



11 Business

11.1 Overview

This chapter provides an assessment of the business impacts associated with the construction and operation of Melbourne Metro. The chapter is based on the impact assessment presented in Technical Appendix G *Business*. All relevant references are provided in Technical Appendix G.

Melbourne Metro is one of the largest public transport infrastructure projects ever undertaken in Australia. It would facilitate the reconfiguration of Melbourne's passenger rail network and benefit business in a number of important ways:

- The ability of businesses to interact with their customers, suppliers and professional services via the public transport network would be enhanced.
- New retail and commercial opportunities can be provided in and around train stations and well-connected activity centres.
- Reduced commuter time and travel time costs would widen the employee pool available in central Melbourne, enabling better matching of worker skills to jobs and increasing productivity.
- Melbourne Metro could transform the business mix of some areas, as improvements in accessibility spark shifts in the locational preferences of firms – especially knowledge-intensive and creative firms.
- The project would provide urban renewal opportunities for business and developers, particularly for over-site development at the CBD North and South stations and surrounding the Arden station.

These broader business benefits are discussed in more detail in Chapter 2 *Project Rationale and Benefits*. This chapter responds to the EES Scoping Requirements by assessing the impacts of constructing and operating Melbourne Metro on businesses 'in the area of the project'.

Once it commences operating, Melbourne Metro would have positive impacts for business along and in the vicinity of the project's alignment. It would provide direct opportunities for the suppliers of goods and services for the operation and maintenance of Melbourne Metro, change the mix of business in some areas and is predicted to increase annual production by a Gross Value Added* of \$10.1 million in 2041.

There would be some adverse impacts on local businesses during the construction of Melbourne Metro, notably the compulsory acquisition of commercial land that supports around 87 businesses and disruptions caused by constructing Melbourne Metro. The assessment of these impacts, as well as the identification of recommended Environmental Performance Requirements and proposed mitigation measures to reduce these effects, has been informed by understanding the consequences of other large infrastructure and commercial developments interstate and in central Melbourne.

The recommended Environmental Performance Measures, which specify outcomes to be achieved, are aimed principally towards either assisting businesses to relocate where they are being compulsorily acquired or supporting businesses where there are unavoidable disruptions brought about by construction activity.

11.1.1 Construction

Business acquisition and relocation

With most construction activities taking place underground, impacts on individual businesses would be limited to particular locations where surface works and road and footpath closures could have an impact on business access and trade.

The acquisition and temporary occupation of land would also result in the displacement of some businesses, which would have a significant impact on most of these businesses and their employees. Under the Concept Design, businesses would be displaced in the following locations:

- Precinct 1 - Tunnels: one business – the Fawkner Park Tennis Centre in Fawkner Park
- Precinct 2 - Western portal (Kensington): around 14 businesses, including 13 currently operating from the 50 Lloyd Street Business Estate in Kensington, mainly businesses involved in transport, warehouse and storage activities

* Gross Value Added is the measure of the value of goods and services produced in an area, industry or sector of the economy.

- Precinct 3 - Arden station: seven industrial businesses currently leasing land in the publicly owned (VicTrack) site at Arden Street, including two concrete batching plants
- Precinct 4 - Parkville station: four businesses in Carlton would be displaced for construction purposes
- Precinct 5 - CBD North station: around 37 businesses, mainly occupying offices in Swanston, La Trobe and Little La Trobe Streets. Some street level retail would also be displaced
- Precinct 6 - CBD South station: around 32 businesses along Swanston and Flinders Streets and in Port Phillip Arcade, mainly retail businesses, cafes, fast food and convenience services.

No businesses would be displaced in the Domain, eastern portal or western turnback precincts.

The acquisition of land required for Melbourne Metro would affect around 87 businesses, which employ approximately 1,100 people (out of a current total of around 35,000 jobs across all Melbourne Metro precincts). If all of these businesses were removed from the Melbourne economy, this is conservatively estimated to result in the theoretical direct loss of approximately \$130 million in Gross Value Added across all of the precincts. In practice, many businesses are expected to relocate to other locations within the project area or within the broader metropolitan Melbourne area, so the net impact of constructing Melbourne Metro is expected to be less than this estimate.

In some precincts (for example the western portal precinct), the business impact would be driven by the acquisition/temporary occupation of land. In other precincts, the level of business impact would increase and then reduce as construction activity ramps-up, plateaus and winds-down. For example, construction works for Parkville station would be disruptive while the station site is prepared. After the station box is installed, the intensity of the construction works would lessen.

Many of the acquired businesses would be expected to relocate to the nearest suitable location and, where possible, retain their employees. This would substantially reduce the theoretical estimate of job and production losses outlined above. Furthermore, any losses would also be offset against the significant increases in employment and productivity expected once Melbourne Metro comes into operation (see section 11.1.2).

Under the *Land Acquisition and Compensation Act 1986*, any person with an interest in acquired land is entitled to compensation that not only encompasses land value, but also loss attributable to 'disturbance'. Such losses typically include the losses associated with business disruption and relocation and any reasonable costs incurred as a result of the compulsory acquisition.

Business disruption

Businesses in all precincts would be disrupted temporarily to varying extents during construction of Melbourne Metro as a result of changed amenity (such as dust and noise and vibration impacts, although these impacts would be mitigated), construction traffic (though overall this is not significant), disruptions to tram and bus services, reductions in passing trade (in some cases) and constrained access for customers, deliveries and staff. A range of measures would be taken to avoid or mitigate these impacts through the recommended Environmental Performance Requirements, including:

- Supporting businesses in proximity to construction activity with signage and advertising material indicating they remain open for business
- Maintaining access to businesses for customers, deliveries and waste removal, where practicable
- Consulting businesses in the preparation of noise and vibration, dust and traffic management plans
- Preparing and implementing engagement plans to ensure businesses are kept informed about key project milestones, planned construction activities, changes to traffic conditions and the possible duration of impacts.

With the exception of the Parkville station precinct, these measures would reduce the risk of significant temporary business disruption from construction activities in all precincts to low or very low. In Parkville, the risk of disruption would remain at a medium level, even with the implementation of the recommended Environmental Performance Requirements. This means that businesses in this area could experience moderate levels of disruption due to noise and vibration impacts and traffic changes, with the hospitals and research facilities in the precinct potentially likely to be more affected than other businesses.

Business benefits

In some precincts, the large number of workers present on a daily basis during the construction phase would generate additional demand for goods and services that may benefit local retail, food and beverage businesses. Victorian businesses may also be able to provide some of the materials and services required for the construction, maintenance and operation of Melbourne Metro.

11.1.2 Operation

Once operational in 2026, Melbourne Metro would enhance transport connectivity across metropolitan Melbourne. This would deliver significant benefits to business.

By 2041, there is anticipated to be a substantial rise in population and jobs growth and in effective job density (that is, the ability to access overall economic activity across metropolitan Melbourne) leveraging off Melbourne Metro. The areas where this is expected to occur are often in close proximity to railway stations, and the west and north regions of Melbourne are expected to see the biggest uplift in job densities.

Across the project alignment, the operation of Melbourne Metro would increase the connectivity of each precinct to other parts of the city. This would result in a range of benefits, such as greater business access to potential labour. In particular, substantial annual increases in production are forecast for the five precincts where new stations would be located. Together, these precincts are estimated to record an increase in annual production of around \$10.1 million by 2041 due to agglomeration economies, some 15 years after trains have commenced operating on Melbourne Metro and sufficient time has passed to influence businesses' locational decisions.

In addition to improving connectivity and accessibility, Melbourne Metro would likely transform the business mix of some areas and/or provide the stimulus for urban renewal and redevelopment. The project would also strengthen central Melbourne – the most productive and economically significant area within Melbourne and Victoria – and support the expansion of the central city area to generate more business, investment and employment opportunities.

More broadly, Melbourne Metro would enable businesses in many parts of Melbourne to achieve higher productivity through economies of scale and scope. The elevation of labour productivity from this source is estimated to generate additional Gross Value Added of around \$800 million across the metropolitan economy by 2041.

11.2 EES Objective

The EES Scoping Requirements set the following draft evaluation objective:

- *Social, community, land use and business – To manage the effects on the social fabric of the community in the area of the project, including with regard to land use changes, community cohesion, business functionality and access to services and facilities, especially during the construction phase.*

To meet this objective, investigations have been undertaken into potential land use, social and community, and business impacts of Melbourne Metro. The land use and planning and social and community impact assessments are considered in Chapter 9 *Land Use and Planning* and Chapter 10 *Social and Community* respectively.

Based on the investigations and findings of the business impact assessment, Environmental Performance Requirements have been recommended along with proposed mitigation measures to manage adverse business impacts associated with the project.

11.3 Legislation and Policy

As discussed in Chapter 4 *EES Assessment Framework and Approach*, the impacts of Melbourne Metro on business would be managed and assessed in accordance with Victorian legislation, standards, goals, objectives and requirements. The main laws and policies relevant to Melbourne Metro are set out in Table 11–1.

Table 11–1 Business legislation and policy relevant to Melbourne Metro

Legislation	Policy/guideline	Comment
State		
<i>Transport Integration Act 2010</i>		<p>The <i>Transport Integration Act 2010</i> establishes a framework for an integrated and sustainable transport system for Victoria. To conform with the Act, Melbourne Metro would need to contribute to delivering a transport system that:</p> <ul style="list-style-type: none"> • Enables persons to access social and economic opportunities • Enables efficient and effective access to places of employment, markets and services • Is integrated with land use and facilitates access to social and economic opportunities • Section 63 requires that the department responsible for administering the Act undertakes integrated transport planning to guide the development of the transport network in Victoria. DEDJTR is developing a network development strategy that will align with both a refresh of <i>Plan Melbourne</i> (anticipated to be finalised in mid-2016) and the Regional Statement to provide integrated guidance on land use and transport planning for Victoria.
<i>Planning and Environment Act 1987</i>		<p>Any project that requires planning approval needs to be assessed against the objectives set out in the Act, including:</p> <ul style="list-style-type: none"> • Providing for fair, orderly, economic and sustainable use, and development of land • Balancing the present and future interests of all Victorians.
	State Planning Policy Framework	<p>Melbourne Metro should demonstrate alignment with the objectives of Clauses 11, 17 and 18.</p> <p>Clause 11 states that planning is to respond to the needs of existing and future communities through provision of zoned and serviced land for, amongst other things, employment, commercial and community facilities and infrastructure.</p> <p>Sub clause 11.04-1 addresses the delivery of jobs and investment in Metropolitan Melbourne. The objective is to create a city structure that drives productivity, supports investment through certainty and creates more jobs. This includes strengthening the competitiveness of Melbourne's employment land and planning for an expanded</p>

Legislation	Policy/guideline	Comment
		<p>central city that will become Australia's largest commercial and residential centre by 2040.</p> <p>Sub clause 17.01-1 relates to business. The objective is to meet the community's needs for retail, entertainment, office and other commercial services and provide net community benefit in relation to accessibility, efficient infrastructure use and the aggregation and sustainability of commercial facilities.</p> <p>Clause 18 states that planning should ensure an integrated and sustainable transport system that provides access to social and economic opportunities, facilitates economic prosperity, contributes to environmental sustainability, coordinates reliable movements of people and goods, and is safe.</p> <p>Sub clause 18.01-1 relates to the integration of land use and transport planning, with an objective to create a safe and sustainable transport system by integrating land use and transport.</p>
	<p><i>Plan Melbourne</i></p>	<p>Melbourne Metro should align with the following objectives:</p> <ul style="list-style-type: none"> • Create a city structure that drives productivity, supports investment through certainty and creates more jobs (<i>A distinctive Melbourne</i>) • Provide a diversity of housing in defined locations that cater for different households and are close to jobs and services (<i>A globally connected and competitive city</i>) • Provide an integrated transport system connecting people to jobs and services, and goods to market (<i>Social and economic participation</i>). <p><i>Plan Melbourne</i> is being reviewed and updated. The <i>Plan Melbourne Refresh Discussion Paper</i> states that a core aim of <i>Plan Melbourne 2016</i> will be to drive the expansion of the central city and that planning for the expanded central city (particularly in urban renewal precincts) needs to ensure commercial development opportunities are preserved and the early delivery of key transport infrastructure is considered.</p> <p>It is understood <i>Plan Melbourne 2016</i> will incorporate the currently proposed Melbourne Metro alignment.</p>
<p><i>Major Transport Projects Facilitation Act 2009 / Land Acquisition and Compensation Act 1986</i></p>		<p>Under the <i>Major Transport Projects Facilitation Act 2009</i>, once the Project Area for Melbourne Metro is designated, the project proponent has the power to compulsorily acquire land within this area. The compulsory acquisition of land would be carried out in accordance with the <i>Land Acquisition and Compensation Act 1986</i>.</p>

Legislation	Policy/guideline	Comment
Local		
<i>Planning and Environment Act 1987</i>	Melbourne, Port Phillip and Stonnington Planning Schemes Municipal Strategic Statement and Local Planning Policy Framework	Melbourne Metro should support the visions, objectives and strategies set out in the following Local Planning Policy Frameworks (which form part of each council's Municipal Strategic Statement): <ul style="list-style-type: none"> • Melbourne Local Planning Policy Framework – nominates particular areas for growth (including current, proposed and potential urban renewal areas such as Docklands, Arden-Macaulay and E-Gate) and identifies business, transport and infrastructure objectives for the City of Melbourne • Port Phillip Local Planning Policy Framework – sets out a vision for the City and outlines a strategic approach to achieve this vision, including maintaining the role of St Kilda Road as the City's premier commercial strip • Stonnington Local Planning Policy Framework – sets out a vision for the City and economic development objectives, including making provisions for increased local employment and promoting Stonnington as a premier arts and cultural destination.
	City of Melbourne structure plans	Melbourne Metro should contribute to the achievement of the <i>City West Plan 2003</i> , the <i>Arden-Macaulay Structure Plan 2012</i> and the <i>City North Structure Plan 2012</i> .
	City of Port Phillip strategies and structure plans	Melbourne Metro should contribute to the achievement of the <i>City of Port Phillip Economic Development Strategy 2012</i> and the <i>St Kilda Road North Precinct Plan</i> .
	City of Stonnington strategies and structure plans	Melbourne Metro should contribute to the achievement of the <i>City of Stonnington Economic Development Strategy 2012</i> and the <i>Chapel reVision Structure Plan 2014</i> .

There are no strategies or structure plans of relevance to the Western turnback within the City of Maribyrnong.

11.4 Methodology

11.4.1 Assessment Approach

Study Area

The study area for assessing Melbourne Metro's business impacts follows the proposed tunnel alignment, extending from Kensington in the west through the Melbourne CBD to South Yarra in the south-east. This includes areas within the project boundary and areas immediately adjacent to the boundary.

However, once it is operational, Melbourne Metro would improve connectivity across the metropolitan rail network and would result in an increase in train frequency on a number of lines. Accordingly, the business impact assessment has also examined broader business impacts that extend beyond the precinct boundaries and across the wider metropolitan area.

Desktop Assessment

A desktop assessment was undertaken to identify potential business impacts associated with Melbourne Metro. This information was used to estimate current business activity within each of the proposed Melbourne Metro precincts and to calculate the impact on this activity during the construction and operational phases of Melbourne Metro.

The desktop assessment included:

- A review of the business impact assessment methodologies of other significant road and rail projects to help to inform the anticipated business impacts of Melbourne Metro, including the Cross River Rail Project (Brisbane), NorthConnex (Sydney), the East West Link – Eastern Section (Melbourne) and EastLink (Melbourne)
- A review of available data sources (see Section 11.4.2)
- A land use audit to understand existing conditions along the proposed Melbourne Metro alignment and identify commercial uses
- Consideration of the impacts of previous Melbourne projects in the vicinity of the project area (including the Regional Rail Link, Swanston Street redevelopment, Myer Emporium, RMIT Swanston Academic Building, Southern Cross Station, Victoria Comprehensive Cancer Centre and Fitzroy Gardens Stormwater Harvesting System) to gain an understanding of how they affected surrounding businesses. Previous tram re-routings were also reviewed
- Understanding pedestrian flows from carparks, train stations and tram stops within the central city area by modelling foot traffic patterns and reviewing pedestrian counts collected by the City of Melbourne

- Assessment of specific amenity impacts on businesses based on other specialist studies conducted for the EES
- Identification of the number of commercial, industrial and residential properties expected to be acquired for the proposed project in consultation with the project team.

The report *Agglomeration Benefits of the Melbourne Metro* (SGS Economics and Planning, 2012) was also used as a resource for the business impact assessment.

Measurements of Business Activity

The data sources listed in Section 11.4.2 were used to estimate the impacts that Melbourne Metro would have on business activity within each precinct during the construction and operational phases. This included estimating agglomeration benefits and labour productivity impacts, and estimating Gross Value Added in each precinct with and without Melbourne Metro. The methodologies adopted to estimate these impacts are detailed in Section 4 of Technical Appendix G.

A number of assumptions were made regarding impacts on business activity, including assumptions regarding the elasticity of foot-traffic to sales for each industry (to determine the extent to which businesses would be affected by a reduction in passing foot-traffic) and the number, distribution and potential purchasing behaviour of construction workers. These assumptions are explained in Section 4.4 of Technical Appendix G

Site Visits, Interviews and Consultation

Site visits were made to each of the proposed Melbourne Metro stations and portal precincts to cross-check the available data and the information contained in the land use audit.

Face-to-face and telephone discussions were conducted with proprietors or staff of businesses likely to be acquired, as well as businesses operating in the vicinity of the proposed project. Across Precincts 2 to 8, 106 businesses were approached and a total of 53 have participated in interviews. Amongst other matters, representatives of businesses were asked to estimate the proportion of their sales that is directly attributable to passing foot-traffic. This information was used to inform the elasticity assumptions referred to above.

Officers of the Cities of Melbourne, Port Phillip and Stonnington were consulted about business activities and potential disruption in their municipalities. Representatives of Traders' associations in a number of locations were also consulted. Further details of consultation undertaken for the business impact assessment are provided in Section 4.6 of Technical Appendix G *Business*.

Other technical specialists undertaking assessments for the EES (in particular the traffic, noise and vibration and air quality specialists) were consulted to gain an understanding of the range of implications for businesses from Melbourne Metro.

The business impact assessment has also been independently peer reviewed.

11.4.2 Baseline and Background Data

Data sources used in the business impact assessment included:

- ABS data on employment and labour productivity
- City of Melbourne's Census of Land Use and Employment data
- SGS Economics and Planning's Australian Cities Accounts 2013–14 and Small Area Land Use Projections database
- Retail turnover data from ABS Retail Trade, Australia
- Outputs of the Victorian Integrated Transport Model (the strategic traffic model developed by PTV, which is used for strategic modelling of transport projects located in metropolitan Melbourne)
- Information obtained from the land use audit and site investigations conducted for the impact assessment (see Section 11.4.1).

11.5 Existing Conditions

Commercial land uses across the Melbourne Metro alignment vary considerably and include industrial areas, high-rise offices, education and training facilities, hospitals and health care services, and major retail zones and centres.

Key existing commercial uses in the vicinity of the Melbourne Metro include:

- Major retail areas, including Melbourne Central retail centre (CBD North) and the Toorak Road and Chapel Street shopping areas (eastern portal)
- Food and beverage businesses, with concentrations of these businesses in the Parkville, CBD North and CBD South Precincts
- Education and training services, including the University of Melbourne (Parkville), RMIT University (CBD North) and Melbourne Grammar School (Domain)
- Health care and social assistance services, including Royal Melbourne Hospital and the Victorian Comprehensive Cancer Centre (Parkville) and small health care providers (Parkville and CBD North)
- Firms providing business and professional services, with concentrations of activity in CBD North, CBD South and Domain
- Parkville Employment Cluster (Parkville), which has a strong concentration of businesses in the education, research, health, professional and technical industries

- Parkville Knowledge Precinct, a business cluster on the northern fringe of Royal Park adjacent to Parkville that includes CSL, Royal Melbourne Hospital and the National Ageing Research Institute.

Current levels of business activity are summarised in Table 11–2.

Table 11–2 Business activity in the Melbourne Metro station precincts

Precinct	No. of businesses	No. of employees (rounded)	Main sectors	Annual gross value added (\$m)
1 – Tunnels	469	11,000	Retail, food and beverage services	2,362
2 – Western portal	49	609	Transport, postal, and storage.	67
3 – Arden station	66	670	Business Services, Manufacturing, Food and Beverage Services	70
4 – Parkville station	387	19,500	Health Care, Education and Training, Retail, Food and Beverage Services	1,574
5 – CBD North station	498	7,700	Retail, Education and Training, Health Care, Business and Professional Services	925
6 – CBD South station	733	6,300	Retail, Manufacturing, Business and Professional Services, Food and Beverage Services	734
7 – Domain station	306 floors of commercial, retail and office space, retail and educational space on the western side of St Kilda Road; 44 businesses on the eastern side of St Kilda Road	6,800	Retail, Business and Professional Services	74

Precinct	No. of businesses	No. of employees (rounded)	Main sectors	Annual gross value added (\$m)
8 – Eastern portal	31	310	Retail	25
9 – Western turnback	1	10	Education	N/A

11.6 Risk Assessment

An Environmental Risk Assessment has been completed for the precinct level business impacts of Melbourne Metro. Further information about the risk assessment approach adopted for Melbourne Metro is included in Chapter 4 *EES Assessment Framework and Approach*.

Impact assessment must be informed by risk assessment so that the level of mitigation action relates to the likelihood of an adverse impact occurring.

As a result of the business impact assessment, project-specific Environmental Performance Requirements – together with examples of mitigation measures that would achieve the Environmental Performance Requirements – have been proposed to manage the identified impacts.

Achieving these requirements would ensure that the residual ratings of all risks remain low or very low, other than the potential impact on business operations from construction activities in the Parkville station precinct, which would continue to have a medium residual risk rating – largely due to the presence of major hospitals and medical research institutes in the area.

The business impact risk associated with Melbourne Metro with a residual risk rating of medium or above is shown in Table 11–3. A full list of business risks, showing the initial and residual risk rating of each risk, is provided in Technical Appendix B *Environmental Risk Assessment Report* and in Technical Appendix G.

The recommended Environmental Performance Requirements are listed in Section 11.19.

Table 11–3 Business and economic risks

Impact pathway		Project phase	Precincts	Residual risk rating
Activity	Potential event			
Construction activity impacting operations (such as from noise, dust, vibration and construction materials)	Business functions unable to occur due to construction impacts. Some business types would be impacted more than others, particularly those operating sensitive equipment	Construction	4 - Parkville station	Medium

11.7 Impact Assessment

11.7.1 Construction

The main impacts of Melbourne Metro are associated with property acquisition and the disruption to business operations as a result of construction activities.

Direct Opportunities

Some businesses – such as those providing food and beverages – may benefit from catering to the increased demand for goods and services from a large construction workforce. Businesses would be most likely to benefit in precincts where large numbers of construction workers would be based: in particular the Arden station and Domain station precincts, and the CBD.

There may also be opportunities for businesses located in or near the precincts to be employed during the construction phase of the proposed Melbourne Metro.

Commercial Property Acquisition and Business Displacement

The large underground component of Melbourne Metro would limit the amount of ground surface property acquisition required. However, an estimated 35 properties with commercial activity would still need to be acquired across the Melbourne Metro alignment, resulting in the displacement of approximately 87 businesses. Around nine other businesses would be displaced either by temporary occupation or non-extension of VicTrack leases.

Property acquisition would be conducted in accordance with the *Land Acquisition and Compensation Act 1986* (see discussion box overleaf).

Environmental Performance Requirements are recommended to reduce the effect of land acquisition on businesses. Proposed mitigation measures to meet these requirements include:

- Undertaking early face-to-face engagement with businesses to be acquired and giving them sufficient notice to enable time to plan for relocation
- Giving businesses a single point of contact where they can direct all their enquiries in relation to business disruption or relocation
- Where the construction program allows, considering the early purchase of commercial properties in consultation with businesses
- Supporting acquired businesses to make the transition to new premises, including providing assistance with finding sites for relocation, the logistics of relocation and advertising and other requirements arising from a changed location.

In addition to the direct impacts on acquired businesses, other businesses could be affected through:

- A direct reduction in business activity within local areas due to the acquisition of industrial and commercial property
- Indirect or secondary loss of output from businesses that remain in the area that were previously supplying the acquired businesses
- Indirect or secondary loss of output from businesses that remain in the area due to the acquisition of nearby residential properties that were previously supporting the acquired businesses.

Business Disruption

The construction phase is expected to create disruptions to some business activity due to:

- Reduction or diversion of foot traffic/pedestrian flows associated with construction of Melbourne Metro
- Changes to amenity (such as from noise and vibration impacts) that affect business operations or discourage customers from visiting businesses
- Constrained access to businesses for staff, deliveries and potential customers from additional truck movements and traffic disruption, the temporary occupation of car parks and impeded pedestrian routes
- Potential disruption to utilities impacting on the productivity and output of local businesses
- Difficulty renting commercial properties due to reduced amenity and access constraints
- Increased demand for parking generated by construction workers, impacting access for staff and customers of surrounding businesses

Commercial property acquisition and compensation process

Any land acquisition required for Melbourne Metro would be conducted in accordance with the *Land Acquisition and Compensation Act 1986*. This Act sets out the compulsory acquisition process and how compensation is determined.

Under this Act, the project authority for Melbourne Metro would be empowered to compulsorily acquire interests in land, and required to compensate anyone with an interest in that land. This would include compensation for business disruption or relocation which occurs as a natural, direct and reasonable consequence of the compulsory acquisition of the property.

The amount of compensation payable to a business would be assessed on a case by case basis, in accordance with the compensation principles prescribed by the Act.

The Act allows for individual cases to be assessed on their merits to determine the most appropriate type and level of assistance to be provided.

In relation to business tenants, the principles are largely the same, although the expenses that may be claimed are related to the early termination of occupation rights under a lease.

- Acquisition of residential properties whose occupants patronise local businesses
- Potential reduction in public events indirectly affecting business activity.

Some businesses may be impacted more than others, depending upon a number of factors including the type of business being operated, whether the business relies on passing trade (such as retail, food service and accommodation businesses) and whether there are other easily accessible locations offering similar goods and services.

The construction phase is expected to disrupt traffic in some locations as a result of additional construction traffic and the closure of some streets. This disruption is likely to directly affect some businesses. Where this disruption occurs concurrently with other local road or building construction works not associated with Melbourne Metro, the cumulative impact may be more severe. Potential cumulative impacts are addressed in greater detail under each precinct where they could occur, with further detail provided in Technical Appendix G *Business*.

Melbourne Metro traffic management plans would be mindful of, and informed by, other major construction projects in the vicinity of the project, such as the Western Distributor. These plans would be prepared after detailed design and when construction methodologies have been finalised.

A business disruption plan would be prepared to manage amenity impacts on business operations from construction activities. Mitigation measures could include:

- Supporting businesses in proximity to construction activity, such as providing signage and advertising material indicating they remain open for business
- Developing 'way finding' programs to establish pedestrian access patterns and develop routes to assist businesses that rely on foot traffic
- Consulting with individual businesses to ensure access arrangements are reasonable for their needs
- Working with local authorities and businesses to identify ways to attract people to the area.

Once these measures are implemented, there could still be temporary amenity impacts that could reduce demand for the goods and services sold by businesses in proximity to construction works. However, some demand would likely be redirected (for some industry types) over time to businesses located in nearby streets.

Amenity impacts are proposed to be managed and mitigated in accordance with the proposed mitigation measures to achieve the relevant recommended Environmental Performance Requirements for noise, vibration and air quality issues.

Other than the Parkville station precinct, all adverse business and economic risks are expected to be low or very low with the implementation of the proposed mitigation measures to achieve the recommended Environmental Performance Requirements. The specific impacts in the Parkville station precinct are discussed in Section 11.13.

11.7.2 Operation

Over the longer term, Melbourne Metro could have an impact on individual businesses through changed traffic and pedestrian patterns. Local areas are likely to experience incremental change in business mix and the types of jobs available.

Direct Opportunities

The maintenance and operation of the Melbourne Metro tunnels, stations and other infrastructure would require a range of goods and services from the private sector. There may be opportunities for local businesses to provide these goods and services.

Impacts on Individual Businesses

A reduction in business activity due to residential and commercial property acquisition may lead, in turn, to higher rents and displacement of some business types. Some business types could be impacted more than others, particularly those that do not benefit from productivity improvements from increased commuter accessibility (such as manufacturing and industrial businesses). The risk of this occurring has been assessed as low across all precincts.

Change in Business Mix

Melbourne Metro would likely transform the business mix in some areas, as it would potentially spark shifts in the locational preferences of firms, particularly knowledge-intensive and creative firms. This may spur further employment growth in Local Government Areas already experiencing an upward trend in innovative- and knowledge-based jobs and a decline in manufacturing industries.

Increased Annual Production

In areas surrounding the new stations, Melbourne Metro would have a positive impact on business and economic activity as a result of improved transport accessibility. Broadly speaking, the new stations would help to improve connectivity between key districts such as Arden and Parkville and the Hoddle Grid in the CBD.

Table 11–4 summarises the estimated annual value of Melbourne Metro's operational impacts in 2041.

Table 11–4 Summary of estimated annual operational impacts

Precinct	Gross Value Added (\$m)
1 – Tunnels	-
2 – Western portal	-
3 – Arden station	1.8
4 – Parkville station	3.0
5 – CBD North station	1.5
6 – CBD South station	1.8
7 – Domain station	2.0
8 – Eastern portal	-
9 – Western turnback	-
Total	10.1

11.8 Metropolitan Impact

Melbourne Metro is likely to provide key links and enhance connectivity across metropolitan Melbourne. By reshaping accessibility across Melbourne, particularly for the central, western and northern sub-regions, the project would enable businesses to achieve a higher productivity through agglomeration economies.

In addition to improving connectivity and accessibility, the project would likely transform the business mix of some areas and/or provide the stimulus for urban renewal. The intensified agglomeration economies and associated improvements in productivity generated by Melbourne Metro would likely spark shifts in the locational preferences of firms, particularly those that are relatively knowledge- or creative-intensive.

11.9 Early Works Impact

Early works are not expected to impact businesses in the precincts as interruptions to utility services are not anticipated. However, utilities are essential for business operations and if works unexpectedly cause any interruption to services, this may suspend business activity until services are returned.

It is assumed that any disruption would be short-term in nature and therefore would have a negligible impact on businesses. This risk could be mitigated by informing businesses of the timing and duration of works.

11.10 Precinct 1: Tunnels

11.10.1 Construction

As most of Melbourne Metro in this precinct would be underground, business impacts would be confined to the areas around the proposed TBM launch sites in Domain and, potentially, Fawkner Park and the proposed emergency access shaft sites in Fawkner Park and Queen Victoria Gardens. The main temporary impacts during construction would be associated with the potential acquisition of Fawkner Park Tennis Centre and surrounding open space, construction traffic, disruption to traffic flows for cars, trams, buses, bicycles and pedestrians, and reduced amenity.

Commercial Property Acquisition and Business Displacement

Acquisition of one business – Fawkner Park Tennis Centre – would be likely to be required in this precinct if both Fawkner Park and Domain are chosen as TBM launch sites. The tennis courts at the Fawkner Park Tennis Centre would need to be occupied during construction. Given that after construction is completed, the site would not be covered by a structure, its previous use could be reinstated or used for another purpose. This occupation would potentially lead to the displacement of two jobs and the loss of \$0.3 million in Gross Value Added from the precinct. The majority of activities at the centre would be expected to relocate to other tennis facilities across Greater Melbourne.

Business Disruption

The tunnels precinct consists of number of non-contiguous sections. The sections where business impacts are anticipated are discussed below.

Within the CBD section (along Swanston Street) of the tunnels precinct, vibration and ground-borne noise are predicted to be experienced for relatively short periods of time during the roadheader construction of the tunnels. This is not predicted to have any material impacts on businesses.

Impacts along Swanston Street are anticipated to stem from the cumulative impact from works in the nearby CBD North, CBD South and Domain station precincts where changes to the road and pedestrian networks are anticipated, as are some short-term tram disruptions. This is anticipated to lead to a temporary reduction of foot traffic along Swanston Street.

Greater impacts may be experienced at businesses affected by construction of the station caverns (addressed later in this chapter in respect of CBD North and CBD South stations).

At the Fawkner Park section of the tunnels precinct, construction activity would take place within parkland (with areas not required for permanent structures returned to parkland once construction is completed). There would be a negligible, if any, impact to local businesses in those locations.

However, works at the Fawkner Park TBM launch and construction work site would be in very close proximity to the Fawkner Park Children's Centre and Kindergarten. The centre's operation would be particularly sensitive to amenity changes and also from perceptions of amenity changes, which would potentially impact its operations. Following consultation with the centre, consideration would be given to relocating it for the duration of the construction phase.

There is also a food and beverage and accommodation business located across Toorak Road, west of the Fawkner Park TBM launch and construction work site.

Some business types, particularly retail and food and beverage, may benefit from the demand for goods and services generated by construction workers based at the TBM launch sites and emergency access shaft construction work sites.

11.10.2 Operation

As there are very few businesses within the vicinity of the permanent emergency access shaft structures, there would be negligible, if any, business impacts associated with the operation of Melbourne Metro in this precinct. The broader, city-wide implications of the operation of Melbourne Metro tunnels as part of the metropolitan rail network are discussed in Section 11.8.

11.10.3 Alternative Design Options

The alternative design option is a small variation on the Concept Design, with a slight variation on the location of the two emergency access shafts proposed. Therefore, the business impacts are the same as those described for the Concept Design.

11.11 Precinct 2: Western Portal (Kensington)

The western portal precinct is largely bound by industrial, office, warehouse and park land uses, with a modest number of dwellings located to the east of South Kensington station. In 2015, there were 49 businesses located within the precinct: the majority of these businesses (38) were in the transport, postal and storage sector. These businesses employ approximately 609 people.

11.11.1 Construction

The main business impacts in this precinct during construction would be associated with the acquisition of 13 business and nine residential properties, changed access to the 50 Lloyd Street Business Estate, construction traffic, the loss of car parking spaces and reduced amenity. One business property would be temporarily occupied.

Overall, the construction of Melbourne Metro under the Concept Design would result in an estimated reduction of around \$23.0 million in Gross Value Added in the western portal precinct, although this would partially be offset by spending by construction workers.

Commercial Property Acquisition and Business Displacement

Thirteen commercial properties (and one part common area title) would need to be permanently acquired in the east of the precinct under the Concept Design to accommodate a construction work site located between Bakehouse Road and McClure Road, Kensington. This could lead to the displacement of 14 businesses and 204 employees, and a reduction of \$23.0 million in Gross Value Added from the precinct. Thirteen businesses would be displaced from the 50 Lloyd Street Business Estate.

The employment and economic activity from these businesses would not likely be lost to Melbourne, as they would probably relocate to other parts of the city. Considering the business types and their current location, it is most likely they would relocate in Melbourne's north and west.

The impact to these businesses would be mitigated through compensation entitlements provided through the *Land Acquisition and Compensation Act 1996*, supported as required by assistance to find suitable alternate premises, early engagement and sufficient notification of acquisition.

Business Disruption

The construction of Melbourne Metro would create temporary disruptions to some businesses, generate additional truck movements and traffic disruption, and reduce access to some businesses.

Access changes would particularly affect those tenants of the 50 Lloyd Street Business Estate who use large freight vehicles and for whom the entrance from opposite JJ Holland Park is crucial. The alternative entrance in the east of the estate would be able to be used by large vehicles, with traffic management allowing the low rail bridges over Lloyd Street to be avoided.

Changes to business access would also result from the temporary occupation of car parks along Childers Street. However, given the industrial nature of the area and businesses within the precinct, the impact on businesses of changes in foot traffic would be minimal.

Cumulative disruptions to businesses are possible in this precinct from the concurrent construction of the Western Distributor, which is expected to occur from 2018 to 2022. The risk of disruption could be reduced if transport authorities coordinate the preparation and endorsement of construction traffic access routes from Melbourne Metro and the Western Distributor, in the event that both projects are developed concurrently. In any event, the Melbourne Metro traffic management plans would be mindful of, and informed by, other major construction projects in the vicinity of the project such as the Western Distributor.

As noted in Section 11.7.1, achieving the recommended Environmental Performance Requirements would avoid or mitigate business disruption impacts.

11.11.2 Operation

During the project's operational phase, there would be few, if any, business impacts, as accessibility would be unchanged. Land acquired during the construction phase could be redeveloped.

11.11.3 Alternative Design Option

The alternative design for the proposed western portal would require the construction of an additional rail bridge over Kensington Road and the placement of a TBM retrieval box opposite the pavilion on Childers Street.

As the alternative location for the TBM retrieval box would not require the acquisition of commercial property, there would be no direct impacts on businesses from property acquisition. However, the business disruption implications of the Concept Design and alternative TBM location would be similar.

11.12 Precinct 3: Arden Station

The Arden station precinct is dominated by industrial land, but also contains a small number of offices and dwellings. In 2015, there were 66 businesses located within the precinct; 30 per cent of these businesses were in the manufacturing industry and were located within the industrial precinct on Laurens Street. These businesses employ approximately 670 people.

11.12.1 Construction

The main business impacts in this precinct are associated with the use of the publicly owned (VicTrack) land as a major staging and construction work site for the northern section of Melbourne Metro, construction traffic accessing the site, the potential for dust-generating activities and the possible closure of parts of Laurens Street to traffic for the construction period.

Commercial Property Acquisition and Business Displacement

Seven businesses that currently lease land on the publicly owned (VicTrack) land would be displaced from the precinct to enable construction of Melbourne Metro: two concrete batching plant businesses, a timber recycling and furniture manufacturer and three storage/warehouse businesses.

It should be noted that VicTrack holds this land for the Victorian Government and is required to make the land available should it be needed for transport projects. The early planning of Melbourne Metro allowed sufficient notification to these tenants that the land would be required for the delivery of this project in line with the project timeline.

This displacement would lead to a reduction in seven businesses, 180 jobs and \$17 million in Gross Value Added from the precinct. As the concrete businesses have particular requirements (such as proximity to major construction sites), a large part of this activity could be lost to Melbourne if these businesses cannot find alternative sites close to the CBD. This issue would require careful management by the relevant authorities.

Business Disruption

The construction of Melbourne Metro would create temporary disruptions to some business activity, generate additional truck movements and traffic congestion, and reduce access for potential customers.

As the publicly owned (VicTrack) land currently includes industrial uses that generate truck movements, the impacts on businesses from additional truck movements would not be significant.

Cumulative traffic impacts could occur in this precinct from the concurrent construction of the Western Distributor, which is expected to occur between 2018 and 2022. While this would lead to greater impacts to businesses, the risk of disruption would be reduced if the common areas that are disrupted by construction vehicles associated with both projects are co-ordinated to minimise disruption to the travelling public (see Chapter 8 *Transport*).

Some businesses would be disrupted from a reduction in foot traffic along Laurens Street, Munster Terrace and Arden Street. However, the large number of workers located in the precinct during the construction phase (peaking at almost 900) would create demand for goods and services that may benefit some local business types, particularly food and beverage businesses.

Achieving the recommended Environmental Performance Requirements relating to air quality and transport connectivity would avoid or mitigate these impacts and reduce the risk of significant business disruption from construction activities in this precinct.

11.12.2 Operation

A new underground station and associated urban renewal in the Arden area would improve the accessibility of the area, enabling customers to more easily access businesses in the precinct and giving local businesses better access to the broader Melbourne labour market and to suppliers and services in other key business precincts such as the Melbourne CBD and Southbank. Improved levels of accessibility would increase the attractiveness of the area to potential businesses, particularly professional services businesses.

As a result, a sharp rise in population and employment would be anticipated within this precinct. In addition, a structural change in the employment composition of the area is projected: moving from industrial jobs to professional and services jobs over the next two decades.

Overall, Melbourne Metro would be expected to have a positive impact on business and economic activity in the precinct. This would lead to an estimated additional annual production of \$1.8 million for the precinct for existing jobs and the creation of an additional 3,700 jobs and \$1.24 billion Gross Value Added by 2041 (compared to Melbourne Metro not proceeding).

11.13 Precinct 4: Parkville Station

The proposed Parkville station sits within the Parkville Employment Cluster, which has a strong concentration of workers in the education, research, health, professional and technical industries. Key institutions in this precinct include the University of Melbourne, Royal Melbourne Hospital, Royal Women's Hospital, Royal Children's Hospital and the Victorian Comprehensive Cancer Centre.

In 2015, there were 387 businesses located within the precinct: about 60 per cent of employment was within the health care sector and about 20 per cent of employment was within the education sector. These businesses employ about 19,500 people.

11.13.1 Construction

Business impacts in this precinct during construction would be associated with the acquisition of commercial property, the temporary closure of Grattan Street and partial closures of Royal Parade, changes to the 401 bus service, disruptions to tram services, additional truck and construction traffic, acquisition of car parking spaces and reduced amenity. There would also be potential impacts from construction activities on the operation of specialist hospital areas and equipment.

Overall, the construction of Melbourne Metro is expected to result in an estimated reduction of \$17.1 million in Gross Value Added in the Parkville station precinct as a result of business acquisition and disruption.

Commercial Property Acquisition and Business Displacement

Part of 230 Grattan Street (owned by the University of Melbourne) would need to be acquired permanently to enable construction of Melbourne Metro station entrances. This parcel of land is undeveloped. Two other properties on Berkeley Street (also owned by the University of Melbourne) would be acquired. Two properties would be temporarily occupied: one property is University Square and the other is the City Ford site at 712 Elizabeth Street.

The acquisition and temporary occupation of these properties would lead to a reduction within the precinct of 48 jobs and \$4.7 million in Gross Value Added.

Business Disruption

The construction of Melbourne Metro would disrupt business activity due to changed amenity, additional truck movements, disruption to road traffic and tram services, the occupation of car parks and reduced access for potential customers.

The closure of Grattan Street and partial closure of Royal Parade would require disruptions to tram and bus services along these roads during the excavation of the station box (see Chapter 8 *Transport*). Due to limited parking in the area, many staff and students travel to the precinct by tram and bus. Detours and disruptions would impact their journeys. While pedestrian and bicycle access would be maintained around construction work sites, there would be disruptions to pedestrian networks throughout the duration of works.

These changes, in combination with changed amenity during the construction phase of the Parkville Station, are anticipated to have an impact on access for staff, customers and deliveries to businesses in this precinct. Changes to local amenity brought about by noise and vibration impacts have also been considered. However, the specialised nature of many of the facilities in the precinct means that, despite changes in amenity, there would be no significant change in demand as staff, students, customers and patients would continue to attend and use these places. However, for other business types – especially retail, food and beverage services that are reliant on foot traffic for a proportion of their sales – these changes would potentially have a relatively greater impact in this precinct than in others. Environmental Performance Requirements and mitigation measures are recommended to manage the impacts, but a reduction in foot traffic would still be likely on some streets during the construction phase.

The medical and research institutes in the precinct operate equipment and conduct research that is highly susceptible to vibration. In particular, MRI machines (which have large magnets) are affected by some construction materials and activities and may need additional protection.

The predicted vibration impacts of constructing the station box and tunnels in the Parkville precinct are higher than Guideline Targets for some vibration-sensitive equipment at several locations, including the Royal Melbourne Hospital and Victorian Comprehensive Cancer Centre. However, the noise and vibration impact assessment conducted for the EES canvasses a range of measures to mitigate these impacts, such as liaison with the affected institutions, additional vibration attenuation, temporary rescheduling of the use of equipment and using less vibration-intensive construction methods. Adopting these measures should reduce the extent of interference caused to the Parkville institutions from these construction activities.

Tunnelling is predicted to result in higher levels of vibration and ground-borne noise than Guideline Targets for a number of wards and Intensive Care Units at the Royal Melbourne Hospital, the Royal Women's Hospital and the Victorian Comprehensive Cancer Centre. These higher levels are predicted to occur for relatively short periods of time; vibration impacts would be limited to less than nine days and highly intrusive levels of ground-borne noise would occur for approximately two days. The recommended Environmental Performance Requirements for noise and vibration would involve monitoring of vibration levels and regular consultation and communications with these institutions so that the implications of any vibration impacts would be taken into consideration (see Chapter 13 *Noise and Vibration*).

During the construction phase, these medical and research institutes may need to use additional labour resources to manage the potential impacts of constructing Melbourne Metro (and in particular the Parkville station), relocate some services and/or invest in new capital equipment to mitigate the impacts. These responses would potentially require additional spending, estimated to be around \$10.8 million.*

The assessment of business disruption to the hospitals, university and research institutions has been based on estimates of the cost of shielding sensitive equipment, internal administration to deal with Melbourne Metro, the cost of repeating testing due to unexpected disruption, the cost of research activities being delayed/disrupted, the cost of research activities being lost from the precinct and the cost of day-to-day operations being changed due to Melbourne Metro. These estimates were based on consultation with businesses and data analysis. The recent construction of the Victorian Comprehensive Cancer Centre helped to inform this analysis.

* It should be noted that estimates of the business impacts for hospitals, universities and research facilities (where there is no direct financial transaction to observe) should be treated with caution, as it is more difficult to assess the business impacts in relation to these facilities.

For the construction phase of Melbourne Metro, a proposed management measure would be to establish a consultation group, comprising all major health care and research institutions, which would meet regularly to identify and resolve construction-related issues.

The construction contractors would also be required to maintain vehicle and pedestrian access to hospital emergency departments at all times and to other key health and medical facilities where practicable.

Cumulative impacts are possible with construction works possibly occurring at the Royal Melbourne Hospital and the University of Melbourne (likely along the Royal Parade frontage) during Melbourne Metro's construction period. This could result in larger impacts to businesses in the precinct than those identified for the construction of Melbourne Metro alone. These impacts would be managed and mitigated in accordance with the recommended Environmental Performance Requirements (see Section 11.18).

Achieving the recommended transport and noise and vibration Environmental Performance Requirements in this precinct would still result in a moderate impact on businesses during the project's construction phase. While construction activities would take place in the precinct for a period of up to seven years, the impacts would likely vary from location to location, at different times during construction.

These impacts would be offset to a limited extent by the large number of workers located in the precinct during the construction phase, whose demand for goods and services could benefit some local business types, particularly food and beverage businesses.

11.13.2 Operation

The commercial and residential uplift from the new station at Parkville would be significant, although more modest than that expected in Arden due to:

- A more modest rise in accessibility, given the current high level of tram and bus transport infrastructure in the precinct
- Modest development opportunities, given the large institutions that currently occupy much of the area (such as the University of Melbourne and the Royal Melbourne Hospital).

Health jobs would be expected to rise (relative to conditions without Melbourne Metro) due to the greater accessibility and use of existing health facilities.

Overall, Melbourne Metro is forecast to have a positive impact on business activity in the precinct, leading to additional annual production of \$3 million from existing jobs and the creation of an additional 2,000 jobs and around \$217 million Gross Value Added by 2041 (compared to Melbourne Metro not proceeding).

11.14 Precinct 5: CBD North Station

Located on the northern edge of the CBD, the CBD North station precinct includes RMIT University, the State Library of Victoria, Melbourne Central station and retail centre, and education, office, retail and accommodation land uses. Swanston Street is the 'civic spine' of Melbourne and a high intensity tram corridor. Tram routes also run along La Trobe Street. The existing Melbourne Central station, located to the south of the precinct, provides train services.

In 2015, there were 498 businesses located in the precinct, which employed about 7,700 people and generated around \$925 million in Gross Value Added. Around 50 per cent of employment in the precinct was within the education and training sector and 20 per cent was within the retail sector, which includes businesses located in Melbourne Central and along Swanston Street. There was a significant number of business and professional services jobs located in buildings along Swanston Street and with Victoria Street frontages.

11.14.1 Construction

The main business impacts in this precinct during construction would be associated with the acquisition of commercial and residential property, the temporary closure of Franklin Street east of Swanston Street, potential disruptions to Swanston Street and La Trobe Street tram services, additional truck and construction traffic and reduced amenity.

Overall, the construction of Melbourne Metro would result in an estimated reduction of around \$60 million in Gross Value Added in the CBD North station precinct as a result of commercial property acquisition and business disruption. However, some of the displaced businesses may relocate within or in the vicinity of the precinct if appropriate premises are available. The presence of a large construction workforce might also benefit some businesses, particularly in the food and beverage sector.

Commercial Property Acquisition and Business Displacement

Nine commercial property titles, some containing several businesses, would need to be acquired in this precinct along Swanston Street, La Trobe Street and Little La Trobe Street.

This would lead to the displacement of 37 businesses and 385 jobs, and an estimated reduction of \$60 million in Gross Value Added. Some of these businesses are likely to relocate to other suitable premises either within the precinct or in nearby streets and laneways.

The impact on these businesses would be mitigated through compensation entitlements provided through the *Land Acquisition and Compensation Act 1986*. Where the construction program allows, the provisions of the *Land Acquisition and Compensation Act 1986* could be supported, as required, with early engagement, assistance to find suitable alternate premises and sufficient notification of acquisition.

Business Disruption

Some business activity would be disrupted temporarily as a result of changed amenity, additional truck movements and disruption to road traffic and tram services, reduced access to the CBD and within the precinct for potential customers, and a potential reduction in foot traffic.

The potential reduction in amenity is expected to reduce demand for the goods and services sold by businesses in proximity to the construction work, although demand would be redirected to some extent over time to businesses located in nearby streets and laneways. The changed environmental amenity may particularly impact the operation of food and beverage businesses, especially those with outdoor seating. Disruptions to tram services and increased truck and construction traffic for the duration of CBD construction works, along with constrained access for pedestrians alongside station entrance construction sites, would also affect some businesses.

The impact on businesses from changed access and amenity would be managed through the recommended Environmental Performance Requirements that include consultation and communication with businesses, traffic management plans, ensuring key access routes for businesses are maintained, marketing activities and signage. However, it is anticipated that there would still be some decline in passing trade along some streets in the precinct.

RMIT University operates equipment and runs experiments that are highly susceptible to vibration impacts. Operation of this equipment also requires uninterrupted access to services such as water, electricity and gas. The use of a 20-tonne rock breaker in constructing the CBD North station, together with the roadheader construction of the rail tunnel in the vicinity of CBD North station, are predicted to result in higher levels of vibration than Guideline Targets for three pieces of sensitive equipment at RMIT. Detailed consultation would be undertaken with RMIT to agree on actions to manage potential impacts on the operation of this equipment. Actions could include additional vibration attenuation, timing of works or the temporary relocation of equipment.

Perceptions around the impacts of construction could also impact the university's ability to attract research staff and students. This would only impact a very small percentage of potential researchers and students who are considering RMIT University compared to other similar institutions.

The recommended Environmental Performance Requirements and mitigation measures for noise and vibration would involve monitoring of vibration levels and regular communication with RMIT University and could involve modifying construction methods so the implications of any vibration impacts can be addressed (see Chapter 13 *Noise and Vibration*).

As noted in Section 11.7.1, achieving the recommended Environmental Performance Requirements would reduce the risk of significant business disruption from construction activities in this precinct to low or very low.

The large number of workers located in the precinct during the construction phase would generate demand for goods and services that may benefit some local business types, particularly food and beverage businesses.

11.14.2 Operation

Even without Melbourne Metro, there is expected to be a significant amount of residential development and employment growth located in and around the Hoddle Grid, including the CBD North precinct. This growth would be drawn by the area's very high levels of transport accessibility.

Another benefit that may arise after the construction phase is the unlocking of development potential above part of the station. To a large extent, the employment benefits from this opportunity would be dependent upon the scale and nature of the development. For instance, a residential building may only bring employment benefits during the construction period, whereas an office building would also bring a larger workforce to the precinct once completed.

The project would also enable more trains and people to come to the CBD. This would increase passing trade in the vicinity of the station entrances, benefitting some business types such as retail and food and beverage.

More broadly, the operation of Melbourne Metro would be expected to increase the connectivity of the city and increase household access to the CBD. This would result in a range of agglomeration benefits, such as greater access for businesses to potential labour.

By 2041, the precinct would generate \$1.6 billion in Gross Value Added and support 14,000 jobs (with Melbourne Metro).

11.15 Precinct 6: CBD South Station

The CBD South station precinct is in the heart of the Melbourne CBD. It encompasses Flinders Street Station, Federation Square, St Paul's Cathedral, City Square and Melbourne Town Hall, as well as retail, office, education and accommodation uses. The St Kilda Road – Swanston Street corridor is the busiest tram route in Melbourne and a main access point for workers and visitors to the CBD.

In 2015, there were 733 businesses located in the precinct which employ about 6,300 people. Around 33 per cent of employment in the precinct was within the retail and food and beverage sectors, with most of these businesses located along Swanston Street. Business and professional services firms also featured prominently, mostly based in office buildings along Swanston Street.

11.15.1 Construction

The main business impacts in this precinct during construction would be associated with the acquisition of commercial property, the occupation of City Square for a major construction work site, disruptions to tram services travelling from St Kilda Road, the temporary closure of Flinders Street, additional truck and construction traffic and reduced amenity.

Overall, the construction of Melbourne Metro would result in an estimated reduction of approximately \$35.2 million in Gross Value Added in the CBD South station precinct as a result of commercial property acquisition and business disruption.

Commercial Property Acquisition and Business Displacement

Eight commercial property titles would potentially need to be acquired in this precinct to enable construction. This includes allotments along Swanston Street containing retail and fast food outlets and Flinders Street (Port Phillip Arcade). At City Square, Brunetti City Square would need to be acquired. Part of the land owned by the City of Melbourne that is presently occupied by the City Square Car Park is also proposed to be acquired. This acquisition would impact on access to the Westin Hotel basement (which includes car parking and other essential services), which would have implications for the Westin's operations. Access to the Westin's services would be maintained during construction.

This acquisition would lead to the displacement of an estimated 32 businesses and 278 jobs, and a reduction of around \$24 million in Gross Value Added in the precinct. Given the level of churn in the CBD property market, there is every reason to expect that most of these businesses would relocate within the precinct or shift to other adjoining streets and laneways.

The impact to these businesses would be mitigated through compensation entitlements provided through the *Land Acquisition and Compensation Act 1986*, early engagement, assistance to find suitable alternate premises and sufficient notification of acquisition.

Business Disruption

General

Some businesses would be disrupted temporarily as a result of changed amenity, additional truck movements and disruption to road traffic, tram services and pedestrian traffic.

Food and beverage businesses would potentially be the most affected by amenity impacts, especially those with outdoor seating, as well as service businesses where the customer experience is crucial to attracting trade. The potential reduction in amenity is expected to reduce demand for the goods and services sold by businesses in proximity to the construction work, although demand would be redirected to some extent over time to businesses located in surrounding streets and laneways.

Disruptions to tram services and increased truck and construction traffic for the duration of CBD construction works, along with constrained access for pedestrians alongside station entrance construction work sites, would also be expected to reduce access to businesses.

The recommended Environmental Performance Requirements and potential mitigation measures for noise and vibration require monitoring and regular communications with stakeholders (see Chapter 13 *Noise and Vibration*). Further mitigation measures may also be required to manage the impacts of construction activities on commercial buildings located close to excavation sites in this precinct, such as ACMI (for the Federation Square excavation) and Young and Jackson Hotel (for the Flinders/Swanston Street excavation).

As noted in Section 11.7.1, measures would be taken to avoid or mitigate business disruption impacts through the recommended Environmental Performance Requirements and mitigation measures. This would include preparation of a business disruption plan that would identify ways to manage impacts on non-acquired businesses.

Taking these measures would reduce the overall risk of significant business disruption from construction activities in this precinct to low or very low. However, it is anticipated that there would be some decline in passing trade along some streets in the precinct. There would potentially be significant impacts on a small number of businesses in specific locations, as discussed below.

The large number of workers located in the precinct during the construction phase (reaching around 315 in the second year) would result in demand for goods and services that may benefit some local business types, particularly food and beverage businesses.

City Square

The temporary occupation of City Square would be likely to have a significant impact on businesses that are located within City Square or that have a City Square frontage. Access to these businesses would be highly constrained during construction of CBD South station to the point they may not be viable.

A number of businesses operate within City Square or have frontage onto the square including a range of cafes, bars and other retail outlets. The contribution of these businesses to activity within the precinct would be expected to be lost entirely. This is due to the location of the construction work site directly in front of their businesses and the associated visual and other amenity impacts, changes to access and the importance of passing trade to the operation of these businesses.

The owner of the Westin Hotel, who also owns the premises along the eastern side of City Square, would likely receive reduced or no rental income in respect of these tenancies for the duration of the construction phase. The western side of the Westin Hotel overlooks the City Square and guests staying on this side of the building would be likely to experience reduced amenity (including increased noise and vibration levels) associated with construction of the station entrances and cavern, although recommendations have been made on how these effects could be mitigated.

Airborne noise would comply with the relevant EPA criteria if an acoustic shed is deployed over construction activities in City Square and key construction activities are carried out during the day where possible, although this shed would alter the visual amenity of City Square when viewed from the Westin Hotel. Nevertheless, if air and noise emissions are assumed to be at the levels predicted in the relevant assessments, this may require the hotel to offer reduced rates or it may lead to higher vacancy rates.

City Square has been host to a number of public events over recent years that have helped to attract local people and tourists to the precinct. The displacement of these events would affect the trade of surrounding businesses, particularly food and beverage and retail businesses.

Corner of Flinders Street and Swanston Street

The acquisition of Port Phillip Arcade would temporarily create a 'dead end' at Scott Alley. Pedestrians, who currently can walk from Flinders Street to Flinders Lane through Port Phillip Arcade and Scott Alley, would then only be able to access Scott Alley from Flinders Lane. Businesses in Scott Alley, which rely heavily on passing trade, would potentially be impacted to a significant extent during the construction period – although this may be mitigated to some extent by increased advertising and signage.

Young and Jackson Hotel, on the corner of Swanston and Flinders Streets, would be nearly surrounded by the construction work site and its trade would also be significantly impacted during the construction phase. Again, this could be mitigated to some extent with increased advertising, signage and the maintenance of pedestrian movements along Swanston and Flinders Streets.

Businesses at Federation Square are unlikely to be impacted significantly as construction activities would not prevent or deter people from accessing these businesses.

Achieving the recommended Environmental Performance Requirements would involve taking specific measures to minimise impacts on businesses at these locations and at City Square. These proposed measures could include:

- Providing regular updates on the timing and duration of activities that would likely impact these businesses
- Establishing a consultation group for these businesses to meet at regular intervals as jointly agreed
- Consulting with businesses to ensure reasonable access arrangements for their business and customer needs
- Developing 'way finding' programs to help customers and workers navigate construction work to access existing businesses
- Mitigating amenity impacts in accordance with the proposed measures identified in the transport, air quality and noise and vibration impact assessments (refer to Chapter 8, Chapter 12 and Chapter 13).

11.15.2 Operation

As discussed under Precinct 5, the CBD is expected to record a significant amount of residential development and employment growth, even without Melbourne Metro.

However, Melbourne Metro would allow for potential development above the station entrances in Swanston and Flinders Streets. The employment benefits from this opportunity would be dependent upon the scale and nature of development.

Melbourne Metro would enable more trains and people to come to the CBD, with the improved connectivity and accessibility provided by the project predicted to lead to additional annual production of \$1.8 million for the precinct.

11.16 Precinct 7: Domain Station

The Domain station precinct includes open space and a number of buildings containing residential, retail and office uses. In 2015, there were 306 floors of commercial, retail and educational space on the western side of St Kilda Road and 44 businesses on the eastern side of St Kilda Road within the precinct. In total, there are approximately 6,800 employees within the precinct.

11.16.1 Construction

The main business impacts in this precinct during construction would be associated with the closure of Domain Road and the potential re-routing of the number 8 tram to Toorak Road West, disruptions to St Kilda Road traffic and tram services, additional truck and construction traffic, reduced amenity and the increased demand for on-street parking generated by construction workers.

Overall, the construction of Melbourne Metro would be expected to result in a small reduction of around \$0.8 million in Gross Value Added in the Domain station precinct, as a result of business disruption.

Commercial Property Acquisition and Business Displacement

No commercial properties would need to be acquired in this precinct and no businesses would be displaced.

Business Disruption

The construction of Melbourne Metro would create temporary disruptions to some business activity from changed amenity, additional truck movements and traffic congestion, and reduced access for potential customers. Amenity impacts are expected to particularly impact the operation of food and beverage businesses, especially those with outdoor seating, and service businesses where the customer experience is crucial to attracting trade. This is expected to reduce demand for the goods and services sold by businesses in proximity to the construction work, although demand would likely be redirected to some extent, over time, to businesses located in surrounding streets.

Other business in the precinct (including Melbourne Grammar School and Mac.Robertson Girls' High School) would not be impacted adversely during construction. Changes to access from the potential realignment of the number 8 tram from Domain Road and Park Street would impact business activity for businesses along these streets, particularly those that rely on passing trade. Impacts are anticipated to be minimal, due largely to the local catchment of these businesses. Measures would be taken to avoid or mitigate these impacts through the recommended Environmental Performance Requirements and mitigation measures. Taking these measures would reduce the risk of significant business disruption from construction activities in this precinct to low or very low.

The construction phase would also be expected to increase traffic disruption through the potential reduction of St Kilda Road to one lane in each direction and the use of trucks and vehicles related to construction work. This would disrupt access to businesses in the precinct for employees, customers and deliveries. Traffic management plans would minimise these impacts, as well as the impacts of the use of trucks and vehicles related to construction work on local traffic flows and traffic congestion, and help to maintain access to local businesses (see Chapter 8 *Transport*).

Part of the parkland surrounding the Shrine of Remembrance would be acquired and temporarily occupied to enable construction in the precinct. The triangular reserve at the intersection of St Kilda Road and Albert Road (Albert Road Reserve) would also be used for Melbourne Metro's construction. This may have some impact on events in the precinct. Construction work in the road reserve may require events that currently use St Kilda Road, including the Melbourne Marathon, Run Melbourne and City to Sea to be re-routed away from the construction. The displacement of these events from the precinct would affect the trade of surrounding businesses, particularly food and beverage and retail.

The large number of workers located in the precinct during the construction phase would result in demand for goods and services that may benefit some local business types, particularly food and beverage businesses. The land use audit conducted for the impact assessment identified approximately 15 food and beverage premises in this precinct. As these businesses mainly service office workers based in the precinct, it would be expected that the demand for food and drink from these providers would remain largely unchanged. For those businesses that experience some drop in sales and output, this could be offset by the increase in demand from construction workers.

11.16.2 Operation

There would be expected to be limited opportunity for commercial development in the immediate vicinity of the new Domain station, given that the area is adjacent to parkland and anecdotal evidence suggests that residential property values in the vicinity are two to three times commercial property values.

However, the station would be expected to improve the accessibility and relative attractiveness of the South Melbourne district, which is expected to result in a change in the property mix of the immediate area. Total floor space would be expected to remain broadly unchanged, although a higher proportion of commercial offices and premises would be expected close to the station due to the improvement in accessibility and relative attractiveness of the area to businesses.

Overall, Melbourne Metro would be expected to have a positive impact on business and economic activity in the Domain station precinct, leading to additional annual production of \$2 million for existing jobs in the precinct and resulting in the creation of an additional 800 jobs and \$254.6 million Gross Value Added by 2041 (compared to the project not proceeding).

11.17 Precinct 8: Eastern Portal (South Yarra)

The eastern portal precinct includes open space and residential development with offices, retail premises and shops located along Toorak Road and Chapel Street. In 2015, there were 31 businesses located within the precinct, almost all of which are in the retail trade sector, with an estimated 310 employees.

11.17.1 Construction

The main business impacts in this precinct would be associated with the effects of residential property acquisition on business activity, additional truck and construction traffic, decreased amenity and the increased demand for on-street parking generated by construction workers.

Overall, the construction of Melbourne Metro would be expected to result in a relatively small reduction of around \$1.1 million in Gross Value Added in the eastern portal precinct, as a result of business disruption.

Commercial Property Acquisition and Business Displacement

No commercial properties would need to be acquired in this precinct and no businesses would be displaced.

Business Disruption

The construction of Melbourne Metro would create disruptions to some business activity from changed amenity, additional truck movements and traffic disruption, and reduced access for potential customers. Food and beverage businesses would potentially be the most affected by amenity impacts, especially those with outdoor seating, as well as service businesses where the customer experience is crucial to attracting trade. This would be expected to reduce demand for the goods and services sold by businesses in proximity to the construction work, although demand would be likely to be redirected over time (to some extent) to businesses located in nearby streets.

As noted in Sections 11.6 and 11.7, these impacts would be managed and reduced by achieving the recommended Environmental Performance Requirements and implementing the proposed mitigation measures. This would reduce the risk of significant business disruption in this precinct to low or very low.

The acquisition of seven residential properties in the precinct would reduce the demand for goods and services in the local area by around \$91,000 each year. While lost from the precinct, this expenditure would not be lost from the Melbourne economy (assuming people relocate elsewhere in the area or elsewhere in Melbourne). This decline in spending may be offset by the construction workforce based in the precinct demanding additional goods and services that would benefit some business types, particularly food and beverage businesses.

11.17.2 Operation

The operational phase of Melbourne Metro would be expected to have limited impact on the businesses within the eastern portal precinct. The proposed project would not be anticipated to alter business numbers within the precinct or wider local area.

11.18 Precinct 9: Western Turnback (West Footscray)

This precinct is largely industrial with very few businesses operating within the precinct and two non-government organisations: The Potter House Christian Fellowship and the Western Emergency Relief Network.

11.18.1 Construction

The construction for the third platform at West Footscray station would not extend beyond the rail reserve. Accordingly, construction activity would have minimal impact on businesses in the precinct.

Commercial Property Acquisition and Business Displacement

No commercial properties would need to be acquired in this precinct and no businesses would be displaced.

Business Disruption

The contained construction footprint and very small number of businesses in or near the precinct means that disruptions to businesses from the construction of Melbourne Metro would be minimal. Some food and beverage businesses in the broader local area may benefit from the spending of construction workers during the construction period.

As noted in Section 11.7.1, measures would be taken to avoid or mitigate amenity and traffic impacts through the achievement of the recommended Environmental Performance Requirements. Achieving these requirements would reduce the risk of significant business disruption from construction activities in this precinct to very low.

11.18.2 Operation

The operational phase of Melbourne Metro is expected to have a minimal impact on businesses within this precinct. The proposed project would not be anticipated to alter business numbers within the precinct or the broader local area.

11.19 Environmental Performance Requirements

As noted in Section 11.6, measures are available to avoid or minimise the business impacts from the construction and operation of Melbourne Metro. The following table shows the recommended Environmental Performance Requirements for Melbourne Metro in relation to business impacts.

The risk numbers listed in the final column align with the list of business risks provided in Technical Appendix B *Environmental Risk Assessment Report*.

Table 11-5 Environmental Performance Requirements for Business

Draft EES evaluation objective	Environmental Performance Requirements	Proposed mitigation measures	Precinct	Timing	Risk No.
<p>Social, community, land use and business – To manage the effects on the social fabric of the community in the area of the project, including with regard to land use changes, community cohesion, business functionality and access to services and facilities, especially during the construction phase.</p>	<p>Reduce the disruption to businesses from direct acquisition or temporary occupation of land, and work with business and land owners to endeavour to reach agreement on the terms for possession of the land.</p>	<p>Early face-to-face engagement with acquired businesses (at least six to 12 months' warning is preferable)</p> <p>Businesses given a single point of contact including a contact name and direct phone number where they can direct all enquiries</p> <p>Where the program allows, businesses are given a minimum of six months' notice of acquisition, but preferably at least 12 months</p> <p>Consider the early purchase of properties in consultation with businesses</p> <p>Facilitate business relocation through providing assistance in finding sites for relocation, the logistics of relocation, and advertising and other requirements arising from changed location</p> <p>Undertake business surveys before, during and after construction activity</p> <p>Trigger levels identified in the transport impact assessment, air quality impact assessment and air quality impact assessment to be utilised to identify if there are impacts beyond those anticipated that could trigger the assistance identified in the business disruption strategy</p>	<p>All</p>	<p>Design</p>	<p>B006</p>

Draft EES evaluation objective	Environmental Performance Requirements	Proposed mitigation measures	Precinct	Timing	Risk No.
	<p>Prepare a business disruption plan to manage impacts to non-acquired businesses and to engage with business, property owners and the community throughout construction. The plan shall include:</p> <ul style="list-style-type: none"> • Timely information on key project milestones • Changes to traffic conditions and duration of impact • A project construction schedule developed in coordination with transport authorities and local councils and in consultation with businesses to minimise cumulative impacts of this and other projects • Plans for notifying customers of proposed changes to business operations, including the setting of suitable timeframes for notification prior to commencement of works • Measures to ensure access to businesses is maintained for customers, delivery and waste removal unless there has been prior engagement with affected businesses (including mutually agreed mitigation measures as required). This could include the installation of directional and business signage to assist customers • Process for registering and management of complaints from affected businesses. 	<p>Provide regular updates on the timing and duration of impacts to surrounding businesses</p> <p>Mitigate against impacts in accordance with mitigation measures identified in the air quality and noise and vibration impact assessments</p> <p>Develop 'way finding programs'* to establish pedestrian access patterns</p> <p>Establish a consultation group comprising all major health care and research institutions to meet at regular intervals as jointly agreed</p>	All	Construction	B001 B002 B004 B005 B007 B008 B009

* Pedestrian way finding programs used by Optus following their move from North Sydney to Macquarie Park could be an example of this type of mitigation program.

Draft EES evaluation objective	Environmental Performance Requirements	Proposed mitigation measures	Precinct	Timing	Risk No.
	Following consultation with potentially affected businesses and prior to main works or shaft construction commencing, prepare management plans to minimise dust, noise and vibration impacts during construction, as per Environmental Performance Requirements for air quality and noise and vibration.	Provide regular updates on the timing and duration of impacts to surrounding businesses Develop 'way finding programs' to establish pedestrian access patterns Mitigate against impacts in accordance with mitigation measures identified in the air quality and noise and vibration impact assessments Relocate the Fawkner Park Children's Centre and Kindergarten for the duration of the construction	All	Construction	B003
	Maintain vehicular and pedestrian access to hospital emergency departments at all times during construction and to other key health and medical facilities where practicable.	Consult with all major health care and research institution	All	Construction	B001 B004
	Develop a stop work contingency plan for Class 1 emergencies (as defined in the <i>Emergency Management Act 2013</i>) in consultation with medical institutions in the Parkville precinct in the event that Melbourne Metro construction works are required to cease.	Consult with all major health care and research institutions	4 – Parkville station	Design/ Construction	B001 B004

Refer also to the recommended Environmental Performance Requirements in relation to transport, social and community, air quality and noise and vibration impacts. These requirements and proposed mitigation measures are provided in Chapters 8, 10, 12, 13 and 17 respectively.

11.20 Conclusion

Achieving the recommended Environmental Performance Requirements would be expected to reduce business risks arising from Melbourne Metro to low or very low, with the exception of the Parkville station precinct where construction risks would remain 'moderate'.

Achieving the Environmental Performance Requirements, and implementing the proposed mitigation measures, would reduce the risk of significant disruption to businesses during construction. However, the ability of individual businesses to trade could be compromised in and around City Square, on the corner of Swanston and Flinders Streets, and in Scott Alley (all in the CBD South station precinct) and along Domain Road (Domain station precinct).

In the Parkville station precinct, construction activity could potentially be particularly disruptive to business activity, due partly to the highly specialised and sensitive nature of a number of facilities located within the precinct.

Specific Environmental Performance Requirements have been recommended to minimise disruption to businesses in close proximity to construction sites and activities, and to maintain access to businesses during construction (including emergency access to hospitals). Measures to avoid or minimise amenity impacts associated with construction dust, noise and vibration, and traffic and public transport disruption are set out in Chapter 8 *Transport*, Chapter 12 *Air Quality* and Chapter 13 *Noise and Vibration*. Businesses would be consulted in the preparation of impact management plans.

Construction activity has been confined to specific sites and existing road reserves, with acquisition of commercial land that supports around 87 businesses required.

MMRA would provide a high level of assistance to the businesses being displaced by this land acquisition. This would include early engagement with acquired businesses, providing a minimum of six months' notice prior to possession (where the program allows) and assisting with finding sites for relocation, the logistics of relocation and advertising, and other requirements arising from a changed location.

The business impact assessment found that Melbourne Metro would be consistent with the draft EES evaluation objectives as it would manage amenity and traffic impacts on business functionality and reduce almost all of these impacts to low or very low.

Melbourne Metro also aligns with and helps to achieve stated Victorian Government policy and guidelines – in particular, by helping to expand the central city, helping to create a city structure that drives productivity, and continuing to develop a transport system that better links people to jobs and services.

Once Melbourne Metro is operational in 2026, significant business benefits would begin to be realised. By enhancing connectivity and accessibility throughout metropolitan Melbourne, Melbourne Metro would support a substantial increase in labour productivity across the city's economy by 2041, resulting in the generation of additional Gross Value Added of around \$800 million per annum.