DELIVERING INFRASTRUCTURE AND LAND USE-TRANSPORT INTEGRATION POLICY: EXAMINING GOOD GOVERNANCE ISSUES IN MELBOURNE AND PERTH

ABSTRACT
Governance is a difficult topic to address in the often controversial area of transport and planning. Good governance allows issues associated with balancing different interests, objectives and pressures, to be addressed and solved - but its absence is a major barrier to this occurring. The Australasian Centre for the Governance and Management of Urban Transport, an independent research centre, held two forums in 2008 to discuss infrastructure governance in Melbourne, and transport and land use integration in Perth, Australia. The forums were structured to enable practitioners from a range of agencies and individuals from the community to share their experience and viewpoints on good governance. Issues presented were interrogated collectively during breakout group discussions affording participants a chance to also express their positions and to raise issues. The diversity of attendees permitted a wide range of views on governance. This paper examines the key differences which distinguished the perceptions and practice of good governance in Melbourne and Perth and identifies socio-political reasons why these differences exist.

Analysis of the discussions from the forums in Melbourne and Perth reinforced the hypothesis that different governance frameworks were in use in each of these two cities. While transparency, communication structures and resource constraints remained consistent issues in both cities, the emergent differences raised questions about how and if institutional structures and procedures facilitated and mediated the implementation of policy.

INTRODUCTION
Since the 1960s transport planning has traditionally been a matter left in the hands of ‘technocrats’ as a science-based modelling/engineering exercise (Schon, 1983: 10). New challenges have raised questions about this traditional role. A new approach to land use and transport integration, in which transport is provided through accessibility and proximity, has taken transport planning beyond its technocratic sphere. At the same time socio-spatial planning has expanded to embrace a broader socio-environmental context (Albrechts, 2001a, 2004) that includes the reality brought on by climate change, resource scarcity and most recently economic constraints. This has resulted in a need to bridge the gap between the technical and the social spheres. Transport planning has been repositioned as part of a complex framework. It has resulted in the movement away from the ‘predict and provide’ philosophy which has dominated transport planning policy by equating infrastructure need with demand (Owens, 1995: 44) to decision-making involving multiple different choices (including non-built solutions) determined by engaging a wider range of stakeholders (see

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Healey, 1997; Forester, 1999). This shift has been reflected in technical aspects of transport model building and utilisation as well, reflecting the expansion of disciplines perceived by analysts as relevant by the analytical economic and engineering specialists. This shift has engaged these groups progressively closer with broader governance issues (Horovitz, 2006): 18) and greater integration with political concerns (Grigor, 2005).

The inter-disciplinary nature of transport planning requires that a contemporary approach to policy-making be adopted. This provides actors from a range of stakeholder groups the opportunity to engage. The challenge which emerges is one of managing power relationships in a highly contentious area of policy. One such framework for policy-making which manages these relationships is deliberative democracy. This is described as an inclusive (Smith, 2003) and unconstrained (Dryzek, 1990) process of engagement that produces policy outcomes that are more rational (Dryzek, 1987, 1990; Smith, 2001) and legitimate (Selman, 1999) than conventional approaches.

The Australasian Centre for the Governance and Management of Urban Transport (GAMUT) is a research body with offices in Australia and the Asia Pacific region. It is one of seven Volvo Research Endowment Fund (VREF) Centres of Excellence. One of the roles of GAMUT is to promote and advocate sustainable transport by engaging communities. In 2008 GAMUT held two public forums. The first forum was held in Melbourne on the topic of governance for transport infrastructure and the second in Perth on governance for transport/land use planning. These topics had recently provoked debate in national and local media outlets.

Examination of transport governance issues in Australia highlights the key issues which unite and divide cities. Analysis of the discussions from the forums in Melbourne and Perth reinforced the hypothesis that different governance frameworks are in use in each of these two cities. While transparency, communication structures and resource constraints remained consistent issues in both cities, the emergent differences raised questions about how and if institutional structure and procedures facilitated and mediated the implementation of transport policy. This paper examines the key differences which distinguished the practice of good governance in Melbourne and Perth and identifies socio-political reasons why these differences exist.

TRANSPORT GOVERNANCE IN AUSTRALIA THE CASE OF VICTORIA AND WESTERN AUSTRALIA

Cities around the world, including those in Australia, witnessed an exponential growth in car ownership in the period from 1975 and 1995. This was supported by growth in real incomes and cheap energy (Banister, 2002: 25; 2005: 20). The ‘demand and supply’ practice of government and engineers was the dominant form of decision-making which resulted in mobility in cities pursued by government and industry through building more roads (Low, Gleeson, Green, & Radovic, 2005: 133). Historically transport planning has taken this more technical approach (Banister, 2002: 24) which has supported a national bias towards road construction in Australia. For instance, between 2000–2001 and 2006–2007 a total of AU$ 63.3 billion was spent nationally on roads and bridges, while only AU$12.0 billion was spent on railways—and only a relatively insignificant portion of that on investment in urban railways as opposed to freight railways (ABS, 2009a).
In Australia the development of the transport governance system has been influenced by its physical and human geography, and by the development of the federal political system. The cities vary in size from 1.17 million in Adelaide in June 2008 to 4.4 million in Sydney (ABS, 2009b). The metropolitan areas of each of these cities are much larger than their populations would suggest, while conversely they are surrounded by few smaller rural or coastal towns, at a distance of up to 150kms away. The distances between these major cities range from the shortest distance of 728km from Melbourne to Adelaide, to the longest of 4384km from Perth to Brisbane.

Due to the very large distances involved, trade between the capitals is limited suggesting that Australia is characterised by separate state economies (Low & Sturup, 2008). National government engagement in transport has therefore been used to maintain linkages between remote rural and mining townships (which produce commodities), and to ensure the development of a national system of highways and railways linking each of the major cities for the purposes of trade. National investment in urban areas, however, has focused mainly on removing bottlenecks to enable greater access for road based freight transport to the ports (see Low et al, 2005). One of the perverse consequences of this approach has been the spread of urban areas as private car travel utilises the consequent network of high speed roads (Gottmann, 1990; Owens, 1995; Stephens & Wilkstron, 2000; Banister, 2002; Hall, 2002).

All Australian road infrastructure is owned by the State and Territory governments (Low & Sturup 2008). The Commonwealth government does not directly build infrastructure it has an interest in, nor since 1996, has it played a direct role in land use or urban development planning. Rather, Commonwealth influence is apparent through its control over the collection and distribution of income taxes and Goods and Services Tax (GST) revenue (Australian Constitution section 51). This, until recently, was tied to specific purposes and through funds provided directly under a variety of programs, most notably Auslink.

Thus the long standing approach to transport planning in Australia has been dominated by planning for road based trade connections over very long distances. This has led to a focus on car-based mobility which uses the created infrastructure, even in urban areas. However, the paradigm around transport planning is changing. Sustainable transport is now on the agenda (Banister, 2005). Here the focus is on accessibility, rather than the traditional emphasis on mobility (Jacobs, 1961; Calthorpe, 1991, 1993). There is an interest in reducing the need for car-based travel rather than simply meeting its insatiable demand. Movement of freight however, remains an impetus for more road infrastructure.

While the dominant paradigm surrounding transport planning is beginning to shift, the political reality and the institutions which support transport planning are changing at a rate that is much slower (Newman & Kenworthy, 1999: 292). This rate varies between States. The following sections examine the institutional structures in place which support the system of transport planning in Victoria and Western Australia.

Transport Governance in Victoria

The State Government of Victoria is the most powerful player in transport governance in Melbourne composed of key players such as the Department of Transport (DoT) and the statutory body corporate named ‘the Roads Corporation of Victoria’ (VicRoads). The DoT was re-structured in 2008. As a result of this re-structuring this department is led by two ministers, the Minister for Roads and Ports and the Minister for Public Transport. According to its website DoT is aspiring toward a ‘safer, fairer and greener transport system’ that
promotes a ‘more prosperous and connected community’ (DoT, 2009). Under its new structure DoT has two operations sections: the Freight Logistics and Marine Division, and the Public Transport Division. The latter has responsibility for managing the contracts with the private public transport companies under franchise arrangements.

VicRoads, on the other hand, is a statutory body corporate established under the *Transport Act* (Vic) (1983) whose purpose is to maintain, upgrade, vary and extend the State’s declared road network and in conjunction with municipalities, to assist in the maintenance, upgrading and construction of other roads. VicRoads reports directly to the Minister for Roads and Ports. Under the *Transport Act* (1983) it is also responsible for providing advice concerning plans for the federal network of roads in Victoria to the relevant Commonwealth government minister.

Melbourne’s 31 municipalities (locally elected) are responsible for local roads, bridges, roundabouts, traffic calming measures, footpaths, bicycle infrastructure and other means of traffic and street management. The Local Government planning scheme sets out policies and requirements for the use, development and protection of land for each municipality in Victoria. Land use policy and control is mainly the responsibility of local government, subject to broad policy generated at the State level. The State Department of Planning and Community Development (DPCD) is responsible for State land use policy, which is primarily directed at defining areas for population growth and conversion of agricultural to urban land (DPCD, 2007). This department advises nine Ministers of which the Minister for Planning is one.

There have been a plethora of strategic plans and policies developed in recent years relating to transport. The Victorian Transport Plan, produced by the Department of Transport in 2009 has the objective of setting a clear strategic direction for transport in Victoria to 2020 while providing new investment and creating more jobs for the State (DoT, 2009). Most policies recognize the importance of coordinating transport planning with land use planning (VicRoads, 1994d: 3). The most recent strategic metropolitan plan *Melbourne 2030* (2002) promotes the idea of Melbourne as a polycentric city, with activity centres developed around transit stations.

*Transport Governance in Western Australia* (WA)

The WA institutional structure has experienced a progressive change from a myriad of agencies responsible for transport (with many State Ministers) to just one (Figure 1). After the state 2001 election of the incoming State Labor government, the Department of Transport, the Ministry for Planning, and Main Roads Western Australia (MRWA) were amalgamated into the Department of Planning and Infrastructure (DPI). Road functions however remained split with DPI responsible for strategic policy development and the MRWA responsible for service delivery. While the state government has responsibility for primary regional roads, including many of the urban arterials, local government has responsibility for local roads. MRWA, however, retains a strong influence even on local roads as it has responsibility for line marking and traffic signs.
This new institutional arrangement required that DPI, MRWA and the Public Transport Authority (PTA) report to one Minister under the banner of Planning and Infrastructure (Gleeson, Curtis, & Low, 2003: 217). The mission of this new department would be to:

- partner government, local government, community and industry clients in producing timely high-quality planning advice and land use decisions (WAPC, 2001: 5)

The motivation behind this amalgamation was to facilitate transport planning in Western Australia in a more effective manner than achieved under previous institutional arrangements when transport and land use planning were separate (Curtis & James, 2004: 278). It was thought that the amalgamation would generate better coordination between land use planning and transport and therefore better integration. However, evidence later emerged suggesting that such a structure was not achieving its goal (Curtis & James, 2004: 289).

Land use and transport planning is managed through a ‘tri-pod’ model that interconnects the Minister with the DPI and the independent Western Australian Planning Commission (WAPC). Established under the Western Australian Planning Commission Act (1985), the responsibility of the WAPC is to guide land development in the State, coordinate aspects of the planning process and maintain the partnership between the community, business and government with particular attention given to land use planning and the implementation of strategies that guide long term growth (WAPC, 2001: 3-4). The responsibility of DPI is to advise the Minister and the WAPC on planning matters relevant to the State. This includes,

- coordination and promotion of urban, rural and regional land use planning and land development;
- advising on the administration, revision and reform of legislation; advising on the provision of infrastructure;
- assessing town planning schemes and scheme amendments;
- managing and maintaining reserved land held by the Commission under the Metropolitan Region Schemes (MRS);
- controlling development under the MRS;
- controlling subdivision under delegated authority from the Commission, and;
- reviewing the MRS (WAPC, 2001: 5).

As in Victoria, there have been a plethora of strategic plans and policies emanating from the different state agencies (Curtis, 1999). The new 2001 administration saw a move to consolidate and replace most of these with one strategic plan, the Network City (2004), produced using a deliberative democratic approach to plan-making. This plan-making process used good governance to capitalize on the divergent views prevalent in transport and land use planning by creating a plan through an inclusive process of engagement (Hartz-Karp, 2005:...
Unfortunately, this inclusive process of plan-making is not commonly practiced in Australia. Divergent views are not always encompassed in transport planning as a result.

Good governance and inclusively of the process is the key to ensuring divergent views are encompassed in planning (Healey, 1997, Irazabal, 2005). A process that engages with a wide range of stakeholders gives greater legitimacy to the decisions which is vital if plans are to be implemented (Habermas, 1984; Albrechts, 2004, 2006). Examining governance is therefore critical to understanding the key issues and barriers to the implementation of land use and transport policy in Australia (Albrechts, 2001b, 2004, Low, 2005). The following section examines the key issues raised during the transport governance forums held in Melbourne and Perth in 2008.

THE TRANSPORT GOVERNANCE FORUMS IN MELBOURNE AND PERTH

The lack of attention to governance in the transport discipline under-represents the interdisciplinary nature of transport planning. In Australia the discussion of transport governance is positioned within a pluralist context. As is typical in such contexts the agents with the greatest amount of resources and power – in transport planning, traditionally developers and automobile lobby groups – are better positioned to influence policy development (Held, 1987). When a discussion occurs on governance it is generally treated in a theoretical or abstract manner rather than as a basis from which common ground can be established amongst stakeholder groups.

Addressing the issues related to transport governance requires that a range of explorations be undertaken. These range from participation in community and professional groups to formal analysis of transport organizations and their performance in relation to governance structures. The two governance forums held in Melbourne and Perth drew upon a wide range of stakeholder actors in each area. The attempt was to create a single event that would combine a range of the required explorations to identify these issues.

Both forums followed a format which included fifteen minute key note presentations on ‘key issues’ from decision-makers. Following the key note addresses were short three-minute experienced-based presentations by decision-makers, community activists and academics on what they perceived the key issues to be. This was followed by group discussions facilitated by GAMUT staff on four key questions. GAMUT staff recorded the major points raised by each speaker. Figure 2 provides details on the knowledge interface created in the forums, with particulars of the questions dealt with in the break out sessions, and summaries of the plenary sessions, and experienced based presentations. The forums differed slightly in focus due to the differing contexts in Melbourne and Perth. Participants were encouraged to offer their own views on the key issues and to provide critical reflection through the break out sessions.
## Knowledge Interface in Governance Forums

### Presentations by Key Note Speakers (15 mins each)

**Melbourne:**
- The ‘Better Cities’ Program, National Government involvement in transport governance
- Governance needs for a transport network
- Integration is not just a matter of Institutional structure
- Pending National Government involvement in infrastructure planning

**Perth:**
- National Government involvement in transport governance
- Governance needs for a transport network
- Integration is not just a matter of Institutional structure
- Pending National Government involvement in infrastructure planning

### Experienced Based Presentations (3 mins each)

**Melbourne**
- A new model of community engagement which values evidence based input from the community is needed.
- Melbourne needs a vision with long term focus, and a Melbourne wide agency to deliver it.
- Problems with rail are causing congestion, the cause is lack of management rather than infrastructure.
- Need a clear, achievable and measurable transport policy.

**Perth**
- Perth has a highly effective public transport system but it is missing integration with land use planning.
- A shift from private vehicles to public transport will require dealing with inertia built into the transport system and processes to support innovation.
- Transport and land use integration and implementation of Network City require all players State and Local to integrate.

### Break out discussion groups (1 hr+)

**Questions:**

**Melbourne**
- What do you see as the key issues surrounding governance for transport infrastructure?
- How can we overcome the key issues preventing good governance for transport infrastructure?
- What can we all do in the future to help overcome the barriers?

**Perth**
- What do you see as the key issues surrounding governance for transport and land use integration?
- What are the strengths and weaknesses of current arrangements for infrastructure governance in WA?
- Do any of the recent developments in the environment for infrastructure investment require new arrangement?
- What can we all do in the future to ensure good governance in transport and land use integration in WA continues to develop?

### Summary of Points

**Melbourne**
- The issue is to integrate policy outcomes rather than the Department.
- For road builder it is about reducing congestion.

**Perth**
- Need structure plans to underpin strategic plan.

### Knowledge Interface in Governance Forums

Following the events, a draft report containing a summary of the presentations and group discussions was circulated to the participants for comment, with the final text being published as GAMUT reports (Curtis, et al, 2008; Legacy, et al, 2009).

![Figure 2: Knowledge interface among participants](image-url)
KEY GOVERNANCE ISSUES IN PERTH AND MELBOURNE

The responses by the participants at the two forums to the discussion questions above were categorized under three headings: key issues, barriers, and solutions. These contributions were then further analysed as either related to community, planning process, finance/resources, institutional structure, types of practice and professional expertise. The results revealed that the weight of opinion offered by forum participants in both cities focused more on the question of issues than on barriers. This could be explained by the short time available to work through all four questions; therefore priority had to be given to some. In terms of implementing the practice of land use and transport planning integration, the findings offered several avenues for solutions, each of them highly context dependent.

Issues common to both Fora

The common issues identified by participants at both forums included the lack of funding and resources given to sustainable transport and the fragmentation of service delivery and transport governance within government. The proposition was put forth that greater allocation of money and staff resources needed to be given to the delivery of adequate public transport services. Participants perceived part of the problem of transport governance having to do with the distribution of resources between road infrastructure, public transport and active transport. This corroborates the view that the federal government’s involvement in transport, and focus on road development has effected the development of transport across Australia.

Interestingly, participants at both the Melbourne and Perth forums identified the lack of transport and land use integration as issues of concern. The challenge associated with integrating land use and transport in Melbourne has been perceived as an issue of organizational fragmentation because land use and transport exist as separate departments with different Ministers. Conversely DPI in Western Australia administratively integrates transport and land use under one Minister, and yet participants indicated that the delivery of land use and transport planning integration remains problematic. Some suggested that working practices remained fragmented, referring to silos, but this was now simply hidden under the overarching organisational structure. Many participants pointed out that the integration of the department had shifted focus to the administrative integration of land use and transport planning, to the detriment of the implementation of integrated land use and transport policies and developments.

Solutions – Organisational structure

The forum discussion on what can be done about these issues produced interesting results. In Melbourne, it was generally agreed that the issue of government fragmentation and land use-transport integration could be addressed by conducting institutional consolidation of land use and transport planning into a single agency. Western Australia participants argued that they had already achieved this institutional consolidation and instead argued that they could best address issues of fragmentation and integration by giving more attention to substantive planning outcomes and the process involved in delivering this outcome. Rather than getting the organizational structure right, focus should be given to ensuring the delivery of a desired outcome. The participants in Perth argued that processes of communication and relationships between land use and transport planners and agents is what matters in the delivery of outcomes. It was mooted that no one organizational structure had proven most effective at delivering land use and transport integration. There are instead a range of structures that are capable of delivering this mandate.
Solutions - Vision versus Demonstration projects

There was significant contrast between Melbourne and Perth regarding the role of visioning or big picture planning in creating land use and transport integration. Some participants at the Perth forum suggested that ‘big’ picture planning is required. This included thinking about the vulnerability of the outer suburban regions to an increase in oil price and the impacts associated with climate change that will ensue on the city structure. The point was made that although Network City dealt with some of these things; it has not been operationalised through the WAPC and the Metropolitan Region [planning] Scheme. Conversely, Melbourne participants shied away from this idea of a big picture operational plan. Rather, an ‘operational vision’ was suggested for Melbourne. This operational vision would identify the current functioning of the city including the particulars of its inefficiencies and what would need to be improved. It was posited at the Melbourne forum that the metropolitan region of Melbourne needs a metropolitan wide planning authority. The fragmentation amongst the municipalities requires a WAPC or Brisbane City Council type model to intervene, since this offers the possibility of regional strategic planning. The discussion was about a bigger picture plan but not at the level of a strategic vision. The focus was on the implementation level.

The focus for the participants at the Perth forum was to address the issue of fragmentation by adopting a vision that would guide integrated decision-making. Whereas in Melbourne it was argued that the big picture planning process (e.g. Melbourne 2030) has proven in the past to be unsuccessful at delivering substantive change (e.g. activity centres). As a result, participants at the Melbourne forum were interested in ideas such as demonstration projects that illustrate the kind of change that are possible. Participants argued for a real-life working example, rather than further articulation or attempts to enrol people in visions.

Solutions – Transparency and Community engagement

The governance forum in Melbourne occurred several months after the release of the East West Link Needs Assessment (DoT, 2008) which proposed two controversial infrastructure projects – a road tunnel under the CBD of Melbourne and a rail tunnel that would provide the foundation for a possible Metro system. This was a controversial document for several reasons. Firstly, the cost associated with delivering such projects was extremely high and as a result would potentially exhaust financial resources for other ‘big’ infrastructure projects that are needed. And secondly, the appropriateness of the Terms of Reference was criticized publicly as being ‘misguided’ and narrow compared to the magnitude of the transport issues faced in Melbourne (Millar and Lucas, The Age, 15 March 2008), and was structured to exclude many higher rate of return projects, and even so, with a very poor cost benefit ratio. In response to the development of this plan and others from the past, what was articulated strongly at the Melbourne forum was a lack of transparency and community engagement in decision-making. The suggestion was put forth, therefore, to establish ‘knowledge networks’ that would create bridges across sectors in the community that collaborate on the development of policy. This would enable more access points for the community to engage with the process of policy development. It is perhaps indicative of the relative success of the consultative nature of Network City that this issue did not emerge strongly in WA.
CONCLUSION

The two forums revealed several key social and institutional differences between the two cities which consequently support quite different systems of governance. For instance, the discussion which manifested at the Perth forum revealed a strong perception of a system of regional planning control. It was also suggested that Perth had already achieved an integrated institutional structure through the 2001 DPI amalgamation. Melbourne, however, exhibited neither regional planning control, nor integrated institutional structures. One of the key institutions ‘missing’ from the landscape in Melbourne is an independent regional planning body such as WAPC to help facilitate decision-making and implementation.

Despite the integration of land use and transport under one portfolio, Perth continues to identify issues of fragmentation. The issues experienced in Perth suggest that there is fragmentation which inhibits the implementation of land use and transport integration policies. The Perth forum revealed that the lack of substantive integration is a result of a breakdown in procedural governance within the DPI portfolio. In light of Perth’s experience, it is worrying that some academics and community based organizations in Melbourne articulate the aspiration that integration of land use and transport could be best achieved by reorganizing the Department of Transport and the Department of Planning and Community Development under one portfolio similar to that of DPI in Perth. The perceived fragmentation of policy in Perth suggests that the organizational restructuring of interest to people in Melbourne may be problematic and that further examination needs to be undertaken. This examination should address the procedural governance issues related to the implementation of land use and transport integration policies within and between these departmental structures.

The metropolitan strategies in these two cities play a crucial role in helping to guide decision-making on infrastructure investment. Both Perth and Melbourne have recently developed metropolitan strategic plans. What sets these two plans apart however is the distinctly different processes adopted to create these plans. Perth’s Network City was developed through an inclusive and deliberative process of stakeholder engagement. This process has been highly regarded by the Planning Institute of Australia (PIA) as an exemplary process in community engagement (PIA, 2005). It was ostensibly more transparent and inclusive of a wider range of stakeholder actors than the process undertaken to develop the Melbourne 2030 strategy. It is not a great surprise therefore that participants at the Perth forum did not weigh community engagement as a key issue to the same extent as Melbourne’s participants.

Even though Perth has a broad-based plan, participants at the Perth forum indicated an interest in operationalising a ‘big’ picture vision for the region through their Metropolitan Region Scheme. Interestingly in Melbourne, participants of the forum were not as interested in a ‘big’ picture vision as they were in operational examples. What operational examples entail is practical on the ground measures, illustrating the appropriateness of certain policies through the assessment of the particulars around its implementation. Possibly this interest is a result of Melbourne not having a metropolitan-wide planning scheme through which a strategic plan could be operationalised. These operational examples would show what works and what does not work by actually implementing demonstration projects which illustrate, for instance, the time shares, the emission reductions, etc of particular land use and transport integration policies.

In conclusion, this paper has illustrated that two distinct governance frameworks are in operation in Melbourne and Perth. Organizational integration of land use and transport (e.g.
Perth’s DPI does not necessarily mean that implementation of this integration is more likely to occur. What this paper reveals is that procedural issues related to governance require further examination to better understand how to enable the implementation of land use and transport integration. This paper also illustrates that the wide range of participants in each city shows that any real convergence of perspectives on governance is still a long way from being achieved, and the integration of contestable evidence based analytical frameworks (e.g. open models of the system under question) have yet to make their appearance in such a fora. The governance issues associated with transport and planning where the diversity of professional skills now actively engaged still has some way to go in both venues.
References

ABS (2009a). *Engineering and Construction Activity*, Canberra, cat. no. 8762.0