July 2020

Pyrmont Peninsula Economic Development Strategy

Final draft

NSW
GOVERNMENT

Table of contents

List of figures

List of tables

Executive summary

THE PYRMONT PENINSULA TODAY

Home to **20,000** residents

Supports **40,000** workers with **$7 billion** per annum of economic activity

Sydney's **5th** largest business district

Key sectors include tourism and entertainment, media, professional services, IT and education

Supports the global attractiveness of **Sydney Harbour** with a vibrant and unique **24-hour economy**

Drives growth through the **Innovation Corridor**

Fosters collaboration of **small business, start-ups** and **research institutions**

THE PYRMONT PENINSULA IN 20 YEARS

Should the **Government invest** in a Sydney Metro West Station[1] and enable an additional **600,000 – 800,000** square metres of employment floorspace, the **Peninsula** would:

Support **20,000 – 23,000** additional workers representing growth of around **50%** against current levels

Expand its local economy by **60%** – with **$4.2-$4.9 billion** more economic output per year compared to current levels

Increase local productivity by **7%** – due to an increase in knowledge intensive jobs

A Metro station will bring approximately **10,000 workers** and **$2.1 billion** in economic activity, representing close to half the estimated total uplift in these measures to **2041**

These changes will be supported by adjustments to planning controls alongside improvements in amenity and connectivity across the Peninsula

1 The NSW Government is continuing to investigate the feasibility of building a Metro station in Pyrmont. This includes further industry engagement and transport and economic modelling to assess its feasibility and affordability.

Introduction

The Pyrmont Peninsula ('the Peninsula') is a vibrant and unique area situated in the Western Harbour on the fringe of Australia's busiest business district. The Peninsula is home to over 20,000 residents and close to 40,000 workers.

The area has evolved significantly over time. From its origins as an industrial waterfront, it has transformed into a significant economy in its own right. In what is a relatively small area in geographic terms (roughly 1.5 square kilometres, which is about one-third the size of Sydney CBD), it is Sydney's fifth largest small-area economy.[1] Residents, major employers, retail and entertainment providers jostle for space in what is one of Sydney's true 'mixed use' areas.

In recognition of this ongoing evolution, the Greater Sydney Commission (GSC) was commissioned in 2019 to undertake a planning review of the Precinct. This review consulted widely with residents, businesses, and workers and ultimately recommended the development of a detailed Pyrmont Peninsula Place Strategy ('the Place Strategy'), supported by an Economic Development Strategy (EDS) to highlight the role and potential of the Peninsula in growing a stronger and more competitive harbour.

Objectives of the Economic Development Strategy

In line with Sydney's role as a global city, change is already occurring in and around the Peninsula. The question for the EDS, and the Place Strategy it supports, is how to best harness this change and capitalise on the area's economic strengths and opportunities.

There are two fundamental principles for developing a strategy: (1) a strategy requires making difficult trade-offs (most importantly, choosing what not to do), and (2) every strategy should seek to capitalise on what makes a precinct (or city, or business) truly unique. Relevant and actionable Economic Development Strategies do just that by establishing one or two truly globally relevant specialisations in which to make concerted, long-term investments.

As the *New South Wales (NSW) Economic Blueprint* did for the State, this EDS will contextualise and localise the state-wide economic strategy for the Peninsula in order to inform the planning and infrastructure decisions within the Place Strategy.

[1] As measured by ABS Statistical Area 2 employment and economic output for Pyrmont - Ultimo

The objectives of this EDS are therefore to:

- o understand the historical and current economic character of the Peninsula through analysis of key economic and commercial indicators

- o identify economic and commercial growth drivers for the area and define the strategic vision including the Peninsula's role within Greater Sydney

- o forecast employment by industry and infrastructure requirements assuming a Sydney Metro West Station is constructed at Pyrmont and comment on the implications and risks

- o provide recommendations on how to ensure strong and lasting economic growth and realise the strategic vision for the Peninsula.

Strategic vision for Pyrmont Peninsula

The Peninsula has seen consistent growth in jobs and economic activity over the last 20 years, while preserving many of the unique aspects of the area. Of the major employing industries, tourism and entertainment media and professional services have experienced the strongest growth at above 4 per cent year-on-year over the 10 years to 2018.

Although still dominated by residential land use, Pyrmont is home to an array of commercial uses across industry sectors in addition to being an entertainment and tourism hub anchored by The Star Casino, the International Convention Centre (ICC), the Sydney Fish Market, the Australian Maritime Museum, the Powerhouse Museum, and Harbourside. As home to these globally significant tourist destinations, the Peninsula has a unique opportunity to continue to grow its attractiveness to visitors and strengthen its role as an entertainment hub in the Western Harbour. To the south of the Peninsula, a large and established higher and tertiary education presence exists with University of Technology Sydney (UTS) and the Technical and Further Education (TAFE) facilities in Ultimo.

In recognition of the growth observed in the precinct, the NSW Government's strategic direction for the Peninsula was established in the Greater Sydney Region Plan: *A Metropolis of Three Cities*. This plan aimed to rebalance growth and deliver its benefits more equally and equitably to residents across Greater Sydney. The Peninsula sits as a critical part of the 'Innovation Corridor' that includes Pyrmont and Ultimo, encompasses Central and Camperdown and extends southward towards Redfern and Eveleigh.

The Peninsula's role within the Innovation Corridor recognises the significance of the 40,000 (largely knowledge-intensive) jobs already located in the area. Pyrmont is among the top 10 regions in Greater Sydney for professional services jobs, which are attracted by its proximity to the CBD, character buildings, and waterfront access.

The area is known for the presence of innovative and creative businesses and its tourism and entertainment offerings. Figure 1 illustrates the industry sector clustering in Pyrmont using a location quotient analysis, which reveals the relative proportion of industries compared to the NSW state average.

Figure 1: Industry cluster analysis of the Pyrmont Peninsula relative to NSW (2018)
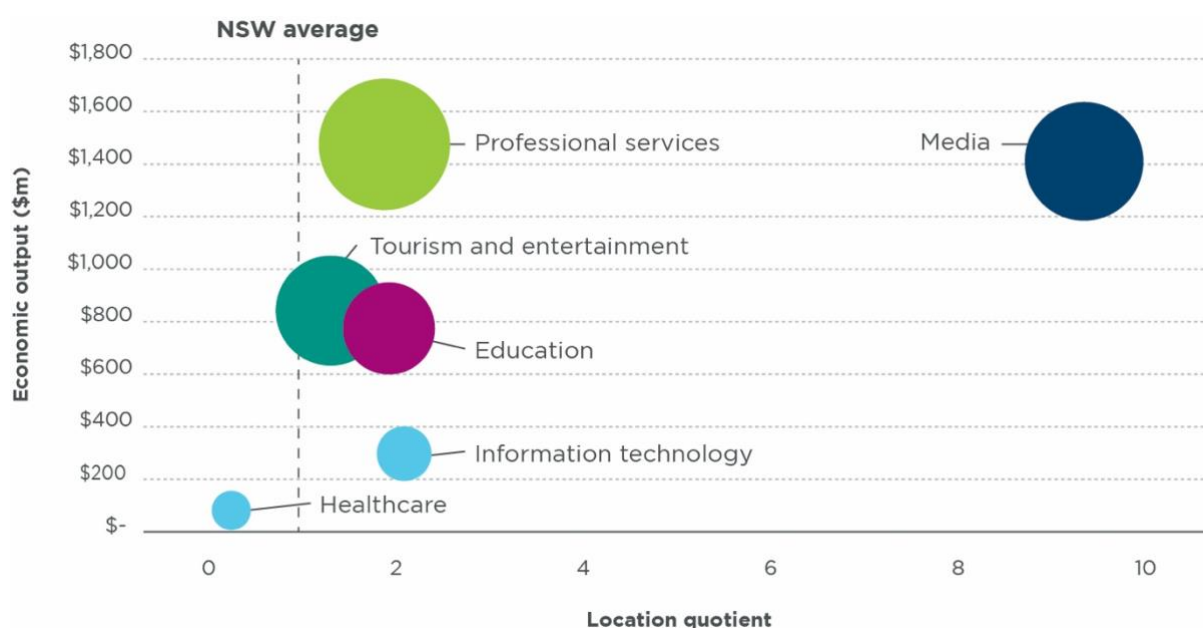
Source: PwC (2019) Geospatial Economic Model

Note: The location quotient represents the proportion industry composition for Pyrmont against the average proportion for New South Wales. The size of the bubble represents the proportion of Pyrmont's economic output attributable to the industry. Refer to Appendix C for industry mapping to the Australian Bureau of Statistics ANZSIC industry definitions.

The presence of media and media-related activities is part of what makes the Peninsula unique. In economic development terms, this is a 'cluster' or specialisation on which there is an opportunity to build due to comparative advantage. Capitalising on the unique character and function of Pyrmont by selectively investing in spaces and supporting infrastructure that will make the area attractive and affordable for these types of businesses will help to ensure the area's continued growth and role in the Innovation Corridor.

Delving further into the role of the creative media cluster reveals a further specialisation in web search portals, data processing platforms and publishing and broadcasting. This specialisation, exemplified by the presence of Google, has been characterised as creative media and 'adtech' (the strategy, set up, and management of digital advertising activities). The evidence shows that the Peninsula has the highest percentage of jobs in adtech of any small area in NSW, equating to roughly 1,600 jobs.[2]

These adtech and other creative media jobs are at risk due to the departure of Seven Network (which moved its head office to South Eveleigh in 2018) and the expected departure of Nine (including the Sydney Morning Herald and the Australian Financial Review), which are moving to North Sydney in the second half 2020.[3] For the Peninsula to strengthen its role in adtech and creative media, the NSW Government should support

[2] ABS (2016) Census of Population and Housing - small area economy is defined by ABS Statistical Area 2 boundaries. A significant number of these jobs are within Google, which moved to the precinct in 2015 and expanded it's offices in 2018.

[3] The Australian (2019), Nine to unite in North Sydney, available https://www.theaustralian.com.au/business/property/nine-to-unite-in-north-sydney/news-story/ab1f6973d3433852a2895975d75ab837

targeted industry development, talent and investment attraction, and consider developing dedicated spaces for start-ups to showcase and prototype solutions.

The economic vision for the Peninsula is for the area to:

- o play a strong role in the NSW Government's Innovation Corridor, driving innovation through digital advertising technology and new media to complement the emerging Tech Central precinct

- o create an environment to foster the connection and collaboration of major institutions with industry, (including start-ups and small business) to increase productivity through research and innovation

- o enhance its role as an attractive waterfront tourism and entertainment district, supporting the global attractiveness of the Sydney Harbour with a 24-hour economy.

Looking ahead

Over the past 20 years, Pyrmont has evolved to become one of the largest 'city fringe' commercial office precincts in Sydney. Vacancy rates have fallen from their peak of 12 per cent in 2014 to below 4 per cent in 2019, with rents increasing in line with demand. This, coupled with the limited supply of office space in the precinct until 2025, limits the opportunities for employment growth going forward.

Figure 2 : Pyrmont vs Sydney CBD: Average vacancy rates, Average gross face rents, Indicative office supply pipeline (sqm 000's)*

Source: Knight Frank (2019), Cushman and Wakefield (2019), Floor Space and Employment Survey 2017 (Harris St Village Area): City of Sydney, PwC Analysis (2020)

* Estimated floorspace and completion date only and subject to change

The success of the Peninsula going forward, in economic terms at least, will be decided by three factors:

- o **Availability (and cost) of commercial floorspace:** supply of office and other floorspace to accommodate growth in population and employment into the future.

- o **Connectivity:** access to the area (particularly through mass public transport), ability to move around the precinct (e.g. walking, cycling), and connectivity with the Innovation Corridor and other key precincts and employment hubs in NSW.

- o **Maintaining character and attraction:** continuing to attract anchor tenants in key industries (including adtech, tourism and entertainment, and education) and small businesses, despite the increasing rents and physical barriers to growth. Additionally, enhanced amenity and entertainment opportunities are key to attracting business, residents and tourists.

Likewise, there are risks to achieving the strategic vision that should be considered:

- o **Competing precincts** – other precincts in Greater Sydney could attract key industries or anchor tenants away from the Peninsula. Some neighbouring precincts are earmarked for development to encourage innovative enterprise, including Tech Central and Bays West.

- o **Upward pressure on rents** – increased economic development in the Peninsula could put upward pressure on commercial rents, which could price out rent-sensitive start-ups and creative businesses.

- o **Maintaining Pyrmont's attractive urban character** – stakeholders consulted in the development of the Place Strategy highlighted the importance of Pyrmont's amenity in maintaining its attractiveness to enterprise, in particular preserving the mixed-use character of the precinct. For the economic vision to be realised, economic development and accompanying changes to urban character and built form will need to occur in a way that maintains or strengthens Pyrmont's attractiveness.

- o **COVID-19** – the COVID-19 pandemic has caused immediate and widespread changes to the way Australians go about their jobs. In a post-COVID world, working remotely will likely be more common, however the importance of face-to-face interactions has also been reinforced. In light of these changes, the lasting impacts (if any) on employment precincts and commercial floorspace are not yet well understood. There could be fewer jobs physically located in precincts if businesses encourage remote working.

- o **Job automation** – jobs are at risk of either being automated or augmented by new technologies, machine learning and artificial intelligence. This is considered a risk to the realisation of job and economic activity growth in the area.

Future growth

The NSW Government is continuing to investigate building a Metro station in Pyrmont. This includes further industry engagement and transport and economic modelling. Additionally, employment and commercial floorspace forecasts assume that investment in a Metro station will be accompanied by appropriate changes to planning controls (zoning, built form) to support the economic growth in the Peninsula.

Compared to the current industry fabric and urban character, the economic development forecast for Peninsula demonstrates:

- o strong growth in jobs – an increase of 20,000 - 23,000 by 2041

- o a local economy that is approximately 60 per cent larger by 2041 with $4.2-$4.9 billion more economic output per year compared to current levels

- o an increase in productivity by 7 per cent due to the growth in jobs in knowledge intensive industries

- o greater supply of commercial buildings — an additional 600,000 – 800,000 sqm of floorspace will be required across the precinct by 2041

- o increased retail and residential development density (more shops and apartments) associated with the provisioning of a Metro station, as well as more commuters coming in and out of the area

- o an industry mix more geared towards the knowledge industries, albeit with growth in many of the associated industries for which the Peninsula is currently recognised, including tourism and entertainment, media, and information technology (IT).

Table 1 summarises the forecast employment and required floorspace to accommodate this increase.

Table 1: Summary - economic and floorspace forecasts

Industry	Employment - 2017	Employment - 2041	Net employment increase (2017 – 2041)	Net economic output increase ($ millions)	Additional floorspace* required by 2041 ('000 sqm)	Assumed job density (sqm/job)
Total	**36,900**	**56,700 – 60,000**	**19,800 – 23,100**	**$4,280 - $4,940**	**590 - 823**	
Tourism and entertainment	8,100	10,800 – 11,400	2,700 – 3,300	$290 - $360	176 - 228	65 - 69
Media	7,100	8,500 – 9,000	1,400 – 1,900	$260 - $360	35 - 57	25 - 30
Professional services	6,800	12,500 – 13,200	5,700 – 6,400	$1,150 - $1,300	86 - 128	15 - 20
Education	5,500	7,400 – 7,800	1,900 – 2,300	$250 - $310	95 - 127	50 - 55
Information technology	1,500	2,800 – 3,000	1,300 – 1,500	$240 - $280	20 - 30	15 - 20
Healthcare	800	1,100 – 1,200	300 - 400	$30 - $40	8 - 12	26 - 31
Other knowledge services	3,000	8,500 – 9,000	5,500 – 6,000	$1,830 - $1,990	110 - 150	20 - 25
Industrial and other services	4,100	5,100 – 5,400	1,000 – 1,300	$230 - $300	60 - 91	60 - 70

Source: City of Sydney (2017), Floor Space and Employment Survey 2017, TfNSW's Travel Zone Projection 2016, PwC (2019) Geospatial Model, PwC analysis (2020)

* Additional floorspace required is measured as NLA - Net Lettable Area

Note: The additional economic output is provided in real Australian dollars using the base year of 2017

Stakeholder consultations undertaken to inform the vision for the area have highlighted diverse views held by the community in respect to the 'optimal' future for the Peninsula. There is no solution that will be pleasing to all interested stakeholders, so all opportunities and threats should be considered in the planning process.

Recommendations

The analysis undertaken in this EDS has led to a number of recommendations to support the growth of the Peninsula in line with the economic vision. These recommendations, grouped under the identified key growth drivers of the area, are presented in Table 2.

Table 2: Recommendations to support the growth of the Pyrmont Peninsula

Growth driver	Recommendations
Industry mix and ability to cluster	1. Foster a collaborative/networking environment for companies and educational institutions within the Innovation Corridor. Increasing national and international competitiveness through innovation districts is a planning priority in the GSC's Eastern District Plan. As an example, Government should engage with anchor tenants in adtech (e.g. Google) to establish long term collaboration with businesses and industry across the Innovation Corridor. 2. Support local tertiary and vocational training institutions to offer courses that cater to the skills that the Innovation Corridor is likely to need (e.g. in media). 3. Strengthen and communicate the unique proposition of the Peninsula's 24-hour economy with globally significant events, arts, entertainment and recreation, pop-ups and cultural events.
Cost of commercial floorspace	4. Support appropriate and sustainable developments that increase and re-purpose the supply of commercial floorspace to accommodate projected employment in the area (for example, via the new development proposals in Blackwattle Bay and Ultimo). 5. Consider actions to enable ongoing availability of affordable space for small business, startups and creative industries.
Connectivity	6. Subject to completion of a final business case, invest in a Sydney Metro West station to realise the full economic potential of the Peninsula, driving economic growth, creating jobs and increasing visitation. 7. Strengthen active transport connections within the Peninsula including between open spaces and the foreshore, and deliver missing regional and local cycle infrastructure.
Amenity	8. Establish a business improvement district to improve amenities and public domain. 9. Rejuvenate Harris Street and renewal sites including Blackwattle Bay, Darling Island and Tumbalong Park through new hubs of activity and enhanced shopfronts, streetscapes and public spaces. 10. Open up the foreshore and Wentworth Park for additional open space and improved waterfront access for recreational and cultural uses. This is critical to attracting creative and knowledge-based employers and providing quality places for new and existing residents.

1. Introduction and context

1.1 The Pyrmont Peninsula

The Peninsula is a vibrant and unique area situated in the Western Harbour on the fringe of Australia's busiest business district. The Peninsula is currently home to over 20,000 residents and around 40,000 workers, enticed by the mix of jobs in emerging industries, the range of amenities and the rich urban character of the area.

The area is characterised by significant tourism and entertainment land uses on its eastern edge, tertiary educational institutions and major professional service businesses in or around Ultimo, a range of local retail offerings and a presence of small to medium innovative and creative enterprises.

Employment in the Peninsula has grown strongly over the last 10 years. Major employers include the ABC, the ICC, The Star, UTS, TAFE, Google and a range of other media businesses.

The visitor economy is buoyant, supported by the ICC, Darling Harbour, the Star Casino and other attractions including the Sydney Fish Markets, the Australian Maritime Museum and the Powerhouse Museum.

The Peninsula contains dispersed areas of open space and urban tree canopy. Wentworth Park provides a large recreational facility, the Darling Harbour waterfront includes open areas with pedestrian access and there are several parks dispersed throughout residential neighbourhoods. There are four community centres, one public primary school and around 10 childcare centres. The Peninsula is connected to the Sydney CBD, east and west through light rail and bus services and the harbour via two ferry wharfs. The Pyrmont Bridge provides pedestrian and cycleway access to the Sydney CBD.

Apart from being on the doorstep of the Sydney CBD, it will also neighbour Tech Central (formerly known as the Sydney Innovation and Technology Precinct), the Camperdown-Ultimo Collaboration Precinct and the Bays Precinct.

History and context of the area

The Gadigal people of the Eora Nation are the Traditional Custodians of land in the area. In the early 1900s, the area was predominantly an industrial precinct with sugar mills, flour refinery, bottled milk dispatch, electricity generation and a busy working harbour.[4] During the latter half of the 20th century, Pyrmont underwent a marked evolution from predominantly industrial land use to the residential, commercial, tourism and higher education uses now associated with the area. The relocation of Sydney Fish Market to Blackwattle Bay in 1966 was a major catalyst for the land use shift away from industrial uses. Pyrmont has grown into a thriving mixed-use precinct and one of the largest economies in Sydney and NSW. The

[4] Sydney Harbour Foreshore Authority (2004), Ultimo + Pyrmont Decade of Renewal

region now attracts businesses in innovative and creative industries and remains a hub for tourism and entertainment with a 24-hour economy.

Boundary of the Pyrmont Peninsula

For the purposes of the Place Strategy, the Peninsula is defined as shown in Figure 3. The Peninsula is within the City of Sydney Local Government Area (LGA), part of the Eastern Harbour City and comprises the suburbs of Pyrmont, Ultimo and parts of Darling Harbour and the Bays Precinct. The area is bounded by the harbour to the north, Wentworth Park to the west, Darling Harbour to the east and Broadway to the south.

Figure 3 : The Pyrmont Peninsula boundary

Legend
○ Pyrmont Peninsula

Source: Greater Sydney Commission (2019), Western Harbour Precinct including the Pyrmont Peninsula Planning Framework Review Report

This boundary has been defined to provide clarity around the area used for the purposes of this analysis and other analyses feeding into the broader Place Strategy. Despite the boundary being defined for this purpose, the Place Strategy acknowledges and highlights the importance of the surrounding areas to the growth trajectory of the Peninsula. In particular, the neighbouring areas that will play a critical role in the success of the Peninsula include the Sydney CBD, Darling Harbour, Tech Central (including the Central to Eveleigh Corridor), the Camperdown-Ultimo Collaboration Area, and the Bays Precinct (which includes Bays West).

1.2 Objectives of this Economic Development Strategy

The EDS forms a critical input to the Place Strategy. It informs and scopes the economic landscape of the Peninsula, identifying strengths and opportunities for economic activation. In addition, it provides recommendations for the NSW Government to realise the strategic vision of the area and informs the direction on infrastructure investment decisions.

The main objectives of this EDS are presented below:

- o understand the historical and current character of the Peninsula through analysis of key economic and commercial indicators
- o identify economic and commercial growth drivers for the area and define the strategic vision including the Peninsula's role within Greater Sydney
- o forecast employment by industry and infrastructure requirements with inclusion of a Sydney Metro West station in Pyrmont and comments on the implications and opportunities
- o provide recommendations to Government to ensure a strong economic future for the Peninsula and comment on the risks of realising the strategic vision.

To deliver on the objectives, the remainder of this document is structured as follows:

- o **Chapter 2: Current state analysis** – provides a historical and current state analysis of the economic and commercial characteristics of the Peninsula, highlighting what makes the area unique against other comparable employment centres.
- o **Chapter 3: Future outlook** – articulates the drivers of growth in the Peninsula with considerations to the trends and policies driving growth across Sydney, NSW and the strategic vision of the local area.
- o **Chapter 4: Employment and floorspace forecasts** – forecasts industry level employment in the Peninsula over the next 20 years, commenting on the infrastructure requirements, commercial feasibility and opportunities.
- o **Chapter 5: Implications and recommendations** – explores the implications of the forecasts, details recommendations and risks in realising the strategic vision, and provides opportunities and recommendations for Government.

This EDS is not intended to narrowly define the objectives or metrics for economic development in the Peninsula, but rather to explore strategic opportunities that will drive growth and guide the realisation of the vision for the area.

1.3 Strategic vision for the Peninsula

The NSW Government's strategic vision for the Peninsula is articulated as an emerging Innovation Corridor that is part of a strong and competitive Harbour CBD. The Eastern City District Plan sets out planning priorities and actions to deliver the Greater Sydney Region Plan and promotes the attraction and development of innovation activities in the Corridor to enhance Greater Sydney's global competitiveness.[5]

The Innovation Corridor extends south from The Bays Precinct through Pyrmont, Ultimo, University of Sydney to Royal Prince Alfred Hospital and includes North and South Eveleigh, Central Station and parts of Surry Hills. It contains knowledge-intensive, creative and start-up industries along with health, education and research services that support the global competitiveness of the Harbour CBD. The Region Plan and District Plan recognise the Peninsula's important role in the Innovation Corridor. Figure 4 illustrates the industry clusters that currently exist in and around the Peninsula, emphasising the area's role in the Innovation Corridor.

Figure 4 : Industry clusters in and around the Pyrmont Peninsula
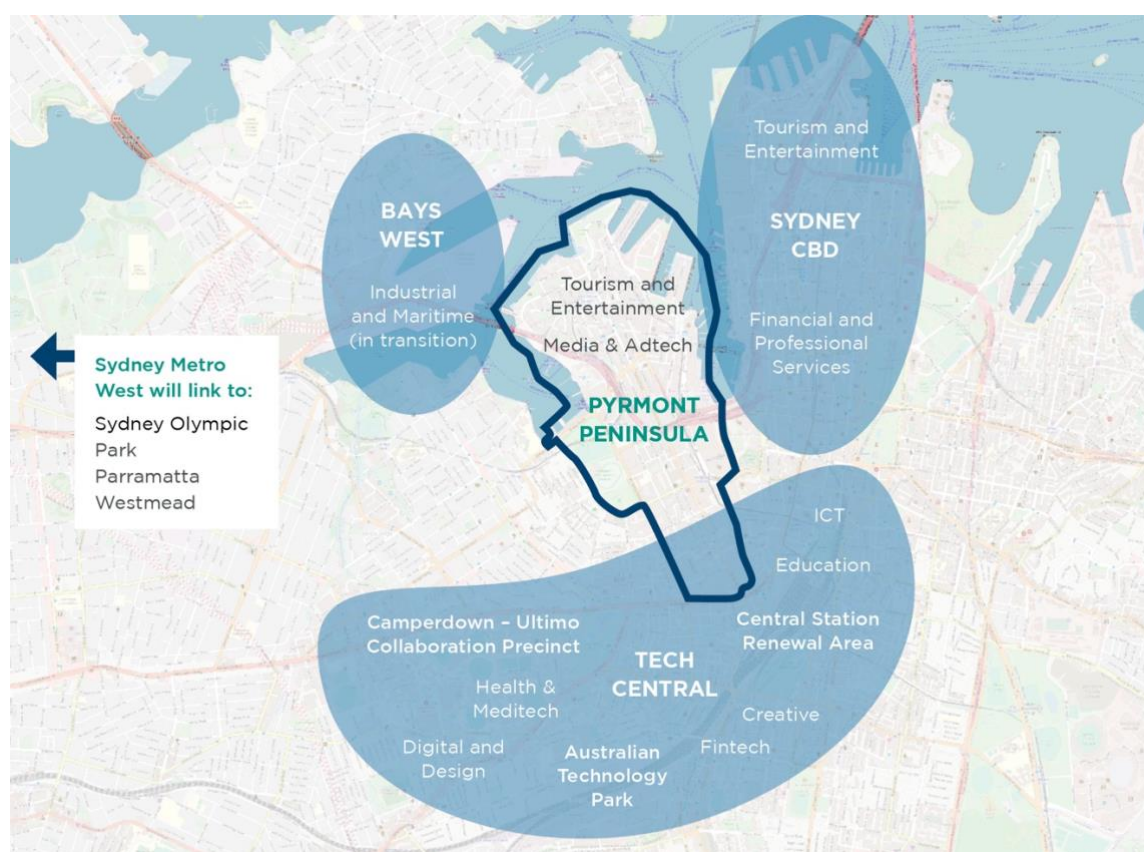
Source: PwC, NSW Treasury, Department of Planning, Industry and the Environment (2020)

---

[5] Greater Sydney Commission (2019), Western Harbour Precinct including the Pyrmont Peninsula: Planning Framework Review Report

The Peninsula is a regionally significant tourism destination, a hub for creative industries, IT and media companies, and is one of the top 10 precincts in the Greater Sydney region for professional services jobs. Dating back to the Pyrmont - Ultimo planning framework in the mid 1990's, the vision for the area has been a vibrant mixed-use precinct featuring high-quality public domains with public access to the entire foreshore.[6]

In addition, the Greater Sydney Region Plan and Eastern City District Plan recognise the importance of collaboration, liveability, sustainability and place-based planning that aligns infrastructure with growth.

This EDS focuses on the economic vision of the Peninsula within Greater Sydney (the place-making elements of the vision will be further explored in the Place Strategy). The economic vision for the Peninsula is summarised below:

- o play a strong role in the NSW Government's Innovation Corridor, driving innovation through digital advertising technology and new media to complement the emerging Tech Central precinct
- o create an environment to foster the connection and collaboration of major institutions with industry (including start-ups and small business) to increase productivity through research and innovation
- o enhance its role as an attractive waterfront tourism and entertainment district supporting the global attractiveness of the Sydney Harbour with a 24-hour economy.

1.4 Policy context and strategic alignment

Background

The Greater Sydney Commission's (GSC) *Western Harbour Precinct including Pyrmont Peninsula Planning Framework Review Report* in September 2019 recommended developing a Place Strategy for the Western Harbour Precinct. The GSC highlighted the importance of an EDS — a key input into the Place Strategy — that would identify the potential of the Peninsula in growing a stronger and more competitive harbour.

Additionally, the City of Sydney ('the City') acknowledged the Peninsula as a pivotal location in the Eastern City District's Innovation Corridor in its *Local Strategic Planning Statement* (LSPS). The LSPS highlights priorities and actions for consideration in the Place Strategy (including the EDS) as follows:

- o Promote employment growth, visitor accommodation, affordable enterprise space, high technology industry, retail, community and cultural uses.
- o Identify a review of the land use framework where a Sydney Metro West station is committed in Pyrmont.
- o Facilitate improved environments for walking and cycling.

---

[6] Greater Sydney Commission (2019), Western Harbour Precinct including the Pyrmont Peninsula: Planning Framework Review Report.

  o Maximise public and active transport interchange.
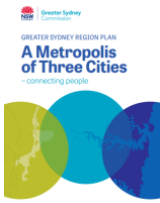
These priorities and actions, the LSPS stated, will guide the city in its review of planning controls in Pyrmont-Ultimo and its advocacy to the NSW Government where the State is responsible for development in the area.

Alignment with NSW Government strategic plans

The strategic direction of the Place Strategy, including the EDS for the Peninsula, builds on the strategy and planning work already completed across numerous State and Local Government reports. In forming the directions of the Place Strategy there was consideration of the themes of infrastructure, collaboration, liveability, productivity and sustainability woven through the *Greater Sydney Region Plan* and the *Eastern City District Plan*.

The EDS also draws on the *NSW Economic Blueprint* and the *Global NSW Strategy*, recognising the importance of smart, vibrant and connected precincts and creating a strong, open and globally connected economy. Table 3 highlights the themes relevant to the EDS.

Table 3: Alignment with state and region strategies

Document	Key themes relevant to the Economic Development Strategy
Greater Sydney Region Plan	o Greater Sydney celebrates the arts and supports creative industries and innovation. o Internationally competitive education, research and innovation precincts. o Communities that are culturally rich with diverse neighbourhoods.
Eastern City District Plan	o Growing a stronger and more competitive Harbour CBD. o Growing investment, business opportunities and jobs in strategic centres. o Fostering healthy, creative, culturally rich communities. o Growth in targeted industry sectors including the visitor economy.
NSW Economic Blueprint	o Sets the direction for NSW's continued economic success in a changing world. o Globally connected businesses and industries are vital. o Supporting high-growth industries including tech-innovation, tourism and education. o Desire for innovative businesses and industries of the future. o Government should behave in a way that encourages innovation.
Global NSW Strategy	o To competitively position NSW in the global economy and cement Sydney and NSW's regional leadership as Australia's global hub. o To support a strong and resilient NSW economy by growing and diversifying trade, stimulating new business investment, fostering innovation and boosting our industry competitiveness in our cities and across the regions. o Equip our businesses, from small businesses and start-ups through to industry leaders, with the skills, know-how, talent and partners in innovation o Foster an environment conducive to investment that allows innovation to prosper. o Deliver productive jobs in great places to live. o Promote NSW's business, creative, innovation, research and education credentials to the world.

Source: Greater Sydney Commission (2018) Greater Sydney Region Plan, Greater Sydney Commission (2018) Eastern City District Plan, NSW Treasury (2019) NSW 2040 Economic Blueprint, NSW Treasury (2019) Global NSW.

Other Government plans relevant to this EDS include:

- o the City's *Economic Development Strategy*
- o the City's draft *Central Sydney Planning Strategy*
- o the City's *Camperdown-Ultimo Collaboration Precinct Innovation and Collaboration Study*
- o the GSC's *Camperdown-Ultimo Place Strategy*
- o directions from the strategic work being undertaken by NSW Treasury on Tech Central.

This EDS reflects on these documents and situates them within the local context in order to set out a strategy and identify opportunities for capitalising on the economic potential of the area.

Draft directions for the Pyrmont Peninsula Place Strategy

The Department of Planning, Industry and the Environment (DPIE) released draft directions for the Place Strategy in March 2020. This document highlights 10 directions that are the starting point for a robust, workable place strategy that considers the many elements that make a city a great place to live, work and visit. The 10 directions are highlighted in Figure 5.

Figure 5 : The 10 draft directions for the Place Strategy

1 Development that complements or enhances the area	2 Jobs and industries of the future	3 Centres for residents, workers and visitors	4 A unified planning framework	5 A tapestry of greener public spaces
New or upgraded buildings fit with the Peninsula's evolving character.	Investment and innovation to boost jobs, creativity, tourism and night life.	New, lively and attractive centres for everyone to enjoy.	Clearer rules delivering greater certainty and investment.	Better spaces, streets and parks; a rich canopy of trees; and access to the foreshore.
6 Creativity, culture and heritage	7 Making it easier to move around	8 Building now for a sustainable future	9 Great homes that can suit the needs of more people	10 A collaborative voice
Celebrating Pyrmont Peninsula's culture, heritage and connections to Country.	Safer, greener streets integrating with new public transport.	An adaptive sustainable and resilient built environment.	A diversity of housing types, tenure and price points.	A cohesive, agreed approach to bring about the best outcomes for Pyrmont Peninsula.

Source: NSW Department of Planning, Industry and Environment (2020), Directions for the Pyrmont Peninsula Place Strategy

2. Current state analysis

2.1 Current state of the economy in the Pyrmont Peninsula

Economic activity and employment

The Peninsula is the fifth largest small area economy and employment hub in Greater Sydney and NSW.[7] It hosts close to 40,000 jobs, which together contribute to a $7.5 billion economy. Figure 6 shows the position of the Peninsula in Greater Sydney and Table 4 (next page) depicts its economic size and contribution.

Figure 6: The position of Pyrmont Peninsula within the Eastern Harbour City
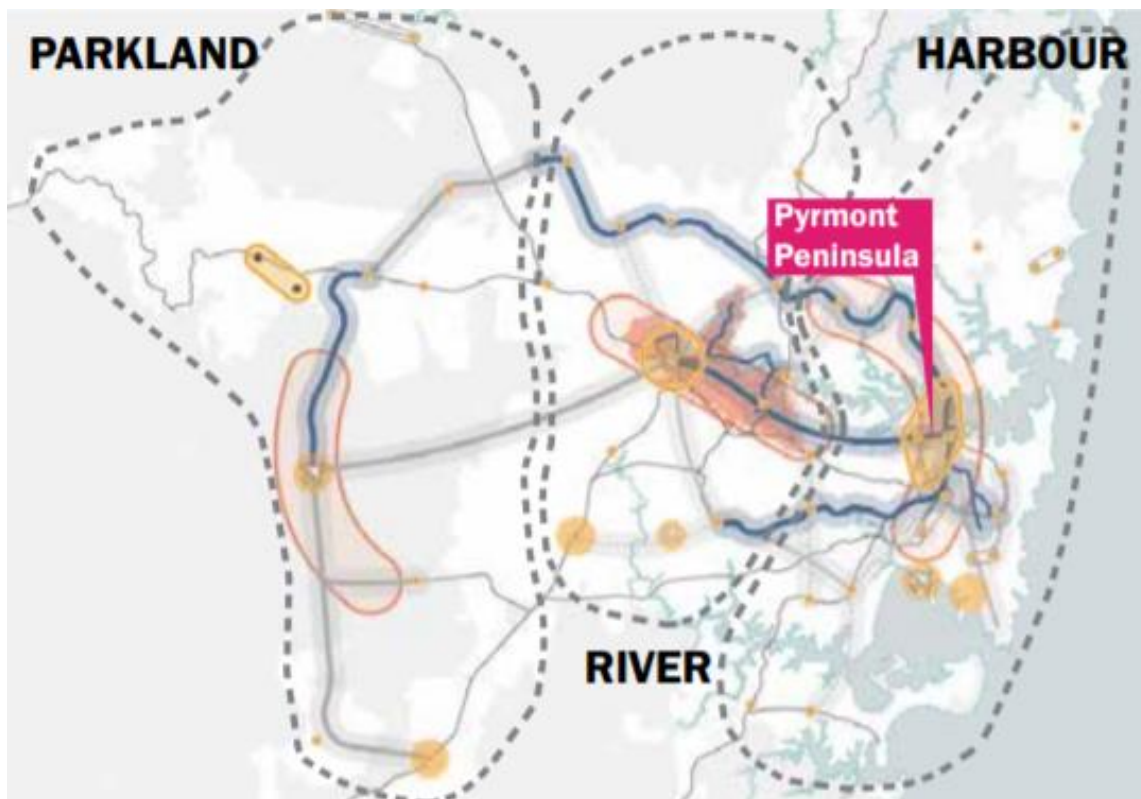
Source: Hassell (2020) Pyrmont Peninsula Place Strategy Project Potential Report

---

[7] Small area economies are defined as Australian Bureau of Statistics Statistical Area 2 regions. Pyrmont Peninsula is the fifth largest for both economic activity and employment.

Table 4: The economic size of Pyrmont Peninsula (2018)

	Economic output ($m)	Jobs
New South Wales	$554,917	3,155,741
Greater Sydney	$411,170	2,204,102
1. Sydney CBD	$83,964	345,599
2. North Sydney	$13,282	50,641
3. Macquarie Park	$11,206	52,594
4. Parramatta	$9,108	51,014
5. Pyrmont Peninsula	**$7,463**	**39,047**
6. St Leonards	$5,736	30,259
7. Surry Hills	$5,731	31,243
8. Homebush Bay	$5,390	26,253
9. Chatswood	$5,225	28,578
10. Singleton Region	$5,090	6,802

Source: PwC (2019), Geospatial Economic Model

Note: Small area economies listed here are ABS Statistical Area 2 regions (with names adjusted where necessary)

The Peninsula covers an area of 1.5 square kilometres, approximately one third the size of the Sydney CBD. It is a dense employment hub with strong productivity that has maintained a unique mix of businesses and industries, contributing to the mixed-use character for which it is well-known. Table 5 highlights some key economic statistics for the Peninsula, with the Sydney CBD used as a point of reference.

Table 5: Pyrmont Peninsula economic profile (2018)

	Pyrmont Peninsula	Sydney CBD
Area (km2)	1.5	4.3
Economic output ($m)	$7,463	$83,964
Growth rate (p.a. over 5 years)	3.6%	4.1%
Output density ($m/km2)	$5,004	$19,556
Jobs	39,047	345,599
Job density (jobs/km2)	26,183	80,495
Productivity (output/job)	$191,117	$242,951
Number of businesses	1,697	16,145
Business revenue ($m)*	$15,220	$102,953

Sources: PwC (2019) Geospatial Economic Model, ABS (2018) Counts of Australian Businesses, ABS (2018) Australian Industry.

Note: Business revenue does not include Financial and Insurance Services revenue; the ABS do not release this data. Productivity is calculated using output and job estimates from PwC's Geospatial Economic Model.

Figure 7 highlights the change in economic activity, jobs and productivity over an 18-year period. Economic output and jobs have grown across this period, leading to the vibrant and thriving Pyrmont we know today.

Figure 7: Time series of key economic indicators

Sources: PwC (2019) Geospatial Economic Model

Industries in Pyrmont Peninsula

The area has seen consistent growth in jobs and economic activity over the last 20 years, while preserving many of the unique aspects of the area. The area is known for the presence of innovative and creative businesses and its tourism and entertainment offerings. Figure 8 illustrates the industry sector clustering in Pyrmont using a location quotient analysis, which highlights which industries Pyrmont is best known for. Figure 9 localises the industry clustering within the precinct.

Figure 8: Industry cluster analysis of the Pyrmont Peninsula relative to NSW (2018)
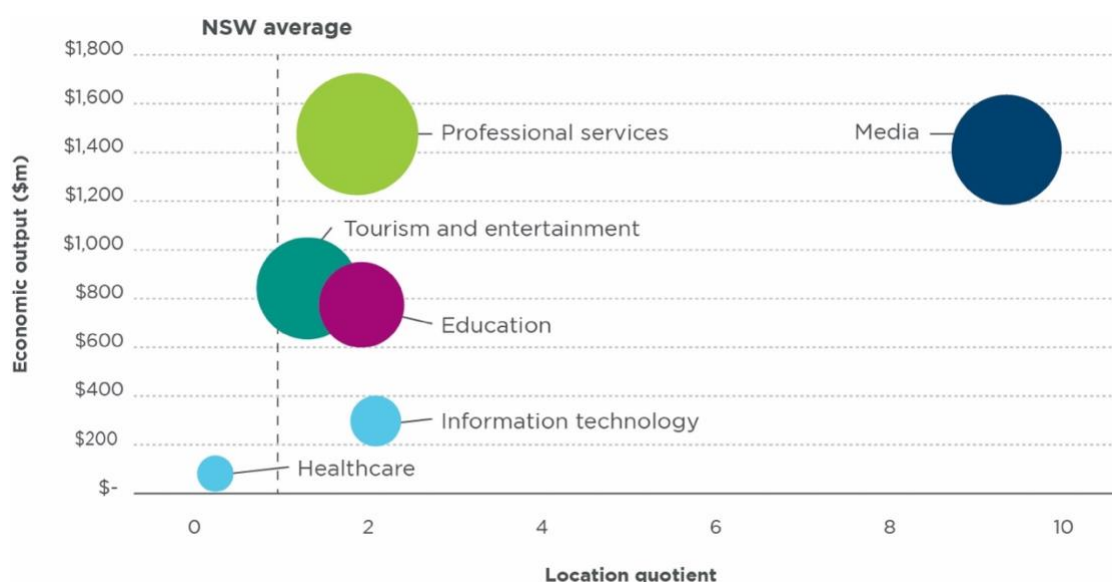
Source: PwC (2019) Geospatial Economic Model.

Note: The location quotient represents the proportion industry composition for Pyrmont against the average proportion for NSW. The size of the bubble represents the proportion of Pyrmont's economic output attributable to the industry. Refer to Appendix C for industry mapping to the Australian Bureau of Statistics ANZSIC industry definitions.

Figure 9: Localised employment clusters in Pyrmont Peninsula

EMPLOYMENT CLUSTERS

Employment Sector Density Legend
- Arts
- Retail
- Financial Services
- Professional Services
- Information Media
- Health
- Education
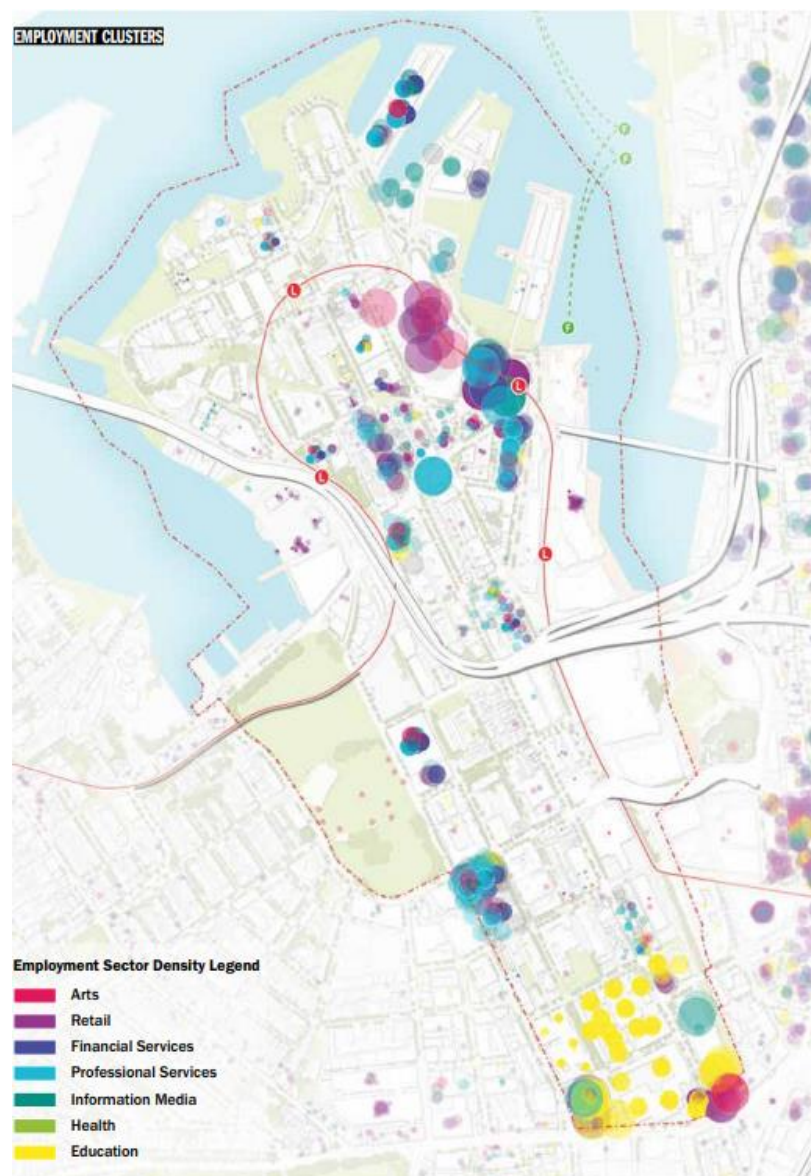
Source: Hassell (2020) Pyrmont Peninsula Place Strategy Project Potential Report

There is a strong representation of media with the likes of the ABC and Nine having an office presence in the Peninsula. There is an education cluster in the south of the Peninsula, which is home to both UTS and TAFE. The tourism and entertainment offerings are centred around the waterfront land in Darling Harbour with the ICC, Harbourside Shopping Centre, the Sydney Fish Market, the Australian Maritime Museum, the Powerhouse Museum, and The Star Casino. In terms of commercial offices, the Peninsula is currently home to Google and a range of small-to-medium-sized professional services businesses.

The combination of arts, information media, and professional services is of particular interest from an economic development perspective. There is strong evidence that these types of economic 'clusters' are the engine of urban economies. It is from these clusters that new jobs and GDP growth are propelled. In contrast, so-called 'population-serving' jobs (such as local retail shops) tend to increase in line with population, rather than driving economic growth in their own right.

Employment clusters such as the one seen in Pyrmont occur because businesses experience a competitive advantage from being there. To date, slightly cheaper rents, flexible floor plates and proximity to the CBD have all played a role. As more businesses cluster, this in turn drives increased productivity and innovation (often referred to as 'agglomeration') through collaboration, knowledge sharing and technology, and supply chain linkages.

There is evidence of the clustering of businesses already driving innovation in the Peninsula. This is a strategic priority for the area set out by the NSW Government. Businesses in the area are investing in new media and advertising technology. This is shaping the role for the Peninsula within the Innovation Corridor, currently complementing the likes of medtech in the Camperdown - Ultimo Collaboration Area and fintech in South Eveleigh. Figure 4 (p.15) highlights the role of the Peninsula within the Innovation Corridor, highlighting the industry clustering across this area.

The cluster of media, IT and professional businesses within the Peninsula are focused on new media and advertising technologies, anchored by the presence of Google. Table 6 shows that the Peninsula has the highest percentage of jobs in adtech of any small area economy in NSW. The City of Sydney's Tech Startups Action Plan noted Pyrmont – Ultimo's contribution to the nation's ICT workforce including start-ups and small business.[8] Sydney is home to 43 per cent of Australian tech start-ups and the action plan encourages tech start-ups to create jobs, boost productivity and strengthen global connections.[9] It is noted that the cluster of adtech jobs is currently heavily reliant on Google as the large anchor tenant. Other large-to-medium companies are already located elsewhere, including Salesforce and the Trade Desk in the Sydney CBD and Adobe at Darling Park. This could make it difficult to maintain the adtech clustering if Google was to leave the Peninsula.

[8] City of Sydney (2016), Tech Startups Action Plan

[9] Startup Muster (2018), Annual Report 2018

Table 6: Adtech jobs in the Pyrmont Peninsula against other areas in NSW (2016)

Region	Total jobs	Adtech jobs	% adtech jobs	Rank (% adtech jobs)
Pyrmont Peninsula	36,790	1592	4.3%	1
Glebe - Forest Lodge	7,128	165	2.3%	2
West Pennant Hills	2,599	55	2.1%	3
North Ryde - East Ryde	11,870	177	1.5%	4
Macquarie Park - Marsfield	48,320	647	1.3%	5
North Sydney - Lavender Bay	48,943	600	1.2%	6
Pennant Hills - Cheltenham	5,689	48	0.8%	7
Sydney CBD	320,836	2580	0.8%	8
St Leonards - Naremburn	29,288	220	0.8%	9
Concord West - North Strathfield	19,738	145	0.7%	10

Source: ABS (2016) Census

Note: Adtech includes jobs in Internet Publishing and Broadcasting, Internet Service Providers, Web Search Portals and Data Processing Services, Internet Service Providers and Web Search Portals, Data Processing, Web Hosting and Electronic Information Storage Services, Data Processing and Web Hosting Services, Electronic Information Storage Services

Of the major employing industries, tourism and entertainment, media, and professional services have had the strongest growth at above 4 per cent year-on-year over the last 10 years to 2018. Education appears to have suffered a larger hit following the Global Financial Crisis (GFC), however it has recovered and maintained about 5 per cent per annum growth since 2011. Figure 10 illustrates these employment trends over the past 10 years.

Figure 10: Growth in jobs in key industries
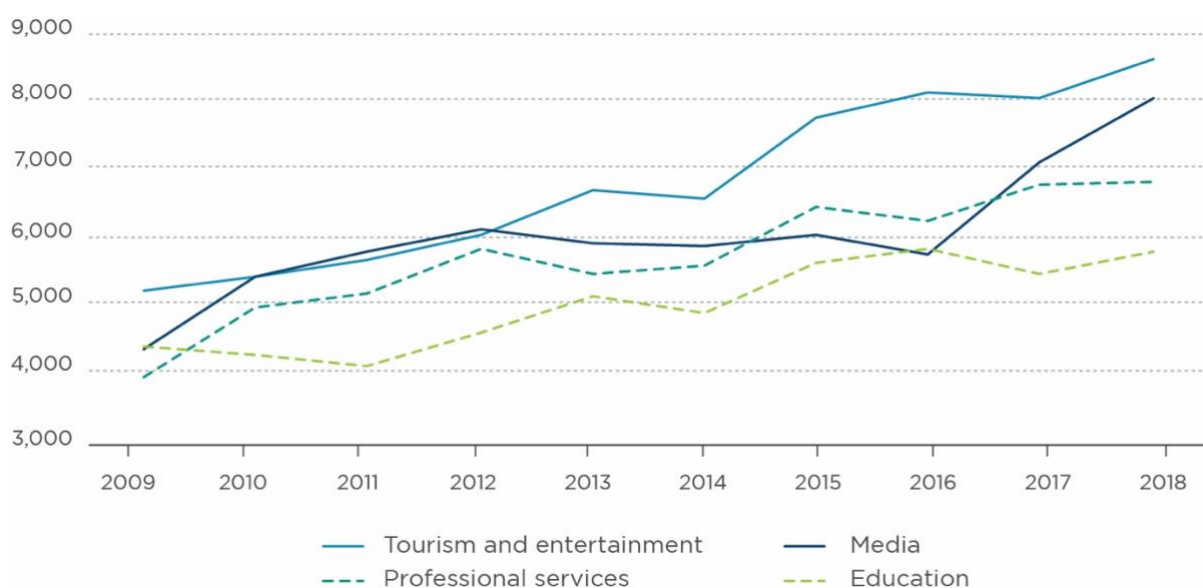
Source: PwC (2019) Geospatial Economic Model

Note: There are small job count differences between the PwC's Geospatial Economic Model (based on ABS data and other sources) and the City of Sydney's Floorspace and Employment Survey likely driven by respondent behaviour and boundary differences. Refer to Appendix C for industry mapping to the Australian Bureau of Statistics ANZSIC industry definitions.

As a fringe offering to the Sydney CBD, the Peninsula has managed to attract and retain small and medium businesses. It is home to 1,700 businesses that produce over $15 billion per annum in revenue. Small businesses, defined as those that have less than 20 employees, make up 90 per cent of all businesses in the Peninsula (this is slightly higher than the proportion of small businesses in the Sydney CBD, which is 88 per cent). Figure 11 highlights the ratio of small, medium and large businesses across the high employing industries in the area. The area is dominated by small and medium professional services and tourism and entertainment businesses. The average size of a professional services business in Pyrmont is about 10 employees.

Figure 11: Number of businesses in the Pyrmont Peninsula (2018)
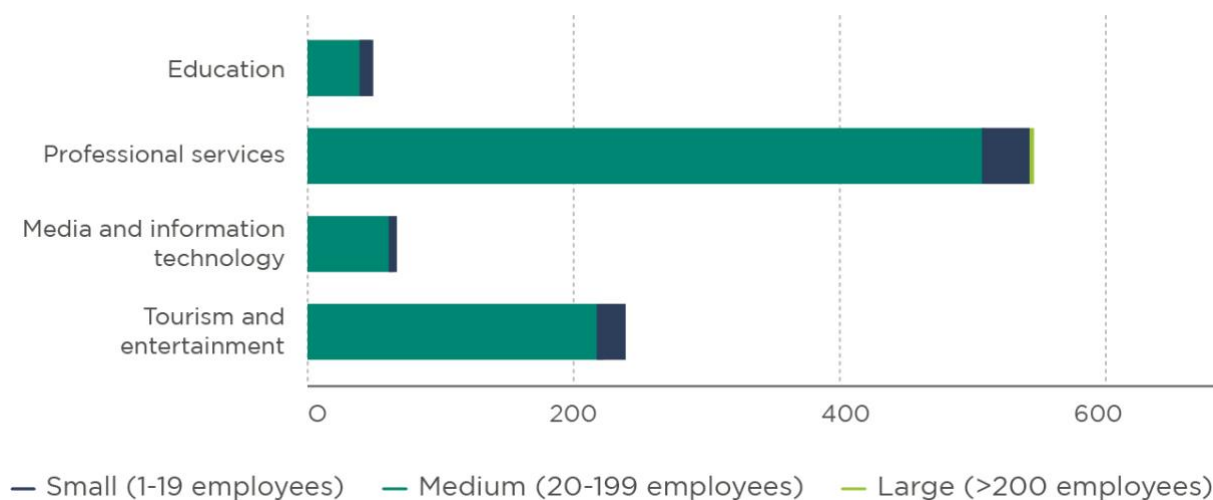
Source: ABS (2018) Counts of Australian Businesses

Accessibility and connectivity

In economic terms, connectivity is important because it affects both the number of businesses and customers a firm can easily trade with (business connectivity) and labour markets (the number and type of workers a business can draw on).

Connectivity is also sometimes referred to as accessibility or 'effective' density as it is determined by both the number of businesses located physically within the precinct (actual density) as well as the ease of connecting with other businesses in the Sydney CBD and other employment precincts (effective density). Improving connectivity therefore plays a role in unlocking the economic potential of precincts.

The Peninsula is accessible across a range of transport options, including active transport, public transport, car share and other vehicles. Transport options include:

- o light rail between Dulwich Hill and Central, via Rozelle and Lilyfield

- o bus services, with two routes serving the area, route 389 between Pyrmont and Bondi Junction via Town Hall and route 501 between West Ryde and Central via Pyrmont and Ultimo

- o ferries operating from two locations (Pyrmont Bay Ferry Service next to Australian National Maritime Museum and Casino Wharf)

- o passenger heavy rail services at Town Hall and Central within walking distance of the Peninsula

- o car share vehicles with more than 400 vehicles available

- o active transport links including the Union Street cycleway, connecting Pyrmont Bridge to Anzac Bridge and the Pyrmont Bridge providing pedestrian and cycle connection to the Sydney CBD

- o roads of regional significance including the Western Distributor, Harris Street and Wattle Street, with a large volume of parking for those who choose to travel by car.

The workforce in the Peninsula comprises 6 per cent Peninsula residents, 19 per cent residents in the remainder of Sydney Inner City and the remaining 75 per cent are from further abroad.[10] The proportion of workers in the Peninsula that travel from distant commuter locations such as the Central Coast and Wollongong is similar to that of the Sydney CBD.

It is broadly acknowledged that accessibility of the Peninsula needs to improve to accommodate new businesses, workers and visitors. The unique geography of the Peninsula comes with obvious constraints in terms of overland accessibility. An important

[10] Australian Bureau of Statistics (2016), Census of Population and Housing

consideration when improving transport connections is the Transport Access Program, which provided accessibility to people with a disability, limited mobility and parents with prams. The Pyrmont Bay Wharf was upgraded in 2015 as part of this Program.[11]

Connection with the Sydney CBD is currently largely reliant on active transport via the Pyrmont Bridge. Transport for NSW (TfNSW) analysis of mode of transport to work in the area concluded that there is a very high proportion of people walking to work at around 35 per cent. There are key locations where active travel links are disjointed and interrupted by major road corridors, such as Darling Harbour to Harris Street Village.

In addition to exploring options for a Sydney Metro West station at Pyrmont, there are investigations of increasing frequency of light rail services and a joint NSW Government and City of Sydney initiative for cycleway improvements.[12]

2.2 Current state of floorspace and key market indicators

Over the past 20 years, Pyrmont has evolved into one of the largest 'city fringe' commercial office precincts in Sydney. Although still dominated by residential land use, Pyrmont is home to an array of commercial uses across industry sectors in addition to being an entertainment and tourism hub, anchored by The Star Casino, the Sydney Fish Market, the ICC, the Australian Maritime Museum, the Powerhouse Museum and Harbourside.

The following section provides an overview of the current state of floorspace utilisation within Pyrmont on a sector-by-sector basis and identifies how these uses have evolved over the 10-year period from 2007 to 2017.

Floorspace analysis – Pyrmont Peninsula

Table 7: Pyrmont Peninsula floorspace use by type

Floorspace use by type^	2007	2017	Change (sqm)	2007 (composition %)	2017 (composition %)	Change (%)
Residential	751,600	938,572	**186,972**	24.9%	25.9%	**1.0%**
Parking	566,755	655,495	**88,740**	18.8%	18.1%	**- 0.7%**
Common Area	344,796	504,139	**159,343**	11.4%	13.9%	**2.5%**
Office	443,513	433,586	**- 9,927**	14.7%	12.0%	**- 2.7%**
Utilities	169,246	202,158	**32,912**	5.6%	5.6%	**0%**
Entertainment/ Leisure	128,665	201,794	**73,129**	4.3%	5.6%	**1.3%**

[11] Transport for NSW (2015), Pyrmont Bay Wharf upgrade, available < https://www.rms.nsw.gov.au/projects/pyrmont-bay/index.html>

[12] Greater Sydney Commission (2019), Western Harbour Precinct including the Pyrmont Peninsula Planning Framework Review Report

Storage	147,597	196,842	**49,245**	4.9%	5.4%	**0.5%**
Visitor Accommodation	136,736	159,599	**22,863**	4.5%	4.4%	**- 0.1%**
Community	62,843	98,394	**35,551**	2.1%	2.7%	**0.6%**
Other Infrastructure	107,781	62,849	**- 44,932**	3.6%	1.7%	**- 1.8%**
Restaurant/Eating	50,382	80,826	**30,444**	1.7%	2.2%	**0.5%**
Shop/Showroom	44,814	40,382	**- 4,431**	1.5%	1.1%	**- 0.4%**
Industrial	52,817	29,280	**- 23,537**	1.7%	0.8%	**- 0.9%**
Transport	13,383	20,777	**7,394**	0.4%	0.6%	**0.1%**
Total	**3,020,926**	**3,624,691**	603,766	**100%**	**100%**	

Source: City of Sydney (2017), Floorspace and Employment Survey

^ Definitions of Space Use Code can be found at:
https://www.cityofsydney.nsw.gov.au/__data/assets/pdf_file/0004/308056/Space-use-codes.pdf

* City of Sydney Floorspace and Economic Survey data for Pyrmont Review Area excluding Darling Harbour East

The sections below highlight the key trends in the floorspace use by type followed by the commercial office floorspace over the past 10-year period (2007-2017).

Floorspace use by type

Over the 10-year period from 2007 to 2017, residential remained the dominant land use within the Peninsula, accounting for some 939,000 sqm (or 26 per cent) of total floorspace. This represented an increase of almost 187,000 sqm over the period, up 25 per cent from 752,000 sqm in 2007. The second and third largest increases in floorspace by quantum were for common area and parking uses respectively – common area increased by more than 159,000 sqm (an increase of 46 per cent from 2007) to 504,000 sqm, while parking grew by about 89,000 sqm (an increase of 16 per cent from 2007) to 655,000 sqm.

Average commercial office job density

The purpose of the following sections is to analyse the key trends of a typical office precinct. As such, the Harris Street Village area (see Table 8) has been used instead of the Peninsula, as the large average job density in Darling Harbour West, which largely comprises of the ICC, would distort the average job density of a typical office and mixed use precinct. Harris Street Village is similar to the Peninsula in terms of the area it covers, excluding the Darling Harbour West area and a few other minor areas (see Appendix D).

Table 8: Pyrmont - Harris Street Village Area office floorspace

Floorspace use by type	2007	2017	Change (sqm)	Change (%)
Office	428,474	413,626	**-14,848**	**- 2.6%**

Source: Source: City of Sydney (2017), Floorspace and Employment Survey (Harris St Village Area)

Note: City of Sydney Floorspace and Economic Survey data for Harris St Village Area

While total office floorspace fell by about 3 per cent (or 14,800 sqm) to 413,600 sqm , the total number of jobs within Pyrmont (Harris Street Village area) increased by almost 66 per cent over the same period, resulting in a significant reduction in total office employment density by 41 per cent to an overall density of 16 sqm per job in 2017. This was largely underpinned by enhanced efficiencies in office floor plate configurations via the adoption of activity-based working and flexible workspaces.

On an industry sector basis, the ICT and professional and business services sectors saw the largest fall in job density (see Figure 12).

Figure 12: Pyrmont indicative average job density (office) by industry (sqm/job)
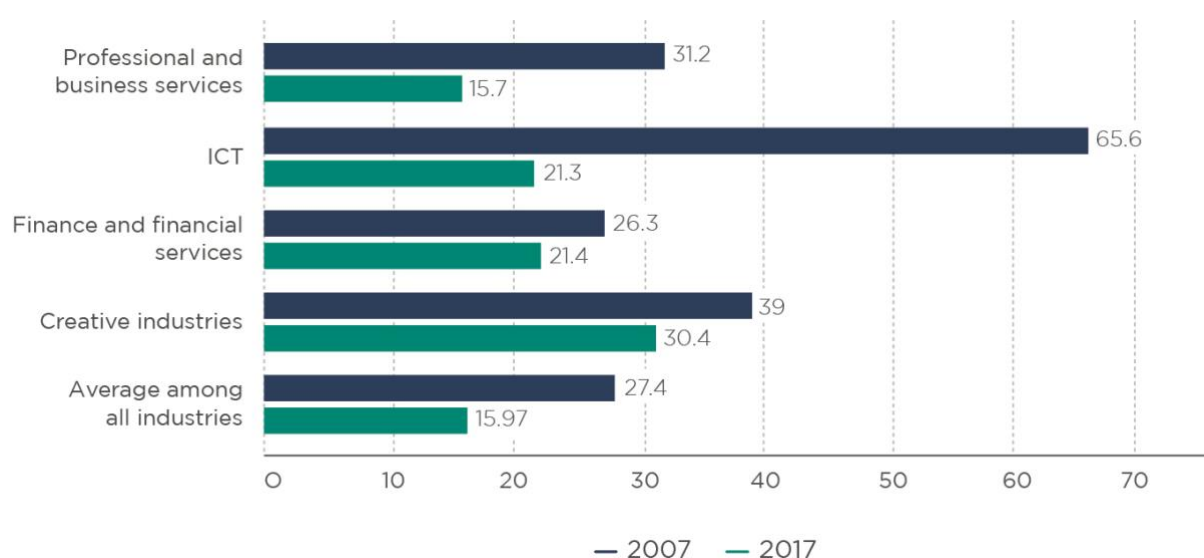
Source: Source: City of Sydney (2017), Floorspace and Employment Survey (Harris St Village Area)
Note: City of Sydney Floorspace and Economic Survey data for Harris St Village Area

Major commercial office tenancy and movements

The 10 years to 2017 saw the departure of many finance and financial services businesses (down 75 per cent) from Pyrmont (Harris Street Village area). Conversely, a number of ICT and professional and business services firms expanded their footprint, particularly in mid-2009 when Google officially opened its Sydney headquarters at Workplace6, with a commitment of 10,000 sqm. Google has since expanded its occupancy within Pyrmont through the lease of 22,000 sqm at 1 Darling Island Road and the acquisition of 38-42 Pirrama Road (25,000 sqm office building) in 2018.

On the other hand, two major media companies from the ICT sector have left or are in the process of leaving the precinct:

  o Seven Network, who moved its head office to South Eveleigh in 2018

  o Nine, including the Sydney Morning Herald and Australian Financial Review, which are moving to North Sydney in the second half 2020. [13]

Accordingly, the internal floorspace occupied by the ICT sector post-2017 is likely to be lower (see Figure 13).

Figure 13: Pyrmont internal floor space (office) by industry (total sqm)
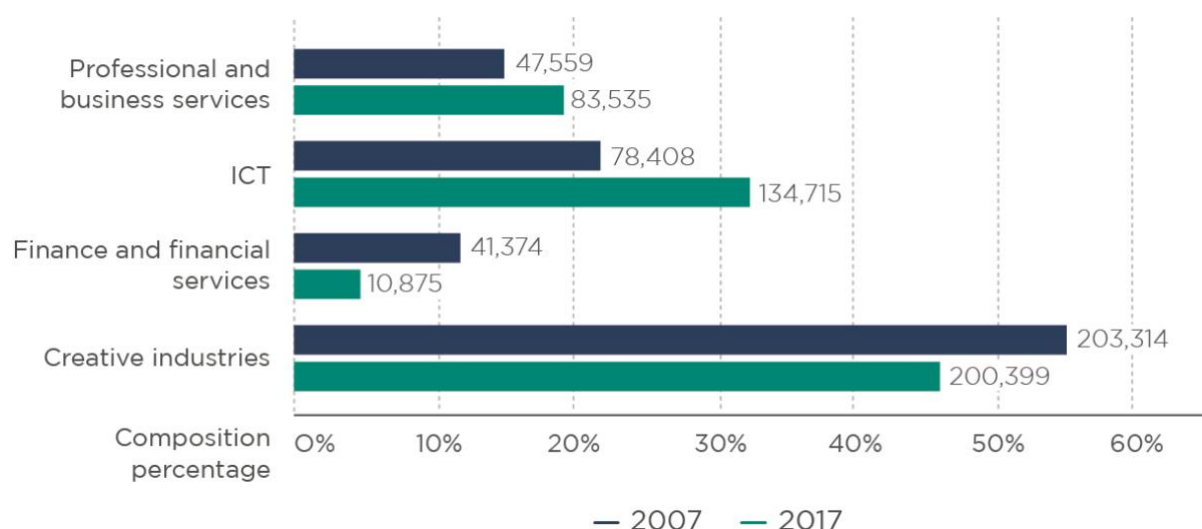
Source: City of Sydney (2017), Floorspace and Employment Survey (Harris St Village area)

[13] The Australian (2019), Nine to unite in North Sydney, available https://www.theaustralian.com.au/business/property/nine-to-unite-in-north-sydney/news-story/ab1f6973d3433852a2895975d75ab837

Pyrmont Peninsula commercial outlook

Figure 14 provides an overview of the current state of existing office floorspace development within the Peninsula and the surrounding area. It also identifies a number of upcoming or recently completed large-scale office development sites and significant employment hubs deemed relevant to future demand for employment floorspace within the precinct.

Figure 14: Pyrmont Peninsula snapshot

Major Office Buildings

	Address	Floor Area m²*	Grade**	Key Tenant/s***
1	19 Harris St, Pyrmont	12,568	N/A	Thomson Reuters, Loreal, Design WorldWide Partnership
2	21 Harris St, Pyrmont	18,888	A	Publicis Groupe, Campfire
3	34 Pirrama St, Pyrmont, 6 Darling Island Rd, Pyrmont	24,999	A	Google
4	38-42 Pirrama St, Pyrmont	16,319	N/A	Google
5	1 Darling Island Rd, Pyrmont	22,196	A	Nine (formally Fairfax Media)
6	48 Pirrama St, Pyrmont	16,300	A	Google
7	100-130 Harris St, Pyrmont	26,879	A	WeWork, Domain, GoCatch, Naked Communications
8	63-79 Miller St, Pyrmont	6,750	N/A	-
9	65 Pirrama St, Pyrmont	15,941	A	John Holland Group, Aust Communications & Media Authority
10	60 Union St, Pyrmont	19,800	A	Coles, American Express
11	55 Pyrmont Bridge Rd, Pyrmont	15,000	N/A	Digital Pacific, Verizon, WOTSO Pyrmont
12	235 Pyrmont St, Pyrmont	10,399	A	JWT, Think Education, Village Roadshow
13	45 Jones St, Ultimo	12,878	A	Johnson & Johnson Pacific, Sheridan Australia, TOGA Group
14	100 Broadway, Chippendale	5,450	A	UTS Graduate School of Health

Newly Completed Office Buildings / Potential Major Developments

	Address	Floor Area m²*	Grade^	Completion^^	Key ICT Tenant/s^^^
15	180 George St, Sydney	55,000	Premium	2022	Salesforce
16	10 Carrington St, Sydney	59,000	Premium	2021	Linkedin
17	2 Market St, Sydney	37,154	Premium	2021	Amazon
18	Cockle Bay Wharf, Sydney	63,000	Premium	2026	-
19	Central Station, Eveleigh	60,000	A	2025	Atlassian
20	Sydney Fish Markets, Pyrmont****				
21	Powerhouse Museum, Ultimo****				

Significant Employment Areas

	Site
22	The Star Sydney
23	Australian National Maritime Museum
24	Harbourside
25	ICC Sydney
26	TAFE NSW
27	ABC Ultimo Centre
28	University of Technology Sydney

Source: Real Capital Analytics, PwC Analysis (2020)

* Indicative floor areas

** Indicative office grade

*** Key Tenant/s subject to change

**** Potential future major development sites

^ Indicative Office grade

^^ Completion date subject to change

^^^ Key ICT Tenant/s subject to change

Notably, the majority of the buildings in Pyrmont are five to seven storeys high with floor plates ranging from 2,000 sqm to 5,000 sqm in flexible, campus style configurations. By comparison, the new and upcoming CBD office developments are significantly taller, denser and have floor plates ranging from 1,300 sqm to 2,500 sqm.

Key commercial office market indicators

Table 9 and Figure 15 provide a snapshot of the current state and recent trends of the office market in Pyrmont and how it compares to the Sydney CBD.

Table 9: Pyrmont vs Sydney CBD (Q4 2019)

Key indicators*	Pyrmont-Ultimo	Sydney CBD	
		Prime**	Secondary
Total office stock (sqm)	399,914	3,003,696	1,948,585
Vacancy rate	3.0 - 4.0%	3.0%	5.4%
Average net face rent ($/sqm) p.a.	$650 - $950	$1,100 - $1,300	$850 - $900
Average incentives^^	15%-20%		19%-20%
Average indicative yield	5.0 - 6.0%	4.25 - 4.75%	4.75 – 5.25%
Average capital value ($/sqm)	$10,000 - $15,000	$20,000 - $25,000	$14,000 - $18,000

Source: Knight Frank (2019), Cushman and Wakefield (2019), CBRE (2019), Savills (2019), PwC Analysis (2020)

* Indicative only ** Prime office space includes Premium and Grade A office space ^ 5-year average

^^ Lease incentives are common as part of a leasing deal, which are offered by the landlord. They effectively reduce the overall net rent (to the landlord) and typically varies from contributions to fit outs, rent free or discounted rent periods, etc.

Note that these indicators do not reflect the impact of COVID-19

Figure 15: Pyrmont vs Sydney CBD: Average vacancy rates, Average gross face rents, Indicative office supply pipeline (sqm 000's)*

Source: Knight Frank (2019), Cushman and Wakefield (2019), Floor Space and Employment Survey 2017 (Harris St Village Area): City of Sydney, PwC Analysis (2020)

* Estimated floorspace and completion date only and subject to change

Key trends and implications for Pyrmont

Based on the data of key commercial indicators presented in Table 9 and Figure 15, the key office trends for Pyrmont are discussed in Table 10.

Table 10: Pyrmont office market indicator trends

Market indicators	Key trends
Office stock	o While total office floorspace in Pyrmont fell by about 3 per cent over the 10-year period (2007-2017), Sydney CBD added over 150,000 sqm (or 3 per cent) of new office accommodation over the past 10 years (2010-2019). o The decline in Pyrmont was largely driven by a lack of office development and the withdrawal of older buildings for redevelopment of other (primarily residential and common area) uses. o We note that the office supply pipeline for Pyrmont remains limited (approximately 20,000 sqm in planned development). By contrast, more than 420,000 sqm is expected to come online over the next three years within Sydney CBD, with the majority of these new developments achieving pre-commitments of above 50 per cent.
Average vacancy rates	o Vacancy rates in both Pyrmont and Sydney CBD have been declining since 2014, with Pyrmont dipping below that of Sydney CBD in 2015, driven by strong demand and limited supply.
Average net face rents	o There was strong rental growth from 2017 to 2019 in Pyrmont, with the average net face rent up by more than 50 per cent, largely underpinned by rising demand from the ICT sector, some of whom were co-locating with major global and national occupiers. o Net face rents of Grade A office spaces in Pyrmont are typically leased at rents approximately 25-35 per cent lower than prime Sydney CBD rents - and are approximately equivalent to secondary office floorspace within the CBD. o Despite the fluctuations and differences in vacancy rates between Pyrmont and Sydney CBD, the rental discount between the two office markets has remained steady over the past 10-year period.
Indicative yields and average capital values	o Likewise, the indicative average capital value of Grade A office floorspace in Pyrmont is about 40-50 per cent lower than prime Sydney CBD values, which is reflective of lower rents, higher yields and capitalisation rates and the inferior amenity and access between the two locations. o Notably, yields for prime Sydney CBD office accommodation have reduced substantially from 7.25 per cent in 2012 to 4.5 per cent in 2020.

Source: PwC Analysis (2020)

2.3 Comparison with selected other regions in Australia

Definition of comparable areas

It is appropriate to compare the Peninsula to other similar regions in Australia to further understand the role and character of the area and assist in informing the vision and forecasting. Southbank (Victoria) and South Brisbane have been chosen as two comparable areas to the Pyrmont Peninsula as they operate as fringe markets to their respective CBDs.

Positioned on the southern bank of the Yarra River, approximately 1km south of Melbourne CBD, Southbank (Victoria) is best known as the cultural hub of arts and entertainment in Melbourne. The area contains high rise residential and commercial office space and is home to the Melbourne Arts Centre, the National Art Gallery of Victoria and media outlets including the ABC and Channel 7.

Separated from the CBD by the Brisbane River, South Brisbane serves as a major arts and entertainment, tourism and education hub for the Brisbane CBD. The headline attractors of the area are the Brisbane Convention and Exhibition Centre, South Bank Parklands as well as TAFE Queensland and Griffith University campuses and several hospitals.

Figure 16 illustrates the boundaries of Southbank (Victoria) and South Brisbane. Table 11 highlights the key institutions by sector in each of the comparators and the Peninsula.

Figure 16: Boundaries of Southbank (Victoria) and South Brisbane
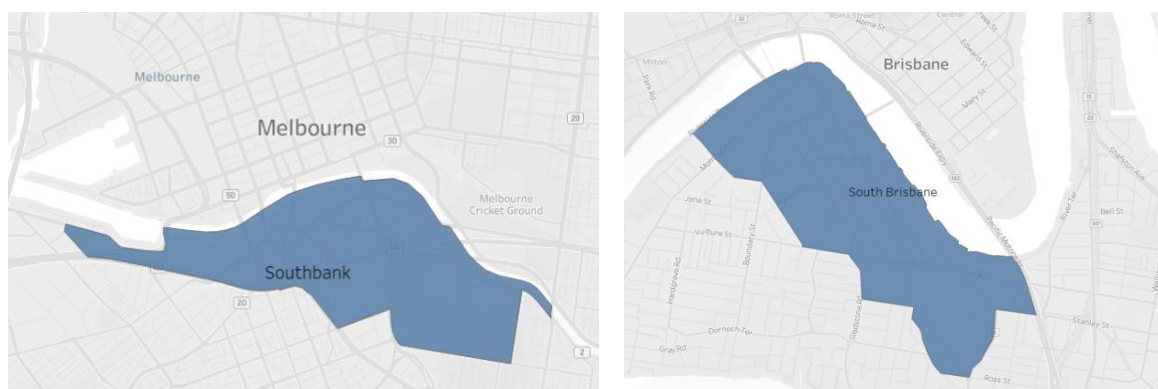
Source: PwC (2020) using ABS Statistical Area 2 shapefiles

Table 11: Key anchoring institutions

Sector	Pyrmont Peninsula	Southbank (Victoria)	South Brisbane
Convention and exhibition	ICC Sydney	Melbourne Convention Exhibition Centre	Brisbane Convention and Exhibition Centre
Leisure and entertainment	The Star, Sydney Fish Markets, Harbourside	Crown Melbourne, Eureka Skydeck	South Bank Parklands, Musgrave Park Swim Centre
Arts and culture	Australian National Maritime Museum, Sydney Lyric Theatre, Powerhouse Museum	Melbourne Arts Centre, National Gallery of Victoria, Australian Centre for Contemporary Art, Melbourne Recital Centre, The Australian Ballet Centre	Gallery of Modern Art, Queensland Art Gallery, Queensland Museum & Science Centre, Queensland Performing Arts Centre, the Queensland Symphony Orchestra, Queensland Conservatorium, Opera Queensland, Maritime Museum
Higher education	UTS, TAFE, University of Notre Dame	Victorian College of the Arts (University of Melbourne)	Queensland College of Art (Griffith University), TAFE Queensland, Griffith University Film School
Information, media and technology	ABC, Network Ten, Nine, Macquarie Radio Network, Nova 96.9, Google	ABC, Network 7	ABC

Source: City of Sydney (2017), Floorspace and Employment Survey (Harris St Village Area), Census of Land Use and Employment (CLUE), City of Melbourne, City of Brisbane, PwC Analysis (2020)

Pyrmont Peninsula against comparators

Southbank (Victoria) and South Brisbane are both larger in area than the Peninsula and have a lower density of both economic output and jobs. The Peninsula is most comparable to Southbank (Victoria) in terms of economic output, jobs and productivity numbers, with South Brisbane producing less with lower productivity. Both the Peninsula and Southbank (Victoria) are home to integrated casinos with entertainment complexes, demonstrating similarities in their respective entertainment quarters.

The number of businesses in the Peninsula, at almost three times as many as Southbank (Victoria), demonstrates the attraction of the area to small-and-medium-sized businesses. This may also reflect the fact that Sydney is Australia's leading global city and the gateway to the Asian-Pacific region.

Economic and commercial indicators

Table 12 highlights the key economic and commercial indicators of the Pyrmont Peninsula and the comparators.

Table 12: Key economic and commercial indicators for Pyrmont Peninsula and comparators (2018)

	Pyrmont Peninsula	Southbank (Victoria)	South Brisbane
Area (km^2)	1.5	3.1	2.0
Economic output ($m)	$7,463	$7,777	$4,273
Growth rate (p.a. over 5 years)	3.6%	2.4%	1.6%
Output density ($m/km^2)	$5,004	$2,530	$2,119
Jobs	39,047	40,880	28,361
Job density	26,183	13,297	14,062
Productivity (output/job)	$191,117	$190,245	$150,679
Number of businesses	1,697	576	971
Business revenue ($m)*	$15,220	$16,647	$7,305
Office stock (sqm)	~399,914	446,659	200,000
Vacancy rate	3.0 - 4.0%	9.0 - 10.0%	10.0 - 15.0%
Average net face rent ($/sqm)	$650 - $950	$430 - $580	$450 - $550
Average incentives	15 - 20%	20 - 25%	35 - 40%
Average yield	5.0 - 6.0%	5.25 - 6.25%	5.75 - 6.75%
Average capital value ($/sqm)*	$10,000-$15,000	$7,000-$12,000	$6,000-$9,000

Sources: PwC (2019) Geospatial Economic Model, ABS (2018) Counts of Australian Businesses, ABS (2018) Australian Industry, Knight Frank, Cushman and Wakefield, Savills, PwC Analysis (2020)

*Note: Business revenue does not include Financial and Insurance Services revenue (as the ABS does not release this data), indicators do not reflect the impact of COVID-19, Average capital value indicative only does not reflect actual valuation

The IT, education and media industry clusters are more unique to the Peninsula (as seen in Figure 17). The number of businesses in the Peninsula, at almost three times as many as Southbank (Victoria) demonstrates the attraction of the area to small and medium sized businesses.

Figure 17: Industry mix in Pyrmont Peninsula against comparators
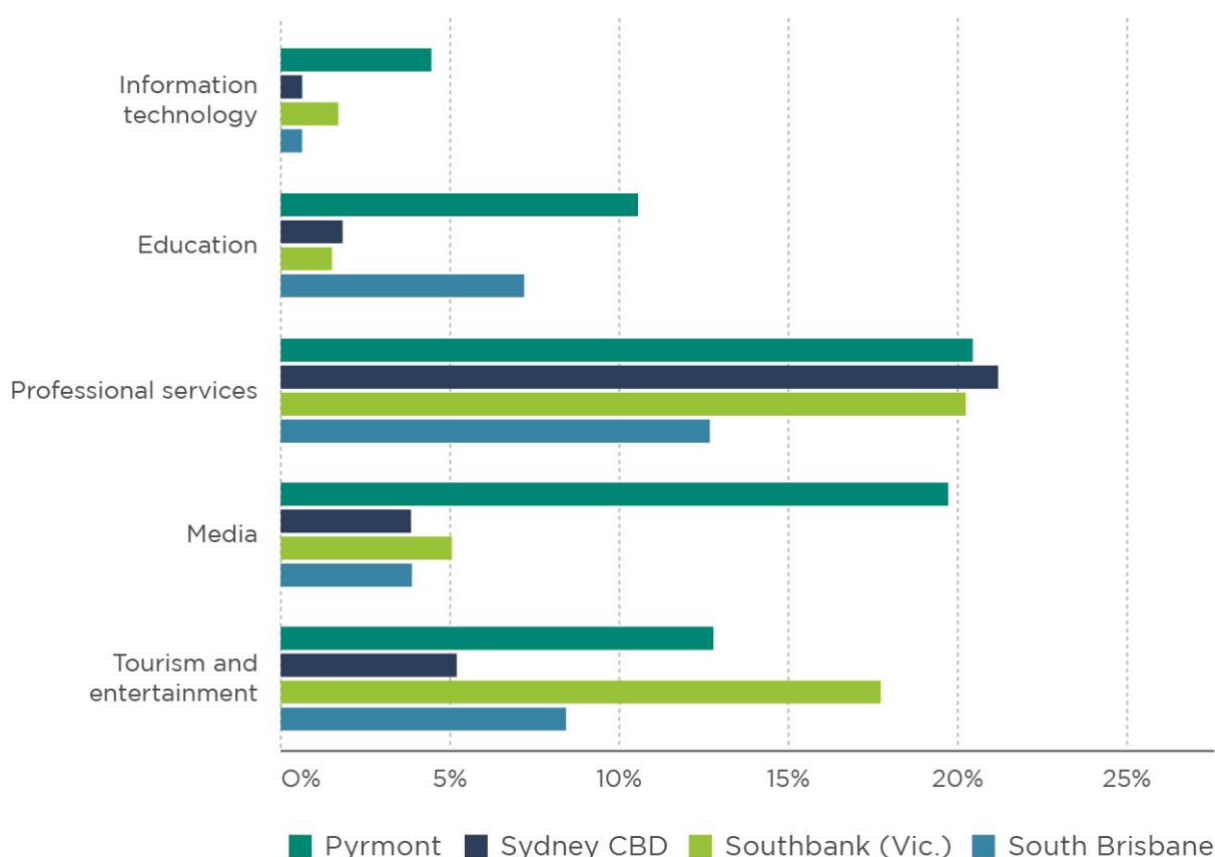
Source: PwC (2019) Geospatial Economic Model

The dominant land use across the three precincts is residential, with Southbank (Victoria) growing the most in terms of total floorspace with an increase of approximately 90 per cent to 1,040,740 sqm over the 10-year period (2008 to 2018), compared with an approximate 25 per cent increase to 938,572 sqm in Pyrmont Peninsula (2007 to 2017).

New office developments in Pyrmont tend to be lower rise (five to seven storeys), with larger floorplates (2,000 to 5,000 sqm). By contrast, the upcoming new office developments in Southbank (Victoria) range from 20 to 58 storeys with much smaller floor plates of between 400 and 1,500 sqm, including a substantial portion of the new office floorspace delivered as part of larger mixed-use developments.

While office floorspace in Pyrmont has been declining, Southbank (Victoria) and South Brisbane have increased floorspace over the past 10 years. Similarly, while the future supply pipeline for Pyrmont is limited, Southbank (Victoria) has a substantial office floorspace pipeline of more than 120,000 sqm over the next five years or more, and South Brisbane is currently going through its own master planning process to unlock opportunities to renew and revitalise the area.

In contrast with Pyrmont's historically low vacancy, both Southbank (Victoria) and South Brisbane have vacancy rates at or above 10 per cent. Southbank (Victoria) has increased from 4 per cent to over 9 per cent from 2017 to 2019. This could be due to the overall decline in office floorspace stock in Pyrmont compared to the comparator precincts, which

have generally increased. Despite the relative differences in office supply and vacancy rates over time, the rental discount between the CBD and City Fringe precincts appears consistent across all three locations over the past 10 years.

Connectivity

Connectivity to the CBD and elsewhere is vital to 'city fringe' areas such as the Peninsula, Southbank (Victoria) and South Brisbane. Southbank (Victoria) is currently serviced by trams and buses, with pedestrian and cycleway connections to the CBD and other surrounding neighbourhoods. There are also a number of footbridges that provide access to mass transit via Flinders Street Station. South Brisbane has train services in the area through South Brisbane and South Bank stations to access the city and suburban areas. New high-capacity and high-frequency Metro services are to run along dedicated busways as part of the improvements planned for public transit in South Brisbane.

The Peninsula has a very high active transport mode share. Continued investment in active transport and public transport will ensure vehicle mode shares continue to drop, as has been the trend. Expansion of public transport capacity, as seen in Southbank (Victoria) and South Brisbane, will be necessary to support the growth in jobs, population and tourism within the Peninsula and reduce existing crowding. [14]

Key insights from the comparator analysis

The comparison against Southbank (Victoria) and South Brisbane highlights a number of key insights around the economic and commercial landscape of the Peninsula and considerations for the future:

- o The Peninsula is a productive and fast-growing employment precinct when compared to these similar areas in Melbourne and Brisbane.

- o The character of the Peninsula and the role that it plays in the broader Sydney market is reasonably consistent with that of Melbourne and Brisbane. The unique offerings around innovation, arts, entertainment, tourism, media and education are what distinguishes these areas from their respective CBDs. The Peninsula has a stronger presence of creative industries, media, education and small businesses than that of Southbank (Victoria) and South Brisbane.

- o A key point of differentiation for the 'city fringe' markets is affordability, and this is consistent across the Peninsula and comparators. The rental gap against the CBD has remained relatively stable historically. This is a critical factor that will drive the presence of anchor tenants and small businesses in the area.

---

[14] Viae Consulting (2020), Pyrmont Peninsula Place Strategy Strategic Transport Plan - Early Findings and Directions

- The low supply of floorspace may limit the growth potential of the Peninsula and is a clear difference to the comparators. It may also impact upon Sydney's relative competitiveness against Melbourne and Brisbane.

- Opportunities for new development and re-purposing of space should be considered.

- Recognising that land is somewhat of a finite resource for the Peninsula, it is important to increase the area's connectivity to other neighbouring innovation centres (with a larger land area and where planning is not to be as constrained) and the Sydney CBD.

Please refer to Appendix E for more detailed analysis and statistics on the comparators.

2.4 Unique characteristics of the Pyrmont Peninsula

Key strengths and character of the area

The key characteristics and strengths that define the Peninsula can be summarised as follows:

- **Geography and location** – waterfront land with access to the Sydney CBD and the working harbour, as well as being part of the innovation corridor.

- **Industry clusters** – an innovation cluster with key anchor tenants from the media, ICT and professional services sectors contributing to the local economy. A large and established higher education and tertiary education presence with the UTS and TAFE in Ultimo. This cluster is also supported by the tourism and entertainment industry, as previously outlined, and is supported by a diverse range of accommodation, dining and retail offerings.

- **Amenity** – attractive to residents, workers and visitors through its vibrancy, heritage buildings, recreational facilities, village/community feel, green space, culture and history.

Key opportunities for the future

The unique position and strengths of the Peninsula make it an attractive place to live, work and visit. The Peninsula has the opportunity to maintain and further enhance its vibrant presence in the Western Harbour whilst connecting with and complementing neighbouring areas. Key opportunities include:

- **Infrastructure investment** – investment in a Sydney Metro West station, which will increase accessibility and connectivity to areas including the CBD, the Bays Precinct, Sydney Olympic Park, Parramatta and Westmead, and will be a catalyst for employment growth, gentrification and revitalisation.

- **Innovation and collaboration** – access to higher education and tertiary institutions offers co-location, collaboration, research and development, and

knowledge transfer opportunities with businesses and other innovation areas including Tech Central and the Camperdown – Ultimo Collaboration Precinct.

o **Improving accessibility** – by extending the Sydney Harbour Foreshore Walk to the Sydney Fish Market and restoring the Glebe Island Bridge.

o **Diversity of businesses** – more affordable office rents to provide an attractive option to commercial tenants, especially from the creative, arts, entertainment and smaller ICT businesses.

Threats to the success of the Pyrmont Peninsula

o **Commercial floorspace** – lack of supply of floor space to accommodate growth in population and employment into the future.

o **Connectivity** – issues accessing the area, particularly through public transport, and an ability to move around the Peninsula by walking or cycling.

o **Maintaining character and attraction** - planning constraints and physical barriers to growth may be an issue when attracting anchor tenants and other businesses. Planning constraints and commercial development pressures may not align well with the precinct's historical character.

3. Future outlook

3.1 Big picture trends and policies driving growth

New South Wales is Australia's largest economy and most populous state and is on track to be Australia's first State to have a $1 trillion economy by 2030. The State is currently experiencing Australia's largest infrastructure boom. It is also home to world-leading universities and the nation's largest and most diverse, highly skilled workforce. The NSW Government is committed to investing in improved digital connectivity, fostering innovation and boosting productivity across the State.[15]

Sydney is the leading knowledge-based economy in the nation. The city's economy is dominated by a number of mature and high-value industries such as finance, professional, digital, tourism and education services.

Sydney is described as Australia's global city. Its global connectivity is based around the dominance of advanced service industries such as finance and business services, with more than 39 per cent of the city's workers employed in these sectors. The city is also a leader in creative and technical industries: creative, information, communication and telecommunications industries account for more than 14 per cent of city jobs.[16]

The *Global NSW Strategy* aims to grow Sydney as the gateway for international business in Australia by promoting creative, innovation, research and education credentials. It is estimated that 16 per cent of the city workforce is dependent on tourism and business visitations from overseas.

The *Eastern City Region Plan,* which is part of the Metropolis of Three Cities vision for Greater Sydney, will see the Eastern Harbour City become more innovative and globally competitive through:

- o boosting of innovation and creative industries alongside knowledge-intensive jobs growth

- o fostering of healthy, creative, culturally rich communities

- o growth in targeted industry sectors including the visitor economy

- o sustaining communities through vibrant public places, walking and cycling, and cultural, artistic and tourism assets.[17]

[15] NSW Treasury (2019), NSW 2040 Economic Blueprint

[16] City of Sydney (2013), Economic Development Strategy

[17] Greater Sydney Commission (2018), Eastern City District Plan

The Peninsula has a role to play in achieving the vision for the Eastern Harbour City and Greater Sydney. It is a hub for driving innovation in creative industries, IT and media, and is complimentary to the fintech of South Eveleigh and medtech in Camperdown-Ultimo. In the future, it will also complement Tech Central and the Bays Precinct.

There are a range of committed NSW Government initiatives that will help shape the growth of the Peninsula and surrounds over the short-medium term. This includes:

- o **Pyrmont Peninsula Place Strategy** – to which this EDS forms a key input, is seeking to ensure a place-based planning framework is applied to the development of the Peninsula and planning controls are unified and simplified to enable this.

- o **Sydney Metro West station investigation** – the option of a station at Pyrmont as part of the Sydney Metro West alignment is currently being explored, which would connect Pyrmont to the Sydney CBD and Bays West, Sydney Olympic Park, Parramatta and Westmead.

- o **Tech Central** – in February 2019 the NSW Government adopted the recommendations of the panel for Tech Central in the Central - Eveleigh Corridor, with the goal of driving jobs, boosting education and creating innovation.

- o **The Bays Precinct** – planning is underway for urban renewal and transformation of The Bays precinct, encompassing Blackwattle Bay, Wentworth Park, Glebe Island, White Bay, Rozelle Bay, Rozelle Railyards and White Bay Power Station. The three key sites include Blackwattle Bay, Bays West and the Sydney Fish Markets (see below).[18]

- o **Sydney Fish Market** – the NSW Government has committed $750 million to the new Sydney Fish Market in Blackwattle Bay. It is set to be a world-class food and dining attraction on Sydney's inner harbour.[19]

- o **Harbour Walk** – the City of Sydney and Place Management NSW has committed to create a transformative and memorable experience for Sydneysiders and visitors alike through the harbour walk extending from Pyrmont Bay to Woolloomooloo, bringing together areas with rich stories, memories and histories of Australia. [20]

- o **Retention of the Powerhouse Museum in Ultimo** – the NSW Government has announced that it will operate the Powerhouse Museum in Ultimo alongside the second location in Parramatta, abandoning plans to sell the Ultimo property. The Government is exploring opportunities to release funds to renovate the site and strengthen the creative industries presence in the precinct.

---

[18] NSW Government (2019) The Bays, available https://www.planning.nsw.gov.au/Plans-for-your-area/State-Significant-Precincts/The-Bays

[19] NSW Government media release (2019), Sydney Fish Market upgrade receives $750 million

[20] City of Sydney, Harbour Walk, available https://www.cityartsydney.com.au/city-art-public-art-strategy/harbour-walk/

o **Western Harbour Precinct Business Improvement District trial –** projects aimed at creating a 'connected and legible precinct' through enhanced, timely, relevant information and mobility services, and a 'fully activated precinct' to raise the profile, awareness and appeal through improved experiential content offerings and events.[21]

3.2 Pyrmont in the future - growth drivers

There are many growth drivers that can influence industry growth and business decisions on where to locate their operations.

Firms have the option to locate in or near the Sydney CBD, in other employment precincts across Greater Sydney, or somewhere in-between. Among many factors that can influence firm location decisions within a metropolitan area, the main factors cited in academic and empirical studies include:

o **connectivity** to other businesses and to workers;

o **existing uses and the ability to 'cluster'** alongside other organisations;

o the **costs** of locating in a particular area, largely in relation to commercial rents; and

o **amenities.**

Table 13 highlights some of the key growth drivers for a precinct or region and discusses the implications or outlook for the Peninsula with respect to each. These are explored further in Appendix F.

Table 13: Growth drivers for the Pyrmont Peninsula

Growth driver	Key factors	Implications for Pyrmont Peninsula
Connectivity	o Increased access to labour, supply chain and customers o Strong relationship between job/development density and use of public transport	o Connectivity of Pyrmont must improve to support jobs growth, including public transport, private transport and active transport o A Sydney Metro West station is likely to change the kinds of industries that locate in Pyrmont
Existing uses and ability to cluster	o Space available for new firms and planning controls o Ability to 'cluster' o Agglomeration economies (increased innovation and productivity)	o Clustering exists in Pyrmont currently, however connection to surrounding clusters including Tech Central can cement this o Supply of commercial space will be important to securing economic growth
Costs	o Rent has repeatedly been shown to be one of the most important considerations to businesses	o Increased density and rents could drive certain businesses out (e.g. small business, creative, arts and culture businesses)
Amenity	o Amenities are an attractor of residents and employers o This includes access to services, entertainment, recreation and walkability/green spaces	o Capitalising on the geographical position and the waterfront o Retaining and better utilising the heritage, parklands and recreational /cultural areas

Source: PwC Analysis (2020)

3.3 International case study - Brooklyn Tech Triangle

In analysing the future of Pyrmont, it is appropriate to look to global exemplar precincts of similar character in order to learn from their development as precedents for sustainable growth in targeted economic activity.

Although much larger in geographic area and population than the Peninsula, the recent regeneration of Brooklyn's waterfront precincts, and specifically the Brooklyn Tech Triangle ('the Tech Triangle'), can inform the aspirational future of the Peninsula as an innovation-focused employment precinct abutting a world-leading central business district.

Historical context

Traditionally a magnet for commerce since the early 19th century, ferrying passengers back and forth between Brooklyn and Manhattan and powered by the industrial economy, by the late 1980s Brooklyn's Downtown area and its neighbouring waterfront had become largely dilapidated.

However, the area's building blocks — strong transportation infrastructure, academic and cultural institutions, and a diverse building stock that could support future job growth – provided a foundation of local resources upon which to build.

Origins of the Brooklyn Tech Triangle

By the early 2000s, Downtown Brooklyn was home to back-office operations for New York City's FIRE (finance, insurance, and real estate) industries, as well as local Government, the court system, and the legal sector that supports them. However, ageing commercial office stock and neglected supporting infrastructure led to a downward trend in occupancy, with vacancy rates of around 10 per cent. This resulted in over 1.5 million square feet of vacant office space, providing an opportunity for landowners (private and public) to experiment with ways to attract new industries to the area.

Two adjacent neighbourhoods — DUMBO (an acronym for 'Down Under the Manhattan Bridge Overpass') and the Brooklyn Navy Yard — had enjoyed success attracting businesses focused on 'innovation'. Specifically, in DUMBO, public-space interventions and innovative placemaking helped it attract a sizable cluster of digital media, advertising, and technology companies.

These initiatives also provided new impetus for attractive residential accommodation surrounding Downtown Brooklyn, facilitating opportunities for a prospective new workforce to live locally. However, a new narrative was still required to reposition its commercial assets, cognisant of the need to respect the area's rich history as well as its local occupier and landowner base.

In 2012, the Tech Triangle was established, encompassing greater Downtown Brooklyn, DUMBO and Brooklyn Navy Yard, through an innovative consortium made up of Downtown Brooklyn Partnership, Dumbo Business Improvement District and Brooklyn Navy Yard Development Corporation ('the TT Partners').

Brooklyn Tech Triangle Strategic Plan

Benefiting from the earlier success of DUMBO and the Brooklyn Navy Yard, a vision for the Tech Triangle had emerged as a unique central business district — and a lower cost alternative to Manhattan — comprising of three complementary offerings:

- o 'front-office' headquarters located in Downtown Brooklyn
- o a virtual design and advertising hub located in DUMBO
- o a manufacturing and distribution hub located at the Brooklyn Navy Yard.

Figure 18: The Brooklyn Tech Triangle Strategic Plan
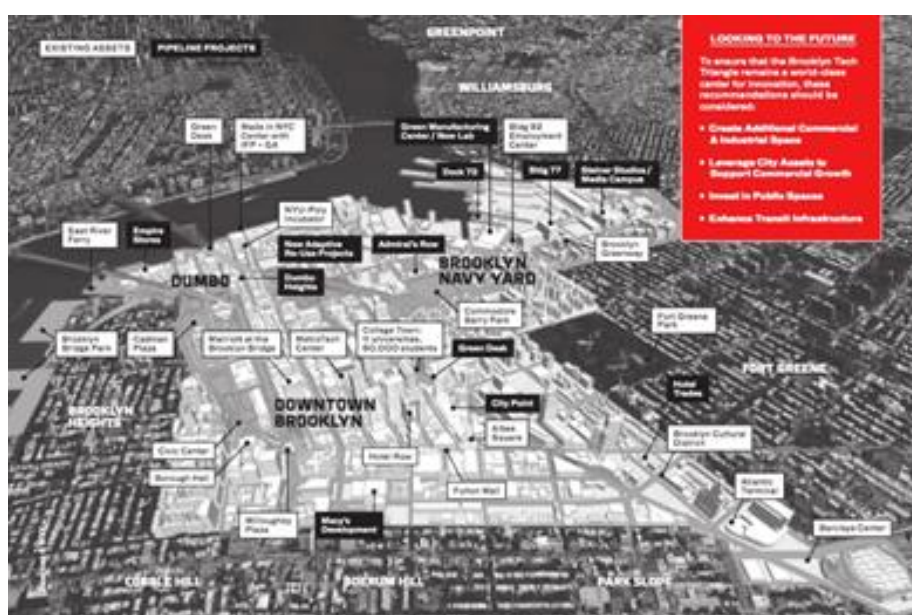
Source: Downtown Brooklyn (2013), Brooklyn Tech Triangle Strategic Plan

The objective was to build upon the existing innovation-focused industry base (approximately 500 businesses) and develop a strategy to attract more of these firms to the area.

After a 12-month process of sustained industry, government and public consultation, the TT Partners released the Brooklyn Tech Triangle Strategic Plan in 2013, encompassing an action-focused blueprint and masterplan for the precinct. Included in this were five key challenges to future development:

1. **Space for tech to grow**: Activate underutilised commercial spaces and create incentives to refurbish spaces for the innovation economy.

2. **A new tech ecosystem**: Create an innovation training hub to address emerging job opportunities.

3. **Connections across the Tech Triangle**: Expand bus routes and create new bike lanes on key corridors.

4. **Dynamic places for tech**: Reimagine selected spaces as activity areas for events, food, and interaction, along with improved lighting, parks, and streets.

5. **Tech Triangle interface**: Expand public WiFi throughout the district and give start-ups the chance to pilot their products locally in the Tech Triangle.

Implementation of the 60+ recommendations falling under these five themes was undertaken collaboratively, where each of the TT Partners agreed to move its individual priorities forward while promoting and marketing any success under the Brooklyn Tech Triangle brand.

Period of growth

By 2015, the Tech Triangle was home to more than 1,350 innovation companies and 17,000 employees, the largest cluster of tech activity in New York outside of Manhattan. That growth was spurred by companies like Etsy, Huge, and MakerBot, along with start-ups like goTenna, Honeybee Robotics and Sartorous, as well as academic expansion from local universities like NYU Tandon School of Engineering and New York City College of Technology. The total economic impact of the Tech Triangle had also grown substantially, from US$3.5 billion in 2012 to US$5.3 billion in 2015.

A report commissioned in 2015 by the TT Partners suggested that growth in economic activity was expected to triple by 2025, reaching US$15.5 billion. Similarly, employment was also projected to increase threefold to 53,000 total employees, resulting in a commensurate increase in total commercial floorspace to almost 10 million square feet (up from 3.1 million in 2015).

Fuelled by a record low vacancy rate of close to 3 per cent in Downtown Brooklyn and a lack of viable office supply in DUMBO, the report provided four critical recommendations considered pivotal to the continued the growth of the area, many of which align with themes applicable to the future economic development of Pyrmont:

1. **Invest in public spaces**: Up to 40 acres of public spaces needed to be improved in order to enhance amenity and improved permeability of the area.

2. **Enhance transit infrastructure**: Improve access (via cycle, ferry, subway) to neighbouring innovation precincts and major educational institutions.

3. **Create additional commercial and industrial working space**: Planning incentives to encourage development of additional commercial floorspace for target industries due to lack of future supply pipeline.

4. **Leverage city assets to support commercial growth**: Approximately 1 million square feet of public transit-rich, underutilised government-owned space identified to be repurposed to create additional office accommodation and key supporting social infrastructure.

Brooklyn today

As of 2018, more than 1,200 tech-focused start-ups were based in Brooklyn — 356 per cent increase since 2008. A large proportion of which are located within the Tech Triangle. This constitutes the second fastest growth rate in the United States over the period, behind only San Francisco (421 per cent increase).

Jobs in technology, creative and advanced manufacturing industries have grown faster in the borough than in Manhattan from 2008 to 2018. Similarly, employment in the technology industry jumped by 175 per cent between 2008 and 2018 in Brooklyn — double the increase of that in Manhattan, despite Manhattan's status as the top citywide destination for the world's biggest tech companies and home to Google, Amazon, Facebook and Twitter.

Since 2015, approximately 3.4 million square feet of new office and manufacturing space has been delivered across the Tech Triangle — some of which has been facilitated through recycling of city assets. While the ongoing supply of new floorspace has continued the growth story of the area, it has had a significant increase in rental pricing. As of Q1 2020, the average commercial rent per square foot in Downtown Brooklyn and DUMBO is now approximately US$60-US$65, versus US$36 in 2012 when the Tech Triangle efforts began.

This clearly demonstrates that while focused industry attraction and enhanced amenities can materially increase economic output and job creation in target sectors, it is important to have in place mechanisms to incentivise new businesses and emerging industries to continue to operate within or around the precinct and/or relocate to key innovation precincts.

4. Employment and floorspace forecasts

4.1 Methodology for forecasting employment and floorspace

This chapter provides forecasts to 2041 for:

- o jobs, broken down by industry sector; and

- o floorspace requirements, by type, to accommodate the projected jobs growth.

These forecasts adopt a 'market-focused' view (meaning they extrapolate historic demand). The forecasts assume that:

- o development occurs in a way that is largely led by the market rather than being coordinated through the Place Strategy and other planning mechanisms

- o government intervention includes:

  - o changes to planning controls such as zoning and built form restrictions (e.g. building heights) accompanying Metro station delivery and assumes a metro station (subject to a final business case and further industry engagement)

- o increased commercial development is induced as a result of heightened public transport access and associated zoning and built form changes.

The analysis and information presented in Chapters 2 and 3 provide important context and understanding to inform the employment forecasts. The following data formed inputs into the forecasting of employment:

- o the current and historical employment and floorspace including industry mix;

- o the character of the area and market led drivers for industry attraction; and

- o the key drivers for growth.

With these key considerations, the method applied to develop employment and floorspace forecasts was:

- o alignment of baseline jobs growth for the area with NSW Government forecasts (Transport for NSW's Travel Zone Projection 2016), which include a level of assumed new development in the Pyrmont area[22]

- o benchmarking of the impact of a potential Metro station delivery on jobs growth using case studies on comparable areas (i.e. Macquarie Park)

- o estimation of the impact on short term employment forecasts due to COVID-19

- o definition of the future industry mix assuming a Sydney Metro West station at Pyrmont

- o production of employment forecasts by industry using jobs growth and industry mix assumptions

- o application of average job density by industry figures to estimate required floorspace to accommodate employment growth

- o sense checking of the employment and floorspace forecasts with consideration of available space, planning constraints, commercial considerations and growth in surrounding precincts.

Impact of COVID-19 on employment

There has been a significant drop in employment as a result of the public health response to manage the spread of COVID-19. PwC modelled the impact on and recovery of the economy in its public report, *Australia Rebooted* (which informs the employment forecasts below: see section 4.2).[23] The estimated drop in employment from FY19 to FY20 is significant at 7.5 per cent: however, the economy is expected to recover to pre-COVID-19 levels in 2021.

Future industry mix assumptions

The change in industry mix over time is dependent on a range of factors. The arrival of a Metro station is likely to attract a higher amount of professional services and other knowledge services, including financial and insurance services. Table 14 comments on some of the location drivers for organisations within the four different broad industry categories. These drivers support the changes in industry mix applied to the employment forecasts.

---

[22] The 'new developments database' forms the primary input into shifting employment projections from a base trend. The most relevant new development in this database for the Pyrmont Peninsula is Central to Eveleigh. TfNSW's technical guide to Travel Zone Projections 2016s description of this development is 'this project is the redevelopment of the corridor between Central to Eveleigh. The project includes increased neighbourhood shops and some commercial development'

[23] Available at https://www.pwc.com.au/important-problems/australia-rebooted-resetting-economy-after-covid-19.html

Table 14: Location Drivers by Broad Industry Category

Broad Industry Category	Drivers
Knowledge intensive (including media, information technology and professional services)	Knowledge intensive businesses are highly transit sensitive, as the productivity returns to connectivity are highest for these jobs. They are also notably more sensitive to the quality of their urban and retail environment, requiring higher levels of amenity.
Health and education	Health and education organisations and jobs often locate in close proximity to anchor institutions such as hospitals, universities, and research institutes. The ability to cluster is of high importance, as is the physical spaces and amenities within which to collaborate.
Population serving (including tourism and entertainment)	Population-serving businesses principally require proximity and accessibility to their customers, which often fall within a narrow catchment area. Certain population services require vehicle access notwithstanding the availability of Metro services (e.g. large format retail shopping) while other population-serving businesses can benefit from the availability of Metro services.
Industrial and other services	Industrial businesses often cite heavy vehicle access or proximity to strategic freight corridors as a top priority. Large floor plates that can accommodate modern warehousing are also in high demand. In contrast, amenities that are attractive to knowledge jobs (such as amenity and public transport access), are less highly valued.

Source: PwC research (2020) based on TfNSW definitions of Broad Industry Categories (BIC)

4.2 Employment and infrastructure forecasts

Employment forecasts

Forecasts of future jobs by industry are provided in Table 15. Total employment in the Peninsula is forecast to increase by 54-63 per cent by 2041. The number of jobs is forecast to grow across all industries despite the assumed shift in the proportion of jobs towards more knowledge intensive industries. The impact of COVID-19 can be seen in the 2021 employment numbers with job growth from 2017-2021 forecast to be lower than the growth rate between the other forecast years.

Table 15: Employment forecast by industry

Industry	2017	2021*	2026	2031	2036	2041	Change (2017 - 2041)
Tourism and Entertainment	8,100	6,400 – 6,700	8,100 – 8,500	8,800 – 9,300	10,200 – 10,700	10,800 – 11,400	**2,700 – 3,300**
Media	7,100	7,000 – 7,400	7,100 – 7,500	7,500 – 7,900	8,200 – 8,600	8,500 – 9,000	**1,400 – 1,900**
Professional services	6,800	7,100 – 7,400	8,700 – 9,200	9,200 – 9,700	11,200 – 11,800	12,500 – 13,200	**5,700 – 6,400**
Education	5,500	5,400 – 5,700	5,500 – 5,800	5,700 – 6,000	6,600 – 7,000	7,400 – 7,800	**1,900 – 2,300**
Information technology	1,500	1,600 – 1,700	2,000 – 2,100	2,200 – 2,300	2,500 – 2,700	2,800 – 3,000	**1,300 – 1,500**
Healthcare	800	800 - 900	800 - 900	900 - 1000	1,000 – 1,100	1,100 – 1,200	**300 - 400**
Other knowledge services	3,000	3,200 – 3,400	3,300 – 3,500	5,300 – 5,600	6,600 – 7,000	8,500 – 9,000	**5,500 – 6,000**
Industrial and other services	4,100	3,900 – 4,100	4,000 – 4,300	4,400 – 4,600	4,600 – 4,800	5,100 – 5,400	**1,000 – 1,300**
Total	**36,900**	**35,400 – 37,300**	**39,500 – 41,800**	**44,000 – 46,400**	**50,900 – 53,700**	**56,700 – 60,000**	**19,800 – 23,100**

Source: Floor Space and Employment Survey 2017, City of Sydney, TfNSW's Travel Zone Projection 2016, PwC (2019) Geospatial Model, PwC analysis (2020)

*The impact of COVID-19 has been modelled, which has a significant impact on the 2021 employment forecasts

Note: Creative industries have components across many of the industries as they are broken down here. The City of Sydney Floorspace and Employment Survey suggests that 18% of jobs in the Pyrmont Peninsula are in creative industries

Table 16 shows how the share of jobs by industry change over time. There is a shift towards professional services and other knowledge services jobs. Evidence shows that knowledge-based industries and innovation clusters benefit particularly from public transit nodes and are more likely to local higher density employment areas.[24] Also, medium and large businesses in these industries are more likely to be able to afford the expected increases in rent that increased attractiveness of the area will bring.

[24] Centre for Transit Oriented Development (2011)

Table 16: Industry mix assumptions

Industry	2017	2021	2026	2031	2036	2041	Change (2017 - 2041)
Tourism and entertainment	22%	18%	21%	20%	20%	19%	**-3%**
Media	19%	20%	18%	17%	16%	15%	**-4%**
Professional services	18%	20%	22%	21%	22%	22%	**4%**
Education	15%	15%	14%	13%	13%	13%	**-2%**
Information technology	4%	5%	5%	5%	5%	5%	**1%**
Healthcare	2%	2%	2%	2%	2%	2%	**0%**
Other knowledge services	8%	9%	8%	12%	13%	15%	**7%**
Industrial and other services	11%	11%	10%	10%	9%	9%	**-2%**
Total	**100%**	**100%**	**100%**	**100%**	**100%**	**100%**	

Source: Floor Space and Employment Survey 2017, City of Sydney, TfNSW's Travel Zone Projection 2016, PwC 2019 Geospatial Model

Note: There are small job count differences between the PwC's Geospatial Economic Model (based on ABS data and other sources) and the City of Sydney's Floorspace and Employment Survey likely driven by respondent behaviour and boundary differences. Refer to Appendix C for industry mapping to the Australian Bureau of Statistics ANZSIC industry definitions.

Floorspace requirement forecast

Based on the key employment forecasts for the Peninsula, the potential additional floorspace required to accommodate the increase in workers has been estimated. Table 17 highlights the expected change from 2017 to each forecast year and the assumed job density by industry. Table 18 shows the additional floorspace requirement by industry to accommodate the increase in jobs.

Total additional floorspace required by 2041 is 590,000 – 823,000 sqm. Around 45 per cent of that increase is additional office floorspace to accommodate the large increase in professional and knowledge services jobs. The other 55 per cent of floorspace will accommodate an increase in jobs in tourism and entertainment and education industries that require more space per job.

Table 17: Industry job change

Industry	Change in number of jobs					Average industry job density* (sqm/job)
	2017-2021	**2017-2026**	**2017-2031**	**2017-2036**	**2017-2041**	
Tourism and entertainment	(1,700) – (1,400)	0 - 400	700 – 1,200	2,100 – 2,600	2,700 – 3,300	65 - 69
Media	(100) - 300	0 - 400	400 - 800	1,100 – 1,500	1,400 – 1,900	25 - 30
Professional services	300 - 600	1,900 – 2,400	2,400 – 2,900	4,400 – 5,000	5,700 – 6,400	15 - 20
Education	(100) 200	0 - 300	200 - 500	1,100 – 1,500	1,900 – 2,300	50 - 55
Information technology	100 - 200	500 - 600	700 - 800	1,000 – 1,200	1,300 – 1,500	15 - 20
Healthcare	0 - 100	0 - 100	100 - 200	200 - 300	300 - 400	26 - 31
Other knowledge services	200 - 400	300 - 500	2,300 – 2,600	3,600 – 4,000	5,500 – 6,000	20 - 25
Industrial and other services	(200) - 0	(100) - 200	300 - 500	500 - 700	1,000 – 1,300	60 - 70
Total	**(1500) - 400**	**2,600 – 4,900**	**7,100 – 9,500**	**14,000 – 16,800**	**19,800 – 23,100**	

Source: Floor Space and Employment Survey 2017, City of Sydney, TfNSW's Travel Zone Projection 2016, PwC 2019 Geospatial Model, PwC Analysis (2020)

* Average job density estimates from the City of Sydney Floorspace and Employment Survey 2017 (Harris Street area)

Table 18: Additional floorspace required

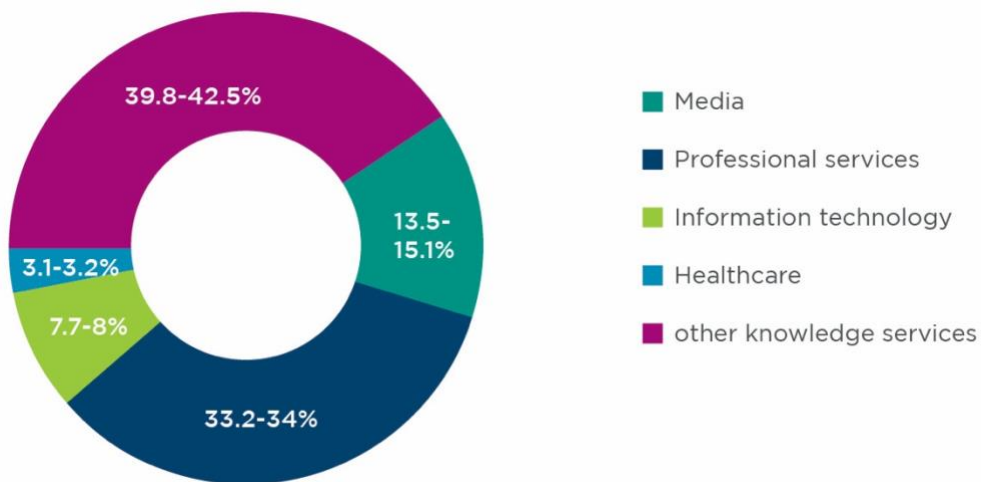| Industry	Additional floorspace required (Net Lettable Area - NLA 000's)*				
	2017-2021	**2017-2026**	**2017-2031**	**2017-2036**	**2017-2041**
Tourism and entertainment	(111) – (97)	0 - 28	46 - 83	137 - 179	176 - 228
Media	(3) - 9	0 - 12	10 - 24	28 - 45	35 - 57
Professional services	5 - 12	29 - 48	36 - 58	66 - 100	86 - 128
Education	(5) - 11	0 - 17	10 - 28	55 - 83	95 - 127
Information technology	2 - 4	8 - 12	11 - 16	15 - 24	20 - 30
Healthcare	0 - 3	0 - 3	3 - 6	5 - 9	8 - 12
Other knowledge services	4 - 10	6 - 13	46 - 65	72 - 100	110 - 150
Industrial and Other Services	(12) - 0	(6) - 14	18 - 35	30 - 49	60 - 91
Total floorspace NLA (sqm 000's) required	**(120) – (48)**	**37 - 147**	**180 - 315**	**408 - 589**	**590 - 823**
Office^ NLA (sqm 000's) required	8 – 38	43 - 88	106 - 169	186 - 278	259 - 377
Office^ GFA (sqm 000's) required**	9 – 45	51 - 104	125 - 199	219 - 327	305 - 444

Source: Floor Space and Employment Survey 2017, City of Sydney, TfNSW's Travel Zone Projection 2016, PwC 2019 Geospatial Model, PwC Analysis (2020)

* Estimated based on Table 17's change in job numbers multiplied by the lower and upper average job density by sector.
** Gross Floor Area (GFA) - calculated based on an assumed 85% floorspace efficiency ratio of NLA.
^ Typical office occupiers are from the Media, Professional services, Information technology, Healthcare (i.e. medical suites) and Other knowledge services sectors.
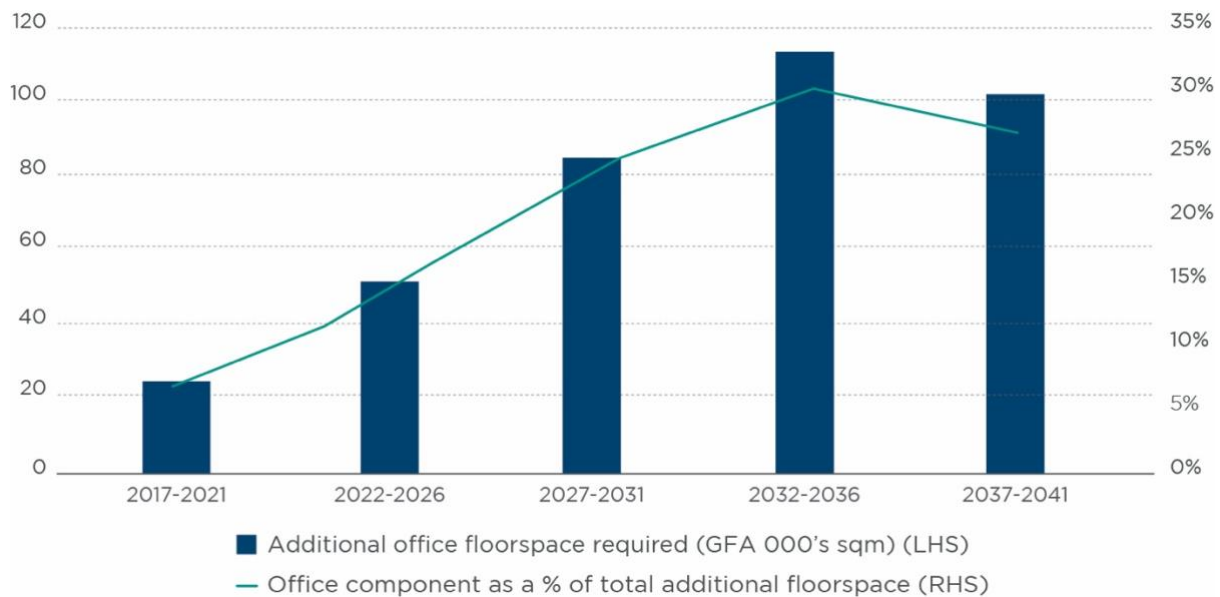
Figure 19: Additional office floorspace required by 2041 by sector (NLA)*

Source: Floor Space and Employment Survey 2017, City of Sydney, TfNSW's Travel Zone Projection 2016, PwC 2019 Geospatial Model, PwC Analysis (2020)

* For each sector, the additional floorspace required as a percentage of the total office floorspace required by 2056 (see Table 18).

Figure 20: Additional office floorspace required (GFA)*

Source: Floor Space and Employment Survey 2017, City of Sydney, TfNSW's Travel Zone Projection 2016, PwC 2019 Geospatial Model, PwC Analysis (2020)

* Additional office floorspace GFA sqm displayed is the average figure of the low and high indicative range for each 10 year range.

4.3 Analysis of forecasts

The level of economic and associated employment growth expected in the Precinct is relatively high, continuing the trends observed in the precinct in the preceding 20 years.

Jobs are forecast to increase by 20,000- 23,000 by 2041, representing growth of 54 – 63 per cent compared to 2017 levels. The forecasts provide for an economic and commercial future for the precinct where jobs, productivity and job density all increase rapidly supported by Government investment in new developments and infrastructure.

Accommodating this jobs growth will see changes in Pyrmont's industry fabric and urban environment. Compared to the current state, the economic growth forecast demonstrates:

- o a strong increase in jobs, economic output and productivity – an increase of 20,000 – 23,000 jobs to 2041 and an increase in productivity by 7 per cent

- o greater supply of commercial buildings (an additional 600,000 – 800,000 sqm of floorspace will be required across the precinct by 2041)

- o increased retail and residential development density (more shops and apartments) associated with provision of a Metro station, as well as more commuters coming in and out of the area

- o an industry mix more geared towards the knowledge industries, albeit with growth in many of the associated industries for which Pyrmont is currently recognised such as professionals, media, IT, tourism and entertainment.

Table 19 summarises the expected increase in employment to 2041 and required floorspace to accommodate this increase.

Table 19: Summary – economic and floorspace forecasts

Industry	Employment - 2017	Employment - 2041	Net employment increase (2017 - 2041)	Net economic output increase ($ millions)	Additional floorspace* required by 2041 ('000 sqm)	Assumed job density (sqm/job)
Total	**36,900**	**56,700 – 60,000**	**19,800 – 23,100**	**$4,280 - $4,940**	**590 - 823**	
Tourism and entertainment	8,100	10,800 – 11,400	2,700 – 3,300	$290 - $360	176 - 228	65 - 69
Media	7,100	8,500 – 9,000	1,400 – 1,900	$260 - $360	35 - 57	25 - 30
Professional services	6,800	12,500 – 13,200	5,700 – 6,400	$1,150 - $1,300	86 - 128	15 - 20
Education	5,500	7,400 – 7,800	1,900 – 2,300	$250 - $310	95 - 127	50 - 55
Information technology	1,500	2,800 – 3,000	1,300 – 1,500	$240 - $280	20 - 30	15 - 20
Healthcare	800	1,100 – 1,200	300 - 400	$30 - $40	8 - 12	26 - 31
Other knowledge services	3,000	8,500 – 9,000	5,500 – 6,000	$1,830 - $1,990	110 - 150	20 - 25
Industrial and other services	4,100	5,100 – 5,400	1,000 – 1,300	$230 - $300	60 - 91	60 - 70

Source: City of Sydney (2017), Floor Space and Employment Survey 2017, TfNSW's Travel Zone Projection 2016, PwC (2019) Geospatial Model, PwC analysis (2020)

* Additional floorspace required is measured as NLA - Net Lettable Area

Note: The additional economic output is provided in real Australian dollars using the base year of 2017

5. Implications and recommendations

5.1 Risks to realisation of the strategic vision

As described in Chapter 4, the jobs and floorspace forecasts discussed here assume a limited role for Government in the development of the precinct. It is assumed that the recommendations of the Place Strategy and EDS have not been implemented and that development occurs in a way that is largely led by the market.

Rather than illustrating the outcomes of implementing the strategic vision, the forecasts assist in highlighting the risks Government could encounter in achieving it, including:

- o **Competing precincts** - other precincts in Greater Sydney could attract key industries or anchor tenants away from the Peninsula. Some neighbouring precincts are earmarked for development to encourage innovative enterprise, including Tech Central and Bays West.

- o **Upward pressure on rents** - increased economic development in the Peninsula could put upward pressure on commercial rents, which could price out rent-sensitive start-ups and creative businesses. This could include losing small businesses in media and adtech, which play a key part in the future strategic role of the Peninsula, to larger, less price sensitive professional and knowledge services businesses.

- o **Maintaining Pyrmont's attractive urban character** - stakeholders consulted in the development of the EDS highlighted the importance of Pyrmont's amenity in maintaining its attractiveness to enterprise, in particular to maintaining the mixed-use character of the precinct. Economic development and accompanying changes to urban character and built form, will need to occur in a way that maintains or strengthens Pyrmont's attractiveness for the vision to be realised.

- o **Impacts of COVID-19** - the COVID-19 pandemic has caused immediate and widespread changes to the way Australians go about their jobs in recent months. Restrictions in many areas are being lifted, as at July 2020, leading to expectations that the economy could recover to pre-COVID-19 levels some time in 2021-22.[25] In a post-COVID world, working remotely will likely be more common, however the importance of face-to-face has also been reinforced. In light of these changes and those that could emerge in the near term, the lasting impacts (if any) on employing precincts are not yet well understood.

[25] Reserve Bank of Australia (2020), available from https://www.rba.gov.au/publications/smp/2020/may/economic-outlook.html

- o **Job automation due to technology** - jobs are at risk of either being automated out of existence or augmented by technology including robots and artificial intelligence. Modelling commissioned by the Australian Computer Society has found that 2.7 million Australians currently have jobs that could be completely automated by 2034. This research has been considered in forming assumptions around job growth and industry mix in the Peninsula.

Many of the most at risk sectors in terms of automation and augmentation are the industrial and other services industries. These industries are therefore expected to grow more modestly in the Peninsula, noting that this may require re-skilling and result in the emergence of new jobs. The percentage of jobs at risk of automation for some of these industries, according to the research, is:

- o Transport, postal and warehousing – 33 per cent
- o Manufacturing – 30 per cent
- o Wholesale trade – 27 per cent
- o Construction – 25 per cent

5.2 Achieving the strategic vision

There are mechanisms available to policymakers to help shape future development that could assist in achieving the strategic vision:

- o Tax incentives to encourage locating in Pyrmont could be extended to the kinds of businesses that are aligned to the strategic vision. This could include creative organisations, tech startups and others.

- o Grants could similarly be provided to these kinds of businesses to incentivise locating in the Peninsula, or the Government could subsidise rents.

- o Planning mechanisms such as Voluntary Planning Agreements (VPAs) could be used to provide subsidised commercial floorspace to target industries. Notably, this has been used previously in Local Government Areas (LGAs) across Sydney.

Recommendations to achieve the strategic vision

A number of recommendations are suggested to respond to the above risks and support achievement of the strategic vision. The recommendations capitalise on the key growth drivers identified for the area and are presented in Table 20.

Table 20 Recommendations to support the growth of the Pyrmont Peninsula

Growth driver	Recommendations
Industry mix and ability to cluster	1. Foster a collaborative/networking environment for companies and educational institutions within the Innovation Corridor. Increasing national and international competitiveness through innovation districts is a planning priority in the GSC's Eastern District Plan. As an example, the Government should engage with anchor tenants in adtech (e.g. Google) to establish long term collaboration with businesses and industry across the Innovation Corridor. 2. Support local tertiary and vocational training institutions to offer courses that cater to the skills that the Innovation Corridor is likely to need (e.g. in media). 3. Strengthen and communicate the unique proposition of the Peninsula 24-hour economy with globally significant events, arts, entertainment and recreation, pop-ups and cultural events.
Cost of commercial floorspace	4. Support appropriate and sustainable developments that increase and re-purpose the supply of commercial floorspace to accommodate projected employment in the area (via the new development proposals in Blackwattle Bay and Ultimo). 5. Consider actions to enable ongoing availability of affordable space for small business, startups and creative industries.
Connectivity	6. Subject to completion of a final business case, invest in a Sydney Metro West station to realise the full economic potential of the Peninsula, driving economic growth, creating jobs and increasing visitation. 7. Strengthen active transport connections within the Peninsula including between open spaces and the foreshore and deliver missing regional and local cycle infrastructure.
Amenity	8. Establish a business improvement district to improve amenities and public domain. 9. Rejuvenate Harris Street and renewal sites including Blackwattle Bay, Darling Island and Tumbalong Park through new hubs of activity and enhanced shopfronts, streetscapes and public spaces. 10. Open up the foreshore and Wentworth Park for additional open space and improved waterfront access for recreational and cultural uses. This is critical to attracting creative and knowledge-based employers and providing quality places for new and existing residents.

Appendices

Appendix A - The Economic Strategy Working Group

The Economic Strategy Working Group (ESWG), a local and state government advisory group, was formed to consult on the EDS. The group met on:

- o Wednesday 6 May 2020
- o Wednesday 20 May 2020
- o Wednesday 3 June 2020

Group membership comprised:

- o NSW Treasury
- o Department of Planning, Industry and Environment (DPIE)
- o City of Sydney
- o Greater Sydney Commission (GSC)
- o Transport for NSW (TfNSW)
- o Department of Premier and Cabinet (DPC)
- o Destination NSW

Appendix B - Industry engagement

An Industry Roundtable was held as an important input into the EDS. The Industry Roundtable was held on 27 May and included a mix of private and public sector organisations who are located in the Peninsula. The two objectives of the Industry Roundtable were to:

1. update industry on the progress of the EDS

2. consult with the organisations and people who work in the area to develop a more informed view of what defines the area and what is required to retain/attract employers.

Four questions were asked to guide the industry input. These questions and the key themes coming out of the discussion are highlighted below.

1. **What is attractive about locating in the Peninsula?**

   o Geographical location and characteristics, including proximity to CBD and amenities provided by the waterfront

   o Cycling and walking friendly

   o Character — vibrant, unique businesses, heritage, green space, village and community feel, and connection to history

   o Industry mix – genuine mixed-use, distinction from commercial focus in CBD, industry clusters (e.g. education)

2. **What changes will help to maintain or increase the Peninsula's attractiveness to employers, employees and visitors? What physical qualities or amenities are most important? Is there a need for further public or private investment to grow the local economy?**

   o Connectivity – improved access to the area (mass transit) and within the area (for pedestrians, cyclists)

   o Floorspace – opportunity to re-purpose existing space to create jobs and maintain character

   o Constraints to growing attractiveness – planning restrictions, physical barriers (including road placement), heritage and history

   o Attraction of anchor tenants

3. **What role does tourism and entertainment play? How could the 24-hour economy be encouraged in the Peninsula?**

   o Known for key tourism and entertainment hotspots

   o Need to balance these hotspots (main attractions) with what residents and workers want

   o Better coordination around experiences to boost 24-hr economy

   o Improved connectivity can support tourism but the driver of tourism is the value of the experience in Pyrmont

4. **Does your organisation benefit from the presence of innovative and creative organisations in the Peninsula? If so, how can the area continue to support these types of businesses?**

   o Questions as to whether Pyrmont is the 'right' precinct for an organisation, given competing offerings in other areas nearby

   o Acknowledgement that not all innovators or creatives are low maturity and rent sensitive

   o Need to attract anchor tenants to encourage innovation

   o Need tools to lower cost for innovative and creative small business (e.g. mandate percentage of space, public or private sponsorship).

Appendix C – Industry definitions

The industry grouping presented in this report was chosen to highlight the most prevalent industries in the Peninsula and more closely align with the common understanding of those industries. These industry groups were formed based on a mapping of the ABS ANZSIC industries as shown below:

Industry group	Mapping to ABS ANZSIC industries
Tourism and entertainment	o Retail Trade o Accommodation and Food Services o Arts and Recreation Services

Media	o Information Media and Telecommunications
	   o Publishing (except Internet and Music Publishing)
	   o Motion Picture and Sound Recording Activities
	   o Broadcasting (except Internet)
	   o Internet Publishing and Broadcasting

Professional services	o Professional, Scientific and Technical Services
Education	o Education and Training

Information technology	o Information Media and Telecommunications:
	   o Telecommunications Services
	   o Internet Service Providers, Web Search Portals and Data Processing Services
	   o Library and Other Information Services

Healthcare	o Health Care and Social Assistance
Other knowledge services	o Administrative and Support Services o Public Administration and Safety o Financial and Insurance Services o Rental, Hiring and Real Estate Services
Industrial and other services	o Agriculture, Forestry and Fishing o Mining o Manufacturing o Electricity, Gas, Water and Waste Services o Construction o Wholesale Trade o Transport, Postal and Warehousing o Other Services

In the report the term adtech is also used to describe an industry group of jobs. Adtech includes the following ABS industries:

- o Internet Publishing and Broadcasting

- o Internet Service Providers, Web Search Portals and Data Processing Services

- o Internet Service Providers and Web Search Portals

- o Data Processing, Web Hosting and Electronic Information Storage Services

- o Data Processing and Web Hosting Services

- o Electronic Information Storage Services

Appendix D - Reference areas

The ABS definition of the Pyrmont - Ultimo Statistical Area, which has been used as a proxy for the Peninsula for some of the data in this report, is provided in Figure 21 below.

Figure 21: Pyrmont - Ultimo Statistical Area 2

Pyrmont Peninsula
Pyrmont - Ultimo Statistical Area 2 (ABS)

Source: Greater Sydney Commission (2019), Western Harbour Precinct including the Pyrmont Peninsula Planning Framework Review Report, PwC (2020), ABS shapefiles

The Harris Street Village area has been used in calculating commercial office job density. It is overlaid with the Peninsula boundary in Figure 22, showing it is a similar area.

Figure 22: Harris Street Village Area

Pyrmont Peninsula
Harris Street Village Area

Source: Greater Sydney Commission (2019), Western Harbour Precinct including the Pyrmont Peninsula Planning Framework Review Report, City of Sydney (2011), Harris St Village Community Profile

Appendix E - Comparator analysis detailed outputs

Definition of comparable areas

It is appropriate to compare the Peninsula to other comparable regions in Australia to further understand the role and character of the area and assist in informing the vision and forecasting. Southbank (Victoria) and South Brisbane have been chosen as two comparable areas to the Peninsula as they operate as fringe markets to their respective CBDs. Where necessary, each of the areas are compared to their respective CBDs to contextualise the position and role of each of the areas.

Southbank (Victoria)

Positioned on the southern bank of the Yarra River, approximately 1km south of Melbourne CBD, Southbank is one of the primary business centres in Greater Melbourne. Historically the area was a predominantly industrial area that served South Melbourne rather than having a strong logistical connection with the CBD. Transition to the current state began in the 1990s as part of an urban renewal program of the area, which resulted in land uses of high rise residential, commercial office, and arts and entertainment being established.

The area is now best known as the cultural hub of arts and entertainment in Melbourne, underpinned by offerings such as the Melbourne Arts Centre and The National Art Gallery of Victoria. Media outlets including ABC and Network 7 are major office tenants of the area.

Figure 23: Boundary of Southbank (Victoria)

Source: PwC (2020) based on ABS shapefiles

South Brisbane

Separated by the Brisbane River, South Brisbane serves as a major arts and entertainment, tourism and education hub for the Brisbane CBD. The headline attractors of the area are the Brisbane Convention and Exhibition Centre and South Bank Parklands with approximately 11 million tourists visiting the area annually.

Due to its desirable location along the river and proximity to the CBD there is an array of retail and restaurant offerings in the area. Educational facilities TAFE Queensland and Griffith University also have major campuses in South Brisbane.

Figure 24: Boundary of South Brisbane
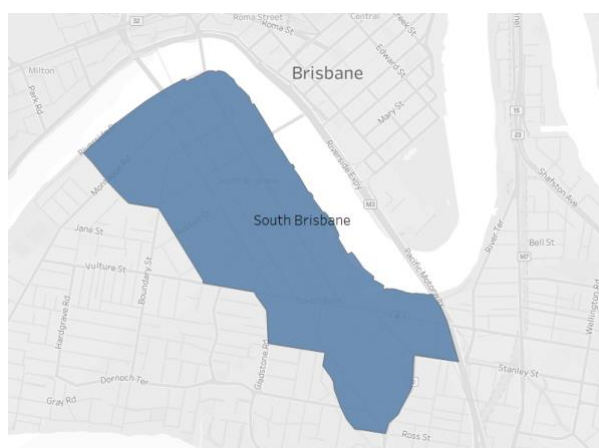
Source: PwC (2020) based on ABS SA2 shapefiles

Economic analysis - Pyrmont Peninsula and comparators

Southbank (Victoria) and South Brisbane are both larger in area to the Peninsula and have a lower density of both economic output and jobs. The Peninsula is most comparable to Southbank (Victoria) in terms of economic output, jobs and productivity numbers, with South Brisbane producing less with lower productivity.

Both Pyrmont and Southbank (Victoria) are home to integrated casinos with entertainment complexes, demonstrating similarities in their respective entertainment quarters. The number of businesses in the Peninsula, at almost three times as many as Southbank (Victoria) demonstrates the attraction of the area to small-and-medium-sized businesses. Table 21 highlights the key economic indicators of the Peninsula and the comparators.

**Table 21: Key economic indicators for Pyrmont Peninsula and comparators (2018)**

	Pyrmont Peninsula	Sydney CBD	Southbank (Victoria)	South Brisbane
Area (km2)	1.5	4.3	3.1	2.0
Economic output ($m)	$7,463	$83,964	$7,777	$4,273
Growth rate (p.a. over 5 years)	3.6%	4.1%	2.4%	1.6%
Output density ($m/km2)	$5,004	$19,556	$2,530	$2,119
Jobs	39,047	345,599	40,880	28,361
Job density	26,183	80,495	13,297	14,062
Productivity (output/job)	$191,117	$242,951	$190,245	$150,679
Number of businesses	1,697	16,145	576	971
Business revenue ($m)*	$15,220	$102,953	$16,647	$7,305

Sources: PwC (2019) Geospatial Economic Model, ABS (2018) Counts of Australian Businesses, ABS (2018) Australian Industry

Note: Business revenue does not include Financial and Insurance Services revenue as the ABS does not release this data

In terms of industry mix, the Peninsula has a larger percentage of output in the media, information technology and education industries than the comparators. Southbank (Victoria) outweighs the Peninsula in terms of tourism and entertainment as it has developed into one of the arts and culture hubs of Melbourne. In South Brisbane, 29 per cent of the economic output comes out of the Healthcare industry with the presence of several hospitals, hence it has a smaller share of the key industries present in the Peninsula.

**Figure 25: Industry mix in Pyrmont Peninsula against comparators**
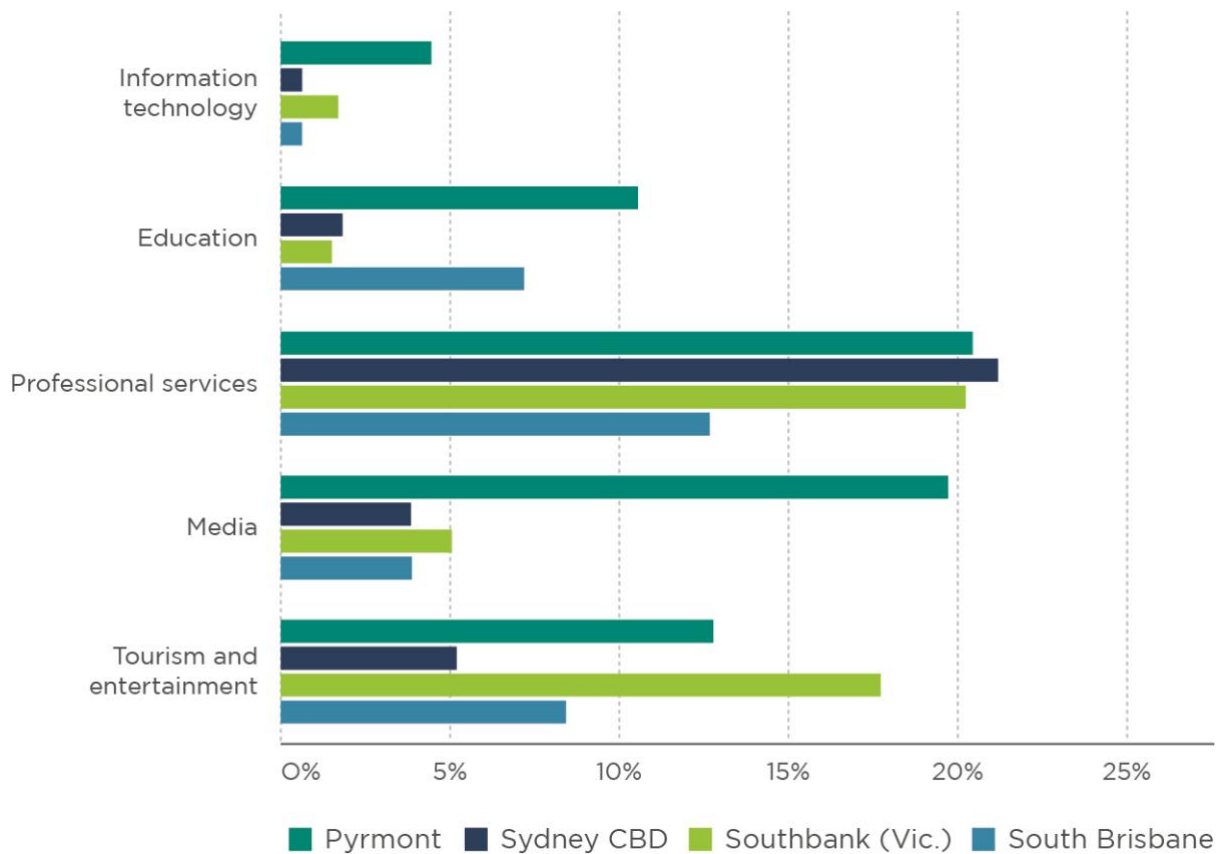
Source: PwC (2019) Geospatial Economic Model

The productivity of the Peninsula has grown strongly over the last 20 years, largely due to the shift away from industrial uses and an increase in jobs in professional services and other knowledge industries. This has seen the Peninsula match the productivity seen in Southbank (Victoria). South Brisbane has seen similar growth in productivity, but it is still significantly lower than that of the Peninsula. The Sydney CBD, along with Melbourne CBD, are the two most productive small area economies in Australia due to the proportion of knowledge intensive industries including financial services.[26]

[26] Productivity is measured as economic output per worker, and is calculated using PwC's Geospatial Economic Model

Figure 26: Productivity in Pyrmont Peninsula over time against comparators
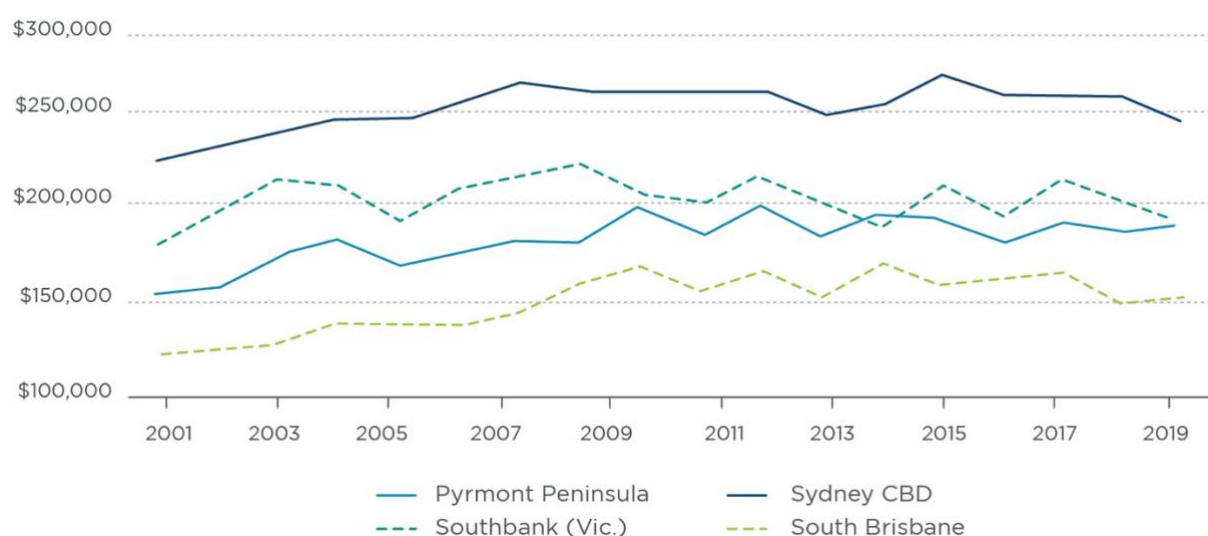
Source: PwC (2019) Geospatial Economic Model

Note: Productivity is in real dollars

Floorspace and commercial analysis – Peninsula and comparators

Both Southbank (Victoria) and South Brisbane are waterfront city fringe locations, operating as key secondary employment hubs adjacent to major commercial CBDs anchored by arts, entertainment and educational institutions (see Table 22).

Table 22: Anchoring arts, entertainment and educational institutions

Sector	Pyrmont Peninsula	Southbank (Victoria)	South Brisbane
Convention and exhibition	ICC Sydney	Melbourne Convention Exhibition Centre	Brisbane Convention and Exhibition Centre
Leisure and entertainment	The Star, Sydney Fish Markets, Harbourside	Crown Melbourne, Eureka Skydeck	South Bank Parklands, Musgrave Park Swim Centre
Arts and culture	Australian National Maritime Museum, Sydney Lyric Theatre, Powerhouse Museum	Melbourne Arts Centre, National Gallery of Victoria, Australian Centre for Contemporary Art, Melbourne Recital Centre, The Australian Ballet Centre	Gallery of Modern Art, Queensland Art Gallery, Queensland Museum & Science Centre, Queensland Performing Arts Centre, the Queensland Symphony Orchestra, Queensland Conservatorium, Opera Queensland, Maritime Museum
Higher education	UTS, TAFE NSW, University of Notre Dame	Victorian College of the Arts (University of Melbourne)	Queensland College of Art (Griffith University), TAFE Queensland, Griffith University Film School
Information, media and technology	ABC, Network Ten, Nine, Macquarie Radio Network, Nova 96.9, Google	ABC, Network 7	ABC

Source: City of Sydney (2017), Floorspace and Employment Survey (Harris St Village Area),, Census of Land Use and Employment (CLUE), City of Melbourne, City of Brisbane, PwC Analysis (2020)

Floorspace analysis and trends – comparators

This section provides an overview of the current state of floorspace use by type in Southbank (Victoria) and identifies how these uses have evolved over a 10-year period (2008 to 2018). Conversely, due to limited data availability, the current state of floorspace analysis for South Brisbane has been estimated and assessed based on typical benchmarks for average floorspace by use.

Southbank (Victoria)

Table 23: Southbank (Victoria) floorspace use by type

Floor space use by type	2008	2018	Change (sqm)	2008 (composition%)	2018 (composition%)	Change (%)
Residential	555,973	1,040,740	484,767	22.4%	28.9%	6.5%
Common Area	418,930	655,082	236,152	16.9%	18.2%	1.3%
Parking	445,543	646,679	201,136	17.9%	17.9%	0.0%
Office	393,646	426,323	32,677	15.8%	11.8%	-4.0%
Visitor Accommodation	129,189	231,341	102,152	5.2%	6.4%	1.2%
Private Outdoor Space	180,081	167,959	-12,122	7.2%	4.7%	-2.6%
Entertainment/Leisure	111,931	131,859	19,928	4.5%	3.7%	-0.8%
Performances, Conferences, Ceremonies	53,741	79,580	25,839	2.2%	2.2%	0.0%
Retail - Shop, cars & stall	48,483	79,477	30,994	2.0%	2.2%	0.3%
Community Use	55,433	55,377	-56	2.2%	1.5%	-0.7%
Equipment Installation	31,118	40,646	9,528	1.3%	1.1%	-0.1%
Education/Research	34,263	38,290	4,027	1.4%	1.1%	-0.3%
Workshop/Studio	15,981	9,406	-6,575	0.6%	0.3%	-0.4%
Storage	5,594	1,502	-4,092	0.2%	0.0%	-0.2%
Health	4,535	446	-4,089	0.2%	0.0%	-0.2%
Total space in block	**2,484,441**	**3,604,707**	**1,120,266**	**100.0%**	**100.0%**	

Source: Census of Land Use and Employment (CLUE) 2018, City of Melbourne, PwC Analysis (2020)

Note: some uses have been renamed to similar categories as the Floorspace and Employment Survey 2017 by the City of Sydney to allow comparison with the Pyrmont Floor Space Analysis

South Brisbane

As the Brisbane City Council and the South Bank Corporation do not provide similar floorspace survey or census data like the City of Sydney and City of Melbourne Councils, the following data was sourced from the Inner-City Vitality Report 2019 (prepared for the Committee for Brisbane) to represent South Brisbane:

Table 24: South Brisbane floorspace use by type (2018/19)

Major industry	Floor space/units (approximate only)	Number of workers (indicative range)
Office	~200,000 sqm	5,000-5,500
Residential	~389,000 sqm^ (4,576 units)	-
Parklands and open space	~ >177,000sqm	-
Hotel accommodation	~ 70,000 sqm* (1,741 rooms)	2,500-3,000
Restaurants and cafes	~ >9,000 sqm** (110 establishments)	2,500-3,000
Retail	12,540 sqm	300-400
Education establishments (no. of entities)	15	2,500-3,000
Major health establishments	Public and private hospitals	10,500-11,000
Others	NA	6,500-7,000
Total	**~ >1,000,000 sqm**	**~27,000-29,000**

Source: Inner City Vitality Report (2019), South Bank Corporation, PwC Analysis (2020)

^ Assuming average apartment unit size of 85sqm

* Assuming average hotel room size of 40sqm

** Assuming average shop size of 80sqm

Key floorspace trends in Comparators and their application to Pyrmont

Table 25: Comparator office trends in relation to Pyrmont

Floor space use by type	o Residential is the dominant use across the three precincts, with Southbank (Victoria) growing the most in terms of total floorspace quantum (up 90 per cent) over a 10-year period (2008 to 2018) – compared with a 20 per cent increase in Pyrmont. o In terms of total office floorspace, Pyrmont fell by about 4 per cent, while Southbank (Victoria) and South Brisbane increased by approximately 8 per cent and 10 per cent respectively over a 10-year period.
Average office job density	o The average job density for office floorspace in Pyrmont and Southbank (Victoria) were almost identical at 16 sqm per job, while South Brisbane appears higher at 25 to 30 sqm per job. o This could be attributed to a larger supply of secondary office accommodation with less efficient floorspace utilisation – notably, newly completed office stock in South Brisbane had comparable job density of 12 to 15 sqm per job.
Office building typology	o New office development in Pyrmont tends to be lower rise (five to seven storeys), with larger floorplates (2,000 to 5,000 sqm). o By contrast, the upcoming new office developments in Southbank (Victoria) range from 20 to 58 storeys with much smaller floor plates of between 400 and 1500 sqm – including substantial office floorspace delivered as part of larger mixed-use developments. o Likewise, in South Brisbane new office developments had floor plates averaging 1,500 to 1,700 sqm, with building heights of approximately 12 to 13 storeys.

Source: PwC Analysis (2020)

Key office market indicators - comparators

The following section analyses the key office market indicators for Grade A office floorspace in the comparator precincts as at Q2 2019. We note that as data for the South Brisbane office market is limited, we have used an aggregated 'Brisbane fringe' average as a reasonable proxy for the current state of South Brisbane.

Table 26: Comparator precincts office market summary

Key indicators*	Pyrmont Peninsula	Southbank (Victoria)	South Brisbane
Office stock (sqm)	~399,914	~446,659	~200,000
Vacancy rate	3.0 - 4.0%	9.0 - 10.0%	~10.0 - 15.0%
Average net face rent ($/sqm)	$650 - $950	$430 - $580	$450 - $550
Average incentives	15 - 20%	20 - 25%	35 - 40%
Average yield	5.0 - 6.0%	5.25 - 6.25%	5.75 - 6.75%
Average capital value ($/sqm)*	$10,000 - $15,000	$7,000 - $12,000	$6,000 - $9,000

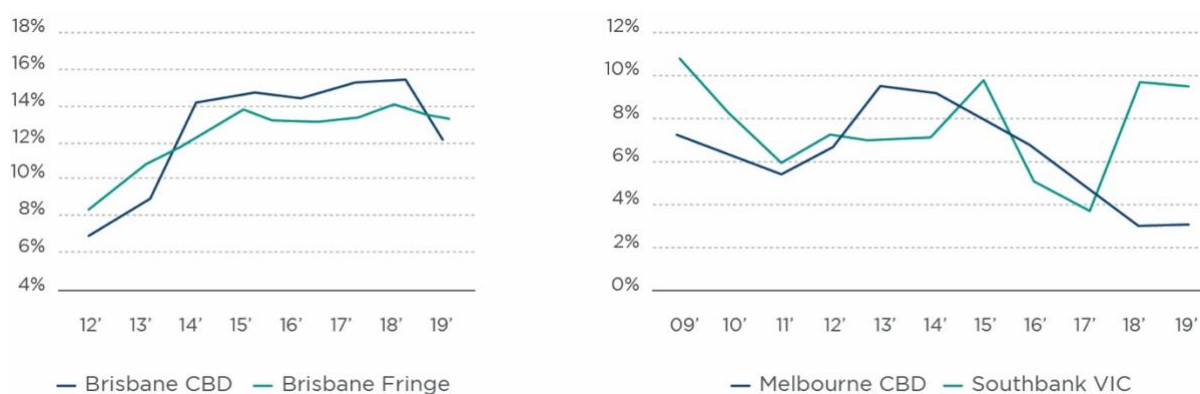Source: Knight Frank, Cushman and Wakefield, Savills, PwC Analysis (2020)

* Indicative and approximate only, does not reflect actual valuation.

Note that these indicators do not reflect the impact of COVID-19

Key long-term trends and future supply

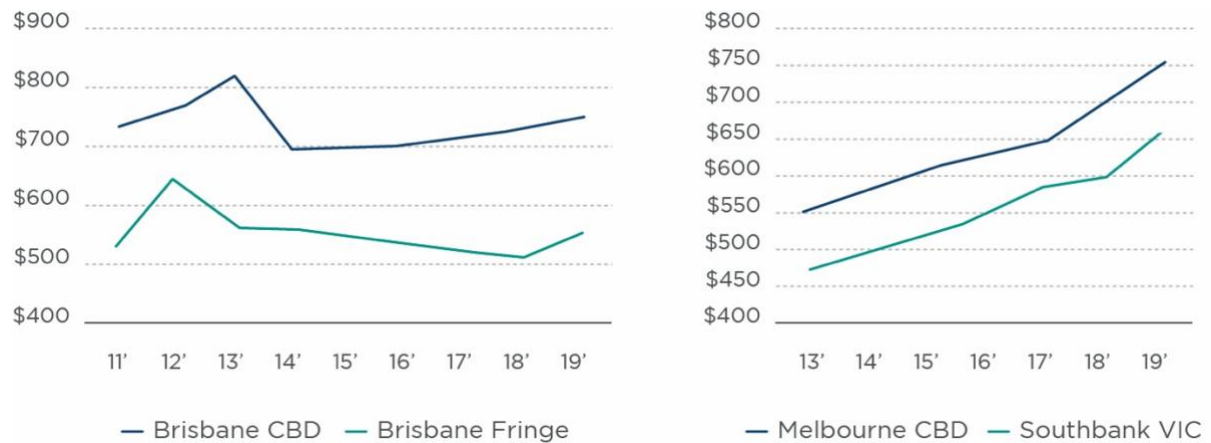### i) Average vacancy rates (per cent)

Figure 27: Vacancy Rates - Comparator precinct vs CBD

Source: Knight Frank, Cushman and Wakefield, Savills, PwC Analysis (2020)

ii) Average gross face rents ($/sqm)

Figure 28: Gross Face Rent - Comparator precinct vs CBD

Source: Knight Frank, Cushman and Wakefield, Savills, PwC Analysis (2020)

iii) Indicative* office supply pipeline (sqm 000's)

Figure 29: Office supply pipeline - Comparator precinct vs CBD

Source: Knight Frank, Cushman and Wakefield, City of Sydney, City of Melbourne, Inner City Vitality Report 2019, PwC Analysis (2020)

* Estimated floorspace and completion date only and subject to change

Based on the data in Figures 27 to 29, the key office market trends for Pyrmont and the comparator precincts are discussed in Table 27.

Table 27: Key office trends

Market indicators	Key trends
Office stock	o While office floorspace in Pyrmont has been declining, Southbank (Victoria) and South Brisbane increased floorspace over the past 10 years. o Similarly, while the future supply pipeline for Pyrmont is limited, Southbank (Victoria) has a substantial employment floorspace pipeline of more than 120,000 sqm over the next five years and South Brisbane is currently going through its own master planning process to unlock opportunities to renew and revitalise the area.
Average vacancy rates	o In contrast with Pyrmont's historically low vacancy, both Southbank (Victoria) and South Brisbane have vacancy rates at or above 10 per cent. Southbank has increased from 4 per cent to over 9 per cent from 2017 to 2019. o This could be due to an overall decline in office floorspace in Pyrmont compared to the comparator precincts, which have generally increased. However, anecdotally we understand that emerging city fringe locations such as Richmond/Cremorne in Victoria and Fortitude Valley in Queensland have been attracting office occupiers (including ICT businesses) relocating from Southbank (Victoria) and South Brisbane due to newer stock with larger, more efficient floor plates.
Average net face rents	o Like Pyrmont, net face rents of Grade A office floorspace in Southbank (Victoria) and South Brisbane on average leased at rents approximately 25 per cent to 35 per cent, which is lower than prime CBD rents in Melbourne and Brisbane respectively, and equivalent to the secondary grade in CBD office markets. o Again, despite the relative fluctuations in vacancy rates over time, the rental discount between the CBD and city fringe precincts appears 'consistent' across all three locations over the past 10 years.
Indicative yields and average capital values	o Indicative average capital value of Grade A office floorspace in Pyrmont are approximately 40-50 per cent lower than prime Sydney CBD values, while the comparator precincts are about 30-40 per cent discount to their respective prime CBD values.

Source: PwC Analysis (2020)

Key implications for the Pyrmont Peninsula

All three precincts have the presence of higher education, although our research indicates a more significant arts and cultural sector exists in Southbank (Victoria) and South Brisbane. Both Pyrmont and Southbank (Victoria) have casinos, and the new casino in Brisbane's CBD will link directly to South Brisbane via a footbridge.

The average gross face rents of all three city fringe locations appear strongly correlated to the CBD. In addition, medium to long term rent data from the three city fringe locations indicate that the discount of Grade A rents to CBD prime rents have been relatively 'stable' despite the differences in vacancy levels and trends. Hence, this rental gap is likely to be maintained over the medium and longer term, as tenants tend to relocate based on 'flight to quality' (i.e. office buildings in prime or similar fringe location, better building quality, fit outs, amenities, more efficient floor plates, etc). This is especially apparent when the discount of city fringe rents narrows with respect to the CBD. Moreover, the relatively low vacancy rates (compared to the comparator precincts), rising rents, compressing yields and limited new office developments suggest that there could be 'pent up' demand and investments for office space in Pyrmont.

In order to attract researchers, start-ups, grow and or retain the creative arts and culture sectors in Pyrmont, there may need to be some form of incentives targeted towards provision of new office supply that is both affordable and appropriate to these organisations to prevent them from being priced out of the precinct. The introduction of new key infrastructure (i.e. a Metro West Station) will be one of the key major catalysts to attract and or retain more major global and national occupiers: however, will strengthen the need to support smaller businesses.

While the impact of COVID-19 on the office market in Sydney CBD and Pyrmont is still too early to predict and estimate, any shifts in the current office demand, accommodation requirements and configurations are likely to be gradual. However, with the easing of restrictions and social distancing expected to continue, this could potentially make lower buildings with larger floor plates more attractive in the short term.

Appendix F – Drivers of growth and industry attraction – academic and empirical evidence

Connectivity

Transportation connectivity affects firms' access to markets, materials, workers, customers, and information. It is often cited as a critical location decision factor, in that it has the ability to increase employment or firm density through increased access to labour and better links between companies, which in turn drives productivity increases.[27]

Many studies have shown a positive relationship between rail station investments and the values or rents of residential and commercial properties. This effect dissipates over distance, after approximately 1.2km the effects on property values becomes insignificant. An increase in land values often leads to an appetite or need for higher-density development.

Additionally, the nature of public transportation (over and above road-based forms of connectivity) can deliver higher density concentrations of activity, and therefore productivity by making more efficient use of valuable land.[28] Knowledge-based industries and innovation clusters benefit particularly from public transit nodes and are more likely to local higher density employment areas.[29]

Supply of space and the ability to 'cluster'

Firms are also more likely to locate in markets with an existing cluster of firms in the same industry. This creates distinct clusters of activity and, at a local scale, creates opportunities for innovation through knowledge spillovers (an exchange of ideas).

The spillover benefits accumulate over time as labour markets continue to sit in close proximity with each other. This increase in scale and spatial concentration of firms encourage knowledge sharing, creating clusters within the area. For this reason, firms in knowledge-based industries seeking highly skilled workers have located in or near CBDs to have access to the widest pool of labour.

However, land is a scarce resource, and the floorspace available for new firms to locate in an area such as the Peninsula may be constrained by supply. The balance between (and competition between) residential and commercial land uses must also be considered.

[27] See, for example, Graham, D (2007), Agglomeration, Productivity and Transport. Journal of Transport Economics and Policy
[28] Daniels, R., & Mulley, C. (2011), Exploring the role of public transport in agglomeration economies and centres
[29] Centre for Transit Oriented Development (2011)

Differences in costs

Firms consider the impact of wages, rent and taxes on their bottom line. Of these, the cost of rents has repeatedly been shown to be one of most important firm considerations.[30]

Firms make a trade-off between two opposing forces - the drive towards lower cost premises (often found in more suburban or city-fringe settings) and the desire to capitalise on the agglomeration economies found at the heart of city centres where property costs are often highest.

Amenity

Another consideration, particularly for knowledge-based industries and health and education precincts, is the amenity offered by different locations. This presents an opportunity for organisations to take on a place-making or curation role, fostering the market forces that lead industries to cluster in a particular location.

The nature of existing built form also plays an important role in influencing where firms are likely to locate. For creative and tech industries in particular, vibrant locations that offer street-level culture and amenities are critical to attracting and retaining talent.[31]

[30] Iseki and Jones (2016), Analysis of firm location and relocation in relation to Maryland and Washington, DC metro rail stations. Research in Transportation Economics

[31] Richard Florida's book *The Rise of the Creative Class* proposed that the presence and concentration of 'bohemians' or creatives in cities engenders an environment or milieu which in turn attracts the 'creative class', talented and educated professionals working in knowledge-based industries including business and finance, technology, healthcare, medicine, law and education.

NSW
GOVERNMENT