

Research Paper:

Balancing Liveability and Growth in Melbourne

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Part 1: Introduction: City-level challenge and context

This report outlines the defining urban challenge for Melbourne - to maintain its liveability and competitive advantages in the face of unprecedented population growth – and the implications of this challenge for professional urban practice.

The effects of growth and development on liveability (The Economist Intelligence Unit, 2016), are attracting increasing attention and concern.

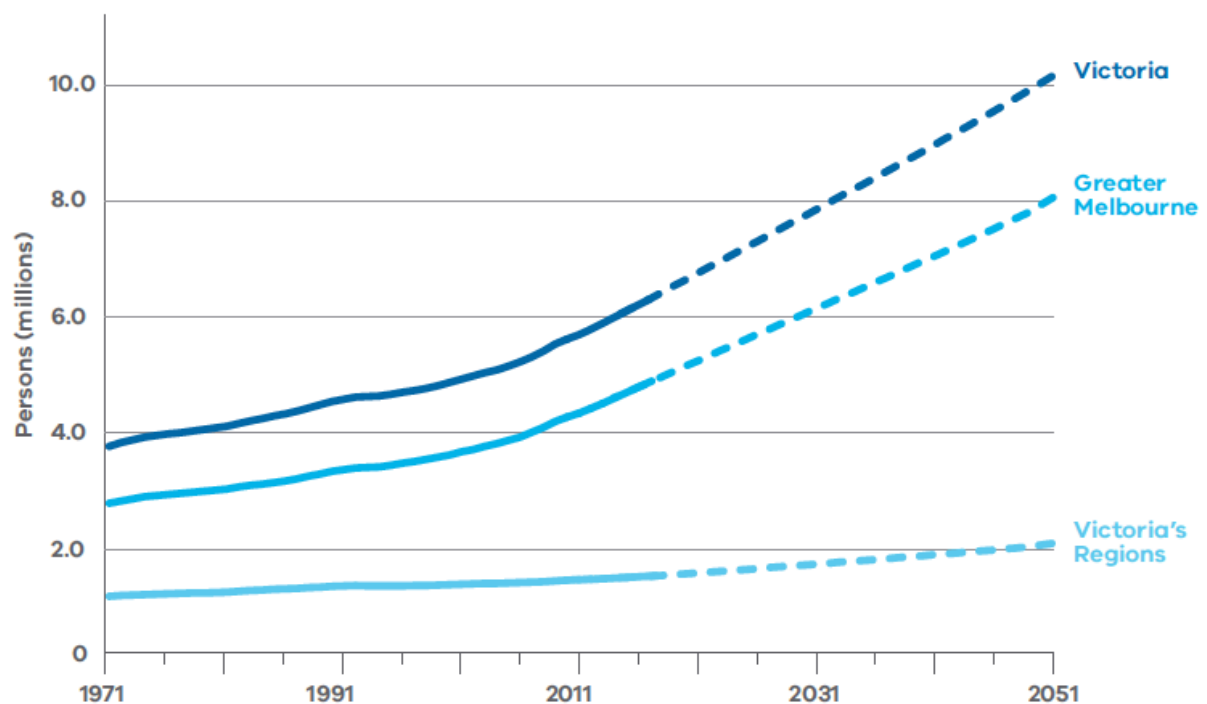


Figure 1: Estimated Resident Population, Victoria and major regions 1971 to 2051 (Victoria State Government, 2016). This graph shows Greater Melbourne's increasing rate of population growth, from approximately 5 million in 2016, to the projected 8 million people by 2051.

This growth is manifest in three contexts, with particular challenges, which form a framework for this Report.

Context 1: Inner city: Increasing high-rise residential development, significant foreign investment.

Challenges: Public realm impacts; limited housing diversity; poor internal amenity; prevalence of investor (rental) stock.

Context 2: Middle-suburbs: Brownfield redevelopment; development in established activity centres.

Challenges: Residential zoning pushing development to inner and outer areas; heritage and amenity controls, and resident action constrains development/density; increasing pressure on brownfield sites.

Context 3: Outer growth areas

Characteristics: Low-density development with expansive land supply; strong developer/purchaser market.

Challenges: Poor transport/service levels; traffic congestion; significant social problems; lack of housing diversity or adaptability (Kelly & Breadon, 2012).

The defining risk is an increasingly unequal city, where quality of life is available to an ever reducing proportion of the city. Melbourne needs to plan for social ‘convergence’, and ‘closing the exclusion gap’ (Jowell, 2016).

It is the central premise of this report that to continue current modes of development risks Melbourne’s liveability, in the outer areas, and across inner city and established suburbs, and that urban practitioners have an essential role in driving transformational change, by leveraging emerging government actions.

Part 2a: Evidence: Growth and risks to liveability

Growth is concentrated in unsustainable suburban development. Six (6) of the 10 fastest growing suburbs in Australia are in Melbourne's outer growth areas (Lucas & Robb, Australia's fastest growing suburbs are on city fringes, new figures show, 2016). 49% of Melbourne's population increase will be in the growth areas (Victoria State Government, 2016).

Growth Area density is too low to support liveability. The target is 15 dwellings per hectare (Growth Areas Authority, 2013). The London Plan establishes density ranges for Suburban locations between 35-55, and 70-130 units per hectare (Mayor of London, 2016).

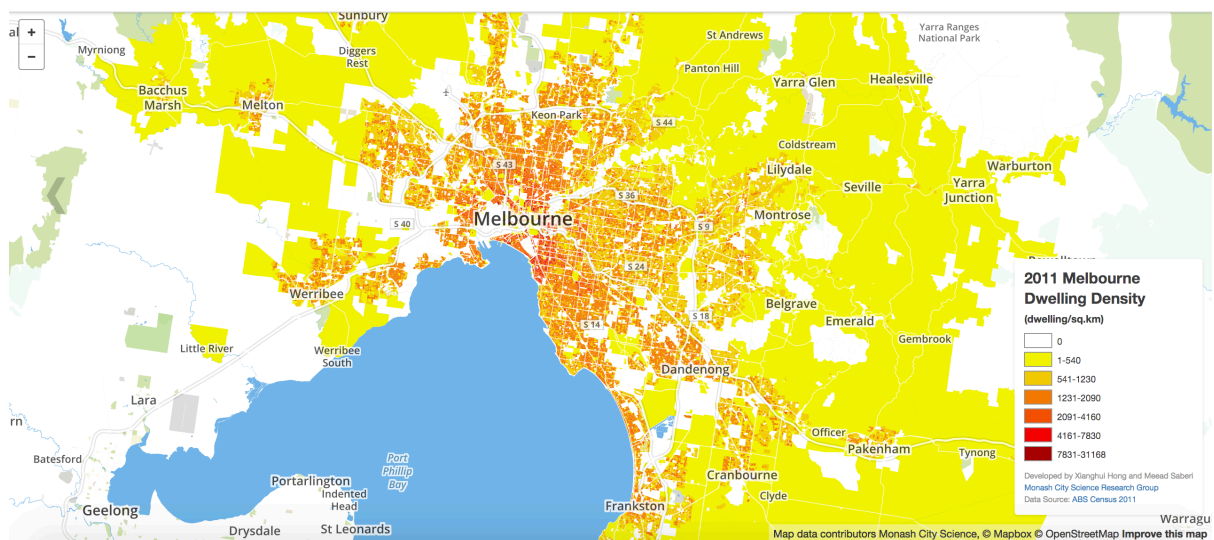


Figure 2: Melbourne Housing Density Map (Greater Melbourne area). (Monash University: City Science, n.d.). The density variation is exponential across the city.

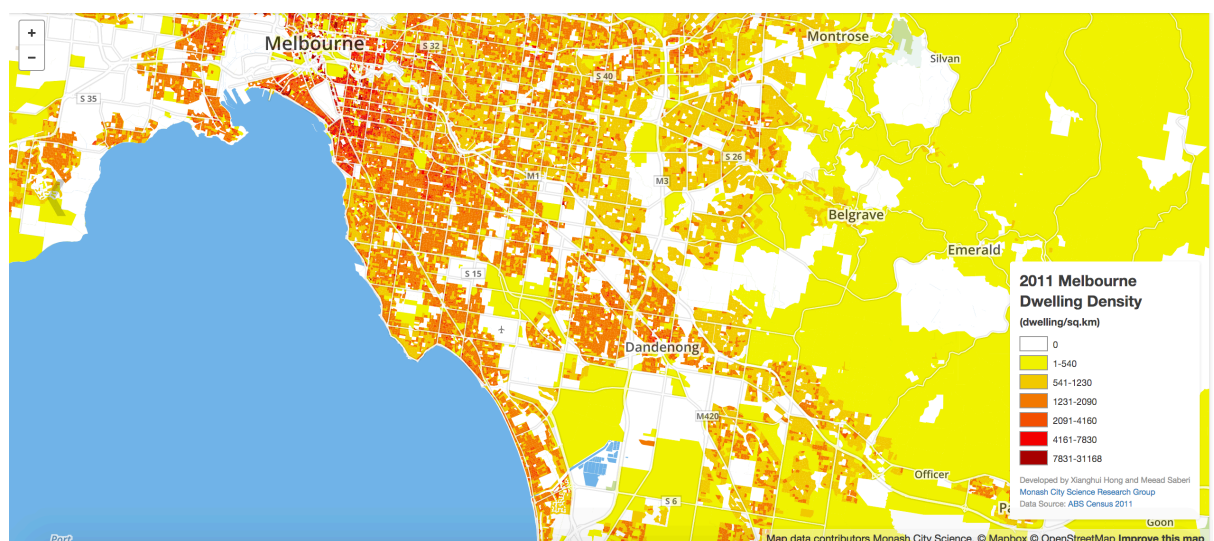


Figure 3: Melbourne Housing Density Map (south-east) (Monash University: City Science, n.d.). Densities in inner suburbs are approximately 5-10 times greater than in outer growth areas.

Densities are too high in the CBD. *‘The densities of some Melbourne developments are in excess of 5000 dwellings per hectare... ten times the densities allowed in London’* (City of Melbourne, 2015). The **London Plan** recommends density ranges for Central locations between 35-80, and 215-405 units per hectare (Mayor of London, 2016).

Some parts of Melbourne are highly liveable, other parts are not. The outer suburbs experience significantly reduced liveability standards, particularly in accessibility to employment and services.

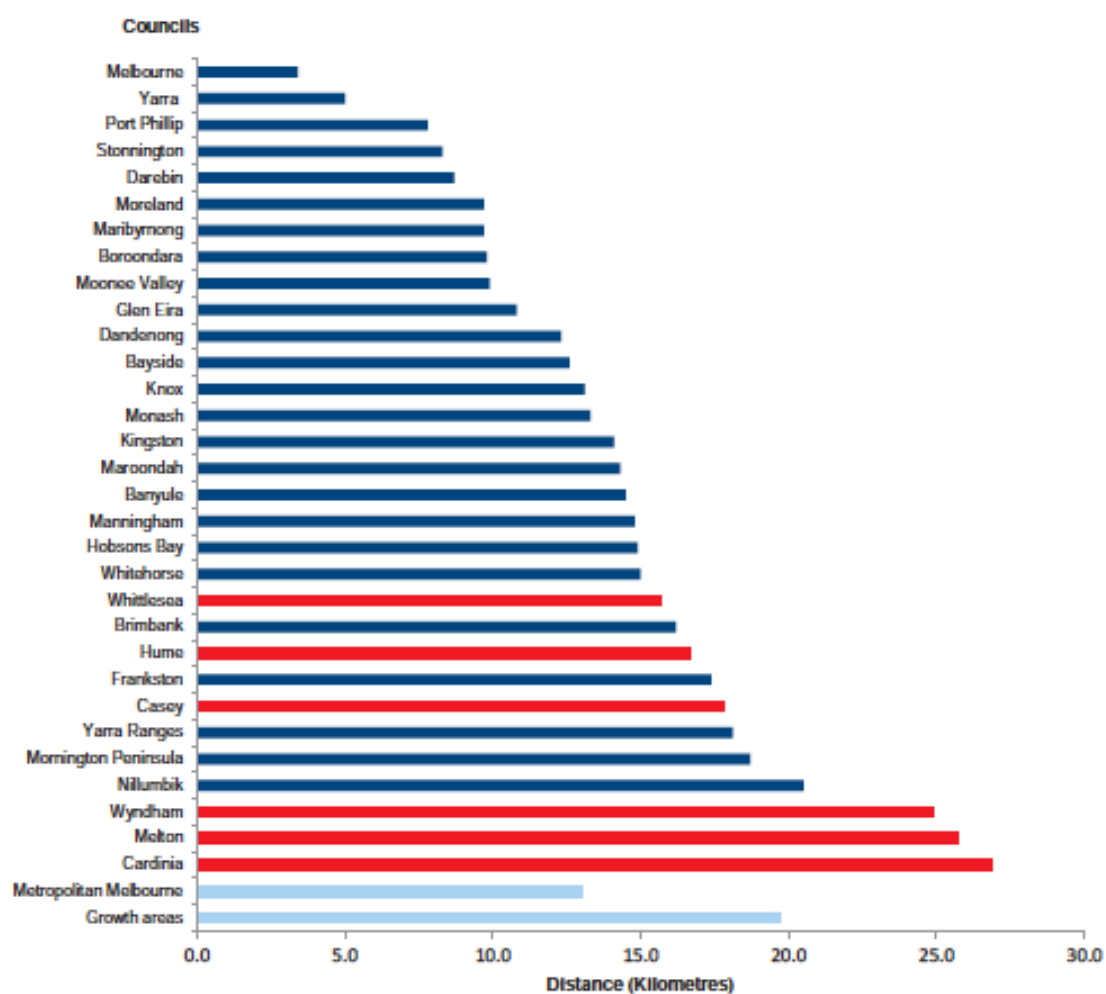


Figure 4: Median distance travelled for residents' journey to work across Melbourne 2009-10, with growth areas in red (Victorian Auditor General, 2013)

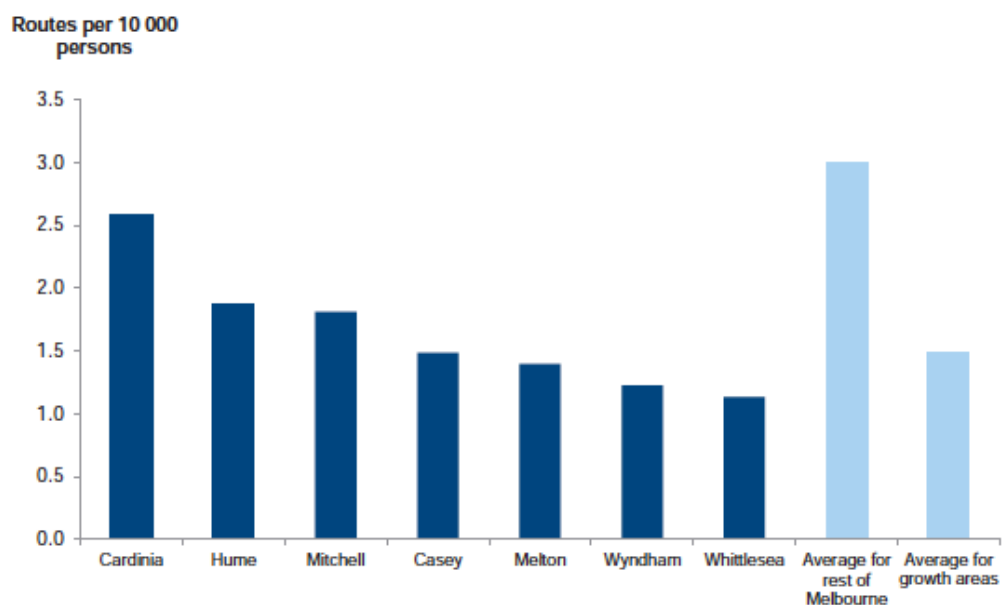


Figure 5: Access to public transport in Melbourne's growth areas, relative to Melbourne average (Victorian Auditor General, 2013)

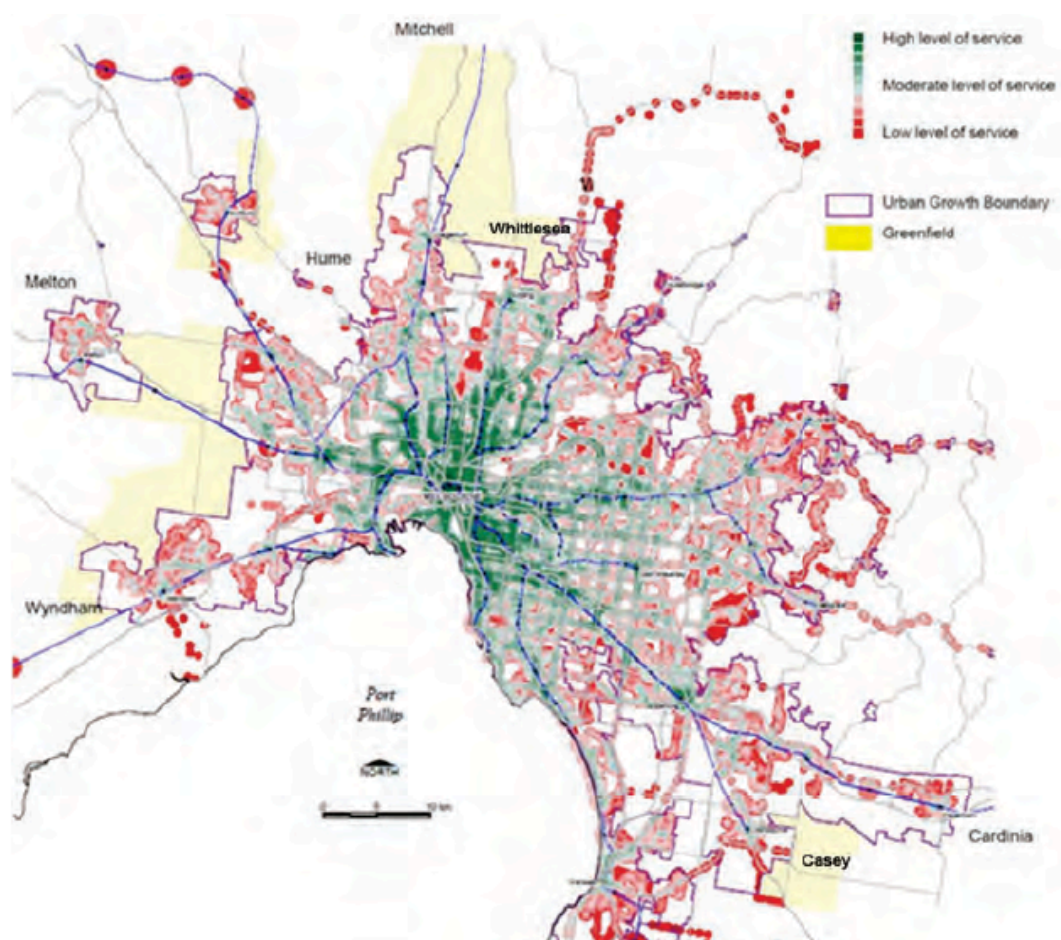


Figure 6: Public transport service levels, Melbourne (Victorian Auditor General, 2013). Red areas indicate low levels of service in outer/growth areas.

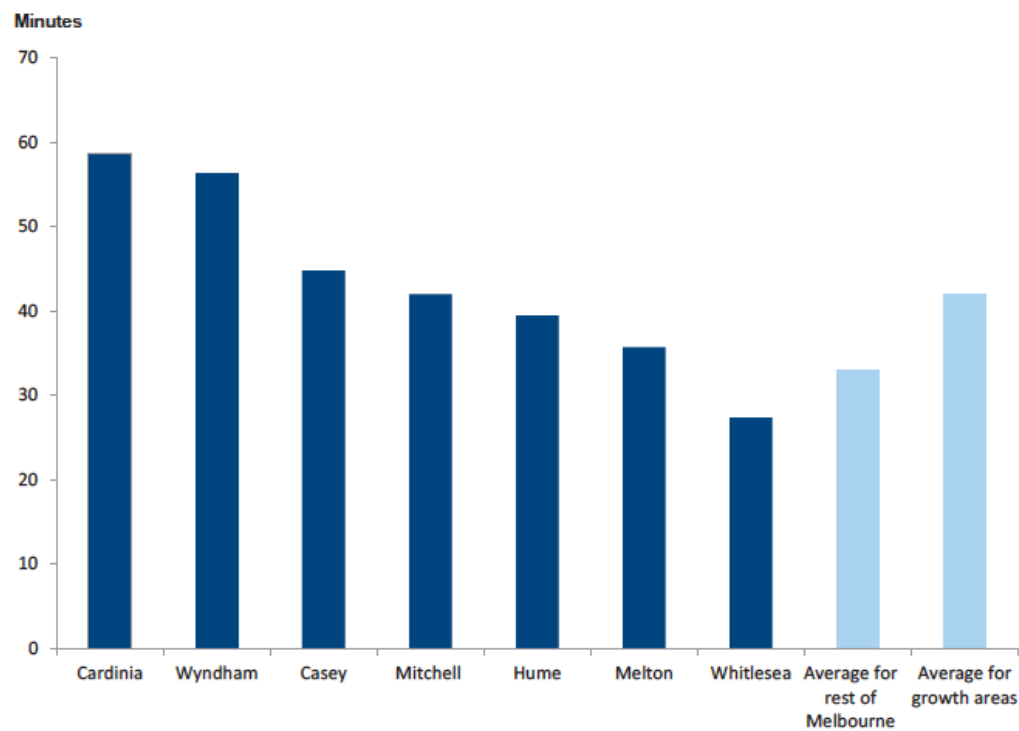


Figure 7: Average service frequency of peak bus services, in Melbourne’s growth areas, relative to Melbourne average (Victorian Auditor General, 2013)

As a result of this growth and established development patterns, Melbourne risks increasing socio-economic disparity. Housing affordability in Melbourne is a significant challenge. Even for established families, purchasing a house anywhere except the outer suburbs may be unaffordable. Failure to purchase a home is likely to lead to impoverishment in later life (Robb, 2016).

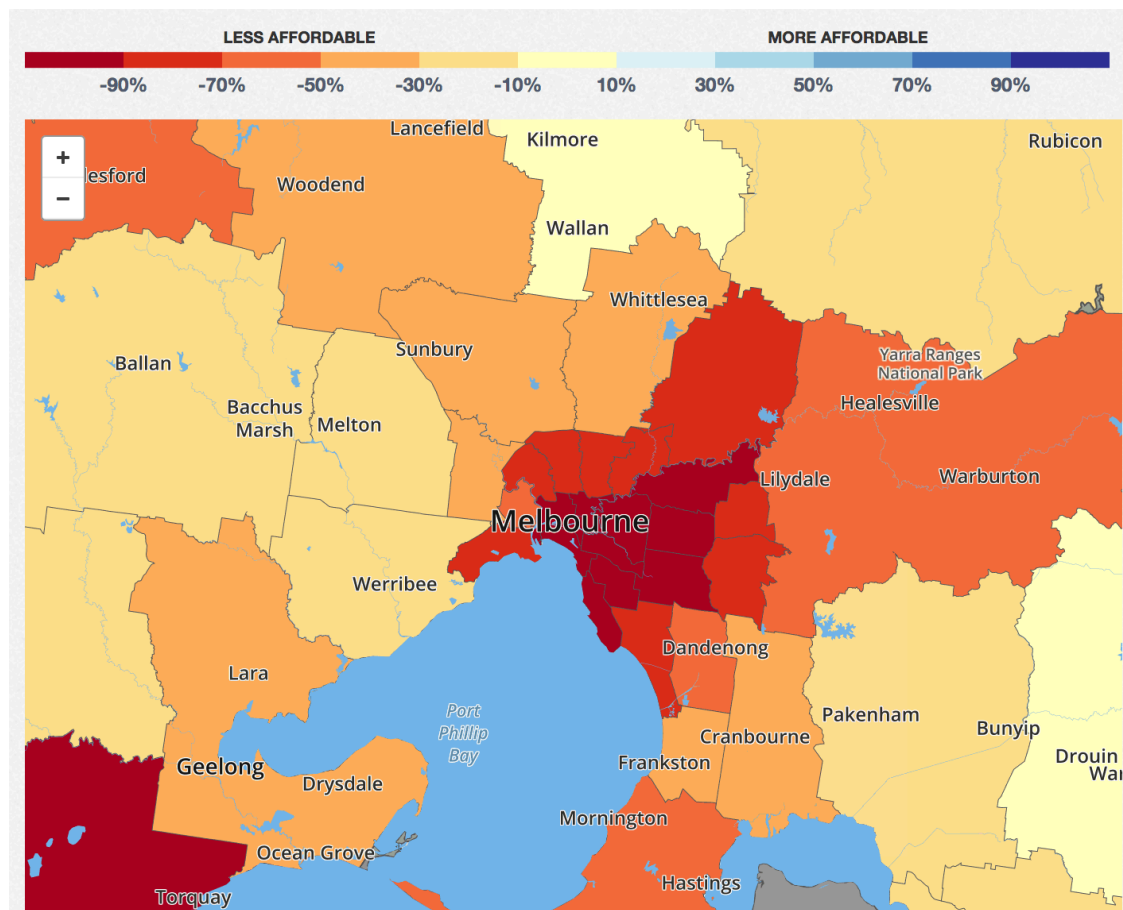


Figure 8: Monetary gap (%) between the average earnings and the estimated minimum earnings required to purchase the median priced home or unit in their LGA: **Young (25-34), single, unit** (MacLeod, 2015). The outer growth areas include Cranbourne, Pakenham, Whittlesea, Hume/Sunbury, Melton and Werribee,

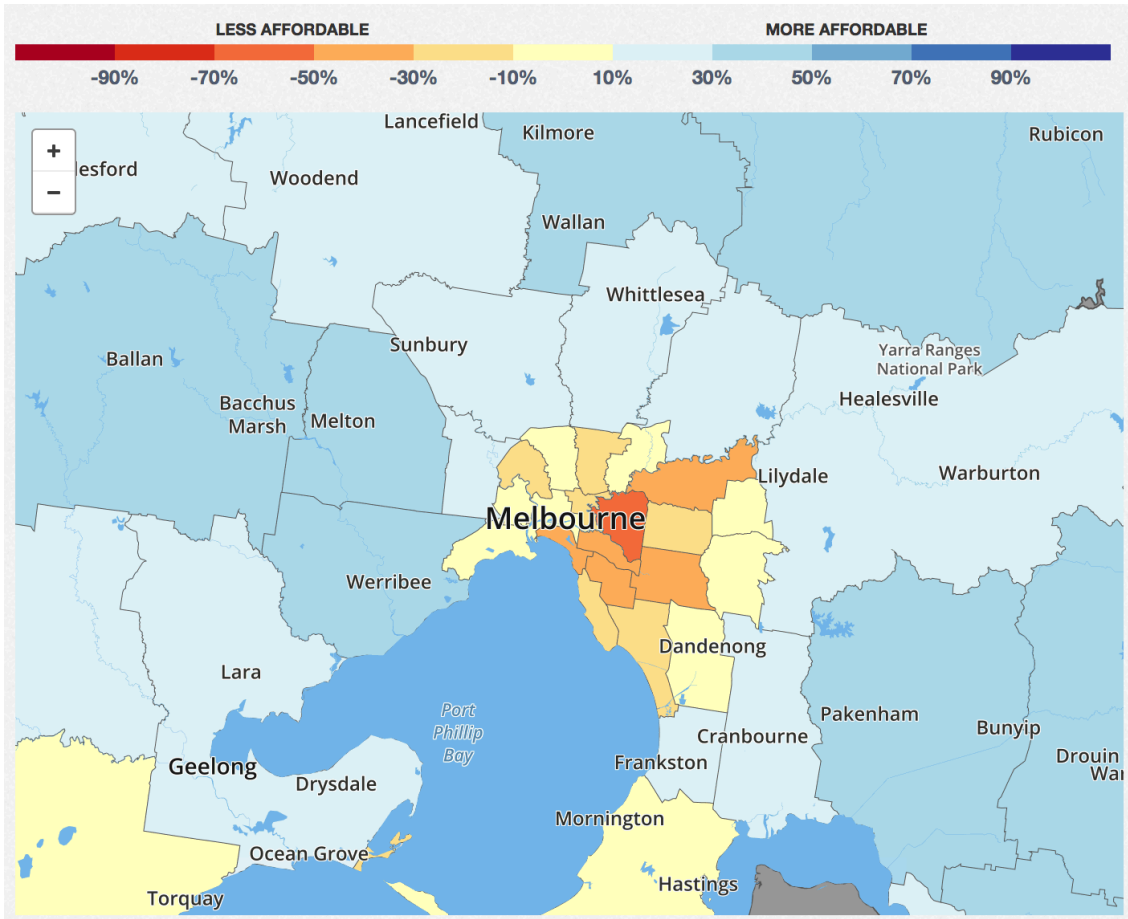


Figure 9: **Older (35-44), couple, house** (MacLeod, 2015). As shown, generally only the outer growth areas are affordable, even for established double-income households.

As people are ‘pushed’ further outwards, in Australia’s knowledge-based city economies, jobs are increasingly centralised:

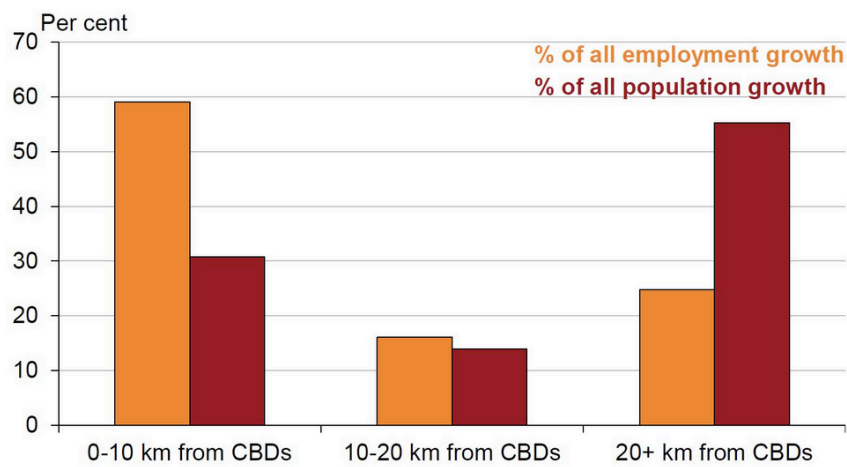


Figure 10: Geographic distribution of employment growth and population growth, Sydney, Melbourne, Brisbane, Perth and Adelaide combined 2006-11 (Lucas, 2015)

Increasing separation between homes and jobs, limited transport infrastructure and increased congestion, are exacerbating Melbourne's liveability challenges.

Disadvantage and risk is concentrated on Melbourne's 'affordable fringes'. A critical review posits *'the state has failed to deliver the infrastructure and services required to support rapidly growing communities... This risks the future liveability of metropolitan Melbourne... Urgent action is required'* (Victorian Auditor General, 2013).

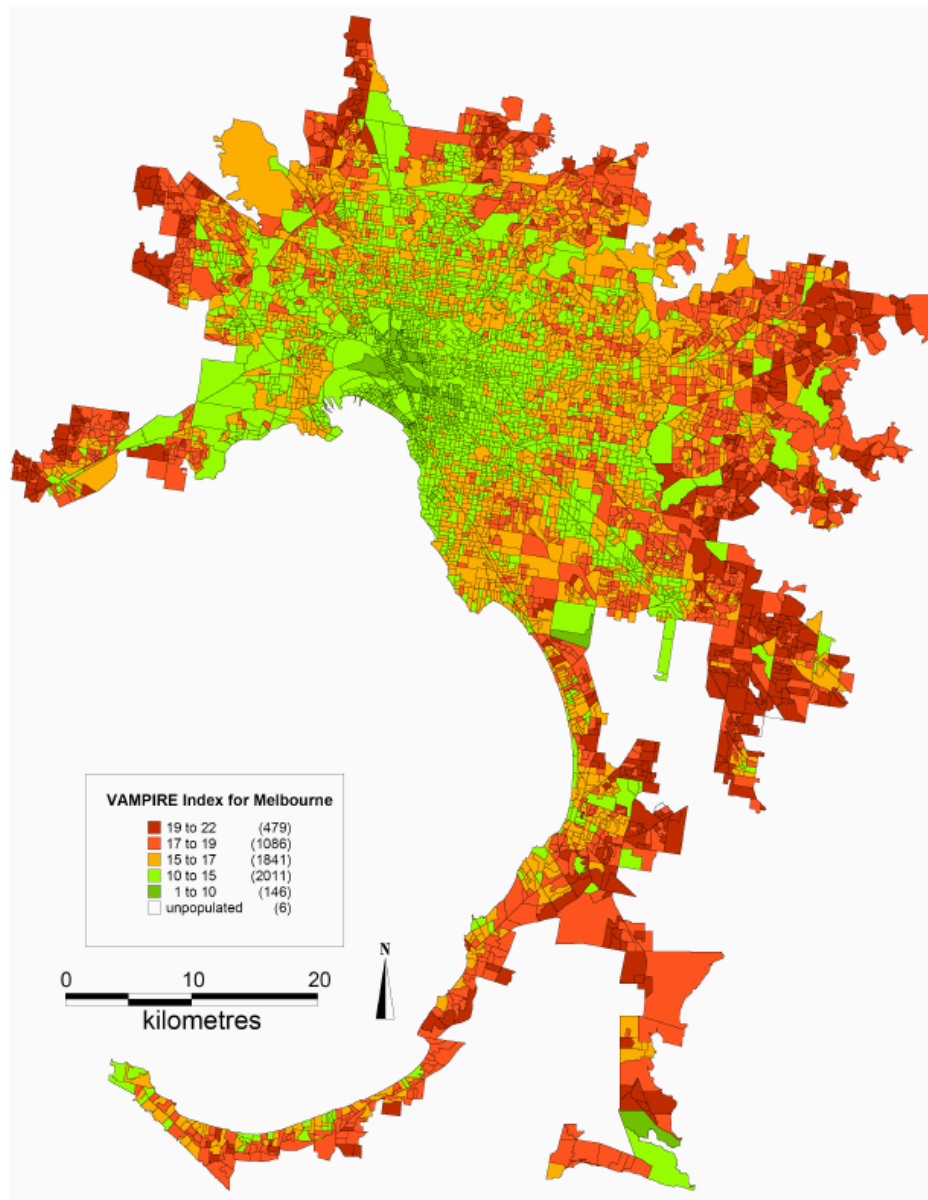


Figure 11: VAMPIRE Index map for Melbourne (vulnerability assessment for mortgage, petrol and inflation). The VAMPIRE study *reflects on the capacity of existing urban structures and transport systems to accommodate behavioural responses to rising fuel costs and changing household financial pressures* (Dodson & Sipe, 2006)

Former growth suburbs are in decline, being bypassed by growth and investment. Locational disadvantage is entrenched and prominent around established outer urban hubs and new growth areas.

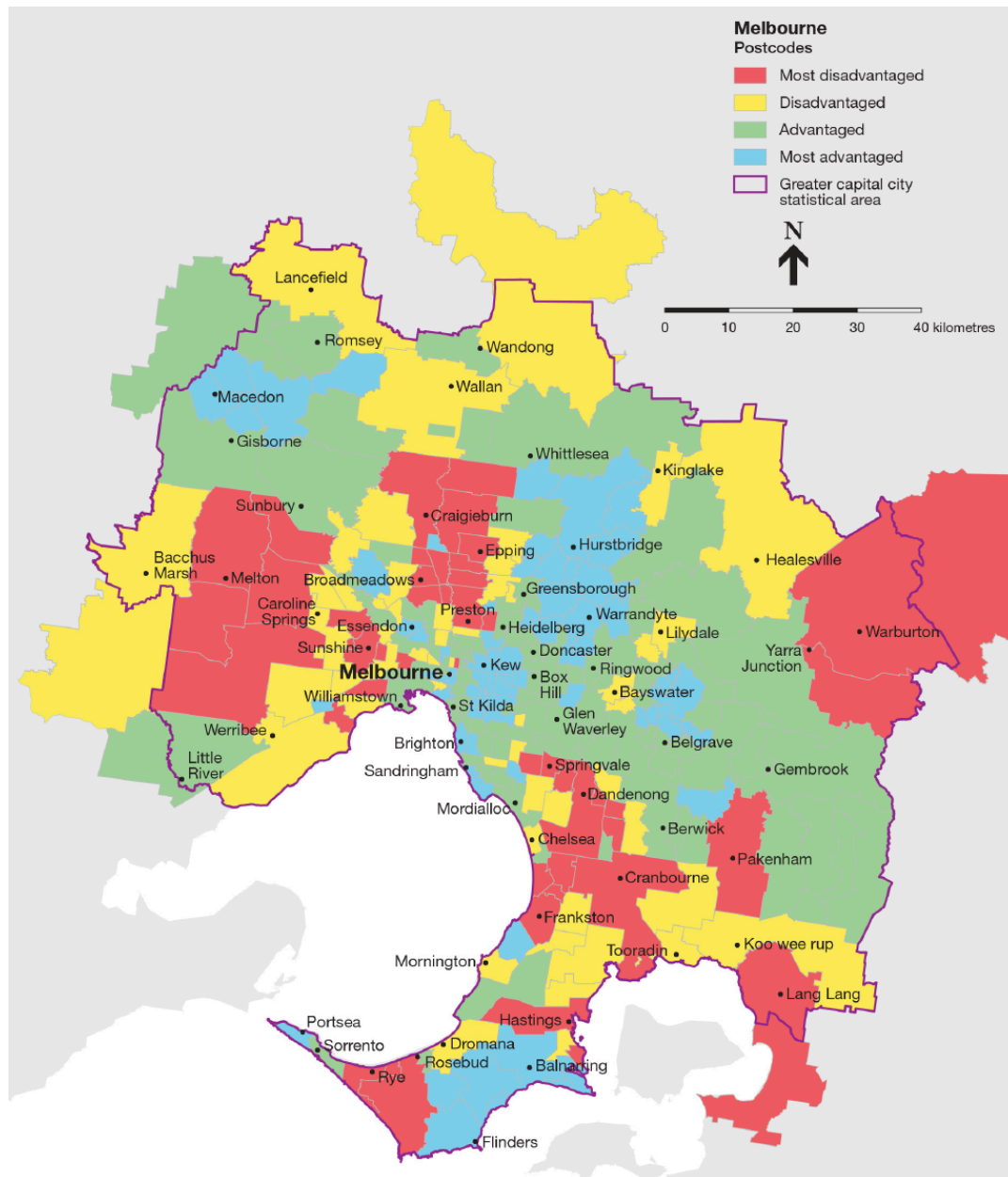


Figure 12: Relative disadvantage in Melbourne (Jesuit Social Services / Catholic Social Services Australia, 2015)

In summary, Melbourne's growth patterns are contributing to an increasingly unequal city. Strong action is required to maintain and more fairly distribute the city's established liveability standards.

Part 2b: Comparatives: Foundations and influences

While it is beyond the scope of this report to compare cities in detail, London and Vancouver present relevant foundational comparisons:

Foreign property investment:

Vancouver (Collinson, 2016).

London (Sassen, 2016).

Housing supply and affordability:

London (Radcliffe, 2016).

Infrastructure provision: (Level Crossing Removal Authority, 2016) (Melbourne Metro Rail Authority, 2016).

London (PricewaterhouseCoopers LLP, 2014).

Development types, density and design quality: (City of Melbourne, 2015)

London (Mayor of London, 2016).

Vancouver (Langdon, 2011).

Urban form and health:

London (Stevenson, 2016)

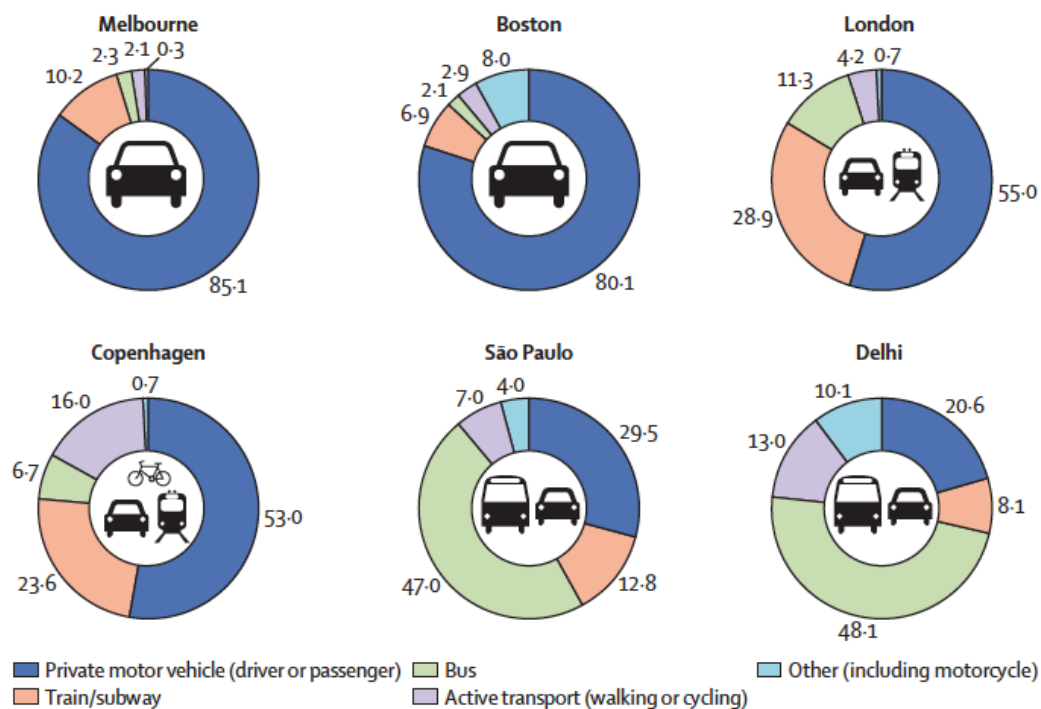


Figure 13: Percentage of vehicle kilometres travelled in Melbourne, London and other cities (Stevenson, 2016).

Knowledge economy: (Plan Melbourne Ministerial Advisory Committee, 2015)
(Davies, 2016)

International education: (Deloitte Access Economics, 2015).

Part 2c: Evidence: Emerging actions

Melbourne must distribute liveability more fairly, as growth continues, to avoid reduced liveability in high-amenity areas. The foundations of this will include:

- Increased housing supply and affordability;
- Greater dispersal of high-value jobs;
- Improved infrastructure and accessibility across the city.

While a number of important initiatives are underway to address these issues and challenges, underlying cultural and political forces may prevent the city leveraging optimal value from these initiatives.

This report considers the efficacy of selected existing/current initiatives (below), in supporting liveability under rapid growth, and the resultant urban development opportunities for professional urban practice.

Context 1: Inner city

- Policy directions to limit development density;
- Increasing awareness of poor quality housing;
- New guidelines for apartment design (Victoria State Government, 2016);
- Increased taxation on foreign investment (Wen & Johanson, 2016);
- Government investment in major urban renewal projects.

Context 2: Middle-suburbs

- Focus on activity centres and commercial zones for development;
- Zoning to 'protect' existing suburbs;
- Distributed rail infrastructure investment (Level Crossing Removal Authority, 2016);



Figure 14: Map of current and planned Level Crossing Removals (Level Crossing Removal Authority, 2016). The highly populated south-east corridors incorporate extensive works.

Context 3: Outer growth areas

- Increasing awareness of previous failures;
- Policy directions to increase densities;
- Increased focus on public transport infrastructure;
- Emerging examples of more compact housing.

These emerging actions provide a foundation for effective urban practice in Melbourne, including potential to influence and inform their implementation.

Part 3: Urban consulting practice in Melbourne

The author established a successful (affiliated) urban practice in 2007, building a significant professional reputation, before recently departing.

There is potential to influence and drive new approaches through effective urban practice, and the urban/design role is increasingly recognised. This is demonstrated by previous 'highlight' projects:

Context 1:

Apartment developments, CBD / inner urban

Services: Design advice, Urban Design Reports, Expert Witness.

Status: Detailed Design / Complete.

The author encouraged and informed a mixed-use, 'vertical neighbourhood' design approaches, integrating various communal facilities and a new pedestrian street.

Relevance to the defining city challenge:

Enhanced design, liveability, community and public outcomes, achieved through commercial, developer-driven projects.



Figure 15: Public space and linkage, inner urban apartment development.

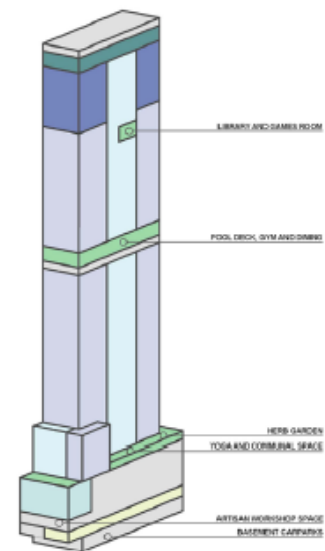


Figure 16: Vertical neighbourhood concept, CBD (Image source: Plus Architecture).



Figure 17: New pedestrian street and River linkage, inner urban apartment development (Image source: Google Maps).

Context 2:

Master Plan, Wellness Village, 4ha

Lead master planner, workshop facilitator.

Early detailed design.

Research and intensive multi-stakeholder design workshop, innovative plan for health-integrated development.

Relevance:

Enhanced design and public outcomes, new public 'heart' for declining former growth suburb.



Figure 18: Wellness Village Master Plan.

Context 3:**Master Plans, 115ha precinct / 12ha town centre***Lead planner**On hold / Detailed Master Planning*

Preparation of aspirational, high-density, mixed-use sustainable suburb and town centre in outer growth area, around proposed train stations.

Relevance:

Planning for 'urban' outcomes in fringe locations, optimising infrastructure.

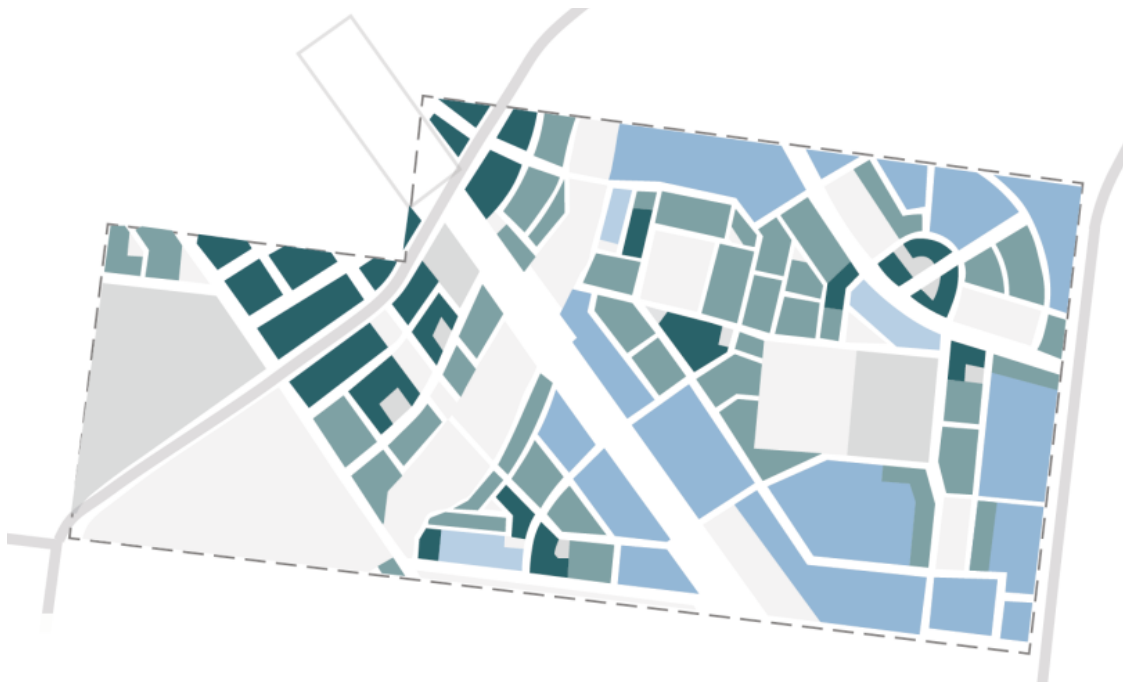


Figure 19: Precinct master plan: housing diversity (three blue/green shades represent prevailing apartments (dark), attached terrace/townhouses (medium) and detached houses (light)).

Professional involvement context:

Research partnership projects, including development of a prototype housing choice 'app'.

Design Review Panels for Victoria and South Australia.

Board Memberships: National Urban Design Protocol, Melbourne University Urban Design.

Relevance:

Contributions to policy, design quality, and thought leadership on current issues.

Professional experience provides valuable learnings for future directions. There is significant work underway that the author is not involved in: Melbourne Metro Rail, Level Crossing Removal projects, leading development precincts with major developers.

The rationale for departing that company, and forming a new urban practice, is therefore seeking:

- Bigger, more significant projects and greater influence, with longer-term involvement;
- More time to learn, research, innovate and lead;
- Continued diverse professional activity, with less financial pressure;
- Full independence and flexibility to collaborate, without specific affiliations;
- To avoid less rewarding projects and project types, and non-aligned clients;
- Projects for communities and disadvantaged areas, which are highly rewarding personally;
- To leverage the development sector itself, which is highly unequal and polarised, with huge investment in some locations, and very little in others.

Part 4: Future practice

Developing an effective new business requires clear focus. The above considerations lead to key directions for this practice:

- **Direction A:** Larger, more strategic, significant and beneficial projects, and design-lead roles.
- **Direction B:** Collaborative and cross-disciplinary basis;
- **Direction C:** Research and knowledge-building focus;
- **Direction D:** Giving back, through work in locations where need is greater.

This focus requires understanding current readiness for the Directions:

Strengths

- Urban Design inputs increasingly recognised and valued;
- Demonstrated project experience;
- Personal professional recognition, broad connections;
- Established reputation with authorities, creating potential links with developers;
- Research background in housing and density.

Weaknesses

- Limited applied experience in growth areas;
- Limited established relationships with major developers;
- Projects generally architect-led, with urban inputs secondary;
- Urban Design involvement generally short term, to Planning Permit.

Opportunities

Direction A:

- Leverage market expectations and planning controls, demanding better outcomes;
- Link better design with smoother project/permit process for developer benefit;
- Focus design on nodes/centres and clusters, and protecting opportunity for higher density development in longer term;
- Longer-term project involvement through Master Plan projects;
- Establish major developer links and relationships through engagement, research, publishing.

Direction B:

- Build on existing links with economists, transport, infrastructure and social planners;
- Create links through joint research;
- Develop rapid design/collaboration techniques;
- Involve clients/authorities directly.

Direction C:

- Re-position affordable housing, to affordable living;
- Ongoing/potential academic research partnerships;
- Demonstration design projects, e.g. model suburb around transport node;
- Demonstrating potentials and benefits of intensive nodal redevelopment;
- Investigate high-rise vs. mid-rise typologies;
- Work with think tanks, consulting firms to combine research and consulting;
- Publishing, speaking, media.

Direction D:

- Participate in lower-value locations, demonstrate commitment and depth;
- Redirect fees from inner city projects, into lower-value locations;
- Leverage benefit for practice, and declining places;
- Transformative change in established/well-served, but underdeveloped, urban centres.

Threats

- Entrenched approaches, short term mindset (outer);
- Developer focus on maximising height (inner);
- Commercial interests predominate;
- Inexperienced developers and architects (middle);
- Idealism/advocacy can constrain business;
- Restricting sprawl is seen to constrain affordability (outer);
- High construction costs and low land values (outer): apartment more expensive than a detached house.
- Communities and Local Council obstructing redevelopment (middle, inner).

Urban practice is optimally positioned to lead transformational change in Melbourne, but this relies on an authoritative position, advanced knowledge and effective partnerships.

Urban practitioners must actively contribute to optimal outcomes in the current context, advocating for better outcomes, challenging clients and government, and demonstrating the nature and value of alternative approaches.

However, there is a delicate balance between thought leadership and client recognition. Increasing public/political interest in cities creates a complex professional environment.

The Directions provide an effective balance of focus areas to approach Melbourne's defining city challenge. Integrating significant projects, collaboration, research and balanced investment, across the three distinct context settings, is considered appropriate in pursuing the following **Actions**:

- i. Develop expertise and recognition as an authority by major public and private sector industry participants;*
- ii. Develop personal leadership, delivery, engagement and collaboration capabilities;*
- iii. Contribute to developing new models of high density housing;*
- iv. Pursue transformational change through optimal redevelopment in established centres and transport nodes, where capacity and accessibility are highest;*
- v. Achieve significant change in declining locations, leveraging opportunity and willingness with strategic design and targeted investment;*
- vi. Create master plans for outer urban/transport nodes that can accommodate/attract diverse housing and high value employment;*
- vii. Critically engage with political and commercial drivers to identify design strategies;*
- viii. Integrate better design/development with better commercial returns, through research and knowledge building.*

The Actions effectively cover the established Contexts and Directions.

	Strongly applicable
	Applicable

<i>Action:</i>	<i>i.</i>	<i>ii.</i>	<i>iii.</i>	<i>iv.</i>	<i>v.</i>	<i>vi.</i>	<i>vii.</i>	<i>viii.</i>
Context 1								
Context 2								
Context 3								
Direction A								
Direction B								
Direction C								
Direction D								

This framework is already yielding results. The author prepared ‘**Better Placed**’, a draft **Architecture and Design Policy for NSW** (Government Architect New South Wales, 2016), for the Government Architect’s Office, within 6 weeks of part-time work. It was launched in October 2016. This work:

- Addresses Directions A, B and C directly;
- Originated through existing connections and recognition;
- Was enjoyable, with opportunity to research international examples, work independently and engage at a high-level;
- Is prominent, already gaining broad recognition in Australia;
- Reinforced my capabilities as high-level/advanced, transferrable geographically, innovative, rigorous and responsive;
- Will continue, with opportunities to contribute to Design Guides and other potentials;
- Will generate other, similar opportunities;
- Is expanding the author’s connections and recognition.

Conclusion

The current trajectories of growth and development in Melbourne require substantial change and redirection to ensure sustained liveability and social equity into the future. This will demand enhanced knowledge, design and negotiation skills, and strong leadership and advocacy capabilities.

In addressing the central premise of this report, it is posited that the proposed practice framework and approach will contribute to a more equitable distribution of high liveability standards, optimise benefits from infrastructure development, support both strategic directives and commercial imperatives, and create a more multi-centred, compact and accessible Melbourne, while providing a sound and sustainable business model.

Bibliography

City of Melbourne. (2015). Homes for People: Housing Strategy 2014-2018. Local Government, Melbourne.

Collinson, P. (2016, September 30). Has Vancouver found the solution to a super-heated housing market? The Guardian.

Davies, A. (2016, July 14). What revitalised central Melbourne? Retrieved October 7, 2016, from Crikey:
<https://blogs.crikey.com.au/theurbanist/2016/07/14/revitalised-central-melbourne/>

Deloitte Access Economics. (2015). The value of international education to Australia. Consultancy, Australian Government.

Dodson, J., & Sipe, N. (2006). Suburban shocks: Assessing locational vulnerability to rising household fuel and mortgage interest costs. Griffith University, Brisbane.

Government Architect New South Wales. (2016). Better Placed: A design led approach: developing an Architecture and Design Policy for New South Wales. Policy, Government Architect New South Wales, Department of Planning, Sydney.

Growth Areas Authority. (2013). Precinct Structure Planning Guidelines (Vol. 2). Melbourne, Victoria, Australia: Victorian State Government.

Jesuit Social Services / Catholic Social Services Australia. (2015). Victoria. Retrieved from Dropping off the Edge 2015:
<http://k46cs13u1432b9asz49wnhcx.wpengine.netdna-cdn.com/wp-content/uploads/DOTE-state-fact-sheet-Vic3.pdf>

Jowell, T. (2016). LSE EMC Roundtable. LSE Executive MSc in Cities. London.

Kelly, J.-F., & Breadon, P. (2012). Tomorrow's Suburbs: Building flexible neighbourhoods. Grattan Institute, Melbourne.

Langdon, P. (2011, June 14). Mid-rise living: A new best practice? (New Urban Network) Retrieved October 10, 2016, from Better Cities & Towns:
<http://bettercities.net/article/mid-rise-living-new-best-practice-14835>

- Level Crossing Removal Authority. (2016). Level Crossings. Retrieved October 4, 2016, from Level Crossing Removal Authority: <http://levelcrossings.vic.gov.au/crossings>
- Lucas, C. (2015, March 2). Melbourne's planning disaster: jobs boom in CBD while affordable housing grows ever outwards in suburbs. *The Age*.
- Lucas, C., & Robb, K. (2016, March 30). Australia's fastest growing suburbs are on city fringes, new figures show. Retrieved October 11, 2016, from Domain.com.au: <http://www.domain.com.au/news/australias-fastest-growing-suburbs-are-on-city-fringes-new-figures-shows-20160330-gnt6ld/>
- MacLeod, K. (2015, June 29). Mapping Australia: Housing affordability. Retrieved September 15, 2016, from SBS NEWS: <http://www.sbs.com.au/news/map/housing-affordability>
- Mayor of London. (2016, March). Policy 3.4 Optimising housing potential. Retrieved October 11, 2016, from London Plan: <https://www.london.gov.uk/what-we-do/planning/london-plan/current-london-plan/london-plan-chapter-3/policy-34-optimising>
- Melbourne Metro Rail Authority. (2016, June 19). Project Scope. Retrieved October 11, 2016, from Metro Tunnel: <http://metrotunnel.vic.gov.au/about-the-project/project-scope>
- Monash University: City Science. (n.d.). Monash University: City Science. (X. H. Saberi, Producer) Retrieved October 5, 2016, from Melbourne Housing Density Map: <http://www.monash.edu/research/city-science/MelbourneHousingDensity/#map>
- Plan Melbourne Ministerial Advisory Committee. (2015). Plan Melbourne Refresh: Discussion Paper. Melbourne.
- PricewaterhouseCoopers LLP. (2014). Crossrail 2 Funding and financing study. Consultancy, London.
- Radcliffe, J. (2016). Greater London Authority Roundtable. LSE Executive MSc in Cities. London.

- Robb, K. (2016, October 10). Life-long renters face financial stress in retirement, new report says. Retrieved October 11, 2016, from Domain:
http://www.domain.com.au/news/lifelong-renters-face-financial-stress-in-retirement-new-report-says-20161007-grvgqb/?utm_content=buffer96acf&utm_medium=social&utm_source=linkedin.com&utm_campaign=buffer
- Sassen, S. (2016). Who Owns The City. LSE Executive MSc in Cities - Week 1. London.
- Stevenson, M. (2016, September 23). Land use, transport, and population health: estimating the health benefits of compact cities. *The Lancet*.
- The Economist Intelligence Unit. (2016). A Summary of the Liveability Ranking and Overview. London: The Economist.
- Victoria State Government. (2016, December). Better Apartments. (Department of Land, Water, Environment and Planning) Retrieved October 11, 2016, from Have Your Say at DELWP:
<http://haveyoursay.delwp.vic.gov.au/better-apartments>
- Victoria State Government. (2016). Victoria In Future 2016: Population and household projections to 2051. Victorian State Government, Environment, Land, Water and Planning, Melbourne.
- Victorian Auditor General. (2013). Developing Transport Infrastructure and Services for Population Growth Areas. Melbourne: Victorian Government Printer.
- Wen, P., & Johanson, S. (2016, May 20). Chinese property investors getting wary of buying in Australia. *Sydney Morning Herald*.