

166-536 Advanced Policy Design

Assessment Task 5: Policy Design Strategy Paper

A strategy to get the Bracks Government to develop an environment policy for the Essential Services Commission.

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1. Executive Summary

While the major contribution energy makes to greenhouse gas emissions is well recognised, there has been inadequate focus on energy market reforms to remove incentives for energy demand and impediments to sustainable energy. The Australian energy market remains dominated by the perspective that competition is the key to effective energy delivery, which led to the restructuring and privatisation of energy in the 1990s. However, in Britain where a similar market reform regime was implemented, there has been recognition of the contribution the energy market plays in driving emissions and the need for the energy regulator to take environment into account.

Up to date the Victorian Essential Services Commission has not seen environment as part of their brief and has been reluctant to pursue environmental objectives, even when they could concurrently meet economic objectives. A secondary duty to consider the impact on the environment of their decisions and contribute to sustainable development would provide them with the mandate to shift beyond their current narrow focus. This policy needs to be pursued by the Victorian Government in the near future, as the development of a national energy regulator could make it difficult to enhance the regulatory role in future.

2. Introduction

This is a strategy to get the Bracks Government to develop an environment policy for the Victorian Essential Services Commission (ESC), to engage the ESC in reducing greenhouse gas emissions from the energy sector. The ESC is currently an economic regulator, established in 2001 with the primary objective of protecting the long term interests of Victorian consumers with regard to the price, quality and reliability of essential services.¹ This paper puts forward a strategy to provide the economic regulator with a mandated role for the environment.

3. Outline of the Problem

Under the Kennett Government the Victorian energy sector was subjected to market based reforms, with the objective of delivering a more effective management structure. The State government owned system was vertically and horizontally broken up and privatised as a means of promoting competition and preventing regulatory abuse by monopoly sectors.² The reform process was completed by the Bracks Government in 2002 with the installation of Full Retail Competition for small energy customers.

The energy market has failed to take externalities into account, resulting in exploitation of the commons through greenhouse gas pollution of the atmosphere. Emissions from Victorian electricity generation have increased by 41% during the 1990s.³ Collective action is required; however this is prevented by a market which is structured around achieving benefits through

¹ Victorian Parliament, Essential Services Commission Act 2001, Part 2 Clause 8

² Stephen King & Rodney Maddock, Unlocking the Infrastructure; the reform of public utilities in Australia, Allen and Unwin 1996, p125

³ Victorian Government, "The Greenhouse Challenge for Energy Position Paper", December 2004, p10

competition and where there is no cost attributed to pollution. Government intervention would be required to develop the mechanisms for a price signal.⁴

Not only does the energy market lead to increased greenhouse emissions, it also contains structural biases which create impediments to emission reduction initiatives. For instance, Victorians who invest in solar photo voltaic systems to become distributed generators of clean energy face a number of barriers. The economic regulatory framework provides little incentive for energy retailers and distributors to encourage such investment, there is insufficient protection for investors and the market fails to recognise the true value of electricity generated by solar systems during peak energy times.⁵

The ineffectiveness of the energy market in responding to environmental concerns is increasingly generating criticism from a wide range of bodies. Community based organisations such as the Victorian Council of Social Services (VCOSS), Environment Victoria (EV) and the Alternative Technology Association (ATA) have all criticised the limited economic framework which the ESC operates within and called for broadening of their mandate to include environment. The influential International Energy Agency (IEA) recently noted that the Australian energy markets have promoted low energy prices and security of energy supply, but “environmental sustainability represents Australia’s greatest energy challenge with high and growing carbon dioxide emissions”.⁶

4. Opportunity for change

In addition to the voices calling for change in the way the Government regulates the energy market, the Victorian state government has recently implemented reforms in the water area which provide an example of how energy might be reformed. The 2004 *Our Water Our Future*⁷ policy statement integrated social and environmental goals. The new policy has enjoyed much community support, including from key non government organisations such as VCOSS and EV.

Other jurisdictions overseas have reformed their energy regulators to ensure that they have an environmental mandate, in addition to their economic duties. In Britain the Office of Gas and Electricity Markets (Ofgem) has been provided with a legislated mandate to take into account the impact of their decisions on the environment and consider how they can contribute to sustainable development.⁸ Annual reports are made to Parliament. In Canada, the Ontario Energy Board which regulates the energy industry has moved to incentivise demand management in energy distribution.⁹ As part of the government’s energy reduction targets, distributors will be funded to undertake demand management and conservation activities, with the regulator playing a strong

⁴ Neil Skaggs & J. Carlson, *Microeconomics – Individual Choice and its Consequences*, Blackwell Publishers, USA, 1996

⁵ Kane Thornton & Dr Jeff Washusen, Alternative Technology Association, “Impediments to Grid Connection of Solar Photovoltaic: the Consumer Experience”, May 2005, available on the internet at ata.org.au

⁶ International Energy Agency media release “IEA commends the efficiency and security of the Australian energy market but cautions on environmental sustainability”, 8 August 2005

⁷ Victorian Government, *Our Water Our Future*, 2004

⁸ Ofgem, “Environmental Action Plan Annual Review 2004/5”, page 1

⁹ Ontario Energy Board, excerpt from “Report of the Board to the Minister of Energy on Demand-side Management and Demand Response in the Ontario Electricity Sector”, 2004, pages 3-4

role in initiating the change in approach and approving the funds for demand management activities.¹⁰

5. Current role of government

In Victoria, energy policy and regulation is dealt with by a number of different State Government agencies, overseen by two ministers, the Minister for Energy Theo Theophanous and the Minister for the Environment John Thwaites. The Department of Infrastructure Energy Policy Unit has overall responsibility for energy policy, being the key driver of the market reforms. The ESC was established in 2001 “to provide for an economic regulatory framework for regulated industries”.¹¹ The Department of Sustainability and Environment also has an interest in energy policy as it relates to emission reduction, through the Greenhouse Policy Unit. The Sustainable Energy Authority Victoria implements a number of programs aimed at increasing sustainable energy uptake within the community.

While the National Electricity Market (NEM) has been in existence for a number of years, and COAG implements a work program where cooperation is required between states, energy has been predominantly a state issue. This is now undergoing change with the establishment in 2004 of the Australian Energy Market Commission and Australian Energy Regulator. The national regulator has been established as an economic regulator and jurisdictions will be negotiating a framework for national regulation of gas and electricity distribution and retail.¹² The Ministerial Council on Energy (MCE) has been overseeing the works program towards greater national harmonisation in energy policy.

6. Existing data on the problem

While there is much data linking energy and greenhouse gas emissions, there is far less data which relates growing emissions to the structure of the Australian energy market. According to electricity industry expert Dr Gavan McDonell, “one of the most striking features of Australia’s power reform initiative is its conspicuous deficits in authoritative research...from its beginnings the NEM (National Electricity Market) has relied upon economic and related ideas which have since had little updating”.¹³

In 2000 the Victorian Government established the ESC, by reforming the Office of the Regulator General. In the foreword to the Consultation Paper Treasurer John Brumby stated: “A major policy initiative of the Government is to establish an Essential Services Commission to ensure high quality, reliable, equitable and safe provision of electricity, gas and water services. The Government also wants to ensure that regulation of utilities enables broader regional, environmental and social objectives to be achieved”.¹⁴ However, the consultation paper then

¹⁰ Ontario Energy Board, “Electricity Utilities File Conservation and Demand Management Program Reports”, media release, 12 August 2005

¹¹ Parliament of Victoria, Essential Services Commission Act, 2001, Part 1, Clause 1b

¹² Parliament of South Australia, National Electricity (South Australia) (New National Electricity Law) Amendment Bill, Second Reading Speech, 2004, page 1

¹³ Gavan McDonell, “COAG’s Quandary: What to do with the Energy Market’s Reform Program?”, Total Environment Centre and Alternative Technology Association, February 2005, page x

¹⁴ Victorian Government, “Essential Services Commission Consultation Paper”, 2000, page 4

outlined that the Government saw the role of the regulator as an economic regulator and that environmental policy objectives should be met through specialist agencies.¹⁵ This approach was criticised by many of the submissions made to the process, including the Energy Action Group and the Consumer Law Centre of Victoria.¹⁶

The Victorian Government recently acknowledged that the energy market plays a direct role in driving emissions growth from electricity generation, as the low cost energy generated in Victoria has been able to compete strongly in the market.¹⁷ Late last year the State Government released a position paper jointly prepared by the Environment and Energy, Industries and Resources portfolio which tried to reconcile the need to reduce greenhouse gas emissions from the energy sector, while retaining access to secure and low cost energy for Victorians.¹⁸

The primary mechanism supported by the Victorian Government to influence emissions from the energy market is the development of a national emissions trading scheme.¹⁹ This is consistent with a market response to an externality, where the problem is internalised through a price signal. A price signal for greenhouse gas emissions must be established through government regulation as there are no clean up costs.²⁰ While emissions trading is the Victorian Government's predominant measure to influence emissions from the energy market, they have stated that only a national scheme would be viable.²¹

At a Commonwealth level, the Ministerial Council on Energy is currently overseeing the intra state process of reforming the National Electricity Market. The objective of electricity market reform is to "achieve a competitive, secure and efficient Australian energy market..."²². This is despite a recommendation from a Senate Committee five years ago that "the Council of Australian Governments designate the reduction of harm to the environment as a goal of ongoing energy market reform, with a specific requirement for the reduction of the greenhouse intensity of power generation".²³ The MCE's approach is to continue the competition based reform agenda, while trying to reconcile some environmental objectives through looking at ways of promoting demand-side response and assisting the Australian Greenhouse Office to implement the Energy White Paper.²⁴

The British regulatory approach is of particular interest to Australia as the countries share a similar market design. The 2003 Energy White Paper integrates responses to climate change, the decline of the UK's energy supplies and aging energy infrastructure.²⁵ It establishes an emission reduction goal of 60% by 2050, with real progress made by 2020.²⁶ In addition to clearly

¹⁵ "Essential Services Commission Consultation Paper", *ibid* page 5

¹⁶ See page 3 of the Energy Action Group submission of 29 September 2000 and page 2 of the Consumer Law Centre Victoria submission of 29 September 2000

¹⁷ Victorian Government, "The Greenhouse Challenge for Energy" December 2004, page 5

¹⁸ "The Greenhouse Challenge for Energy", *ibid* page i

¹⁹ The Greenhouse Challenge for Energy *ibid*, page 9

²⁰ Roger D. Colton, "The Need for Regulation in a Competitive Electric Utility Industry", July 1995.

²¹ The Greenhouse Challenge for Energy, *ibid*, page 10

²² Australian Government, Ministerial Council on Energy, National Energy Market fact sheet, 2005, www.industry.gov.au/content/itrinternet/cmscontent.cfm?objectID=9055D6BE-B

²³ Commonwealth of Australia, Senate Environment, Communications, Information Technology and the Arts Committee, The Heat is On: Australia's Greenhouse Future, 2000, page 165

²⁴ Australian Government, *ibid*

²⁵ UK Department of Technology and Innovation, "Energy White Paper – A Summary", 2003

²⁶ UK Department of Technology and Innovation, *ibid* page 4

attaching emission reduction and energy security goals, the British Government has reformed Ofgem, the energy regulator. While Ofgem has similar duties to the ESC with regards to the need to protect the interests of consumers by promoting effective competition, Ofgem now has a secondary duty to take into account the effect of its decisions on the environment. Ofgem also needs to contribute to the achievement of sustainable development.²⁷

7. Choosing the right instruments

In determining the strategy to reduce greenhouse gas emissions from the energy market, three options were assessed against criteria for effectiveness. Firstly, the capacity for the strategy to impact upon supply *and* demand within the energy market. Secondly, the cost of developing and implementing the initiative. Thirdly, the political viability of the strategy.

Given that the regulator is required by legislation to take environmental legislation into account, the option of using an existing piece of environmental legislation was examined. Under the SEPP (AQM) 2001, a protocol could be developed which requires electricity generators to reduce emissions. This could be a requirement of both their licences with the Environment Protection Authority (EPA) and the ESC. This strategy was rejected due to its focus on the supply side of the market, lacking the capacity to influence energy demand. Costs could be high as the monitoring and compliance functions of the EPA would need resources and improvements to generators would need to be paid for.

Another strategy would be to take a market approach to dealing with externalities, through a price signal. The two ways in which a price signal could be integrated are for Government to put a tax on carbon emissions or to implement an emissions trading system. An emissions trading system is currently under development through a cooperative approach of the state governments. The key benefit of a market based approach is that it is consistent with the current policy approach and hence is politically viable. The costs are considerable however. All the states will need to agree on the details of the trading approach, resulting in considerable time and resources required to develop the scheme. Further, industry capture of the policy area could result in significant concessions being given through grandfathering. The longer the scheme takes to establish, the higher the risk industry will seek exemptions from the scheme prior to investing in infrastructure. Emissions trading could ultimately be a very costly program with minimal emission reduction.

The other strategy reviewed was the British approach, where the regulator is given a secondary responsibility in legislation to consider the impact on the environment of its decisions and also to contribute to sustainable development. While the Victorian Government has in the past been reluctant to perceive the role of the regulator as anything other than economic, the fact that this approach has been successfully implemented overseas could initiate a rethink of the issue. Costs would be reasonably low as it would involve reforming an existing institution. This option was seen as the most viable strategy to provide an environmental policy for the ESC, with the objective of getting the regulator to undertake reforms of the market which would lead to emission reduction.

²⁷ Ofgem, "Environmental Action Plan Annual Review 2004/05", August 2005, page 1

8. Assessing the proposed strategy

8.1 Research design

In order to test the viability of adopting the British model for the ESC, a number of stakeholder and expert interviews were undertaken. To ensure that the interviews could provide information both on and beyond government policy, interviewees were selected from a range of backgrounds. In terms of government, a request was made to the Energy Policy Unit and the Essential Services Commission to make an appropriate officer available. Contacts within the Greenhouse Policy Unit and the Sustainable Energy Authority Victoria who are known to have a good understanding of the energy market were asked directly. In addition, energy expert and academic Alan Pears and environment representative on the ESC consultative committee Daniel Voronoff were asked to participate.

The interviews were very constructive in providing an explanation for current government policy and an assessment of whether the British model would work in the Victorian context. In order to ensure the interviewees could provide their own views on the strategy in addition to the government view (where that exists or applies), particular comments have not been attributed to their source. The one exception to this is where the current view of government was being put forward and explained.

Overall, the response to the strategy was positive. While the strengths of the strategy were upheld, a range of weaknesses were identified which have been further addressed below.

8.2 Research findings

A key issue in reviewing the policy was whether it is appropriate for the ESC to consider the environment or whether it is better for other parts of government to pursue environmental objectives. The clear view of the Energy Policy Unit²⁸ is that the regulator is and should be restricted to economic regulation. This prevents conflict arising from the regulator trying to address incompatible objectives.

At the other end of the spectrum was the perspective held by most respondents that dealing with greenhouse emissions will require an across the board institutional approach and the ESC's responsibilities must reflect this. Aside from Energy Policy, there was general agreement that the regulator should have more of an explicit role, but some differences in terms of how that role should be framed.

A view expressed by a number of respondents is that it would be valid for the ESC to consider environment under their existing terms of reference. According to one respondent, to adequately look after the long term interests of consumers and to maintain viability of the industry, environment must be taken into account. However, this is clearly a moot point as it was agreed by all respondents that the ESC does not take the environment into account currently.

²⁸ The views expressed in the interview with Peter Naughton from the Energy Policy Unit were backed up by an email from the head of the unit, Richard Bolt.

Regulation of monopoly distribution businesses was identified by most respondents as one area where the ESC could pursue environmental objectives without conflicting with economic objectives. There was acknowledgement from a number of the respondents that there are currently incentives for the distributors to grow their networks and this is both inefficient from an economic point of view and has negative consequences for the environment.²⁹ Two different reasons for not addressing this issue through pricing reviews to date were identified. According to one, the difficulty of working out how to cost demand management measures has been a barrier to change. According to another, the way in which the ESC has chosen to address the Distribution Price Review has acted as a barrier itself.

In seeking to transfer a policy from one country to another, the appropriateness of the policy to be transferred needs to be considered. The majority of respondents agreed that the British model is generally appropriate for Victoria. There are similarities between the two jurisdictions, in terms of the structure of the energy market and in terms of legislative approach. One respondent also pointed out that the ESC currently has to grapple with social issues, so extending their brief to consider environment issues should not be so difficult as to rule in out.

As noted above, this particular strategy was chosen to undergo a test because it appeared to have strengths which fulfilled a number of criteria for effectiveness. The majority of the respondents supported the strengths identified. In addition, the unique compliance capacity of the ESC in relation to the energy industry and existing mechanisms (such as the workplan and annual report) were seen to provide a good basis for undertaking the duty. The strength of having a legislative requirement was raised by a number of respondents. One respondent noted that the industry complains when ESC makes the smallest deviation from what is perceived to be their terms of reference. Taking a broader interpretation of the brief than what is accepted by industry puts the ESC at risk of losing productive relationships with their industry stakeholders, or even being taken to court.

With every policy comes a range of weaknesses and costs. An effective policy needs to have benefits which outweigh the costs and, preferably, weaknesses which can be ameliorated. Respondents identified weaknesses under the following headings; policy transfer issues, complexity, trade offs issues, and the role of the national regulator. Given the importance of ensuring weaknesses do not result in an implacably flawed policy, each of these identified weaknesses has been responded to.

In relation to policy transfer, one of the respondents noted that it is easier to implement such policies under the British constitution, as both energy and environment are the responsibility of the national government and regional governments have no role. While this is most likely true, the Victorian Government has responsibility for energy and environment and hence there is nothing barring the Victorian Government from adopting this policy. Implementing the policy at a national level however would be more complex.

Another respondent pointed out that the British regulator not only undertakes regulation but also has responsibility for implementing particular sustainable energy programs. This research has not focused on whether the additional environmental programs run by Ofgem has increased the

²⁹ The Electricity Distribution Price Review 2006-10 Draft Decision acknowledges a range of barriers to demand management under the regulated approach and puts forward the ESC's view of how these can be overcome

capacity of the organisation to pursue environmental duties. This would be an interesting question for future research. Victoria has a range of institutions which can undertake sustainable energy program delivery and which institution has carriage should depend on the particular program under consideration.

The culture of the ESC could be another impediment to successful policy transfer. As noted above, the ESC has not showed any desire to interpret their brief in any way which could benefit the environment. One respondent characterised the ESC as currently timid and closed in their approach. While legislated reform would be a strong driver for culture change, people are clearly very important to culture. Bringing on board new staff with different expertise and building the capacity of existing staff would assist in culture change. Also, having an enforcement capacity with penalties for businesses which did not comply with the new regime would have an impact on culture.

Two of the respondents expressed concern that, depending upon how the policy was implemented, it could lead to increased complexity. Currently the ESC relates most directly to the Department of Infrastructure's Energy Policy Unit, which is under the control of the Minister for Energy and Resources. An environmental mandate could create the need for a relationship with the environment portfolio. This could create tension if the portfolio objectives differed and pulled against each other. There is no doubt that taking 'whole of government' approaches to dealing with environment policy leads to complexity by requiring different areas of government to collaborate. However, this is a 'necessary evil' and it is assumed that the different areas of the bureaucracy would work out approaches to minimise conflict.

Regarding trade offs, there were two opposing arguments. On the one hand there was concern that having a secondary responsibility for the environment and a primary economic responsibility would lead to the environment being traded off in favour of economics. On the other hand, there was concern that measures could be adopted by the regulator which have an environmental benefit but result in higher costs to consumers.

Ultimately having a secondary environmental duty does mean that environment would be traded off, when a measure which was good for the environment did not meet economic criteria. However, the network regulation example above clearly highlights that there are areas where taking the environment into consideration will have positive economic impacts. There would need to be clear advice given to the ESC about how to approach their duty, which could be part of the Tariff Order. The ESC would also need to build its capacity to devise approaches which meet economic and environmental objectives. Ofgem's environmental action plan cites a range of areas where they are undertaking investigations which will influence future regulatory regimes.³⁰

The newly established national regulator role, based on national harmonisation objectives, could create difficulties for enhancing the state regulatory role. Three of the respondents raised this issue, agreeing that the national regulator would not necessarily abolish the need for state regulators. It was noted that State Governments are working out what powers to hand over and how, with the assumption that state differentiation will be required. It could be that the national regulator is given a particular environmental responsibility to implement for Victorian based

³⁰ Ofgem, *ibid*, summarised in the Foreword under "Ofgem's work programme for 2005/06"

businesses, or the ESC could provide this particular role. However, one respondent also identified the loss of personnel from the ESC to the national regulator as a potential problem. While the national regulator does not prevent the State government from making regulatory reforms, there is no doubt that timing is important. The State Government would need to commence policy development while the two regulators are in a state of flux and the ESC still has organisational capacity.

In terms of the cost of the strategies, three different types were identified; the cost of formulating the policy, the cost of implementing the policy and the cost of particular regulatory measures which could arise in the future. Regarding implementation, it was acknowledged by a number of respondents that the ESC would need a wider range of expertise to undertake the new responsibility. One of the respondents noted that this would be counterbalanced by savings through less challenges by industry of the ESC's role in this area. The cost of future regulatory measures would have to meet least cost objectives in line with the economic mandate of the ESC. None of these costs were seen to be prescriptive as the policy is essentially about reform and not establishing a completely new entity.

While not the central focus of the research, respondents were asked if they could think of a different policy approach which could achieve the same, or better, environmental outcomes. A number of respondents agreed that reforming the ESC, while necessary, is only one action which is required to reduce greenhouse gas emissions to the level required to stabilise climate. A number of other opportunities to reduce greenhouse gas emissions were identified, such as broadscale energy efficiency obligations, a state based Mandatory Renewable Energy Target³¹ and emissions trading or a carbon tax. One respondent preferred emissions trading to reforming the ESC. However, others highlighted the weaknesses of emissions trading. One respondent remarked that emissions trading won't deliver least cost solutions as the current incentives in the market will lead to energy retailers selling more electricity and investing in offsets, rather than managing demand. Given that it will only be large emitters who will be involved in the trading scheme, this will leave the community at large with larger electricity bills.

9. Conclusion

To some degree the 'nub' of the policy issue is whether regulators should be given an environmental mandate or whether this should be the domain of government. This debate was also present in Britain. Their deliberations in Parliament³² were swayed by the view that providing the regulator with a secondary duty reduced (rather than enhanced) regulator discretion, and that environmental matters in conflict with the primary economic duty would be referred back to government.³³ Ultimately it is inefficient to structure an energy market so that it contributes to driving energy demand and increasing greenhouse gas emissions. The regulator has an important role to play in the response, but is clearly not the only response required.

The policy change process should be commenced with consultation with the electricity industry and community. The intention to explore this policy option could be flagged by hosting a forum with information from representatives of Ofgem and the British electricity industry. If

³¹ "The Greenhouse Challenge for Energy", *ibid* page 17

³² British Parliament House of Lords, "Extract from Final House of Lords Session on Energy Bill", 15 July 2004

³³ Gill Owen, "Economic Regulation and Sustainability Policy", *Sustainability First*, 2004, page 25

Government wanted to ‘test the water’ prior to taking a more formal consultation process, such an event could be hosted by non government organisations.

Once the principle of extending the regulators mandate has been agreed by government, the next challenge is to ascertain how this should be achieved. The emphasis should be on transparency and clarity, with a legislated mandate put in place by changing the Essential Services Commission Act 2001, Electricity Industry Act 2000 and Gas Industry Act 1994. Consideration would need to be given to penalties for non compliance. More explicit direction from government to the regulator on how to use the duty and the issue of trade offs could be provided in the Tariff Order. The data collection and monitoring capacity of the ESC would need to be improved. This could be achieved by providing the ESC with the same capacity as water authorities to pass on the cost of quantification and monitoring.

The implementation approach will also need to address issues of culture within the ESC. Cultural change could be supported by providing a team of current ESC personnel with the opportunity to spend time at Ofgem to learn more about how they undertake their work. New expertise should also be brought into the organisation. Having the capacity to undertake research into regulatory responses which meet economic and environmental objectives would also assist with cultural change over time.

Timing of the policy implementation is critical. With the development of the national regulator, the Victorian Government needs to ensure that the policy reform process commences prior to finalisation of agreement on what state powers will be allocated to the national regulator.

Ultimately, none of this will be able to be achieved without political will. In the UK the Government has voluntarily committed to high emission reduction targets, in line with the science on climate change mitigation rather than a political view about what level of emission reduction their economy might bear. The UK Energy White Paper³⁴ strongly integrates greenhouse and emission objectives. While the Victorian Government has acknowledged the issue of climate change and has implemented numerous programs in response³⁵, there is no target for emission reduction at a state or national level. Acting in the absence of clear targets and goals makes it difficult to assess whether the actions are effective and therefore can lead to an inadequate response.

³⁴ UK Department of Technology and Innovation, *ibid* page 4

³⁵ Victorian Government, Key Directions of Victorian Greenhouse Strategy Action Plan Update 2005, www.greenhouse.vic.gov.au/directions.htm

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