via email

Author: Peter Campbell, Greenlivingpedia.org

Permission for a late submission was granted verbally in Melbourne on March 30th 2009.

Content of this submission was partly sourced from:

Submission to the East-West Links Needs Assessment
Climate Emergency Network, July 2008
Authors: Pablo Brait, Frank Burden, Peter Campbell

Introduction

I welcome the opportunity to provide a submission to this Senate Inquiry, as transport is an essential feature of the liveability of Melbourne and one of the main areas that require urgent action as part of a response to climate change.

While the recent East West Link Needs Assessment (EWLNA) conducted in Victoria by Sir Rod Eddington had some proposals with merit, such as improvements to public transport and cross city cycle links, it overwhelmingly failed to tackle the massive and urgent problems of greenhouse gas emissions from transport and peak oil.

While the focus on public transport was welcome, and I strongly support increased investment in public transport, the EWLNA and the following Victorian Transport Plan are business as usual documents, based on outdated ideas, at a time where business as usual means climate catastrophe and remaining unprepared for continual increases in oil prices.

The Victorian Transport Plan has little vision for a sustainable transport future for Melbourne and it therefore fails as a document that the State Government can use to guide its actions.

Transport policy cannot assume a business as usual case. All transport policy development must lead to a drastic reduction in reliance on oil, and a massive, rapid reduction in greenhouse gas emissions. In fact, it should be one of the major aims of transport policy to achieve these outcomes – and with these outcomes improvements in the amenity of our suburbs will be created. This is the best way to ensure prosperity and liveability into the future.

In this submission, I look at the broad big picture issues that I feel the Victorian Transport Plan has not adequately tackled, and then provide some specific recommendations relevant to the Inquiry's terms of reference.

Key Points

The key points of this submission are listed below; see separate sections for more detail.

- The Victorian Transport Plan's business as usual approach to transport planning is deeply flawed, and does not take climate change or peak oil into account. Melbourne needs a visionary transport plan that will tackle the urgent problems that we face.
- I support a massive, order of magnitude increase in public transport funding from the State and Federal governments, and thereby broadly support recent elements of the Victorian Transport Plan recommendations that achieve this. However, I do not support road tunnels or any new freeways.
- The assumptions made to make up the Victorian Transport Plan reference case with regard to oil prices, carbon pricing and road pricing are incorrect, and greatly exaggerate the case for supporting private car use and road tunnels.
- The Victorian Transport Plan largely ignores the climate emergency and ignores the pressing need for us to reduce our greenhouse gas emissions from transport. Any new transport infrastructure or plan needs to have emissions reductions as a central aim.
- The propensity for people to shift to public transport when high quality services are available is underestimated and the recommendations are consequently poorly targeted.
- Past transport studies and experience have shown that building freeways does not solve congestion, and they will in fact increase congestion in the long term.
- The recommendations in the Victorian Transport Plan will result in a 1% modal shift from cars to public transport by 2031, in contradiction with the Brumby Government's 11% shift (by 2020). We need a much more profound shift if we are to retain Melbourne's liveability and reduce our emissions.
- Planning for and provision of safe cycle routes throughout Melbourne has been grossly inadequate.
- Fast and efficient public transport – preferable light rail above or below ground – is required for orbital trips between and across inner and outer suburbs.

Flawed Assumptions in the Victorian Transport Plan

The Victorian Transport Plan reference case made the following assumptions:

- No real increase in fuel prices beyond 2006
- No carbon price on transport emissions
- No road pricing before 2031
- Low increases in public transport patronage
- Low increases in cycling for commuting

Under the assumptions made in the Victorian Transport Plan, fuel prices would currently be around \$1.25/litre. World oil prices are driving up petrol prices at a rate much higher than CPI. Some of the world's major banks, such as Goldman Sachs and Deutsch Bank predict that oil prices will continue to rise due to increasing demand and restricted supply.

It is also unrealistic to assume that there will be no carbon price on transport emissions, when transport is a key sector currently being considered for an emissions trading scheme.

Road pricing is also likely to be introduced well before 2031 and motoring organisations such as the RACV are already advocating for the introduction of road user pricing as part of broader reforms.

Public transport patronage has far exceeded Government estimates to the point where this system is frequently crowded past safe operating limits.

These assumptions have meant that the Victorian Transport Plan's projections and priorities are flawed and have falsely exaggerated the case for supporting private car use and road tunnels.

What about Climate Change?

Any government committed to tackling climate change should not be building new freeways or accepting studies that forecast an increase in transport emissions.

The most recent science, as outlined in the book *Climate Code Red* (2008), which is more up-to-date than the 2007 IPCC report that is generally used by government, shows that the situation is much worse than previously thought. As Lord Nicholas Stern pointed out in in 2008:

'I underestimated the threat of global warming in my report in Nov 2006. Emissions are growing faster than we thought. The planet's capacity to absorb is less than we thought. The risks of greenhouse gases are worse and are potentially bigger than more cautious estimates. And the speed of climate change is faster'. (Reuters, 16 April 2008)

According to the most recent science described in the *Climate Code Red* report (2008), we are already, with the current level of greenhouse gases in the atmosphere and our current rate of emissions, locked in to a warming of 2 degrees by 2030. With a warming on average of two degrees, we are likely to get the melting of the arctic ice sheet, the extinction of 15-40% of all plant and animal species, the acidification of the oceans leading to marine ecosystem collapse and coral bleaching, more frequent extreme weather events and widespread drought and desertification across the globe, especially in Australia. All of these impacts will have a profoundly negative effect on Victoria's economy and liveability.

There is scientific consensus that we need to stop emitting greenhouse gases, and start to remove greenhouse gases from the atmosphere, down to the level they were in the 1970s, which means a temperature rise of 0.5 degrees.

It is unacceptable and irresponsible to implement and lock in an expensive transport plan that will not greatly reduce emissions.

The infrastructure recommendations in the Victorian Transport Plan fail the greenhouse emissions test, as they will have practically no effect on transport mode share or greenhouse gas emissions, as compared to a business as usual case. This goes against the State and Federal Government target of a 60% reduction on 2000 levels by 2050, goes against our obligations under the Kyoto protocol and any other subsequent global agreement, goes against the target of 20% of journeys on public transport by 2020, and goes against what the science is telling us about climate change.

The Victorian Transport Plan also puts most of its faith in terms of reducing greenhouse gas emissions (or at least keeping them from skyrocketing) on increasing the fuel efficiency of cars. While increasing the fuel efficiency of cars is a worthwhile aim, it is not going to achieve anywhere near the kind of emissions reductions we need. Modelling by the Bus Association of Victoria in its submission to the Garnaut Review shows that achieving a 20% reduction in transport emissions by 2030 on 2000 levels would require the doubling of fuel efficiency of every single car and truck currently on the road. Their modelling also shows that even if the efficiency of vehicle quadrupled by 2050, they could still only make up 11% of the urban transport modal share (as opposed to 77% in 2007) if we were aiming to cut transport emissions by 80% based on 2000 levels. Clearly, even if we are able to make cars more efficient, we still need a massive modal shift away from the private vehicle.

Peak Oil

Peak oil is the point in time when the maximum rate of global petroleum production is reached, after which the rate of production enters terminal decline. If global consumption is not mitigated before the peak, a world energy crisis may develop because the availability of conventional oil will drop and prices will rise, perhaps dramatically.

While there is some contention on when oil production will peak, with estimates varying from 2005 to right now (2008) to 2020, significant and sustained petrol and diesel price rises during 2008, up to a record \$1.65 per litre in June 2008, indicate that static supply combined with increasing global demand for oil, mainly from China and India, is putting great pressure on oil-dependant western economies such as Australia.

High fuel prices are contributing to financial stress on low-income households and some unrest globally with protests across Asia and by truck drivers and fishers in Europe. What is also being witnessed however is that motorists are more willing and able to shift to public transport and thereby reduce petrol consumption where good quality public transport is available¹. Australian transport policy should recognise this and ensure high quality public transport is made available to more people to reduce the financial impact of rising fuel costs and enable greater mode shift.

Major investments in sustainable transport alternatives are required to avert a looming financial crisis and obviate the need for major changes in the lifestyle of developed nations.

Alternative fuels will not make any meaningful contribution to solving the problem if transport-related energy consumption is not reduced. The substitutes to conventional petroleum with the highest probability of supplying significant quantities of transport fuel may actually result in much higher emissions as is the case with shale oil, tar sands and coal-to-liquids. Significant improvements in the energy efficiency of transport are required. For example, routine single occupant vehicle trips should be shifted to lower energy transport modes such as train or bicycle.

The current Victorian Transport Plan doesn't reduce our reliance on petrol, and doesn't take into account the price rises in oil potentially being caused by peak oil now and into the future. It is ignoring the reality of petrol prices and its recommendations, particularly those advocating for construction of major roads and freeway links are deeply flawed due to this.

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http://www.telegraph.co.uk/money/main.jhtml?xml=/money/2008/06/11/npetrol111.xml&DCMP=EMC-new_11062008

Freeways do not solve congestion

“The past 20 years have seen billions invested in freeways. Each augmentation has come with a promise that congestion would be cured, ignoring the tendency of new freeways to attract traffic and undermine public transport. As the greenhouse clock ticks, do we really want to commit another \$10 billion to this illusion?”

Professor Bill Russell, deputy director of the Centre for the Governance and Management of Urban Transport at the University of Melbourne

Countless transport studies have shown that building freeways does not solve congestion. In the medium and long term, new freeways attract more cars onto the roads and increase congestion. CityLink, for example, was also said to be there to solve congestion, and now we're building extra lanes on the Monash Freeway to deal with the extra traffic that CityLink has caused (again, leading to more traffic!). The East-West Road Tunnel proposed by the EWLNA would be no different. Not only will building more freeways increase greenhouse gas emissions, increase our reliance on depleting oil resources and show the State Government's rhetoric on climate change to be completely false, it won't even do the job it is supposed to, that is, reduce congestion on Melbourne's roads.

It is economically, socially and environmentally irresponsible to build a single new freeway. I recommend that the Victorian State Government commit to the stopping of construction of new freeways as a first step towards a sensible transport policy for Victoria. It's time to break the vicious cycle of freeway construction and increasing congestion.

Public Transport Patronage

During 2005 to 2006 patronage of Melbourne's trains increased over 18 per cent, which caught the Victorian Government by surprise. This increase was partly attributed to increased petrol prices prompting commuters to travel by train rather than by car.

The Government's \$10.5 billion 10-year major transport plan announced in May 2006 had significantly underestimated the usage of public transport. This was followed by an announcement in April 2008 of the introduction of more than 200 new weekly train services, described as the biggest overhaul of Melbourne's rail timetable since the City Loop opened in 1981. The new services will be introduced to tackle overcrowding on the city's busiest train lines, attributed to a lack of trains and falling reliability. Melbourne's train system has reached crisis point.

The Victorian Transport Plan recommendations contain many public transport proposals, but manifestly fail to address low public transport mode share beyond inner Melbourne. There is an urgent need to deliver new and extended train lines servicing growth corridors such as Whittlesea and Casey, and more established areas such as Doncaster and Rowville.

The government target for public transport patronage from the Melbourne 2030 Strategy, is a more-than doubling of the proportion of motorised transport trips taken on public transport from 9 per cent to 20 percent by 2020 Melbourne 2030 stated that:

“The public transport system in and around metropolitan Melbourne must be expanded, resourced and promoted accordingly.”

This 20 percent by 2020 public transport target cannot be achieved by investment in road infrastructure that the Victorian Transport Plan recommends. In fact, the Victorian Transport Plan itself models a modal shift of merely 1% from cars to public transport by 2031 with its recommendations in place – in direct contradiction with Brumby Government policy.

Victorian Transport Plan Recommendations

I believe that the Victorian Transport Plan is fundamentally flawed in its approach to transport planning. I support a massive increase in investment in public transport infrastructure and services, and therefore believe that some of the Victorian Transport Plan recommendations have merit. However, I strongly urge both Commonwealth and State Governments to institute a plan for transport in Melbourne that prioritises mitigating the climate change and peak oil emergencies.

Melbourne Metro Rail Tunnel West to South-East

The recommendation for a new 17 kilometre rail tunnel linking Melbourne's fast growing western and south-eastern suburbs is described in the report as:

“a generational ‘step-up’ in the city’s rail capacity and Melbourne’s first ‘metro’ style passenger line”

However, this very expensive tunnel would service a transport route where there are existing above ground rail services.

By contrast, large regions of Melbourne are not well serviced by existing railway lines, including suburbs where rail lines have been planned but not constructed, such as Doncaster, Rowville and Aurora, and entirely new suburbs in Melbourne's north and south east. These rail routes would carry many more passengers than the proposed rail tunnel. The proposition from the Victorian Government that they cannot be built due to “core congestion in the existing rail network” is not supported by evidence. Core congestion can be overcome by grade separation with exiting core rail services, as is common in many European cities.

Melbourne also lacks any metro style passenger lines that connect hubs close to the central business district such as South Yarra, South Melbourne, Carlton, Brunswick and Richmond.

These are all public transport projects that also need urgent funding.

Heavy and light rail above ground or underground would be much cheaper to construct than the proposed heavy rail tunnels.

Rail Link Werribee to Sunshine (Tarneit link)

Melbourne's west in particular requires greatly improved public transport services. The construction of the Tarneit link is an important first step, and the extension of the metropolitan rail network further to the west needs to be undertaken as soon as possible. However, a number of issues need to be resolved, particularly the impact on Geelong passengers.

Electrification to Sunbury and Sydenham Boost

I welcome this recommendation and believe the government should initiate works on Sunbury electrification as soon as possible. Other measures to enhance capacity should also be expedited such as duplicating lines that are currently only single track, updating signalling systems and ensuring more efficient loading and unloading of trains at stations.

DART bus service to Doncaster – a rail line is needed

The major opportunity to reduce congestion on this arterial route is to construct the long awaited Doncaster rail line. Planned as part of the 1969 Melbourne Transportation Study, construction commenced in the 1970s with a cutting dug 400 metres north of Victoria Park Station to connect to the Freeway. Freeway road overpasses were also constructed to meet the requirements of a rail line in the central median. Although the project lapsed, commuter transit demands on this corridor are clear. While the DART bus service would be an improvement to the current situation, a rail line would be a more effective and climate friendly outcome.

Cross City Cycle Connection Improvements

The cross-city cycle connections recommended would greatly facilitate bicycle travel and make it safer within inner Melbourne. However, to be effective, these routes need to link with equivalent high quality and safe bicycle paths transecting adjacent suburbs. For example, there is currently no safe and efficient bicycle route through Hawthorn and Camberwell towards Box Hill.

Cycling is the most carbon-efficient form of medium distance personal transport. However, low safety and convenience factors are major barriers preventing people from cycling in urban areas.

The current Principal Bicycle Network needs to have routes added to connect with the proposed cross-city cycle connections. Integrated planning for cycle paths and routes is essential to get the best outcome. Improved safety at a local level is also crucial to enable safe access to the Principal Bicycle Network and to activity centres and public transport.

Priority Measures for Trams and Buses

To make sure that we are getting the most efficient road based public transport (buses and trams) we need to ensure that these forms of transport are given priority over cars through traffic light priority measures and strict enforcement of fairways.

Improving Park and Ride Facilities

Park and Ride schemes are an adjunct to integrated and modernised bus services. In their absence station car parks are often full by 8am that prevents many willing train passengers from using trains whether for commuting to work or for other reasons. Park and Ride car parks away from the station combined with a regular local and express bus service to the station or other suburbs can boost the capacity of park and ride schemes. These are not uncommon overseas and with planning can be very effective.

Increase Rail's Share of Freight

The Port of Melbourne Corporation, in its submission to the VCEC Congestion Inquiry 2005) has acknowledged that there are significant opportunities to improve the efficiency of road transport trips to and from the Port, given that trucks on average are loaded at only 50% capacity.

Smart Freight policies must be implemented to promote greater efficiency in the freight industry through better use of freight logistics, based on full cost externalities. In Germany and Sweden, partnerships between logistics contractors and the freight industry, are substantially reducing truck journey times and truck numbers. In Freiburg, truck operations were reduced by 33%. A Swedish example cited in Forseback's Case Studies on the Information Society and Sustainable Development (2000), demonstrated that through efficiencies in carrying, freight kms were reduced by 39%, truck numbers by 42%, and truck journeys by 58%.

It is also imperative to implement actions that will result in increased rail freight capacity to meet the State target of 30% of port land freight carried by rail by 2010.

Introduction of High Productivity Freight Vehicles

It is unfortunate that the present government is following a path of increasing the port handling facilities near the centre of Melbourne. If we are to reduce our ecological footprint we should be dampening this demand rather than encouraging it. However, given that there is to be a significant increase in freight traffic it seems sensible to build infrastructure that maximises efficiency of movement and at the same time reduces the need for road cartage.

Technology has come a long way in the past decade and it should be possible to build systems that make a maximum use of rail without reducing, or in fact increasing, efficiency of movement of containers. The mere expansion of the road system seems to be an unimaginative last century solution and does little credit to transport planners. As a minimum there needs to be a number of automated or semi-automated container hubs so that containers, or the rail truck carrying them, can be shunted and shifted to the appropriate engine and line. Smaller rail engines pulling a lesser number of container rail trucks may be the answer.

Conclusion

Very significant increases in the investment of Commonwealth and State funds in public passenger transport infrastructure and services are a critical measure for providing low emission transport.

In addition, improved public transport will be an important measure to reduce the impact of Australia's and the world's dwindling oil supplies and increasing oil prices.

An audit of the state of public passenger transport in Australia is urgently required to assess areas of greatest need for improved public transport and opportunities for improvement.

Current and historical levels of Commonwealth funding and public investment in private vehicle infrastructure such as roads and freeways is and has been excessive, at the expense of investment in public passenger transport services and infrastructure. The Commonwealth Government should at least provide equal funding for both.

A scientific and economic assessment of the benefits of public passenger transport, including integration with bicycle and pedestrian initiatives, is required. The very high costs and low efficiency of road infrastructure for primary freight and personal transport needs to be revealed.

Measures by which the Commonwealth Government could facilitate improvement in public passenger transport services and infrastructure could include:

- Funding for national planning and construction of improved public transport infrastructure within in and between States. The States and Territories could match this funding.
- Funding for Very Fast Train intercity links initially between Melbourne, Canberra, Sydney and Brisbane.²
- Provision of efficient orbital public transport services – preferably light rail – to overcome Melbourne's chronic problem with travelling between suburbs off the main radial public transport routes.

Commonwealth Government legislation, taxation, subsidies, policies and other mechanisms that directly or indirectly discourage public passenger transport should be removed. For example:

- Fringe Benefits Tax provisions which motivate drivers to travel a minimum number should be removed
- Diesel fuel rebates for road transport should be removed

² http://www.greenlivingpedia.org/Very_fast_trains

Best practice international examples of public passenger transport services and infrastructure should be studied and replicated in Australia where appropriate. Some examples include:

- Separating heavy rail systems from light rail tram/metro systems, such as occurs in cities such as Stuttgart and Paris
- Providing train link to airports such as Melbourne and Adelaide airports
- Implementing end-to-end rail tracks that do not share tracks, as the London Underground and the Paris RER rail systems.
- Integrating cycle paths with rail easements, as is done in Perth
- Make provision for carrying bicycles on public transport, including trains and buses.
- Car free zones with public transport, cycling and pedestrian infrastructure, as implemented in cities such as Freiburg, Germany³.

Thank you for your time, and for the opportunity to make this submission. I hope that the Federal Government uses this opportunity to change course and starts funding the creation of a transport system that will help us meet the challenges of climate change and peak oil, while also improving the amenity of our suburbs.

A sustainable future involves cutting emissions and creating a massive and permanent modal shift from cars to public transport, walking and cycling.

Yours faithfully,

Peter Campbell, peter@greenlivingpedia.org
<http://www.greenlivingpedia.org/>

³ <http://www.greenlivingpedia.org/Freiburg>