



Climate Change Summit
Office of Climate Change - Department of Premier and Cabinet
1 Treasury Place
Melbourne
Victoria 3000

To whom it may concern,

Re: Environment Victoria submission to the Victorian Government's "A Climate of Opportunity" Summit Paper

Please find a submission from Environment Victoria on the Victorian Government's "A Climate of Opportunity" Summit Paper. Environment Victoria is the peak environment non-government organisation in Victoria and has over 120 member groups and 1000's of individual members and supporters across the State. Environment Victoria was one of the first NGO's in Australia to work on climate change, and has been working on the issue for over a decade.

We welcome the opportunity to comment on the Summit Paper, although we hope that the policy development process the State Government is now undertaking does not delay the introduction of immediate measures to reduce the State's emissions.

We have structured our submission by making overarching comments followed by comment on each of the 10 proposed strategic directions.

Please contact me on the number below if you require any further information or clarification on Environment Victoria's submission.

Yours sincerely,

A handwritten signature in red ink that reads "LWK." with a period at the end.

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1. Overarching comments on the Summit Paper

a. Overall goal of State Government policy on climate change: The Summit Paper identifies "10 strategic directions for action to be taken to achieve the Victorian Government's goal of reducing emissions and adapting to the impacts of climate change." However there is no discussion of the goal that is intended to be met by reducing emissions and adapting to climate change. The goal of government policy needs to be iterated.

Environment Victoria believes that the goal of the climate change policy should be to avoid dangerous climate change and stabilise the climate at safe levels. Avoiding dangerous climate change is generally considered to be avoiding climate change in excess of 2 degrees Celsius above pre-industrial averages, although it should be acknowledged that temperature increases of less than 2 degrees will in fact be dangerous to many communities and ecosystems. Essentially government needs to be clear about what level and rate of climate change it believes to be politically and morally acceptable and what rate of emissions reduction globally is possible.

b. Stabilisation targets: Professor Garnaut in his Interim Report wrote that "it is in Australia's interest to seek the strongest feasible global mitigation outcomes - 450ppm (parts per million) CO₂-e as currently recommended by the science advisors to the UNFCCC and accepted by the European Union"¹. A 450 ppm CO₂-e target would give us a 50% chance of limiting the global mean temperature increase to 2-2.4 degrees Celsius above pre-industrial levels². This 450 ppm CO₂-e target was the basis for the 25 - 40% emissions reductions by 2020 target for developed countries that was discussed at the Conference of Parties last December in Bali. Given Australia's (and Victoria's) high per capita emissions, Victoria should be aiming for the more ambitious end of this target - that is emissions reductions of at least 40% by 2020.

However, even adopting a 40% emissions reduction target could still be considered reckless given the 50% chance of overshooting 2 degree temperature increases. For that reason Environment Victoria is advocating that Victoria should adopt two emissions reductions targets:

- 1) ensure that greenhouse emissions are consistently falling by 2010 so that a range of deep cuts targets are within reach in future years, ranging from the IPCC derived targets of 25-40% cuts by 2020 for developed nations to more ambitious cuts.
- 2) introduce a legislated target to cut emissions by at least 50% by 2020 from 1990 levels that is regularly reviewed to ensure it remains a scientifically relevant target.

Professor Garnaut also highlights that stabilisation at 450ppm CO₂-e level will require emissions cuts in the order of 90% by 2050 for developed countries (on 1990 levels), which suggests that the Victorian Government's target of 60% reductions by 2050 (on 2000 levels) is inadequate to prevent dangerous climate change. Furthermore eminent climate scientists like James Hansen are now concluding that "the safe level of atmospheric carbon dioxide is no more than 350 ppm (parts per million) and it may be less"³, suggesting that the IPCC science work upon which Kyoto negotiations and Professor Garnaut's recommendations are being based may be increasingly out of date and in need of review. Therefore it is critical that:

¹ Garnaut Climate Change Review, Interim report to the Commonwealth, State and Territory Government's of Australia, February 2008, p.25

² Meinshausen, M, (2006): 'What does a 2°C target mean for greenhouse gas concentrations? A brief analysis based on multi-gas emission pathways and several climate sensitivity uncertainty estimates', pp.265 – 280 in *Avoiding dangerous climate change*, H.J. Schellnhuber et al. (eds.), Cambridge: Cambridge University Press.

³ http://www.columbia.edu/~jeh1/2008/TwentyYearsLater_20080623.pdf

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- short-term targets focus on deep and early emissions cuts to provide the greatest flexibility to respond to rapidly improving science and an environment that is rapidly changing as a result of climate change.
- longer-term targets are flexible enough to respond to advancing scientific knowledge and the impact of climate change.

Recommendation 1

The Victorian Government should outline the specific goal of its climate change policy in the Green paper in terms of emissions reduction and target temperatures for stabilisation. Environment Victoria believes the goal of climate change policy should be defined as avoiding dangerous climate change and returning to a safe climate. In considering the purpose of the State's climate change policy the Victorian Government should consider whether the 450 ppm CO₂-e target is adequate to avoid dangerous climate change and review emerging scientific literature that suggests that we should be aiming for stabilisation at 350 ppm CO₂-e.

Recommendation 2

The Green Paper should recommend targets for Victoria's contribution towards avoiding dangerous climate change. Environment Victoria suggests that the targets should be:

- 1) Ensure that greenhouse emissions are falling by 2010 so that a range of deep cuts targets are within reach in future years, ranging from the IPCC derived targets of 25-40% cuts by 2020 for developed nations to more ambitious cuts.
- 2) Introduce a legislated target to cut emissions by at least 50% by 2020 from 1990 levels that is reviewed periodically to ensure it is consistent with the science.

2. Specific comments on the 10 proposed strategic directions as outlined in the Summit Paper.

1. *Positioning Victorian industry to capitalize on the new jobs, new technologies and new markets that will flow from the transition to the low carbon economy.*

Renewable energy and energy efficiency industries are booming globally. For instance grid connected solar power has been growing globally at rates of 50% in 2006 and 2007 while the amount of installed wind power grew by 28% in 2007.⁴ These industries are characterized by a first-mover advantage, that is those states and nations that move first to create a market for renewable energy by introducing policy mechanisms that drive investment attract the manufacturing and installation jobs. In some respects Victoria has already missed opportunities to be a global leader in some renewable energy technologies, for instance solar PV cell manufacturing is now largely centered in Germany, Japan, China, Spain and the US. However with a strong feed-in tariff Victoria would create many jobs in installation and maintenance and could lead Australia in this industry. In other industries the door is still open. Given the (poor) economies of transporting wind turbine blades and towers we could be at the forefront of manufacturing wind turbines. We could also re-tool our car manufacturing industry to focus on producing efficient vehicles. However these cleantech industries won't just develop: they will need a domestic market (that is Government will need to introduce policies that drive uptake of these technologies in Victoria) and they will need industry support.

⁴ Renewables 2007 Global Status Report, pp 10-11, www.ren21.net



To date the State Government has been overly focused on innovation in the coal industry at the expense of other sectors. Given Victoria's over-reliance on coal this is unsurprising, however if we are to achieve emissions reductions of the order required to avoid dangerous climate change we will need to develop a broad suite of clean energy and low carbon industries. We should start by deploying existing and proven energy efficiency and renewable energy technologies rather than investing most of our innovation budget (ETIS) in unproven and uncommercial coal technologies.

Recommendation 3

The Victorian Government needs to attract zero and low carbon industries through policy mechanisms that drive uptake and deployment of clean and low carbon industries in Victoria. This will require further mechanisms beyond the existing Renewable Energy Target and the upcoming Emissions Trading Scheme. The Victorian Government should develop a 'Green Industries' strategy that identifies target industries for establishment and development in Victoria and also identifies the necessary policy support and workforce skill-base to attract these industries to Victoria.

2. *Supporting an ETS with complementary measures that smooth the transition for the Victorian economy (including the built environment and transport infrastructure).*

It is encouraging that the Summit Paper recognizes the need for complementary measures to an ETS. Additional measures particularly to support energy efficiency and renewable energy and more efficient building design and construction will be required for some time after the introduction of emissions trading. Further given the relatively inelastic demand for petrol, Government investment in alternatives to private motor vehicle transport will be required, particularly in public transport and rail freight. Regulation will also be important to improve the fuel efficiency of Australia's vehicle fleet. Enhanced planning controls to require more sustainable development of cities, suburbs and towns will be also be needed, particularly to reduce transport emissions. In addition to fuel efficiency, freight logistics efficiency will be important and moving road freight to rail will be an important part of the mix. For example roughly one third of truck movements to and from the Port of Melbourne currently carry no containers at all and those that do have a vehicle utilization rate of approximately 51%⁵. While government initiatives such as Connect Freight are a good start, efficiency programs need to be extended beyond Port of Melbourne based freight. International examples (particularly in the UK) of Collaborative Distribution have the capacity to drastically reduce our freight task, and consequently our impact on carbon emissions and consumers.

Case Study: Greening Victoria's buildings.

The Centre for International Economics estimates that the energy use of Australia's buildings (excluding embodied energy) contributes around 23% of Australia's total GHG emissions⁶. In Victoria 5 star building standards have initiated the process of renewing and greening the State's housing stock, however given a very small proportion of the existing housing stock has been built in the years since these standards were introduced, measures targeting the existing building stock, and commercial and other types of buildings, will also be necessary. A combination of building standards, retrofitting programs, appliance efficiency standards and an expanded version of VEET could greatly reduce the carbon footprint of Victorian buildings. Importantly, the Victorian

⁵ VCEC 2006: Making the right choices, p.324

⁶ Centre for International Economics (2007) Capitalising on the building sector's potential to lessen the costs of a broad based GHG emissions cut (Centre for International Economics:Canberra), September 2007.

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Government could lead the way in introducing these measures, and then use Commonwealth processes such as COAG meetings to seek wider implementation. The table below outlines what a package of policies to overhaul Victoria's buildings might look like:

<i>Type of building</i>	<i>Measure</i>	<i>Who responsible?</i>
New residential	-Upgrade 5 star standard to become 7 star.	State Government implements and then work for national harmonisation
New commercial	-Upgrade current 3 to 3 ½ star standards to minimum 5 star standard.	State Government implements and then work for national harmonisation
Other types of buildings eg school, hospital, warehouse etc.	-Develop and implement minimum standards	State Government implements and then work for national harmonisation
Fittings for buildings eg lighting, heating, ventilation and cooling, hot water services, showerheads,	-Include minimum standards for these appliances/fittings in the building code or other building approvals. -Ban new installation of conventional electric hot water services. -Work for introduction of minimum standards nationally through MEPS program.	-State Government sets standards for Victorian buildings -State Government works with Commonwealth on new appliances for MEPS. -State Government supports proposed Federal ban on installing conventional electric hot water systems.
Existing residential	-VEET (existing) -Rebates (solar hot water, insulation, PV). Existing rebates need to be more generous or targeted to increase uptake. -Gross Feed-in law to encourage distributed renewable energy generation. -Expanded white certificates trading program (could build on VEET) with more ambitious targets to encourage activities beyond changing light bulbs. -Behaviour change programs. -'Warm front' type program targeting energy efficiency activities towards low income homes. ⁷ -Mandatory disclosure of energy and water efficiency of residential properties at point of sale or lease. -Mandatory standards for water and energy efficiency that need to be met prior to sale or lease.	-Could all be initiated by State Government, and extended nationally.
Existing commercial	-Extend VEET to commercial sector. -Lower energy and water use thresholds for EREP program. -Gross Feed-in law to encourage distributed renewable energy generation (and possibly cogeneration. Businesses and community buildings eligible to participate unlike under proposed Victorian Government scheme. -Expanded white certificates trading program (could build on VEET) with more ambitious targets -Behaviour change programs. -Mandatory disclosure of energy and water efficiency of commercial properties at point of sale or lease. -Mandatory standards for water and energy efficiency that need to be met prior to sale or lease.	Could all be initiated by State Government, and extended nationally.

Recommendation 4

The immediate focus of the Victorian Government should be to ensure that the ETS is as robust as possible. In particular the target for emissions reductions will need to be adequate (see comments on targets above), and the ramp-up rates linear so that emissions reductions begin immediately. Additionally the Victorian Government, along

⁷ See <http://www.warmfront.co.uk/index.htm> for more information

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with other States and Territories and the Federal Government, will need to withstand the constant claims for exemption and compensation. Exemptions should be extremely limited given that any exemption imposes a higher cost on the sectors covered. We have attached a document entitled "Key Tests for an Australian Emissions Trading Scheme" which was developed by Environment Victoria and other environment NGO's.

Recommendation 5

The Victorian Government should explicitly support complementary measures to emissions trading. In particular renewable energy targets and feed-in tariffs, energy efficiency, planning controls, vehicle fuel efficiency, a reduced number of freight trips through improved efficiency and a shift to rail, and public transport investment will all be needed to complement emissions trading and reduce emissions.

Recommendation 6

The Victorian Government should develop a clear policy agenda to dramatically improve the energy and water efficiency of Victoria's entire existing and future building stock. This will require regulations and programs that will cover new and existing buildings of all types, fittings and appliances used within these buildings, and apply to both rental and freehold properties. In the residential sector targeted programs like the UK's 'Warm Front' program would improve social welfare, reduce living costs and deliver environmental gains. An expansion of EREP and VEET or a similar white certificate trading program could provide an impetus for energy and water efficiency activities that may not be delivered by the ETS. Mandatory disclosure and performance standards for energy and water efficiency could be applied to all types of buildings at the point of sale or leasing.

3. Pursuing cost effective emissions reductions in sectors of the Victorian economy not covered by the ETS.

Environment Victoria believes that the ETS should cover all major emissions sources for which it is practical to measure emissions with the accuracy needed to support a robust emissions trading scheme. Currently only agriculture, land use and forestry should be excluded due to a lack of robust measurement. These sectors may be able to participate in future years but in the interim emissions reductions will need to be supported by complementary measures. Some of these complementary measures, eg reducing land clearance, will also deliver other conservation benefits, eg biodiversity protection and catchment protection. One area that may not be covered by the ETS, waste and landfill, offers great potential for emissions reductions that are achieved through regulatory measures eg landfill gas capture. Additionally the ETS will not be implemented until 2010. The Victorian Government should develop an action plan of measures for implementation that would lead to Victoria's emissions falling by 2010.

Recommendation 7

In developing complementary measures for the agriculture, land use and forestry sectors priority should be given to measures which have additional environmental benefits like biodiversity conservation or catchment protection.

Recommendation 8

The Victorian Government should develop an action plan of measures for immediate introduction that would see the State's emissions start falling by 2010. This should include mandatory capture of methane gas from Victorian landfills, an effective solar feed-in tariff (60 c/KWh paid on gross generation) and new energy efficiency targets for the commercial and industrial sectors (perhaps matching the household target of 10% emissions reductions by 2010).

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4. Ensuring the continued security, efficiency and affordability of Victoria's energy supplies by encouraging low-emission and renewable energy options.

The key barriers to investment in low emissions and renewable energy technologies in Victoria are the lack of a clear trajectory for emissions, a price signal for long term investment and the continued subsidisation of polluting activities. The ETS will provide some certainty for investors but it may fall short of Victoria's ambitions for emissions reductions and industry development. One barrier to investment in low emissions technologies in Victoria is the 'cheap' price of brown coal generated electricity. Whilst this under-pricing may be partially corrected by an ETS, there will still be barriers for newer, less-polluting entrants as they will be competing with power stations that have been operating for years and have written off their capital investment. The Government should look at what additional support and measures will be necessary to provide adequate incentive for new generation to replace conventional brown coal generation. Additionally the State Government should complete an inventory of State and Federal subsidies that exist for fossil fuel use and immediately remove State Government subsidies for fossil fuel use (eg Alcoa's electricity costs which the State Government subsidises to the tune of \$100-150 million each year) and campaign for the removal of Federal fossil fuel subsidies. This could provide a source of funds to implement emissions reductions and adaptation programs. Much of this analysis has already been undertaken and could be used as the starting point for a review of subsidies.⁸

Recommendation 9

The Victorian Government should look at what additional support and measures will be necessary to provide adequate incentive for new generation to replace conventional brown coal generation. This might involve additional support for gas or renewable energy projects that directly substitute for coal-fired generation, ie they take coal generation off line. This will be particularly important if the ETS architecture does not deliver adequate emissions reductions.

Recommendation 10

The Victorian Government should complete an inventory of State and Federal subsidies that exist for fossil fuel use and immediately remove State subsidies for fossil fuel use and redirect this public spending towards emissions reductions and adaptation programs.

5. Assisting households to adjust to the rising costs of electricity, fuel and other commodities.

Electricity, water and fuel prices are already rising in Victoria, partly as a consequence of climate change impacts (less rainfall leading to less hydro power, and more investment needed in water infrastructure). Climate change policy also has the potential to increase living costs, particularly for low income families. The areas where low income families will be most vulnerable are likely to be in relation to petrol and electricity prices, though any increase in petrol prices as a result of emissions trading is likely to be dwarfed by prices rises that have occurred as a result of increased demand and static supply. Environment Victoria believes the following measures should be pursued to protect particularly low income households from electricity and petrol price rises.

Recommendation 11

The Victorian Government should support the inclusion of the transport sector in an emissions trading scheme but should also greatly increase its investment in public transport, particularly to extend the public transport system to

⁸ Chris Riedy, Energy and Transport Subsidies in Australia: 2007 Update (2007) Institute for Sustainable Futures, Sydney



outer suburbs which have poor services. Limiting public transport fare prices rises to less than CPI price increases would reduce the impact of rising fuel prices on households though may not assist households in areas that are not well serviced by public transport. Cycling and walking infrastructure will also need investment. Additionally the Victorian Government should actively pressure the Federal Government to introduce mandatory vehicle efficiency standards for all new vehicles sold in Australia to green our car fleet.

Recommendation 12

The Victorian Government should ensure that a substantial proportion of revenue from emissions trading permit auctions is used to buffer the impact of rising energy costs for low income households. This could include a major energy efficiency program in low income households, increasing energy concessions, or introducing alternative pricing mechanisms for low income households. New energy efficiency programs should be more targeted, focusing on geographic or demographic communities. With existing rebate programs participants are self-selecting which means that it is difficult to target resources to where they are most needed. The Warm Front program in the UK worked street-by-street, town-by-town to improve the energy efficiency of every house in target neighborhoods which meant that Government funds were spent where they were going to have most impact in easing the burden of rising fuel prices. Rental housing should be required to meet minimum standards for energy and water efficiency and landlords should be required to disclose the performance standards of properties when seeking tenants.

6. *Increasing our knowledge about climate change impacts and adaptive needs and possibilities.*

While we have reasonable understanding of the likely impacts of climate change on Victoria through work done by the CSIRO and others, we have a very limited understanding of what adaptation is possible and necessary. While Environment Victoria believes the immediate policy priority should be mitigation, we support adaptation research, policy development and implementation. Areas that need to be looked at as a priority include town planning in coastal areas to ensure we are not building in areas likely to be inundated by rising sea levels in the coming century, the future of water intensive industries like dairy, rice and cotton particularly in the north of the State with drier conditions predicted by climate modeling and increasing biodiversity protection to provide a buffer for the natural environment against climate change (see strategic direction 8 below for further discussion).

As far as behaviour change goes Environment Victoria believes that one of the reasons we haven't seen greater community effort to reduce emissions is that we haven't had the necessary leadership from Government at the State or Federal level to date. Neither the State nor Federal Government has set strict targets for reducing emissions in the near term, eg 2010. Without a target for the community to aim for there is not a collective sense of responsibility for our emissions. By contrast the State Government has very effectively made the case for saving water and the community has responded with impressive reductions in water consumption. While greenhouse emissions are less tangible than empty water reservoirs the necessary effort to change behaviour at the household, community, commercial or industrial levels has been largely absent. The black balloons campaign has been an effective method for illustrating greenhouse gas emissions, but in the absence of a near-term emissions reduction target, supported by politicians continually reinforcing the message that we need to cut greenhouse pollution now (not by 2050), the black balloons campaign floated around without a context.

Recommendation 13

The Victorian Government should allocate a proportion of its climate change budget, eg 25%, to develop and implement adaptation strategies and policies.

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Recommendation 14

Upon establishing a short-term target for emissions reduction, eg a target for emissions to be consistently falling by 2010, the State Government should develop a whole-of-government integrated advertising and public relations campaign urging households, communities, business and industry to contribute to the task of emissions reductions. Providing better real-time data about emissions will assist with this effort. For example with our dams we can monitor daily how much water is in Melbourne's dams. By contrast under the current greenhouse reporting regime there is an 18 months lag period before we know what our emissions were. For example the Federal Government released state and national greenhouse gas inventories on June 24th 2008 for the 2006 calendar year.

7. *Increasing the climate change resilience of the State's regions and communities.*

Environment Victoria will restrict our comments to two vulnerable regions and communities; irrigators across the State and the Latrobe Valley.

With Victorian rivers under unprecedented stress from climate change and over-allocation we need to prioritise getting more water into our rivers or these river systems, upon which communities and industries depend, will collapse. The need to prioritise environmental flows is discussed in more detail in the next section. However the process of providing water for rivers, and the forecast decline of rainfall and inflows to most of the state's rivers will force a change in the composition of regional and agricultural communities. This can either happen incidentally or we can plan for it and ensure that regional towns that have been reliant on irrigated crop production develop alternative agricultural and other industries. It may be that a water-intensive dairy industry producing powdered milk for overseas markets is a poor use of Victoria's diminishing water resources, but without alternative industries and livelihoods for farmers in these communities we are unlikely to achieve an outcome that protects the environment and regional economic security.

Similarly the Latrobe Valley's reliance on coal for regional jobs and economic output makes it incredibly exposed and vulnerable to a move away from coal-fired generation. To date the State Government's approach has been to hope that so-called clean coal and carbon capture and storage works (and to fund these technologies at the expense of proven gas, renewable energy and energy efficiency technologies) so that little structural change is necessary in the Latrobe Valley. However this approach is a big gamble that could hurt people in the Latrobe Valley if these technologies don't deliver in the next decade. The Latrobe Valley brown coal-fired power stations are the most likely power stations in the country to close if we are serious about reducing greenhouse emissions. The State Government has no Plan B for the Latrobe Valley. A more prudent approach would be to attempt to attract investment in combined cycle gas and renewable energy generation and manufacturing in the Latrobe Valley to diversify the regional economy and reduce the Latrobe's level of carbon exposure.

Recommendation 15

The State Government's climate change adaptation strategy (as recommended in Recommendation 12) should identify communities and regions at risk both from climate change and from policy responses to climate change. These communities should be targeted for 'Just Transitions' programs, that is development of new industries and workforce training to ease the pain of transitioning out of polluting or unsustainable industries.

8. *Assisting our natural assets and ecosystems to deal with the pressures and challenges that climate change will bring.*

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Regulators need to return to the precautionary principle as the basic premise for protecting the natural environment from climate change impacts. However given that climate change threatens to change the ecological functioning and equilibrium of communities it can be difficult to determine how 'precautionary' we need to be to maintain biodiversity. For instance our models of protection of freshwater ecosystems through environmental flows are struggling even without climate change impacts. We have failed to deliver environmental flows to most Victorian rivers despite the fact that their condition is critical, largely because vested interests and government have failed to address long-term over-allocation of water and have prevented the return of water to river systems. Add climate change to the equation and it is clear that our current biodiversity safeguards are either inadequate or are not being properly implemented.

Environment Victoria has contributed to a lengthy submission by the Victoria Naturally Alliance on the State Government's Land and Biodiversity Green paper where we explore this issue in depth. However if we are to maintain our current biodiversity as a State we will need a step-change in biodiversity protection to prepare natural environments to cope with, or limit the damage from climate change.

Recommendation 16

All Victorian rivers should receive their full environmental flow allocations every year from 2009. To date rivers have been the last 'interest' to receive allocations of water. We need to reverse our management regimes so that we recognise that economic and community well-being is a product of healthy river systems and therefore that environmental water allocations should have priority over other uses so that our rivers continue to survive and in time thrive.

Recommendation 17

The Victoria Naturally Alliance submission to the Land and Biodiversity Green paper identifies the need for; at least a 10-fold increase in funding levels to help protect and restore Victoria's habitat for future generations; protection of existing native vegetation and the reconnection of fragmented bushland across the state through very large wildlife corridors; increased resources for control of pests and weeds and for landholders to protect and enhance their wildlife habitat; and strong science with publicly reported systematic long-term monitoring of the State's biodiversity.

9. *Supporting Victorian individuals and communities to get active on climate change.*

As discussed in Strategic Direction 6 by setting clear targets for emissions reduction for 2010 the State Government will provide a clear context for community action to drive emissions reductions. Without this leadership, community activism and effort will largely be focused on trying to get the Government and business to get serious about climate change rather than on driving emissions reductions.

As recognised in the Summit Paper climate action groups have been popping up all over Victoria (and Australia) in recent years, supported by organizations like Environment Victoria. These climate action groups have largely been focused on achieving attitude and policy change at the political level rather than engaging their communities in direct emissions reduction and awareness raising activities (although some groups have managed to work across both areas). If however there was the clear political will to reduce emissions many of these groups could focus on the practical implementation of policies and programs to reduce emissions. As an example solar power buying groups are forming across the state and attracting new constituencies into the climate debate.

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Part of the success of the network of climate action groups across has been the decentralised, lean structures that have been adopted. Government financial support of climate action groups might be welcomed by some groups but if it requires groups to formalise and incorporate and spend their limited volunteer time ensuring they are meeting the Associations Incorporation Act 1981 instead of working on addressing climate change then it will dampen community enthusiasm. If the Government wants to support these groups it could fund existing peak agencies like Environment Victoria to support these groups, or alternatively look at existing local government climate change programs and fund local councils to support local climate action groups.

Recommendation 18

The State Government should use existing networks and peak bodies to provide support for local community climate action groups by funding organizations like Environment Victoria and local government to support climate action groups across the state.

10. Ensuring Victoria continues to play a proactive role in global efforts to address climate change.

The best contribution the Victorian Government could make to global efforts to address climate change would be to make headway in cutting emissions over the next 3 years to provide a model for other jurisdictions. If Victoria is cutting emissions, and bringing on-line new sustainable industries by creating a market for them in Victoria it will be developing the solutions that will need to be implemented globally to cut emissions. It will also be important that the Victorian Government support strong national and international action on climate change. In the next 12 months strong Victorian support for an effective national ETS with adequate targets and few exemptions would be a strong national contribution as would support for complementary measures like the national renewable energy target, improved building standards at the state and national level, mandatory vehicle emissions standards nationally and new national energy efficiency programs.

The Victorian Climate Change Bill provides an opportunity to package together a number of the State Government's climate change policies and provide new mechanisms for implementation of emissions reductions programs. It is extremely important that this Bill is not just about reporting on the State's emissions and establishing a Climate Change Council (which is about all the South Australian Government's Climate Change Act delivers) but rather that it includes measures which will drive emissions down. Extended energy efficiency targets across the commercial and industrial sectors, feed-in tariffs for renewable energy, mandatory methane gas capture at landfill sites and a requirement that all new major projects and all state government policy and investments are assessed for their impact on Victoria's emissions should be included in the Bill. Emissions targets for the State for 2010, 2015 and 2020 (and possibly annual targets) will all need to be in the Bill if it is to provide direction and impetus.

The Victorian Climate Change Bill should implement a ban on new conventional coal-fired power stations as it will be impossible to achieve emissions cuts of the order required if we are building new conventional coal-fired power stations. A standard for new fossil fuel generation of less than 0.4g/KWh CO₂ should be introduced, which would rule out all coal-fired power stations bar those that have 100% carbon capture and storage, and would rule out inefficient gas-fired power stations. The proposed HRL coal-fired power station would not be allowed to proceed under this standard. The New Zealand Government has imposed a similar moratorium on thermal electricity generation. Any new fossil fuel plant should only be brought online to replace existing fossil fuel plants, not to meet additional electricity demand. This measure would not prevent efficiency upgrades and measures to reduce emissions from existing coal-fired power stations (eg coal drying),

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but these are likely to be an interim measure before their eventual replacement by efficient gas, cogeneration and renewable energy power stations.

Recommendation 19

The Victorian Climate Change Bill should include emissions targets for the Victoria for 2010, 2015 and 2020 (and possibly annual targets). The Bill should include policy mechanisms to drive greenhouse pollution reduction including extended energy efficiency targets across the commercial and industrial sectors, feed-in tariffs for renewable energy mandatory methane gas capture at landfill sites. The Bill should provide a mechanism by which all new major projects and all state government policy and investments are assessed for their impact on the State's emissions with the assumption that new major projects will be required to demonstrate that they will reduce greenhouse pollution.

Recommendation 20

The Victorian Climate Change Bill should implement a ban on new conventional coal-fired power stations. A standard for new fossil fuel generation of less than 0.4kg CO₂-e /kWh should be introduced, which would rule out all coal-fired power stations bar those that have 100% carbon capture and storage, and would rule out inefficient gas-fired power stations. Any new fossil fuel plant should only be brought online to replace existing fossil fuel plants, not to meet additional electricity demand.

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Summary of Recommendations

Recommendation 1

The Victorian Government should outline the specific goal of its climate change policy in the Green paper in terms of emissions reduction and target temperatures for stabilisation. Environment Victoria believes the goal of climate change policy should be defined as avoiding dangerous climate change and returning to a safe climate. In considering the purpose of the State's climate change policy the Victorian Government should consider whether the 450 ppm CO₂-e target is adequate to avoid dangerous climate change and review emerging scientific literature that suggests that we should be aiming for stabilisation at 350 ppm CO₂-e.

Recommendation 2

The Green Paper should recommend targets for Victoria's contribution towards avoiding dangerous climate change. Environment Victoria suggests that the targets should be:

- 3) Ensure that greenhouse emissions are falling by 2010 so that a range of deep cuts targets are within reach in future years, ranging from the IPCC derived targets of 25-40% cuts by 2020 for developed nations to more ambitious cuts.
- 4) Introduce a legislated target to cut emissions by 50% by 2020 from 1990 levels that is reviewed periodically to ensure it is consistent with the science.

Recommendation 3

The Victorian Government needs to attract zero and low carbon industries through policy mechanisms that drive uptake and deployment of clean and low carbon industries in Victoria. This will require further mechanisms beyond the existing Renewable Energy Target and the upcoming Emissions Trading Scheme. The Victorian Government should develop a 'Green Industries' strategy that identifies target industries for establishment and development in Victoria and also identifies the necessary policy support and workforce skill-base to attract these industries to Victoria.

Recommendation 4

The immediate focus of the Victorian Government should be to ensure that the ETS is as robust as possible. In particular the target for emissions reductions will need to be adequate (see comments on targets above), and the ramp-up rates linear so that emissions reductions begin immediately. Additionally the Victorian Government, along with other States and Territories and the Federal Government, will need to withstand the constant claims for exemption and compensation. Exemptions should be extremely limited given that any exemption imposes a higher cost on the sectors covered. We have attached a document entitled "Key Tests for an Australian Emissions Trading Scheme" which was developed by Environment Victoria and other environment NGO's.

Recommendation 5

The Victorian Government should explicitly support complementary measures to emissions trading. In particular renewable energy targets and feed-in tariffs, energy efficiency, planning controls, residential and commercial building standards, vehicle fuel efficiency, a reduced number of freight trips through improved efficiency and a shift to rail, and public transport investment will all be needed to complement emissions trading and reduce emissions.

Recommendation 6

The Victorian Government should develop a clear policy agenda to dramatically improve the energy and water efficiency of Victoria's entire existing and future building stock. This will require regulations and programs that will cover new and existing buildings of all types, fittings and appliances used within these buildings, and apply to both rental and freehold properties. In the residential sector targeted programs like the UK's 'Warm Front' program would improve social welfare, reduce living costs and deliver environmental gains. An expansion of EREP and VEET or a similar white certificate trading program could provide an impetus for energy and water efficiency activities that may not be delivered by the ETS. Mandatory disclosure and performance standards for energy and water efficiency could be applied to all types of buildings at the point of sale or leasing.

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Recommendation 7

In developing complementary measures for the agriculture, land use and forestry sectors priority should be given to measures which have additional environmental benefits like biodiversity conservation or catchment protection.

Recommendation 8

The Victorian Government should develop an action plan of measures for immediate introduction that would see the State's emissions start falling by 2010. This should include mandatory capture of methane gas from Victorian landfills, an effective solar feed-in tariff (60 c/KWh paid on gross generation) and new energy efficiency targets for the commercial and industrial sectors (perhaps matching the household target of 10% emissions reductions by 2010).

Recommendation 9

The Victorian Government should look at what additional support and measures will be necessary to provide adequate incentive for new generation to replace conventional brown coal generation. This might involve additional support for gas or renewable energy projects that directly substitute for coal-fired generation, ie. they take coal generation off line. This will be particularly important if the ETS architecture does not deliver adequate emissions reductions.

Recommendation 10

The Victorian Government should complete an inventory of State and Federal subsidies that exist for fossil fuel use and immediately remove State subsidies for fossil fuel use and redirect this public spending towards emissions reductions and adaptation programs.

Recommendation 11

The Victorian Government should support the inclusion of the transport sector in an emissions trading scheme but should also greatly increase its investment in public transport, particularly to extend the public transport system to outer suburbs which have poor services. Limiting public transport fare prices rises to less than CPI price increases would reduce the impact of rising fuel prices on households though may not assist households in areas that are not well serviced by public transport. Cycling and walking infrastructure will also need investment. Additionally the Victorian Government should actively pressure the Federal Government to introduce mandatory vehicle efficiency standards for all new vehicles sold in Australia to green our car fleet.

Recommendation 12

The Victorian Government should ensure that a substantial proportion of revenue from emissions trading permit auctions is used to buffer the impact of rising energy costs for low income households. This could include a major energy efficiency program in low income households, increasing energy concessions, or introducing alternative pricing mechanisms for low income households. New energy efficiency programs should be more targeted, focusing on geographic or demographic communities. With existing rebate programs participants are self-selecting which means that it is difficult to target resources to where they are most needed. The Warm Homes program in the UK worked street-by-street, town-by-town to improve the energy efficiency of every house in target neighborhoods which meant that Government funds were spent where they were going to have most impact in easing the burden of rising fuel prices. 9

Recommendation 13

The Victorian Government should allocate a proportion of its climate change budget, eg 25%, to develop and implement adaptation strategies and policies.

Recommendation 14

Upon establishing a short-term target for emissions reduction, eg a target for emissions to be consistently falling by 2010, the State Government should develop a whole-of-government integrated advertising and public relations campaign urging households, communities, business and industry to contribute to the task of emissions reductions. Providing better real-time data about emissions will assist with this effort. For example with our dams we can monitor daily how much water is in

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Melbourne's dams. By contrast under the current greenhouse reporting regime there is an 18 months lag period before we know what our emissions were. For example the Federal Government released state and national greenhouse gas inventories on June 24th 2008 for the 2006 calendar year.

Recommendation 15

The State Government's climate change adaptation strategy (as recommended in Recommendation 12) should identify communities and regions at risk both from climate change and from policy responses to climate change. These communities should be targeted for 'Just Transitions' programs; that is development of new industries and workforce training to ease the pain of transitioning out of polluting or unsustainable industries.

Recommendation 16

All Victorian rivers should receive their full environmental flow allocations every year from 2009. To date rivers have been the last 'interest' to receive allocations of water. We need to reverse our management regimes so that we recognise that economic and community well-being is a product of healthy river systems and therefore that environmental water allocations should have priority over other uses so that our rivers continue to survive and in time thrive.

Recommendation 17

The Victoria Naturally Alliance submission to the Land and Biodiversity Green paper calls for; at least a 10-fold increase in funding levels to help protect and restore Victoria's habitat for future generations; protection of existing native vegetation and the reconnection of fragmented bushland across the state through very large wildlife corridors; increased resources for control of pests and weeds and for landholders to protect and enhance their wildlife habitat; and strong science with publicly reported systematic long-term monitoring of the State's biodiversity.

Recommendation 18

The State Government should use existing networks and peak bodies to provide support for local community climate action groups by funding organizations like Environment Victoria and local government to support climate action groups across the state.

Recommendation 19

The Victorian Climate Change Bill should include emissions targets for the Victoria for 2010, 2015 and 2020 (and possibly annual targets). The Bill should include policy mechanisms to drive greenhouse pollution reduction including extended energy efficiency targets across the commercial and industrial sectors, feed-in tariffs for renewable energy mandatory methane gas capture at landfill sites. The Bill should provide a mechanism by which all new major projects and all state government policy and investments are assessed for their impact on the State's emissions with the assumption that new major projects will be required to demonstrate that they will reduce greenhouse pollution.

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