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A quiet revolution: City governments tackle global warming

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While the introduction of policies to deal with global warming continues to cause angst for the Australian federal government, a quiet revolution has been occurring in the nation's capital cities. Since the mid-1990s Australia's city governments have been introducing policies and signing international agreements that seek to reduce the contribution of metropolitan areas to global warming.

To demonstrate their commitment to climate change policies, representatives from Melbourne and Sydney city councils travelled to Seoul in April 2009 to meet with leaders from the governments of 40 of the world's largest cities as part of the C40 Cities Climate Leadership Group, under Bill Clinton's Climate Initiative. In June 2009, representatives of Australia's major local governments joined other members of the International Council for Local Environmental Initiatives (ICLEI) to discuss their efforts as part of an international approach by city governments to drive policy development in response to climate change.

The ICLEI had advocated for official UN recognition of successful local climate action worldwide at the UN Climate Talks in Bali in 2007. Australian local governments have been part of an international push by local and regional governments encouraging national governments to look to local experiences when discussing a new climate agreement. They argue that an increase in systematic capacity building and resources on the local level will dramatically help local actions and measures that can build a stronger international climate agreement (International Council for Local Environmental Initiatives 2009).

One assumption underlying the ICLEI view is that federal and state governments should recognise that municipal government is a laboratory of innovation in climate policy and practice, and can offer important lessons on barriers to change and on the most effective types of technical assistance and strategic investment. After all, responses to global warming need to be comprehensive at the local level. Unfortunately, in Australia there is reluctance, particularly on the part of state governments, to make any more than ad hoc gestures towards involving local government in building a co-ordinated response to global warming. Indeed, much of this work is being driven by city governments taking initiatives and seeking participation by other levels of government on a project by project basis. One example is the Melbourne 1200 project, where the Melbourne City Council has enlisted the support of the Victorian and Commonwealth Governments to retrofit 1200 commercial buildings in the Melbourne CBD on a more environmentally sustainable basis.

It appears that while Australia's federal and state leaders are stuck discussing the introduction of the emissions trading scheme some of our local governments have been trying to do something about the impact of human activity on global warming. What remains unclear, however, particularly in federal systems like Australia, is how climate change policies developed by our city governments will be worthwhile, or even negated by the actions or inactions of the other levels of government.

CITIES AND GLOBAL WARMING

It seems reasonably clear that city governments should be involved in policy responses to global warming: cities have large concentrations of both residents and industrial activities, there are more of them, and they are getting bigger. Research by the International Human Dimensions Programme claims there are:

19 mega-cities (i.e., with 10 million or more people); 22 cities with 5 to 10 million people; 370 cities with 1 to 5 million people; and 433 cities with 0.5 to 1 million people. In the year 2015, according to estimations there will be about 60 megacities with a total population of

more than 600 million people (Sánchez-Rodríguez et al. 2005, p. 10).

Since the completion of the Kyoto Protocol negotiations in 1997, there has been a growing recognition of the critical role of city governments in mitigation and adaptation strategies to deal with climate change (Betsill 2007; Kousky & Schneider 2003; Bulkeley & Betsill 2003).

However, there is considerable debate on the overall contribution of cities to global warming. Sánchez-Rodríguez and colleagues (2005) have a negative view. They blame cities' high consumption, unsustainable land use management and poorly designed transport systems for generating a significant proportion of the world's greenhouse gas emissions and for contributing disproportionately to climate change. Their view is that it is the interactions between human activities in urban areas and the environment that continue to have a negative impact on global environmental change.

Other writers are more positive, and argue that the contribution of cities is often overstated. Dodman (2009) argues that critics fail to recognise that the consequences of global environmental change are likely to affect different urban areas in different ways. Satterthwaite (2008) argues many of the processes set in train by urbanisation can have a positive overall effect, as urban residents can generate a substantially smaller volume of GHG emissions per capita than residents elsewhere in the same country. The argument here is that well designed urban developments can reduce the impact of high population densities on global warming. European cities like Copenhagen and Amsterdam are heralded as providing a high quality of life without the same levels of energy consumption as US cities such as Detroit. For writers such as Dodman and Satterthwaite well planned and governed cities provide the only hope of 'de-linking high quality of life from high levels of consumption', which is the critical factor leading to reducing human contribution to global warming (Dodman & Satterthwaite 2009).

Whether cities are the problem or the solution, the policies of city governments have the potential to play a major role in contributing to or reducing the impact of cities on global warming.

THE POLICY CONTEXT

City governments have long sought a role in policy to combat global warming. In the early 1990s, as part of an international movement, many city governments began arguing they were taking the lead in dealing with climate change (Bulkeley & Betsill 2003). Indeed, the Cities for Climate Protection (CCP) programme, established in 1990 and consisting of over 900 city governments, is perhaps the largest greenhouse gas mitigation program in the world (Betsill 2007).

Current evidence suggests that city governments in federal systems claim to be taking more strategic and comprehensive approaches to climate change and establishing more ambitious emission reduction targets than other levels of government.

Two Australian members of the CCP show the level to which city governments are prepared to commit to some action on reducing their contribution to global warming. The Brisbane City Council has established a target of reducing GHG emissions by 50 per cent less than 2000 levels by 2026 through its *Plan for Action on Climate Change and Energy* (2009). Melbourne City Council introduced policies in its *Greenhouse Action Plan 2006–2010* to reduce Melbourne's emissions by 20 per cent below 1996 levels by 2010, and to reach zero net emissions for the municipality by 2020. This is in the context of the federal government's proposal to introduce the national target of a 5 per cent reduction in GHG emissions against 2000 levels by 2020 (Rudd 2009).

Similar situations prevail in North America. The City of Vancouver (2005) has established a target of 33 per cent by 2020 less than 2007 levels. Toronto has a target of 30 per cent by 2020 of 1990 levels (City of Toronto 2008), yet the Government of Canada (2008) has a target of 20 per cent below 2006 levels by 2020. Another notable example is the New York City government that introduced policies in 2007 to reduce greenhouse gases in the city by 30 per cent below 2005 levels by 2030 whereas the US House of Representatives only passed legislation in May 2009 to reduce national GHG emissions by 17 per cent

compared to 2005 levels in 2020 (Energy and Commerce Committee 2009).

The targets set by city governments are impressive. However, they also appear to be establishing strategies that are well beyond their legislated capacity (Bulkeley & Betsill 2005; Doucet 2007; Lambright, Changnon & Harvey. 1996), and this raises important questions about effective policy development, particularly in federal systems. While we need to recognise the diversity of local government capacity in different jurisdictions, in, for example, revenue raising capacity and the provision of services, we also need to acknowledge local governments face similar barriers and constraints in areas where they could be more effective.

Further, the disparities between local and national targets raise questions about the politics of representation at different levels of government. If we accept the argument that local government better understands local concerns and reflects community expectations (Mill 1912; Sharpe 2006), then, in Australia at least, national and state governments should take greater notice of how ambitious city governments have been prepared to be, and how far they have taken some policy initiatives.

WORK TO BE DONE

Despite the commitments and existence of strategies by Australia's capital city governments we have little understanding of the processes followed by decision makers in the design and implementation of their climate change policies. We need this understanding because these policies have the potential to significantly affect the more than 80 per cent of Australians that lives in cities (House of Representatives Standing Committee on Environment and Heritage 2005). What city governments decide affects how individual Australians deal with climate change issues. And, by focusing on how policy is designed and implemented, we can move towards a new understanding of the complimentary roles for each level of government in tackling the consequences of global warming.

Without examining policy development, we lack understanding of some of the central elements influencing city governments in developing these strategies. For example, it may be that many initiatives have been established as symbolic gestures, essentially exploiting local governments' lack of capacity to impinge or sanction. A clearer understanding of these policy processes can also identify valuable lessons for other levels of government in developing future strategies. This is particularly important if it can be shown that city government policies reflect the views of their communities. We need to ask who instigated commitments to these policies, what research has been undertaken, who has been consulted, which views have been adopted and why some initiatives have been taken and not others. We also need to understand the implementation procedures and how policy effectiveness will be assessed.

Further, the fact that city governments have found more success in designing their policies through international collaboration than through national measures raises important questions about policy development in federal systems like Australia. More work needs to be done on examining the opportunities and constraints placed on city governments by the other levels of government, as cities seek to establish policies that are both widely acceptable and within the capacity of the community to undertake.

The themes already emerging as the basis of further work in this area include:

- the role of national and sub-national governments and their impact on facilitating or constraining city government initiatives (Kousky & Schneider 2003)
- the contribution of international networks to the ability of city governments to identify effective policy frameworks in establishing climate change initiatives (Young 2007)
- the role of connections with scientific research in the local context in contributing to the understanding of city governments and effective climate change policies (Betsill & Bulkeley 2007)
- the place of threats (legal liability) (England 2007) and opportunities (economic development and sustainability) (Droege 2007) in the policy development processes, and
- the value of measures for implementation, assessment and review that are adopted into the

strategy process (Dodman 2009).

Comparative studies could contribute more precise analysis of the challenges of city government in federal systems, and of the real scope for city-level initiatives and programmes to combat global warming.

CONCLUSION

Australians produce among the highest greenhouse gas emissions on per capita basis, and unsustainable patterns of urban development continue to contribute. High levels of energy consumption, water consumption and waste production have placed Australia's cities amongst the world's most environmentally unsustainable.

A co-operative approach to the considerable policy challenges Australia faces has been promoted as the preferred method (Henry 2008). In the past, the Commonwealth and state governments have been reluctant to establish a co-ordinated and integrated approach to sustainable development policy. Yet in 2008, the 2020 Summiteers wanted to see Australia adopt a 'National Sustainability, Population and Climate Change Agenda' with a whole-of-government approach to climate change and sustainability policy. Disappointingly, the Rudd Government rejected this proposal, with the argument such an agenda would 'complicate' its existing work on climate change (Australian Government 2009). Research on the policy process is important, but so is political commitment to co-operation between all levels of government on what Ross Garnaut (2007) has described as the most 'diabolical' policy problem.

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