# SGS
## Economics & Planning

# GROWING JOBS IN REGIONAL VICTORIA

**FINAL REPORT**
APRIL 2018

Prepared for

Regional Cities Victoria

Independent insight.

**Certified**

**B**

**Corporation**

**SGS** Economics & Planning | Independent insight.

# TABLE OF CONTENTS

## LIST OF FIGURES

## LIST OF TABLES

# EXECUTIVE SUMMARY

Regional Cities have considerable latent and unique potential to make an important contribution to the State economy. Their capacity to do this needs to be unlocked via investment in productivity enhancing infrastructure and policies. This would elevate the economies of Regional Cities and make a positive contribution to the State economy.

Victoria's ten Regional Cities are currently home to over 600,000 people. These cities account for 10.4 per cent of the total Victorian population, but only 8.3 per cent of the Victorian economy is generated in Regional Cities. The current economic trajectory of Victoria's Regional Cities will see only modest economic growth over the next decade. While Greater Melbourne will see half a million jobs added, the combined Regional Cities will add around 30,000 jobs. This indicates that there is significantly underutilised potential in Victoria's Regional Cities.

An appropriate strategy with a set of coordinated strategic interventions is required to enhance the potential contribution that Regional Cities could make to Victoria's economy. The strategy would help cut across the current silos of government funding and strategic planning. This would provide an incentive for State government agencies to take a 'place based' approach to coordinating investments and priorities with local government planned projects to deliver better outcomes.

The strategy would not seek only to add projects to current investment pipelines, but rather bring forward or expand investments to see economic benefits unlocked more readily. The strategy would include private and public sector investments and engagement with State government agencies.

This strategy would enable Regional Cities to consider the breadth of potential interventions and provide a local response to each. The strategy would consider the unified vision of the Regional Cites: a prosperous and sustainable economy; a well-connected transport network; an attractive place to live, work and play; and a regional 'capital' and well-recognised visitor destination.

Policy and program package elements that would make up the strategy are shown below. The likely economic benefits of each element are shown on the following page. A high-level indication of the funding allocation for each element is also provided.

### Commercial Transport Package
- Upgrade road transport (via new links and improved maintenance) to improve the movement of commodities and people. The road links currently deemed by VicRoads to be unsuitable for heavy vehicle access would be the top priority.
- Investments to freight and logistic hubs across the Regional Cities.

### Knowledge Sector Package (Program + Supporting Infrastructure)
- Advocating for faster NBN rollout and where NBN rollout has occurred, undertaking capacity building initiatives to make optimum use of this infrastructure.
- Programs to improve senior secondary education retention and lift the aspirations of young people in regional cities to fill the knowledge jobs of the 21st Century.
- Initiatives to upskill current workers and encouraging higher education pathways to maintain economic competitiveness of regional cities.

### Health and Aged Care Package

▪ Development of suitable aged care infrastructure to support growth in health care and social assistance sectors, driven by ageing populations.

▪ Boost health care specialty coverage via recruitment programs aimed at highly skilled professionals within the management and service delivery sectors of this industry. Specialties would include oncology, urology, pathology and gerontology.

### Regional Lifestyle and Visitor Economy Package

▪ Building on the Regional Rail Revival program, continue to strengthen links to Greater Melbourne and other regional centres via faster and more reliable train services.

▪ Enhance current natural-heritage-cultural tourist attractions and help strengthen the food offering to build the tourism industry.

### Improved Project Coordination and Integration

To deliver the benefits of the strategy, Regional City Councils would work closely with the State Government to identify, prioritise, plan for, arrange funding and integrate with other related projects. This would help to cut across the current silos of government funding and strategic planning and generate real synergies for the Regional Cities.

It is estimated that the successful implementation of the strategy would increase economic growth by $340 million over the next decade and support 3,600 additional jobs (a 12 per cent increase on the current trajectory).

| Element | Additional Economic Growth (GDP $ Million) | Additional Jobs | Funding Allocation ($ Million) |
|---|---|---|---|
| Commercial Transport Package | $102 | 540 | $95 |
| Knowledge Sector Package (Program + Supporting Infrastructure) | $119 | 1,440 | $110 |
| Health and Aged Care Package | $68 | 900 | $65 |
| Regional Lifestyle and Visitor Economy Package | $34 | 540 | $30 |
| Improved Project Coordination and Integration | $17 | 180 | $0[1] |
| Total | $340 | 3,600 | $300 |

It is proposed this would comprise a $300 million fund, over four years. This amount is based on the additional taxation revenue which the strategy would unlock for government over the next decade.

This clear process to identify strategies, prioritise projects and secure investment will enable Regional Cities to alter the course of their economy towards a more prosperous future.

---

[1] No additional funding required

# 1. INTRODUCTION

This work investigates economic and social trends across Victoria's major regional cities and identifies opportunities to bolster growth in future years.

As distinct destinations with rich cultural, economic and environmental landscapes, Victoria's Regional Cities have considerable latent and unique potential to make an important contribution to the state economy. They have, however, experienced significantly slower economic growth and higher unemployment rates than Greater Melbourne. This impacts on economic potential, taxation revenue and government expenditures, as well as the community fabric and the lives of people living in these cities.

If Victoria's Regional Cities are to continue to keep pace with, or exceed, growth rates experienced in other locations, it is vital that the Cities maintain and improve their potential for innovation and productivity. Innovation is the implementation of a new or significantly improved good or service, a new marketing method or improved internal business practices. While innovation is difficult to measure it can be seen with improved productivity outcomes. Productivity is the efficiency with which firms, organisations, industry, and the economy as a whole, convert inputs (labour, capital, and raw materials) into output (wages or profits). Productivity grows when output grows faster than inputs, which makes the use of existing inputs more efficient.

Innovation and productivity are not abstract concepts but rather central ideas in helping Regional Cities move towards greater prosperity. Productivity growth can be enabled by developing a coordinated set of investments, polices and program for Victoria's Regional Cities.

This work, undertaken by SGS Economics and Planning (SGS) for Regional Cities Victoria (RCV), outlines and details the current trajectory of the Regional Cities, and investigates how strategic interventions could improve their prosperity and that of Victoria as a whole.

The key questions SGS sought to answer in this work were:

- What is the current trajectory for Regional Cities?
- How can this trajectory be lifted?
- What would be the benefit to the whole of Victoria of lifting this trajectory?

A three-tiered approach to answering these questions have been used: firstly, profiling and strength identification; secondly, developing an economic vision and potential strategic interventions for each Regional City; and finally, economic modelling to assess the potential impact of the strategic interventions.

There are a range of interventions (investment, policies and programs) which can help to enable higher productivity growth in the Regional Cities. In this report they have been organised into policy 'packages' which span across and address the shared visions of the Cities.

*In simple terms, this work seeks to answer: how can we make it easier for a business in a Regional City to better market existing products, develop new or significantly improved goods or services and improve their business practices and workplace organisation?*

SGS
Economics
& Planning

# 2. STUDY APPROACH

A three-tiered approach to developing a program to enhance productivity in Regional Cities: 1) profiling and strength identification, 2) visioning and 3) modelling.

SGS's approach to this study was designed to appraise the opportunities found in the Regional Cities as a whole while drawing out the strengths and visions of each individual city.

This involved undertaking current and future profiling for each city and understanding its economic strengths and barriers to productivity uplift. SGS then identified the economic visions of each city and the policy responses that would achieve shared priorities, and modelled the anticipated uplift associated with an appropriate response.

The methodological components of SGS's approach are summarised below.

## 1. PROFILING AND STRENGTH IDENTIFICATION

High level **data analysis** was undertaken to develop an understanding of the local population and economy of each Regional City and the trends shaping it.

Regional City boundaries were defined using the Significant Urban Area (SUA) ABS geography. SUAs are clusters of one or more contiguous SA2s containing one or more related urban centres, where they are, for example, in the same labour market, contain an aggregate urban population exceeding 10,000 persons, contain related urban centres where the edges of the centre are less than 5km apart. The concordance of regional city boundaries can be found in Appendix 1.

Datasets used included:

- SGS Small Area Model (SAM), which produces a database of economic indicators across Victoria using sources such as Victoria in Future (2016), ABS Census, ABS Regional Population Growth and ABS Labour Force Survey. More information on the SAM can be found in Appendix 2.
- SGS small area GDP modelling. Key data sources include:

  - Agricultural Commodities: Small Area Data (Cat. No. 7125.0);
  - Manufacturing Industry, Australia (Cat. No. 8221.0);
  - Regional Population Growth, Australia (Cat. No. 3218.0);
  - Household Expenditure Survey, Australia (Cat No. 6530.0);
  - Education and Training Experience (Cat. No. 6278.0); and
  - Labour Force, Australia, Detailed, Quarterly (Cat. No.6291.0.55.003).

A **policy review** of relevant council and Regional Development Victoria (RDV) documents was concurrently undertaken. The purpose of this review was to gauge the issues, opportunities, strengths and visions relevant to each council. Documents reviewed included economic development strategies, community plans and major project plans.

## 2. VISIONING

**Engagement with RCV member councils** was undertaken to verify the findings of the data analysis and policy review, and to identify the economic vision and three highest strategic priorities for each Regional City. More information on the questions asked of councils and the findings of the consultation and policy review can be found in a separate document, Appendix 3.

These findings were used to **synthesise potential strategic interventions** for the Regional Cities.

## 3. MODELLING

To create **forecasts of economic activity and uplift** in the Regional Cities, SGS's internally developed small area gross domestic product (GDP) forecasts were used. The variable of interest for this project was Gross Value Added (GVA) which was projected out from the base year of 2016.

GVA was projected at an SUA level by growing the 2016 base year by the rate of employment growth and applying a productivity factor. This means that in addition to GVA growing by the SAM projected growth in employment, a gain in productivity means even more economic activity can be generated from the same inputs. Under the base case this productivity factor is 1.5 per cent a year, which is in line with the Australian average in recent decades.

For the **project case or 'Ambition' scenario**, this productivity factor was altered to produce an alternative forecast of GVA. This scenario sees the successful implementation of the RCV program which in turn produces a productivity uplift in the regional cities. While there are no specific projects to base a productivity uplift on, a generic uplift of 0.1 per cent to 1.6 per cent, phased in over 2021 to 2025, has been applied for the project case scenario as a reasonable proxy.

The total additional GVA in the project case was calculated using this estimated productivity enhancement. This total additional value in net present terms was then used to calculate the quantum of investment, assuming a benefit cost ratio of 1.5 is achieved.

# 3. REGIONAL CITIES NOW

Victoria's Regional Cities play an important role in the state and regional economy. This section provides a short overview of population and economic trends in the Regional Cities in recent years.

## 3.1   Context

Regional Victoria has experienced significantly slower economic growth and higher unemployment than Greater Melbourne. As shown in Figure 1, there has been a decline in Regional Victoria's GDP in three of the past ten years, and a decline in GDP per capita in five of the past ten years. There has been a similar outcome for Melbourne; in six of the past ten years GDP per capita has contracted in Melbourne due to population growth outstripping economic growth.

The most recent year saw very strong growth for Regional Victoria of 5.8 per cent, the highest growth rate since 1990-2000. Almost 40 percent of this growth came from very strong agricultural production and a boost in associated food manufacturing. Manufacturing in Regional Victoria saw an increase in production (see Figure 1) in 2016-17, even with the closure of the Ford plant in Geelong.

FIGURE 1: REGIONAL VICTORIA GDP AND GDP PER CAPITA GROWTH



Source: SGS (2017)

If growth rates in Regional Victoria is to continue to keep pace with, or exceed, those of other locations, it is vital that the Regional Cities maintain and improve their potential for innovation and productivity.

Looking at the past ten years, industries such as Other services, Arts and recreation, Professional services, Real estate services and Financial services have been poor performers. It is these types of industries which present a clear opportunity for regional cities. Actions should also be taken to build on existing strengths in serving their agricultural hinterland and advanced manufacturing.

FIGURE 2: CONTRIBUTION TO REGIONAL VICTORIA GDP GROWTH
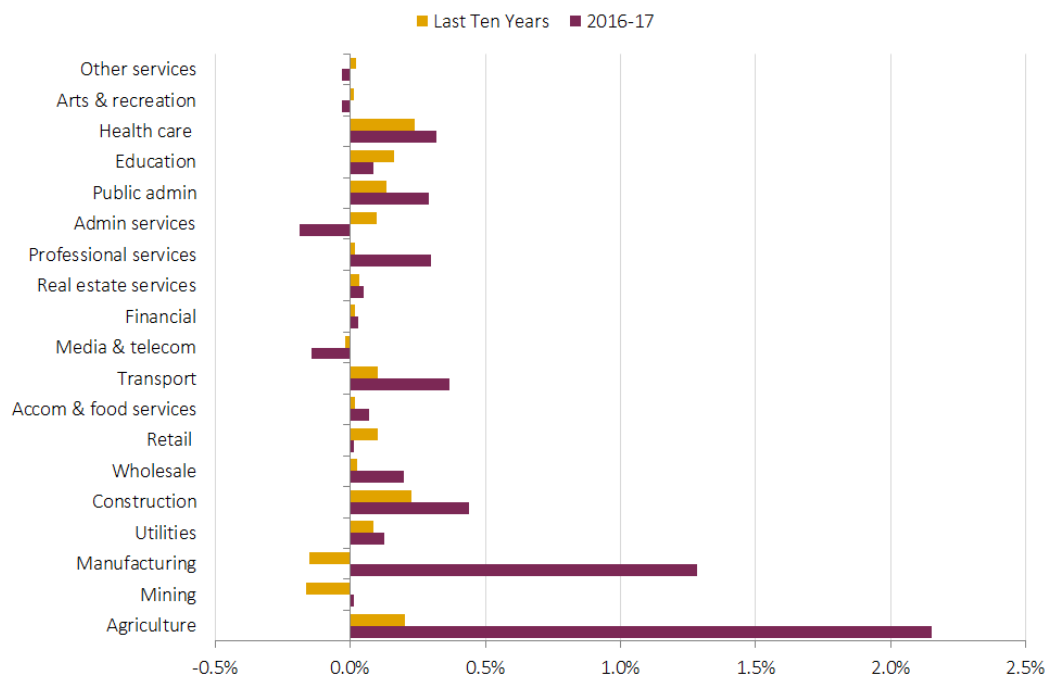


Source: SGS (2017)

## 3.2    Population

The Regional Cities are currently home to over 600,000 people. This accounts for 10 per cent of the total Victorian population[2].

The role and significance of Victoria's Regional Cities in the state context extends far beyond its 10 urban centres, however. With almost an additional 1 million[3] people living in Victoria's regions, in smaller towns or rural areas, the Regional Cities play a critical role in providing access to jobs, retail and services to those who live in these less connected areas.

Each positioned uniquely in the Victorian landscape, the Regional Cities vary considerably in size and character.

As seen in the table below, while cities such as Horsham and Wangaratta have resident communities of under 20,000 people, the three cities closest to metropolitan Melbourne – Geelong, Ballarat and Bendigo – are home to significantly larger populations. At 190,000, Geelong accounts for 30 per cent of the total resident population of Victoria's Regional Cities.

These larger cities have also grown at higher rates in recent years, with the exception of Wodonga, which had the highest compound annual growth rate (CAGR) of the Regional Cities from 2011 to 2016.

As a whole, the Regional Cities have grown in recent years at a lower rate than that of Victoria as a whole, and a much lower rate than metropolitan Melbourne. While the Regional Cities offer high

---

[2] Refer Appendix 1 for spatial definitions
[3] 971,575 people at 2016

relative housing affordability and access to natural assets, they are constrained in their offer of other liveability factors, such as access to employment and services.

TABLE 1: POPULATION 2011 AND 2016

|  | 2011 | % of LGA | 2016 | % of LGA | CAGR 11-16 |
|---|---|---|---|---|---|
| Geelong | 177,600 | 82% | 192,400 | 81% | 1.61% |
| Ballarat | 93,500 | 98% | 101,600 | 98% | 1.68% |
| Bendigo | 87,300 | 86% | 95,600 | 86% | 1.83% |
| Shepparton | 47,600 | 77% | 50,700 | 78% | 1.27% |
| Latrobe | 40,600 | 55% | 41,300 | 56% | 0.34% |
| Mildura | 42,500 | * | 44,900 | * | 1.10% |
| Wodonga | 36,000 | * | 39,800 | * | 2.03% |
| Warrnambool | 33,000 | * | 34,600 | * | 0.95% |
| Wangaratta | 18,000 | 66% | 18,900 | 66% | 0.98% |
| Horsham | 16,100 | 82% | 16,400 | 83% | 0.37% |
| *Regional Cities (all)* | 592,200 | - | 636,200 | - | 1.44% |
| *Melbourne* | 4,013,200 | - | 4,540,500 | - | 2.50% |
| *Remainder of State* | 932,400 | - | 1,002,500 | - | 1.46% |
| *Victoria* | 5,537,800 | - | 6,179,200 | - | 2.22% |

Source: SGS, VIF 2016, ABS

* Crosses LGA or State boundary

## 3.3    Economy

In accordance with their regional service hub role, Victoria's Regional Cities play an important role in the state economy.

Gross value added (GVA) represents the sum of all wages and profits generated by an economy. With over 8.3 per cent of Victoria's total gross value added (GVA) in 2016 (see Figure 3), the economic contribution of the Regional Cities is only slightly lower than the proportion of their total population (10.4 per cent).

FIGURE 3: CONTRIBUTION TO TOTAL VICTORIA GVA (2016)



- Melbourne   - Regional Cities   - Rest of Victoria
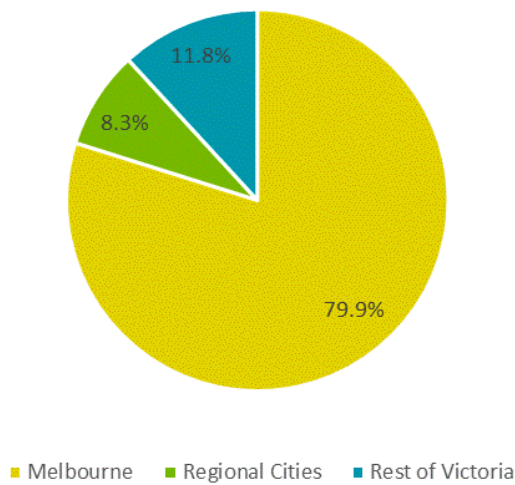
Source: SGS 2018

## Economic activity

Victoria's regions have lagged economically in recent years. As seen in Figure 4, the Regional Cities saw a growth in gross value added (GVA) of only 1.5 per cent from 2011 to 2016 compared to 12.4 per cent in metropolitan Melbourne and 10.1 per cent in Victoria as a whole.

FIGURE 4: PERCENTAGE GROWTH IN GVA 2011 TO 2016



Source: Source: VIF 16, SGS 2018 and ABS

Per capita, the GVA of the Regional Cities as a whole declined over the same period (see Table 2 below). Some cities were able to secure a per capita increase in GVA, however. These were Latrobe, Wangaratta and Horsham.

TABLE 2: GVA PER CAPITA 2011 AND 2016 ($)

|  | 2011 | 2016 | CAGR 11-16 |
|---|---|---|---|
| Geelong | 43,319 | 40,475 | -1.35% |
| Ballarat | 44,072 | 41,343 | -1.27% |
| Bendigo | 42,413 | 40,180 | -1.08% |
| Shepparton | 40,211 | 39,277 | -0.47% |
| Latrobe | 46,673 | 47,285 | 0.26% |
| Mildura | 37,109 | 36,332 | -0.42% |
| Wodonga | 46,587 | 42,871 | -1.65% |
| Warrnambool | 40,673 | 40,181 | -0.24% |
| Wangaratta | 45,424 | 46,296 | 0.38% |
| Horsham | 44,672 | 45,028 | 0.16% |
| *Regional Cities (all)* | *42,991* | *41,049* | *-0.92%* |
| *Melbourne* | *55,021* | *55,821* | *0.29%* |
| *Victoria* | *50,974* | *51,392* | *0.16%* |

Source: VIF 16, SGS 2018 and ABS

## Employment

The Regional Cities have seen modest growth in employment from 2011 to 2016, with an increase of 6,000 jobs. Employment growth in Geelong accounts for almost half of this, with the city's economy recovering after the decline of the manufacturing sector.

TABLE 3: REGIONAL CITY EMPLOYMENT 2011 AND 2016

|  | 2011 | 2016 | CAGR 11-16 |
|---|---|---|---|
| Geelong | 89,666 | 92,616 | 0.65% |
| Ballarat | 48,020 | 50,336 | 0.95% |
| Bendigo | 44,382 | 46,065 | 0.75% |
| Shepparton | 24,423 | 24,715 | 0.24% |
| Latrobe | 21,660 | 21,454 | -0.19% |
| Mildura | 19,278 | 20,096 | 0.83% |
| Wodonga | 19,365 | 19,824 | 0.47% |
| Warrnambool | 17,329 | 15,902 | -1.70% |
| Wangaratta | 11,153 | 10,838 | -0.57% |
| Horsham | 9,251 | 8,957 | -0.64% |
| *Regional Cities (all)* | *304,527* | *310,802* | *0.41%* |
| *Melbourne* | *2,133,955* | *2,304,015* | *1.55%* |
| *Victoria* | *2,804,694* | *3,019,076* | *1.48%* |

Source: SGS 2018 and ABS

As illustrated in Figure 5 unemployment rates vary across the Regional Cities; between 5 per cent and over 10 per cent in Latrobe. Between 2011 and 2016 it increased in all but Shepparton, Albury and Wangaratta, and remained stable in Horsham and Mildura.

FIGURE 5: UNEMPLOYMENT RATE 2011 AND 2016
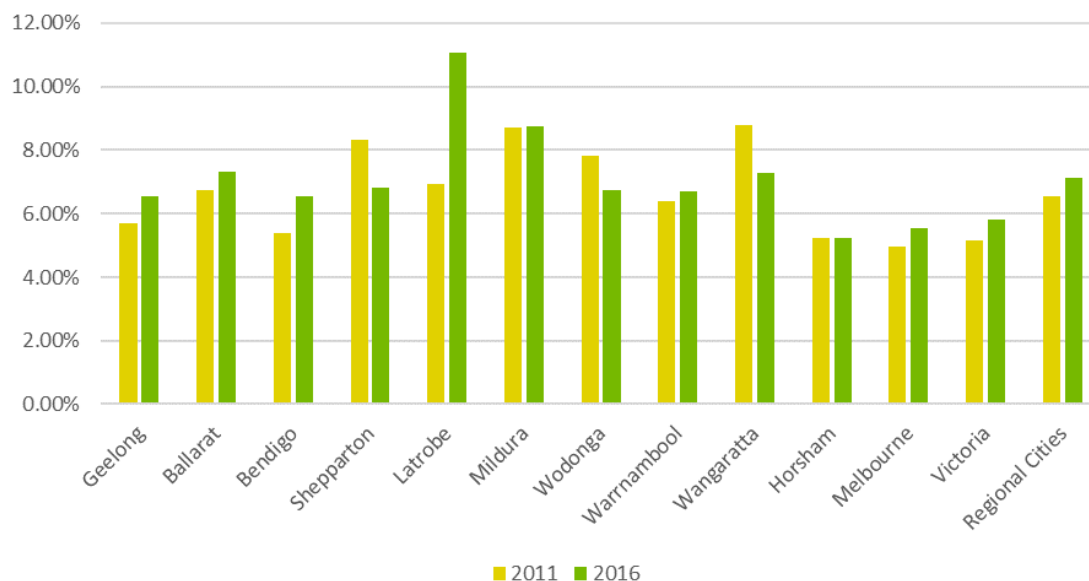


Source: SGS 2018

Figure 6 below illustrates employment trends in four key sectors in the Regional Cities over the past decade.

While the industrial sector has remained relatively unchanged over this period, employment in the population-serving (eg. teaching, hospitality or retail) and health and education sectors has seen sizeable increases. Cities such as Geelong and Bendigo have made significant increases in jobs in knowledge-intensive industries, including in finance and insurance.

FIGURE 6: REGIONAL CITIES EMPLOYMENT: FOUR SECTORS 1996 TO 2016
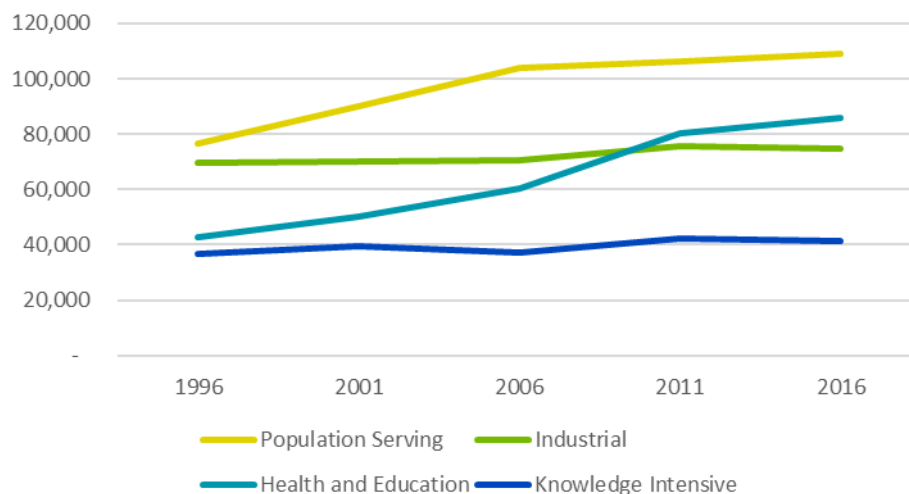


Source: SGS 2018

## Connectivity

As seen in Figure 7 below, connectivity concerns also have an impact on the economic activity of Victoria's regions. The figure illustrates restrictions to Victoria's b-double network. Locations marked with red dots indicated structures that cannot be crossed, while roads marked in red generally

require road manager approval for access by permit. As seen in the network depicted, there are substantial blockages for freight transport across Victoria's regional areas.

FIGURE 7: VICTORIA'A GAZETTED B-DOUBLE NETWORK
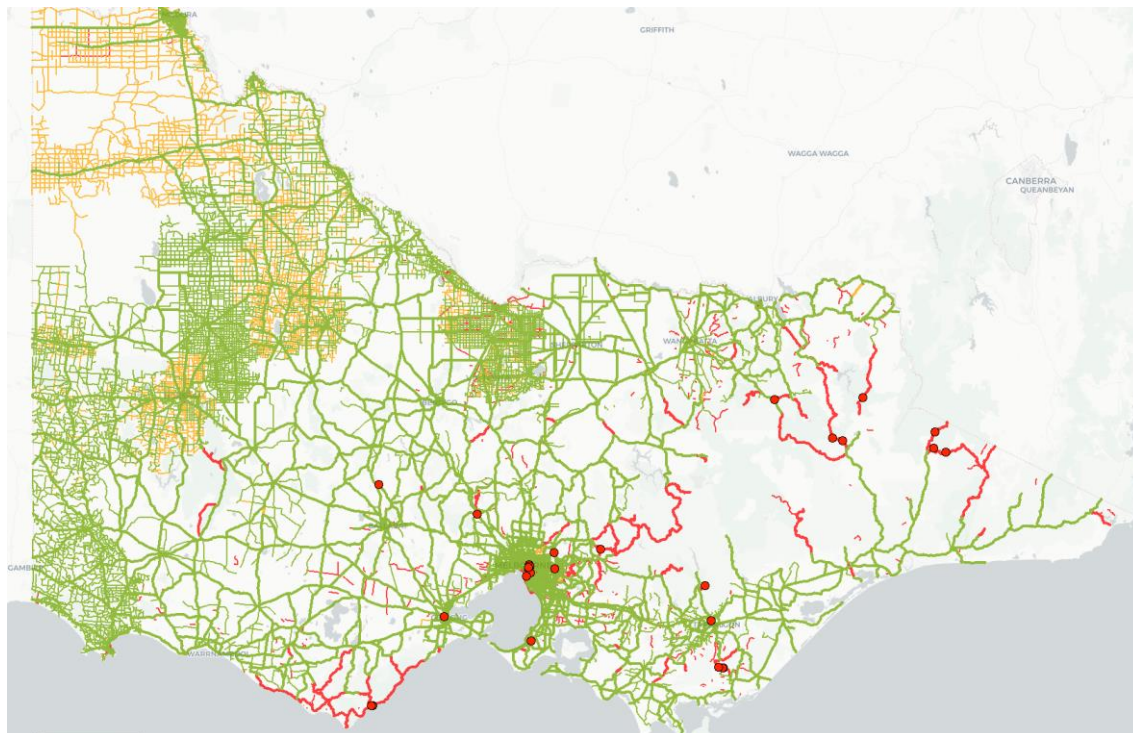


Source: VicRoads 2018

## 3.4    Summary and implications

Regional Cities accommodate approximately 10 per cent of the Victorian population, and also play an important role in providing access to jobs and services for those who live in Regional Victoria.

The distribution of population across the Regional Cities is uneven. Those closest to Melbourne have the largest population, and Geelong accommodates 30 per cent of the population of all Regional Cities combined. The larger Regional Cities have tended to be the locations experiencing the highest rates of growth in Regional Victoria.

The cities with the largest population also had the most jobs: Geelong accommodates 30 per cent of Regional City jobs, followed by Ballarat and Bendigo. Cumulatively, these cities represent over 60 per cent of Regional City jobs. Jobs growth in population serving sectors has grown consistently across the Regional Cities, while Geelong and Bendigo have accommodated growth in knowledge intensive sectors.

The rate of unemployment varies across the Regional Cities; between 5 per cent (Horsham, Bendigo) to over 10 per cent in Latrobe. This is higher than the average for Melbourne (5.5 per cent) and Victoria (5.8 per cent)

Regional Cities contributed approximately 8 per cent to Victoria's economy in 2016. Between 2011 and 2016, Regional City economies grew more slowly than that of Melbourne (12.4 per cent) and Victoria (10.1 per cent). This meant that per capita economic activity in the Regional Cities declined overall, although some cities saw a small increase (Latrobe, Wangaratta and Horsham).

Overall, Regional Cities are growing more slowly than metropolitan Melbourne, and Victoria. There are variations across the Regional Cities; the larger ones closer to Melbourne are growing the fastest.

# 4. CURRENT TRAJECTORY FOR REGIONAL CITIES

*Productivity isn't everything, but in the long run, it's nearly everything. A country's ability to improve its standard of living over time depends almost entirely on its ability to raise its output per worker.*

Paul Krugman, The Age of Diminishing Expectations (1994)

This section outlines what the Cities are likely to experience if they continue on their current trajectory in the coming decades. This helps understand what is likely to occur in the short and long term if there is no intervention or major change enacted in the Regional Cities.

## 4.1    Household and population profile

### Population growth

Overall, the Regional Cities are expected to grow by over 375,000 people from 2016-2051, reaching a total population of 1 million in 2051. The remaining areas of regional Victoria will accommodate an additional 600,000 people.

This represents a minor decline in the overall population proportions that the Regional Cities (from 10.4 per cent to 10.0 per cent) and the remaining areas of regional Victoria (from 16.1 per cent to 15.6 per cent) represent as a total of Victoria.

As Cities are of varying sizes, differing rates of population increase will have varying impacts. Regional Cities are expected to grow at only a slightly lower rate than metropolitan Melbourne, but most of this will occur in the larger cities.

TABLE 4: POPULATION PROJECTIONS 2016 TO 2051

|  | 2016 | 2021 | 2031 | 2041 | 2051 |
|---|---|---|---|---|---|
| Geelong | 192,400 | 206,000 | 235,600 | 268,900 | 308,600 |
| Ballarat | 101,600 | 112,100 | 135,100 | 158,900 | 184,400 |
| Bendigo | 95,600 | 105,600 | 125,900 | 146,300 | 168,200 |
| Shepparton | 50,700 | 53,900 | 60,500 | 67,000 | 73,900 |
| Latrobe | 41,300 | 42,500 | 46,800 | 51,600 | 56,800 |
| Mildura | 44,900 | 46,900 | 51,200 | 55,600 | 59,700 |
| Wodonga | 39,800 | 43,900 | 52,600 | 62,000 | 72,000 |
| Warrnambool | 34,600 | 36,400 | 39,400 | 42,100 | 44,500 |
| Wangaratta | 18,900 | 19,200 | 20,100 | 21,100 | 22,100 |
| Horsham | 16,400 | 17,100 | 18,500 | 20,000 | 21,400 |
| *Regional Cities* | 636,200 | 683,600 | 785,700 | 893,500 | 1,011,600 |
| *Melbourne* | 4,540,500 | 4,987,900 | 5,832,000 | 6,679,400 | 7,597,500 |
| *Remainder of State* | 1,002,500 | 1,064,600 | 1,246,000 | 1,433,500 | 1,607,900 |
| *Victoria* | 6,179,200 | 6,736,100 | 7,863,700 | 9,006,400 | 10,217,000 |

Source: VIF16 and SGS 2018

The largest cities and those in closest proximity to Melbourne (Geelong, Bendigo and Ballarat) are anticipated to have the highest rates of growth, along with Wodonga, which benefits from the proximity of Albury.

FIGURE 8: POPULATION GROWTH PROJECTED
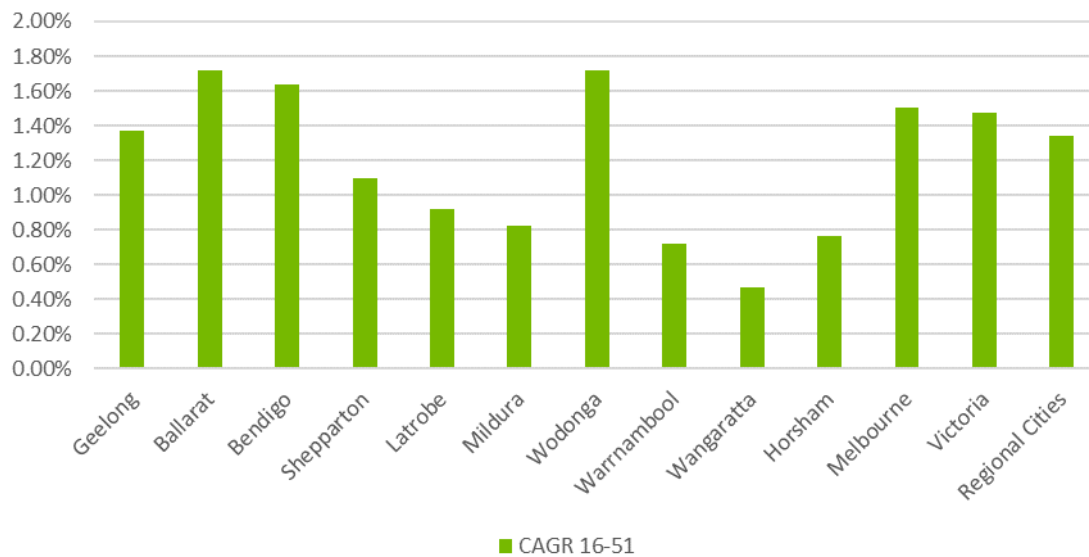


Source: VIF16 and SGS 2018

## Age profile

The proportion of people over the age of 65 is expected to increase in Regional Cities in the coming decades, and conversely, the working age population (26 to 64 year olds) is expected to decrease.

While an ageing population will increase the demand for aged care and social services, this must be appropriately matched with adequate infrastructure for skilled healthcare workers.
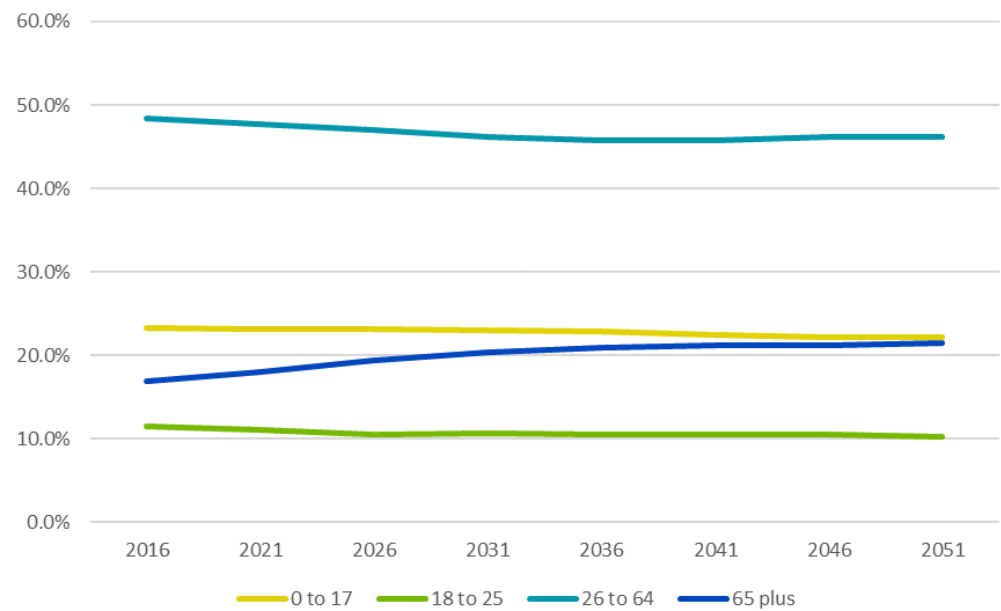
Source: VIF16 and SGS 2018

At 2051 the demographic age breakdown of the regional cities is largely the same as Victoria. However, there are some subtle differences; regional cities will have a slightly lower proportion of working age population at 46.1 per cent of the population, compared to 48.5 per cent of the population for all of Victoria.
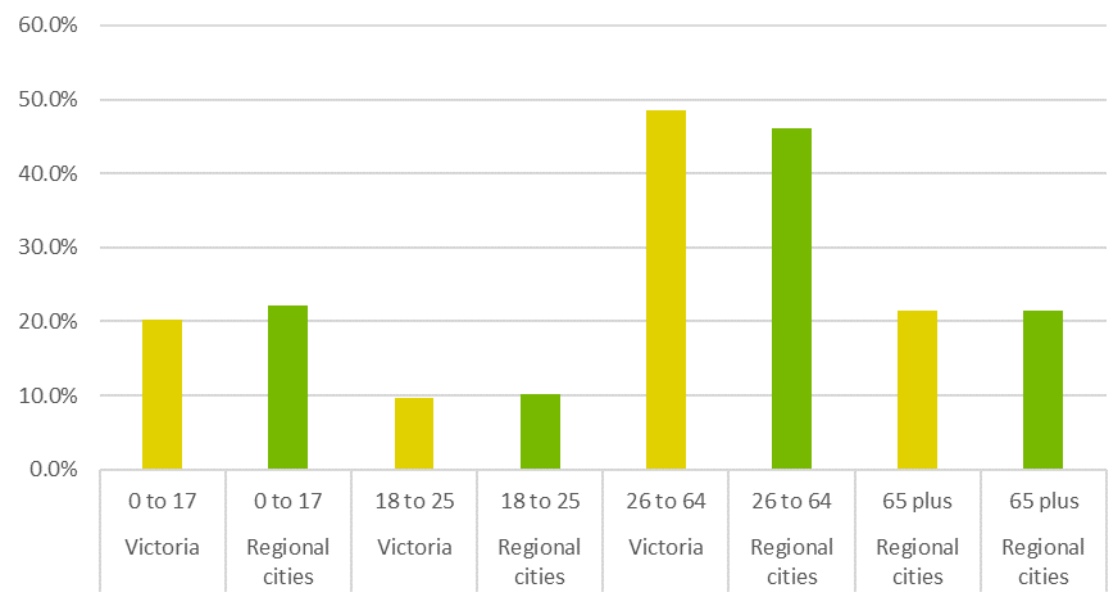
Source: VIF16 and SGS 2018

## Socio-Economic Indexes for Areas (SEIFA)

Other challenges include social disadvantage. The Socio-Economic Indexes for Areas (SEIFA) summarises different aspects of advantage and disadvantage by geographic area using census data. It ranks people's access to material and social resources, and their ability to participate in society, using indicators such as education, occupation, employment, income, families, and housing.

As seen in the map below, Victoria's regions are generally more disadvantaged than areas in metropolitan Melbourne. The urban areas of each of the Regional Cities are in the top 50th percentile for disadvantage, and in many cases even higher.

With the Regional Cities home to some of Victoria's most vulnerable populations, continuing along the current trajectory of the Cities may cause further disadvantage or place further populations at risk into the future.

FIGURE 11: INDEX OF RELATIVE SOCIO-ECONOMIC ADVANTAGE & DISADVANTAGE (2011)
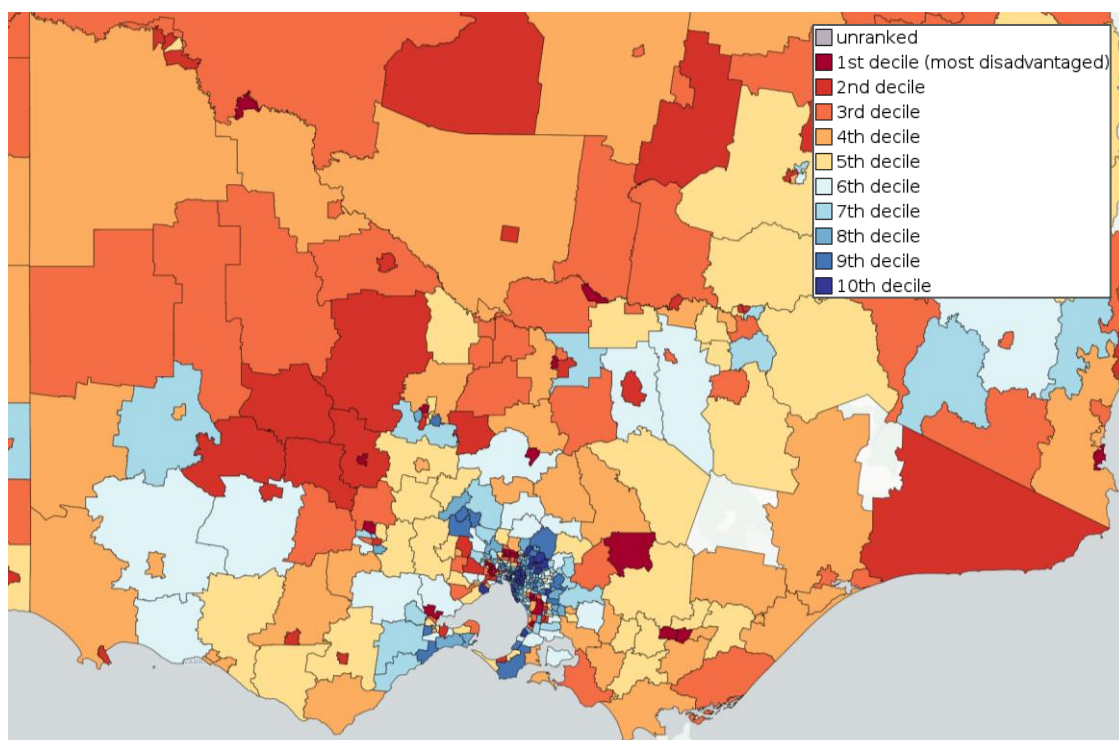


Source: AURIN, 2018

## 4.2    Economy

The economy of regional Victoria relies on its natural, human and capital asset profile. There is a difference in the economic, labour sourcing and visitation structures of those cities within the 2 hour belt of metropolitan Melbourne, and those outside of it. For example:

- Those within close proximity can source labour from Melbourne and generally have better connectivity to Melbourne;
- Professional services vs rural, agriculture and manufacturing based economies; and
- Different tourism patterns eg. day trips vs overnight stays, natural vs. cultural assets.

There are common trends that will influence the economic prosperity of the Regional Cities in coming years and decades:

- Structural changes and transitions eg. decline in manufacturing, increased automation, energy sector transition;
- New technologies; and
- Increasingly globalised markets.

Table 5 and Figure 12 show that under this base case (a scenario where no major intervention occurs), employment growth will occur across the Regional Cities, but at a much lower rate than metropolitan Melbourne. Growth in Latrobe is projected to be limited, although recent announcement of support for Latrobe to recover from the major structural changes to its economy may influence this to some degree.

Horsham will continue to have constrained access to export markets and have low connectivity to other regional areas and metropolitan Melbourne.

TABLE 5: EMPLOYMENT PROJECTIONS 2016 TO 2051

|  | 2016 | 2021 | 2031 | 2041 | 2051 |
|---|---|---|---|---|---|
| Geelong | 92,616 | 97,888 | 111,980 | 125,707 | 138,566 |
| Ballarat | 50,336 | 53,928 | 63,193 | 71,555 | 78,778 |
| Bendigo | 46,065 | 50,266 | 59,184 | 66,843 | 73,459 |
| Shepparton | 24,715 | 25,798 | 29,226 | 32,264 | 34,781 |
| Latrobe | 21,454 | 20,762 | 22,087 | 24,000 | 25,701 |
| Mildura | 20,096 | 20,524 | 22,711 | 24,795 | 26,519 |
| Wodonga | 19,824 | 20,680 | 23,354 | 25,720 | 27,784 |
| Warrnambool | 15,902 | 16,376 | 18,033 | 19,420 | 20,489 |
| Wangaratta | 10,838 | 11,055 | 12,088 | 12,993 | 13,674 |
| Horsham | 8,957 | 8,987 | 9,518 | 9,991 | 10,315 |
| *Melbourne* | *2,304,015* | *2,541,908* | *3,121,421* | *3,669,938* | *4,128,103* |
| *Victoria* | *3,019,076* | *3,274,748* | *3,953,276* | *4,601,459* | *5,151,108* |
| *Regional Cities* | *310,802* | *326,263* | *371,373* | *413,289* | *450,067* |

Source: SGS 2018

FIGURE 12: EMPLOYMENT GROWTH PROJECTED 2016 TO 2051
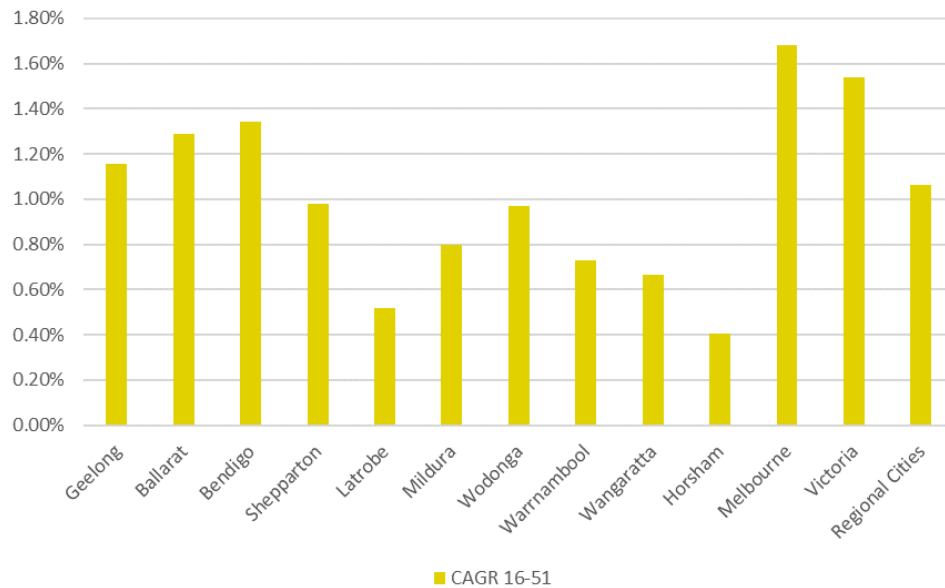


Source: SGS 2018

Employment in health and education will increase significantly in a response to ageing populations, and population serving industries will also grow in alignment with population increases. Knowledge intensive industries will see only a moderate increase, and the industrial sector will remain unchanged.

Despite this latter sector appearing to provide only a stable level of employment, transitions in the industrial sector will lead to higher value activity, producing a higher GVA. As a proportion of GVA across all sectors, however, the contribution of the industrial sector is expected to decline.

FIGURE 13: REGIONAL CITIES EMPLOYMENT: 4 SECTORS PROJECTION
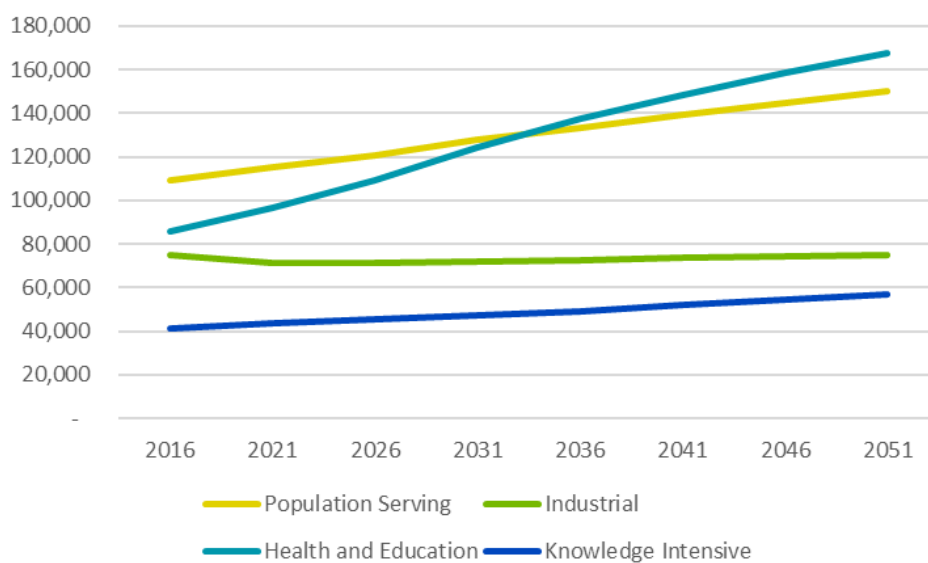


Source: SGS 2018

## Gross value added projection

SGS has projected a Base Case for GVA growth in the Regional Cities. We have calculated this by taking the GVA level at the individual regional city level in our base year (2016) and growing it in line with our employment projections plus an additional productivity enhancement. In the Base Case, productivity enhances GVA by 1.5 per cent a year; this is around the Australian long-term average.

Using this method, GVA in the Regional Cities grows, on average, by 2.6 per cent a year. This takes GVA to a level of around $63 billion by 2051.

This growth is less than that expected of both Greater Melbourne (3.2 per cent) and Victoria as a whole (3.0 per cent).

FIGURE 14: REGIONAL CITIES GVA ($M): BASE PROJECTION
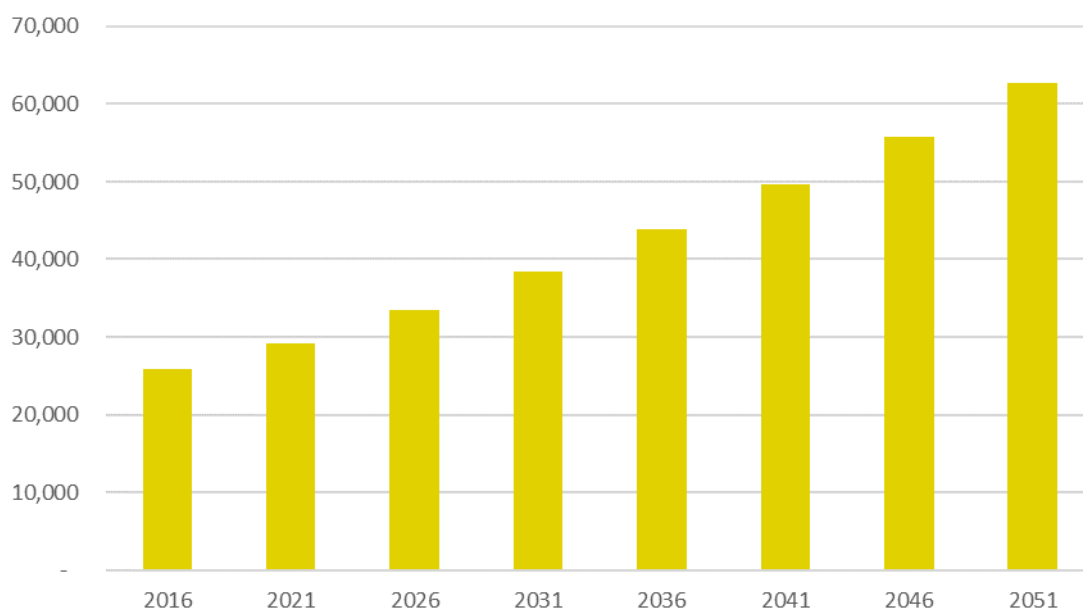


Source: SGS 2018

## 4.3    State policy context

In response to these trends and development in Regional Victoria and the Regional Cities, the State Government has developed policy to address challenges and leverage opportunities. This is outlined in two key documents Plan Melbourne and Victoria's Regional Statement.

## Plan Melbourne (2017)

Plan Melbourne's focus for Regional Cities is to support population and economic growth. It further recognises that "planning for growth in regional Victoria must be led locally and acknowledge the diverse range of opportunities and challenges that exist in different locations". The Strategy notes that while regional Victoria is growing, this growth is not occurring at the same rate as metropolitan Melbourne. It asserts that if current trends continue, the total proportion of Victorians living outside of Melbourne will decline.

Plan Melbourne recognises a need for regional Victoria to "take on a greater proportion of residential and jobs growth than is projected under the 'business as usual' scenario", with an associated need to "plan for better connections to infrastructure and services".

Some key areas recognised by Plan Melbourne in which regional Victoria can further develop are:

- Participating in the transition to a zero-carbon economy;
- "Industries of the future", including knowledge-based services and advanced manufacturing and processing;
- Food-and-fibre exports to China, stimulated by growth in Asia and accelerated demand for produce;
- Tourism, supported by new investment in infrastructure and improvements to marketing, product development and the visitor experience;
- International education, given regional education providers can offer "niche expertise and significant industry expertise in fields of global significance", including food and agriculture, soil and water, energy and resources, and the environment; and
- The population services sector (eg. healthcare and social assistance), which is expected to drive strong employment growth in regional Victoria, particularly as a result of Victoria's ageing population.

Plan Melbourne makes explicit mention of Victoria's 10 Regional Cities, recognising the importance of their diverse economies and strong communities. Policies of relevance to Victoria's regions and the Regional Cities are summarised in the table below.

TABLE 6: RELEVANT PLAN MELBOURNE POLICIES

| Direction | Policies |
|---|---|
| Direction 7.1 Invest in regional Victoria to support housing and economic growth | **Policy 7.1.1 Stimulate employment and growth in regional cities**<br>- The government will continue to make improvements to infrastructure and services to stimulate employment and growth in the state's 10 largest regional cities<br>- Includes developing development strategies that reflect the individual growth opportunities and priorities of each regional city |
| Direction 7.2 Improve connections between cities and regions | **Policy 7.2.1 Improve transport and digital connectivity for regional Victoria**<br>- Integrated labour market across Victoria, and expansion of digital economy<br><br>**Policy 7.2.2 Strengthen transport links on national networks for the movement of commodities** |

Source: Plan Melbourne (2017)

## Victoria's Regional Statement (2015)

Victoria's Regional Statement (VRS) highlights the need for government investment and decision-making in regional Victoria to reflect priorities identified by regional communities. The introduction of Regional Partnerships underpins VRS. A response to an identified need for clear community input to Government decision-making, Regional Partnerships were introduced to "bring together representatives from local business, education, social services and community groups with the three tiers of government".

Regional Partnerships were formed in nine regions in rural and regional Victoria in August 2016. The boundaries for the partnerships are shown in the map below.

SGS
Economics
& Planning
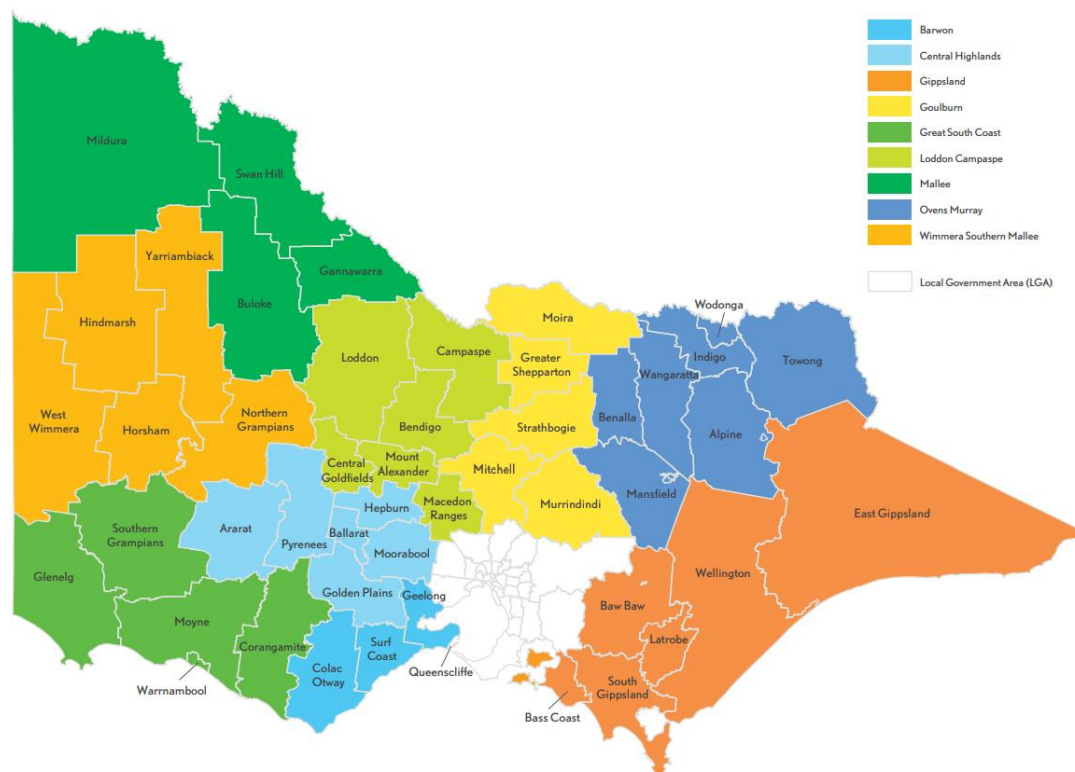
Source: Regional Development Victoria 2015

Regional Partnership members represent a wide range of sectors, including tourism, health, education, food and fibre, the arts, sport, small business, entrepreneurship and volunteerism.[4]

The Regional Partnerships have been tasked with building on existing Regional Strategic Plans to agree annually on actions and outcomes to progress economic and social priorities. These are to be made available publicly.

Key areas for growth and management identified in VRS include: agriculture, tourism and events, renewable energy, small business, racing, creative industries, water and planning. Policy priorities identified are:

- Transport and infrastructure for growth;
- Delivering the education state in regional Victoria;
- Better healthcare for regional families;
- Safer regional communities; and
- Protecting the quality of life in Victoria's regions.

## 4.4 Summary and implications

There is projected to be an additional 375,000 people in the Regional Cities between 2016 and 2051. However, this will be unevenly distributed; over 65 percent of this will be accommodated in Geelong, Ballarat and Bendigo.

Overall, there will be a minor decline in the overall population proportions that the Regional Cities (from 10.4 per cent to 10.0 per cent) and the remaining areas of regional Victoria (from 16.1 per cent to 15.6%) represent as a total of Victoria.

---

[4] https://www.premier.vic.gov.au/diverse-new-regional-partnerships-members-announced/

The economic structure of these larger cities also varies; those within close proximity can source labour from Melbourne and generally have more sophisticated economies with a higher proportion of professional services and knowledge intensive sectors.

The smaller Regional Cities generally have a focus on agriculture and manufacturing based economies. There is also variation in tourism patterns between the Regional Cities close to Melbourne (which accommodate day trips and are more likely to have cultural assets) compared to those further away (which are more likely to see overnight stays and have natural assets).

There are common trends that will influence the economic prosperity of the Regional Cities in coming years and decades:

- Structural changes and transitions e.g. decline in manufacturing, increased automation, energy sector transition;
- New technologies; and
- Increasingly globalised markets

As shown above, if left unaddressed, the current trajectory of Victoria's Regional Cities will see only modest growth. It would also result in significantly underutilised potential. Given the current and potential contribution that Regional Cities do and could make to Victoria's economy as a whole, the loss associated with the failure to undertake appropriate strategic interventions will be felt far into the coming decades.

# 5. REGIONAL CITY AMBITION

Previous sections have outlined the economic and demographic profiles of the Regional Cities and how their dynamics compare to what is happening in regional Victoria and across Victoria more broadly. The outcomes that are likely to occur if current trends and trajectories occur in Regional Cities have also been outlined. These represent risks and missed opportunities for Regional Cities and Victoria. There is, however, an alternative set of outcomes for Regional Cities.

This has been recognised by Regional City councils, who have undertaken a range of analyses to identify their challenges, and to inform their future visions. This Regional City Ambition represents the collective aspiration of the Regional Cities for an improved, more prosperous future.

This section provides an overview of the challenges Regional Cities faces, and the visions Regional Cities have for their future. It has been informed by the considerable work and analysis that has been undertaken by Regional Cities as well as the expertise which exists in Regional City councils, which has been mined for insights.  The section uses a conceptual model of an export-driven local economy to organise the challenges – it is organised under various 'elements' for a prosperous community.

More information on the model can be found in the text box below.

## 5.1    Challenges faced by the Regional Cities

Regional City councils have undertaken significant work to identify the scale and nature of their challenges. While the size, character and subsequently, the barriers to prosperity, of the Regional Cities varies, synthesis of this work has revealed that there are a number of key, underlying themes which are consistent across Regional Cities.

These issues are summarised below, providing an insight into how Victoria's Regional Cities could achieve greater security, prosperity and liveability in the future, and provide a greater contribution to the state as a whole.

### Key themes

#### Human capital

The Regional Cities are facing an increased shortage in the knowledge and skills required to contribute to a City's function and production. These knowledge and skills can collectively be called 'human capital' and are an important concept in economics and social policy. The level of human capital in a city or region is key to understanding and effecting growth in GDP.

Various factors are influencing this shortage, some of which have been discussed in earlier sections. These include:

- Ageing populations and decline of working age populations;
- Outward migration of young people to bigger cities;
- Skills mismatch as a result of transitions in the industrial sector; and
- Low educational aspirations or attainment in young people.

Skills shortages and the need for upskilling are a consistent concern among the Regional Cities, though the particular industries that need attention vary. Geelong, for example, has a greater need for professionals and workers in the growing health and transport industries. Warrnambool, on the

other hand, reported low labour pool availability for jobs in the local meat and dairy industries, as well as in the health sector.

Human capital can be expanded by investment (formal education and experience gained by workers) which increases worker knowledge and skills, and hence productivity. In Regional Cities, where workforce numbers are also limited, greater arts, culture and liveability offerings can work towards attracting and retaining more residents who can contribute to the local economy.

## Connectivity

The issue of connectivity is a consistent issue across Regional Cities. Connections to key markets are particularly important for export driven economies.

Extensive analysis by SGS has previously shown that physical connectivity is critical for the proliferation of jobs, particularly in knowledge-intensive industries. Access to skilled labour, complementary services and a larger customer base are all improved with greater physical connectivity. It also provides greater opportunity for formal and informal knowledge transfers, encouraging businesses to delve into new trends, technologies and business practices, promoting innovation, efficiency and increased productivity.

Effective job density (EJD) is a way of representing the relative accessibility of jobs in an area. It reflects both the location of jobs, and how connected these jobs are via public and private transport. Areas of high effective job density have high levels of access to employment. When this is mapped across Victoria, the proximity of Melbourne can be seen to have a clear impacts; the cities of Ballarat, Bendigo, Shepparton and Latrobe have similarly medium EJD levels. Parts of Geelong are similar to Melbourne, while Horsham, Wangaratta and Wodonga have relatively low levels. Mildura has very low levels, although if the urban area is focussed on, it has similar levels of EJD to Horsham, Wangaratta and Wodonga.

FIGURE 16: EFFECTIVE JOB DENSITY (EJD) ACROSS VICTORIA
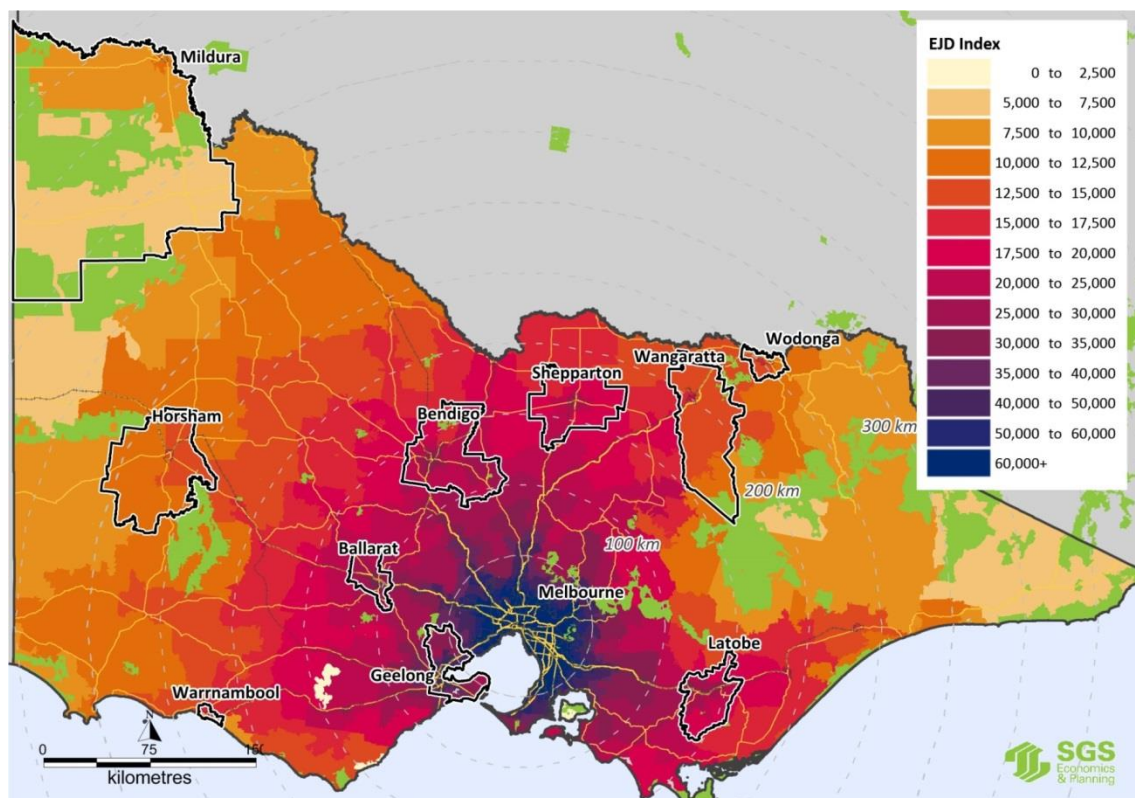


Source: SGS Economics and Planning

## A CONCEPTUAL MODEL OF A LOCAL/REGIONAL ECONOMY

The model shown below illustrates that injections of income to the local economy from exports are a key engine of local prosperity. 'Exports' in this context means any product or service which is traded to customers outside of the regional city, in Australia and internationally. This includes dollars spent by visitors to the area.

Money injected into a local economy from export sales generates a multiplier effect as local suppliers to the exporters enjoy improved sales themselves, and as all firms in the supply chain employ more people thereby increasing household expenditure in local shops and service providers. This multiplier effect is diluted whenever local firms and households direct their spending to suppliers outside of the host regional city.

The objective of local economic development strategies is to maximise inter-regional export income and the associated employment multipliers, and minimise income leakages. Achievement of these objectives depends on a range of elements and enabling factors, namely: skills, institutions/leadership, infrastructure, access to capital and innovation.



**Pre-conditions for a Prosperous Community**

Infrastructure | Skills | Lifestyle, Culture & Social Cohesion | Innovation | Connectivity | Good Governance

**Local Economy EMPLOYMENT MULTIPLIERS**

Inter-regional & International Exports (income injection)

Imported Capital / Investment (wealth injection)

Business Inputs | Consumer Imports | Dividends | Savings

**(leakages of income)**
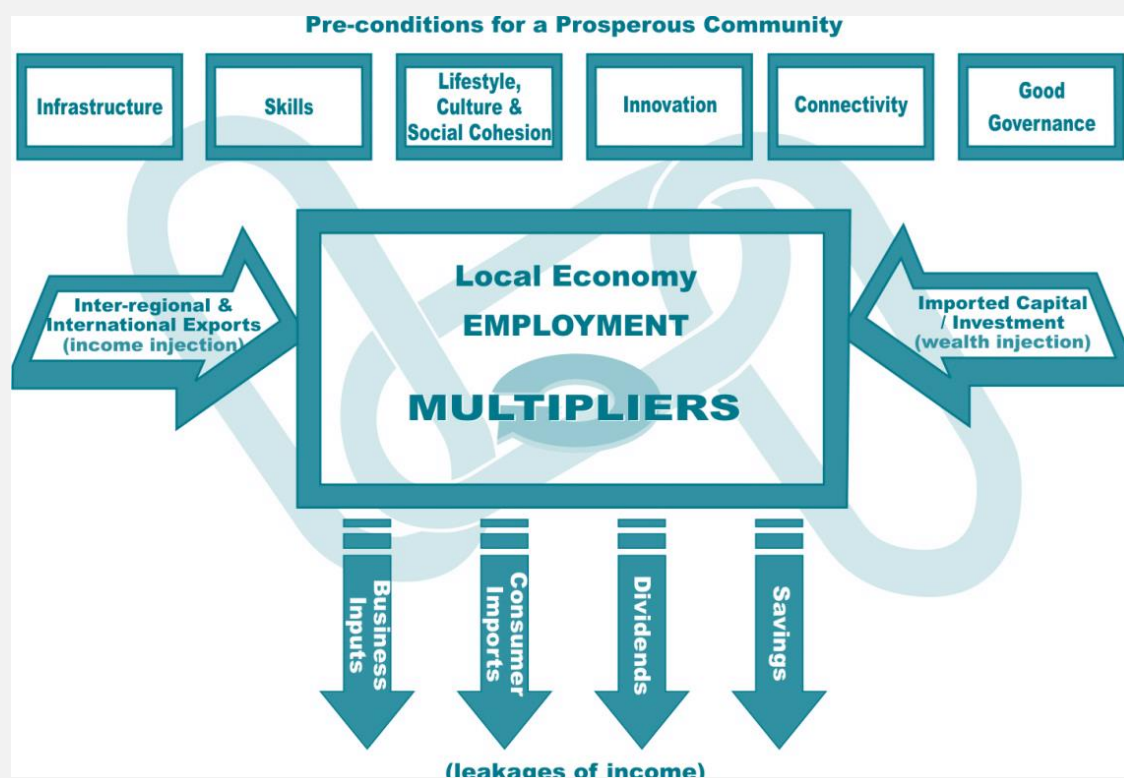
For regional cities to thrive, they must have access to adequate and appropriate transport infrastructure.

In terms of passenger rail networks, this involves either improving connections where they do not exist, upgrading existing infrastructure, or increasing service frequency. Some Regional Cities have identified the need for road infrastructure upgrades.

With many Regional Cities heavily dependent on exports and freight and logistics sectors, limited physical connectivity weakens the competitiveness of these industries. Improved freight transport options, on road, rail, sea and airports, was raised by many councils.

SGS Economics & Planning

Given the physical access and connectivity issues discussed above, the establishment of adequate and comprehensive internet and telecommunications infrastructure is also paramount for businesses to thrive.

While the NBN has been installed in many Regional Cities, a comprehensive approach has not been taken, with some areas either waiting for installation or with installation not planned at all. Similarly, mobile phone coverage is weak across many regional areas. Both of these factors leave regional businesses unable to perform competitively against those in areas that are better equipped, such as metropolitan Melbourne.

### Other challenges

As discussed in earlier sections, there is significant variation in the economies, functions and needs of the different Regional Cities. Other challenges identified by various Regional Cities included the following.

- Need for lower reliance on export-focused industries – so as not to be so strongly affected by exchange rate changes;

- Need for water security (and balancing agricultural needs with environmental needs). This will be increasingly important in future climate change scenarios;

- Addressing demand for social and community services and infrastructure, as well as infrastructure to support the tourism industry;

- The need for improvements to liveability, including city centre amenity and other lifestyle and cultural attractors;

- Acknowledging the role of innovation in supporting future economic activity, to leverage and support the existing knowledge, assets and economic profile of Regional Cities; and

- Supporting improved governance including integrated strategic planning, and partnership development.

These challenges provide context for the future of the Regional Cities. They outline the various barriers, but also opportunities for Regional Cities to improve their economic prospects.

## 5.2    An alternative path for our Regional Cities

The Regional City councils have strong aspirations for their cities. They seek to not only overcome the challenges described above, but to act as leaders in Victoria's regions to grow sustainable, prosperous, healthy and socially-connected communities. This section summarises the key visions of the Regional Cities.

### A prosperous and sustainable economy

The Regional Cities seek to build diverse and sustainable economies that provide local job and education opportunities and attract new, skilled residents. Regional City economies will be resilient in the face of structural economic transitions and have the capacity to build on individual strengths to grow and prosper. All Regional Cities will have the resources and skills they require to maintain and grow their individual regional economies.

SGS
Economics
& Planning

> "Wodonga businesses feel engaged, supported and encouraged to grow, while new businesses and industries are attracted to Wodonga because of its location, stable workforce and high-quality infrastructure."
>
> *Wodonga Economic Development Strategy 2014-2019*

## A well-connected transport network

Connectivity and accessibility for Regional City residents will be of the highest quality. Residents and workers will be able to rely on a highly efficient and reliable public transport network to get them where they need to go, whether for their personal, employment, social or leisure pursuits. Regional City residents and workers will be well-connected to other regional and metropolitan areas, and freight will be able to be transported reliably along safe and efficient routes.

> "The region's transport infrastructure will provide vital backbone support necessary for growth and productivity. Our improved road and rail network efficiency will have facilitated increased movement of passengers and freight in quicker and safer ways."
>
> *Bendigo Economic Development Strategy 2014-2020*

## An attractive place to live, work and play

The Regional Cities seek to create liveable, inclusive and socially-connected communities. They will support, facilitate and accommodate population growth as it occurs, further attracting new residents through their high quality job and unique lifestyle opportunities. With their offer of natural amenity and housing affordability, the Regional Cities will attract those in search of alternative lifestyle benefits.

> "Shepparton is a premium regional destination to live, work, visit and invest."
>
> *Greater Shepparton Economic Development, Tourism and Events Strategy 2016-2020*

## A regional 'capital' and well-recognised visitor destination

The Regional Cities will continue to play a significant regional role within their hinterlands, acting as a hub for higher order retail, service, business, institutional, entertainment, recreation and cultural needs. The Regional Cities will be seen as the 'capitals' of Victoria's regions.

The Regional Cities will have distinct and renowned reputations across Australia and the world as unique visitor destinations. The Regional Cities will have quality and diverse visitor offerings, across all four seasons, including world-class events, festivals, museums, galleries, restaurants, architecture and other attractions. The unique culture and heritage of each of Victoria's Regional Cities will celebrated, conserved and appreciated.

> "Mildura region will be renowned for, and distinguished by, its range of quality tourism offerings and successful events built around an iconic combination of tourism products that embrace big river, food and wine, nature-based, arts and cultural, historic and sporting experiences."
>
> *Mildura Tourism 3 Year Strategic Plan 2015-2017*

SGS
Economics
& Planning

## 5.3    Summary and implications

Regional Cities face a number of challenges, due to changing economic conditions, their natural assets, location, and human capital profile. These challenges effectively represent barriers to achieving their full economic potential, and if they can be overcome, the productive resources of the Regional Cities will be able to contribute more to state GDP.

Regional Cities share this ambition of a different future for themselves; one in which they are vibrant communities which make a significant economic contribution to Victoria. Such an outcome would leverage their existing assets and opportunities in sustainable ways, unlocking latent potential and facilitating growth. The Regional Cities would make more productive use of the assets they currently have, and generate increased income for their community.

If the Regional Cities were to realise this vision, it would provide significant uplift in productivity to Victoria. That is, it would mean workers and the economy overall, would be more productive.

The next section outlines the economic outcome if this could be achieved and identifies a number of potential strategic interventions that could support this.

# 6. FUTURE ECONOMIC TRAJECTORIES

If growth in Victoria's Regional Cities is to continue to keep pace with, or exceed, those of other locations, it is vital that the Cities improve their potential for innovation and productivity.

## 6.1    Introduction

The preceding sections have outlined the dynamics of change present in Regional Cities, the challenges this presents in terms of future growth opportunities, and the vision Regional Cities have for their future, whereby challenges are overcome and Regional Cities prosper.

This section compares the current trajectory presented in Section 4 with the envisioned 'Future Case' or Project Case, which would see an increased capacity for Regional Cities to seize their latent potential. If the Regional Cities were able to improve their productivity, this would have significant benefits to both regional Victoria and the state as a whole.

Productivity is the efficiency with which firms, organisations, industry, and the economy as a whole, convert inputs (labour, capital, and raw materials) into gross value added (wages and profits).

Productivity grows when output grows faster than inputs, which makes the existing inputs more productively efficient. An economy's ability to improve its standard of living over time depends almost entirely on its ability to raise its output per worker. Without an increase in output per worker, income will not increase, investment will be more difficult to attract, and the economy will shrink due to an ageing population reducing the number of workers.

## 6.2    Enabling the ambition

The Regional Cities have gauged and grappled with this need for an alternate trajectory, each identifying a range of aspirations for higher productivity growth and ongoing prosperity. As summarised in section 5.3, the four key, shared visions of the Regional Cities are:

- A prosperous and sustainable economy;
- A well-connected transport network;
- An attractive place to live, work and play; and
- A regional 'capital' and well-recognised visitor destination.

There are a number of policy 'packages' which can help to enable these visions in the Regional Cities. Comprised of a range of investments, policies and programs, these approaches have been drawn from a range of sources, including work done by Regional Cities Victoria. This section proposes four packages that address and span across the Cities' visions.

In simple terms, this section identifies potential solutions to the question:

> *What can be done to make it easier for a business in a Regional City to better market its existing products, develop new or significantly improved goods or services, and improve their business practices and workplace organisation?*

## Commercial Transport Package

Visions for a well-connected transport network, and a prosperous and sustainable economy, require reliable infrastructure networks to enhance business confidence and efficiently move goods around from producers to markets. The Commercial Transport Package recognises the importance of the transport and logistics sector to the Regional Cities and addresses a need for improved road conditions across regional Victoria.

The Commercial Transport Package comprises:

- Upgrade road transport (via new links and improved maintenance) to improve the movement of commodities and people. The road links currently deemed by VicRoads to be unsuitable for heavy vehicle access would be the top priority.
- Investments to freight and logistic hubs across the Regional Cities (eg. Wimmera Intermodal Freight Terminal, Ballarat Freight Hub, GV Link etc.)

## Knowledge Sector Package (Program + Supporting Infrastructure)

Achieving a prosperous and sustainable economy also requires a healthy pool of relevant skills and expertise. This includes 'hands on' vocational skills as well as human thinking, creativity and problem solving skills required in higher order, knowledge sectors. It will be important for Regional Cities to offer a range of skill development opportunities, and in particular within those sectors at risk of automation or with rapid technological advancements.

The Knowledge Sector Package comprises:

- Advocating for fast-tracking NBN rollout and where NBN rollout has occurred, undertaking capacity building initiatives to make optimum use of this infrastructure.
- Programs to improve senior secondary education retention and lift the aspirations of young people in regional cities to fill the knowledge jobs of the 21st Century.
- Initiatives to upskill current workers and encouraging higher education pathways to maintain economic competitiveness of regional cities.

## Health and Aged Care Package

The Health and Aged Care Package aims to meet the infrastructure and service needs of an ageing population and ensure Regional City economies are well-positioned to respond to the growing aged care and social assistance sector.

- Development of suitable infrastructure to support growth in health care and social assistance sectors, driven by ageing populations.
- Boost health care specialty coverage via recruitment programs aimed at highly skilled professionals within the management and delivery and service delivery sectors of this industry. Specialties would include oncology, urology, pathology and gerontology.

## Regional Lifestyle and Visitor Economy Package

The regional Lifestyle and Visitor Economy Package spans all four shared visions, with recognition that a well-connected, attractive location will have manifold impacts on productivity and the visitor economy. This Package aims to ensure that Regional Cities offer key lifestyle and tourism benefits, attracting residents, workers, visitors and investment.

- Continue to strengthen links to Greater Melbourne and other regional centres via faster and more reliable train services. This would build on the Regional Rail Revival program.
- Enhance current natural-heritage-cultural tourist attractions and help strengthen the food offering to build the tourism industry.

The Regional Rail Revival program is a $1.7 billion joint initiative of the Australian and Victorian governments to upgrade stations, signalling and track across Victoria. Major upgrades are being undertaken along every regional passenger line in Victoria.

Key packages include:

- Ballarat Line Upgrade ($557 million across two stages)
- Bendigo Line Upgrade ($91 million)
- Geelong Line Upgrade ($110 million)
- Gippsland Line Upgrade ($530 million across two stages)
- North-East Corridor Line Upgrade ($140 million)
- Shepparton Freight Network Planning ($10 million)
- Warrnambool Line Upgrade ($114 million)

The program comprises track duplication, station and stabling facility upgrades, speed upgrades, platform additions, level crossing improvements and other works.

## 6.3    Future economy growth

The section above identifies potential strategic interventions to change the trajectory of Victoria's Regional Cities to a more prosperous future. This section explores the benefits to Victoria of doing so, by modelling the marginal impacts of an alternative 'Regional City Ambition Scenario'.

### Base Case

In the Base Case, gross value added (GVA) grows at the same rate as projected employment plus a productivity factor. The productivity factor adds 1.5 per cent a year to GVA per worker which is around the Australian and Regional Victoria long-term average.[5]

### Regional City Ambition Scenario

If Regional Cities were able to achieve their ambition, this would be evident in the form of a more productive economy, generating more GVA per worker.

We would see local businesses being able to better market their existing products, develop new or significantly improved goods or services and improve their business practices and workplace organisation.

This can be enabled through productivity enhancing investments, policies and programs (as outlined above in Section 6.2) which improves the capacity of businesses and the economy to create value.

The impact on productivity has been modelled for the next decade as confidence on the impacts beyond 2028 is much lower. In the Ambition Scenario we have assumed that an additional uplift in productivity can be achieved following implementation of the program. It is assumed that the program is implemented over 2018 to 2022 with productivity impacts starting to come online from 2021.

Under the Project Case, productivity improves from 2021 to 2025, at which point it reaches 1.57 per cent before returning to the long-term average of 1.5 per cent. This is illustrated in the table below.

---

[5] https://treasury.gov.au/publication/2015-intergenerational-report/
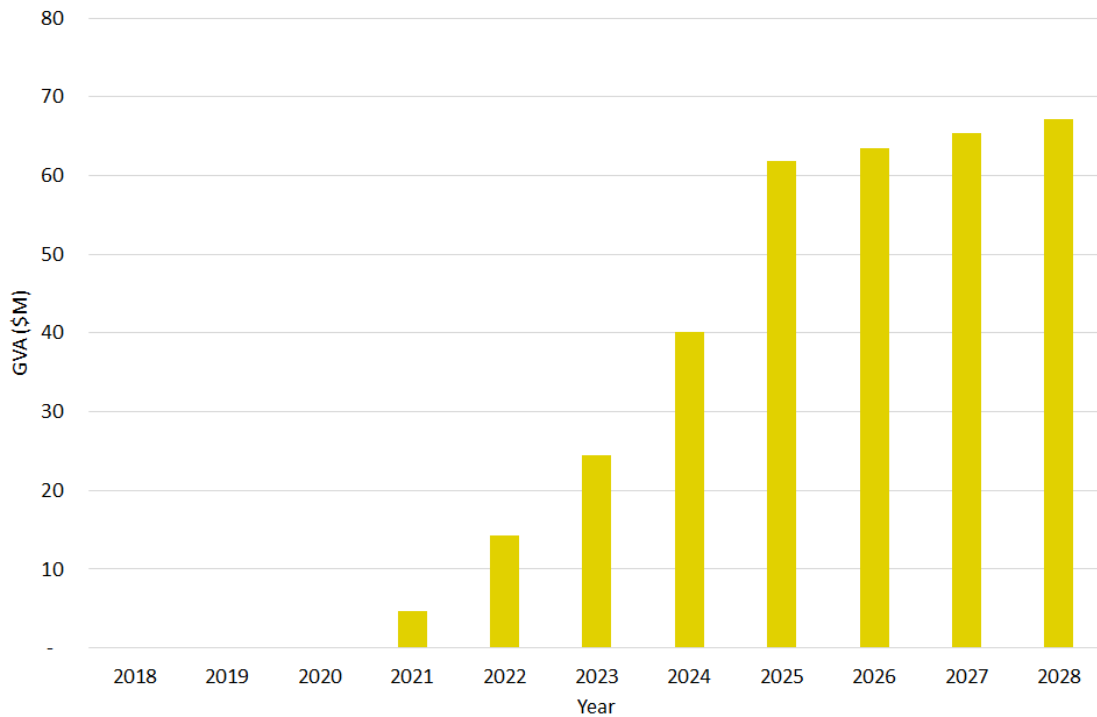
TABLE 7: ANNUAL IMPACT OF PRODUCTIVITY ON GVA: 2018 TO 2028

| | 2018 | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | 2025 | 2026 | 2027 | 2028 |
|---|---|---|---|---|---|---|---|---|---|---|---|
| Base case | 1.50% | 1.50% | 1.50% | 1.50% | 1.50% | 1.50% | 1.50% | 1.50% | 1.50% | 1.50% | 1.50% |
| Project case | 1.50% | 1.50% | 1.50% | 1.52% | 1.53% | 1.53% | 1.55% | 1.57% | 1.50% | 1.50% | 1.50% |

Source: SGS 2018

This productivity uplift in the Project Case flows through to higher GVA in the Regional Cities, in comparison to the Base Case. This is illustrated below in Figure 17. The additional GVA grows strongly over 2021 to 2025 as the projects reach their full impact. Growth in GVA then plateaus following 2025, though the differential in GVA between the Project and Base Case is maintained as the economy is now larger than it would have been otherwise.

In aggregate terms, the net present value (NPV) of the additional GVA (discounted at 7 per cent) from the productivity uplift over 2018 to 2028 is worth $234 million.

FIGURE 17: UPLIFT IN REGIONAL CITIES GVA ($M): PROJECT CASE



Source: SGS 2018

Another way of illustrating this uplift in GVA from productivity enhancements is the approximate equivalent in employment. This is shown in Table 8.

For example, across the Regional Cities the cumulative additional GVA from 2018 to 2028 in the Project Case is approximately equivalent to 3,600 additional jobs.

TABLE 8: PROJECT CASE: ADDITIONAL JOBS[6]

| | 2018 | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | 2025 | 2026 | 2027 | 2028 |
|---|---|---|---|---|---|---|---|---|---|---|---|
| Geelong | - | - | - | 16 | 47 | 79 | 129 | 196 | 199 | 201 | 204 |
| Ballarat | - | - | - | 9 | 26 | 44 | 71 | 109 | 110 | 112 | 114 |
| Bendigo | - | - | - | 8 | 24 | 41 | 67 | 102 | 103 | 105 | 107 |
| Shepparton | - | - | - | 4 | 12 | 21 | 34 | 51 | 52 | 53 | 53 |
| Latrobe | - | - | - | 3 | 10 | 17 | 27 | 40 | 40 | 41 | 41 |
| Mildura | - | - | - | 3 | 10 | 17 | 27 | 41 | 41 | 41 | 42 |
| Wodonga | - | - | - | 3 | 10 | 17 | 27 | 41 | 42 | 42 | 43 |
| Warrnambool | - | - | - | 3 | 8 | 13 | 21 | 32 | 33 | 33 | 33 |
| Wangaratta | - | - | - | 2 | 5 | 9 | 14 | 22 | 22 | 22 | 22 |
| Horsham | - | - | - | 1 | 4 | 7 | 12 | 18 | 18 | 18 | 18 |
| *Regional Cities (all)* | - | - | - | 52 | 157 | 265 | 429 | 651 | 660 | 669 | 678 |

Source: SGS 2018

The likely economic benefits in terms of additional economic growth and jobs of each element are shown in Table 9. A high-level indication of the funding allocation for each element is also provided. No funding allocation is required for the Improved Project Coordination and Integration.

TABLE 9: ADDITIONAL ECONOMIC GROWTH & JOBS

| Element | Additional Economic Growth (GDP $ Million) | Additional Jobs | Funding Allocation ($ Million) |
|---|---|---|---|
| Commercial Transport Package | $102 | 540 | $95 |
| Knowledge Sector Package (Program + Supporting Infrastructure) | $119 | 1,440 | $110 |
| Health and Aged Care Package | $68 | 900 | $65 |
| Regional Lifestyle and Visitor Economy Package | $34 | 540 | $30 |
| Improved Project Coordination and Integration | $17 | 180 | $0 |
| Total | $340 | 3,600 | $300 |

Source: SGS 2018

Assuming that the State Government collects revenue equivalent to 6.9 per cent of total GVA (which is the approximate GVA to tax revenue proportion in 2016[7]) the additional tax revenue to Government from productivity enhancements can be estimated.

Additional revenue is small in the early years, totalling $320,000 in 2021 from the regional cities combined, but ramps up significantly in later years to $4.64 million by 2028.

---

[6] Employment Equivalent to GVA uplift
[7] http://www.dtf.vic.gov.au/Publications/Victoria-Economy-publications/State-taxation-revenue

TABLE 10: PROJECT CASE: ADDITIONAL STATE GOVERNMENT TAX REVENUE ($M)

| | 2018 | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 | 2025 | 2026 | 2027 | 2028 |
|---|---|---|---|---|---|---|---|---|---|---|---|
| Geelong | - | - | - | 0.10 | 0.29 | 0.50 | 0.83 | 1.28 | 1.32 | 1.36 | 1.39 |
| Ballarat | - | - | - | 0.05 | 0.16 | 0.28 | 0.46 | 0.71 | 0.74 | 0.76 | 0.78 |
| Bendigo | - | - | - | 0.05 | 0.15 | 0.26 | 0.43 | 0.66 | 0.68 | 0.70 | 0.72 |
| Shepparton | - | - | - | 0.02 | 0.07 | 0.13 | 0.21 | 0.32 | 0.33 | 0.34 | 0.35 |
| Latrobe | - | - | - | 0.02 | 0.07 | 0.12 | 0.19 | 0.29 | 0.29 | 0.30 | 0.31 |
| Mildura | - | - | - | 0.02 | 0.06 | 0.10 | 0.17 | 0.26 | 0.26 | 0.27 | 0.28 |
| Wodonga | - | - | - | 0.02 | 0.06 | 0.11 | 0.18 | 0.28 | 0.28 | 0.29 | 0.30 |
| Warrnambool | - | - | - | 0.02 | 0.05 | 0.09 | 0.14 | 0.22 | 0.23 | 0.23 | 0.24 |
| Wangaratta | - | - | - | 0.01 | 0.03 | 0.05 | 0.09 | 0.13 | 0.14 | 0.14 | 0.14 |
| Horsham | - | - | - | 0.01 | 0.03 | 0.05 | 0.08 | 0.12 | 0.12 | 0.12 | 0.12 |
| *Regional Cities (all)* | - | - | - | 0.32 | 0.98 | 1.68 | 2.77 | 4.27 | 4.38 | 4.51 | 4.64 |

Source: SGS 2018

## 6.4 Summary and implications

There are a range of interventions which can help to enable the higher productivity desired in the Regional Cities Ambition Scenario. Improvements to infrastructure, workforce and skills, lifestyle, culture & social cohesion, research and development, connectivity, and good governance can unlock significant economic benefits for each individual Regional City and the whole of Victoria.

However, implementing these interventions will require bringing together the different levels of government, the community and local business. This will require a new way of thinking.

To deliver the benefits of the strategy, Regional City Councils would work closely with the State Government to identify, prioritise, plan for, arrange funding and integrated with other related projects. This would help to cut across the current silos of government funding and strategic planning and generate real synergies for the Regional Cities.

This Regional City Ambition is one which is owned by the Regional Cities, but one which the State Government must support, if it is to be achieved.

Developing more robust economies in Victoria's Regional Cities offers benefits not just for the local community, but also for the whole State. This will require more than just a funding injection. Stakeholder partnerships must be forged, and not only must clear objectives and outcomes be developed at the outset, but these must be evaluated and monitored on an ongoing basis.

## EXAMPLE – REGIONAL CITY PRODUCTIVITY STRATEGIES

There are many models which can be used to cut across the current silos of government funding and strategic planning. A Regional City Productivity Strategy is one example of how real synergies for the Regional Cities. This type of strategy could be developed by the Regional City Councils, potentially in partnership with State Government, and would need to be consistent with overarching State Government policies.

The strategy would set out, for each City, a profile of the City's economy, including recent trends and key sectors. It would be structured against the 6 elements identified in the conceptual model identified earlier: infrastructure; skills; lifestyle, culture and social cohesion; innovation; connectivity, and good governance and would identify challenges or barriers to development. An economic vision for the City, would be included, and the strategy would then set out a clear and integrated set of strategies and actions to achieve the vision.

The strategies and actions would include private and public sector investments; engagement with State government agencies to identify the key priorities for the City would be crucial. This would also provide an incentive for State Government agencies to take a 'place based' approach to investment, coordinating investments and priorities with local government planned projects to deliver the vision.

The strategies would embody the economic development priorities and opportunities previously identified by Council in various strategic planning forums and processes.

The Strategies would be action oriented and nominate a set of discrete investment initiatives which might cover infrastructure, skills, innovation and marketing.

Each initiative will include an implementation plan and a schedule of measurable indicators of outputs and outcomes.

The investment package should include a preliminary business case proposing a measurable target for productivity improvement over the medium and long terms.

State Governments would be invited to co-invest in productivity enhancing strategies proposed by Regional City Councils. This could be via a central agency funding program, which would review the Strategies and associated projects. Governments would invest based on agreed implementation milestones and the independently certified achievement of agreed KPIs.

Investment would flow in 'tranches' over a four-year period, triggered by delivery of key outcomes or outputs set out in the Productivity Partnership deed. The independent auditor would provide advice to Government on the release of these tranches.

Successful productivity enhancement in regional cities will boost GVA across the State, leading to improved tax inflows for State and Commonwealth Governments. These inflows can help fund the Regional City Productivity Partnership.

# 7. CONCLUSION

## 7.1    Victoria's unique and diverse Regional Cities

Victoria's Regional Cities play an important role in the state and regional economy. Currently home to over 600,000 people, the Regional Cities account for 10 per cent of the total Victorian population and 8 per cent of the state's total gross value added (GVA).

The role and significance of Victoria's Regional Cities extends far beyond its 10 urban centres. With almost an additional 1 million people living in Victoria's regions, in smaller towns or rural areas, the Regional Cities play a critical role in providing access to jobs, retail and services to those who live in these less connected areas.

Each Regional City is positioned uniquely in the Victorian landscape, varying considerably in size and character. From those within the '2-hour belt' of Melbourne, with diversified economies and strong cultural attractions, to those with long histories of export-based economies and invaluable natural assets, each Regional City has something unique to offer.

## 7.2    A failure to realise the unmet potential of the Regional Cities

Regional Cities have experienced significantly slower economic growth and higher unemployment rates than Greater Melbourne. Along their current trajectory, the proportion of people in Victoria living outside of the metropolitan area is anticipated to decrease over the next 35 years.

Over the same period, the GVA (the sum of all wages and profits generated by an economy) of the Regional Cities is expected to grow by only 2.6 per cent a year on average. This compares to an average growth rate of 3.2 per cent in Greater Melbourne and 3.0 per cent in Victoria as a whole.

While the Regional Cities have considerable strengths and assets, a failure to appropriately capitalise on these will have an impact on Victoria as a whole. Slow growth rates impact on economic potential, taxation revenue and government expenditures. Perhaps more importantly, they impact on the community fabric and the lives of people living in these cities.

## 7.3    An alternative path for Victoria's Regional Cities

If living standards in Victoria's Regional Cities are to continue to improve it is vital that the Cities maintain and improve their potential for innovation and productivity.

The Regional City councils have strong aspirations for their cities. They seek to not only overcome the challenges described above, but to act as leaders in Victoria's regions to grow sustainable, prosperous, healthy and socially-connected communities. They have a unified vision to create for each of their cities: a prosperous and sustainable economy; a well-connected transport network; an attractive place to live, work and play; and a regional 'capital' and well-recognised visitor destination.

Policy and program packages that pursue improvements in infrastructure, workforce and skills, lifestyle, culture and social cohesion, research and development and connectivity will help expand GVA per worker. Under an alternate 'Regional City Ambition' Scenario, it is estimated GVA could increase by $340 million over the next decade and support 3,600 additional jobs (a 12 per cent increase on the current trajectory). Implementing these interventions requires bringing together the different levels and tranches of government, the community and local business. It will require more than just a funding injection.

# APPENDIX 1

## Spatial areas

The following table shows the concordance with Significant Urban Areas (SUAs) and Regional Cities that was used for the data analysis.

| Regional Cities | Significant Urban Areas (2011) |
|---|---:|
| Geelong | Geelong |
| Ballarat | Ballarat |
| Bendigo | Bendigo |
| Shepparton | Shepparton - Mooroopna |
| Latrobe | Traralgon - Morwell |
| Mildura | Mildura - Wentworth |
| Wodonga | Albury - Wodonga |
| Warrnambool | Warrnambool |
| Wangaratta | Wangaratta |
| Horsham | Horsham |

# Small Area Model (SAM)

SGS has used its in-house Small Area Model (SAM) as the basis for projections of employment and population. This model produces a wide range of economic and population forecasts at a small area level to 2051.

SAM creates a suite of forecast variables which are:

- Estimated using a combination of 'top-down' and 'bottom-up' methodologies, ensuring that macroeconomic drivers are integrated with micro spatial data and trends
- Disaggregated to a fine-grain spatial scale, allowing for custom geographies to be defined based on the scope of analysis, such as an activity centre or renewal precinct
- Developed using a dynamic and systematic algorithm which enables robust scenario testing and impact analysis
- Presented via a web-accessible and interactive platform which allows for analysis and visualisation.
- A vital aspect of SAM is that it can produce these forecasts using a transparent set of inputs, assumptions, and techniques. These parameters can therefore be altered to create sets of clearly defined scenarios, which are a key focus of policy evaluation.

SAM includes detailed information across three key variable types. These are:

- Dwellings and population, which includes a range of household and demographic attributes
- Employment, which includes labour force status, industry and occupation attributes by place of usual residence and place of work
- Students, which includes primary/secondary/tertiary student attributes by education provider type, place of usual residence and place of institution.

The following diagram highlights the four key stages to the SAM. Each stage draws on a number of external datasets and is combined with SGS's expert macro and micro economic analysis to create the final SAM dataset. An overview of the modelling process is illustrated below.

FIGURE 18: SAM OVERVIEW
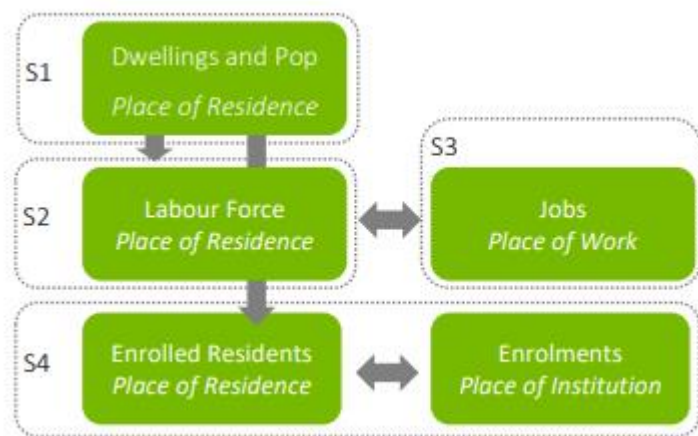


Source: SGS Economics and Planning

The SAM was initially developed for the Victorian Government to inform long term strategic transport planning. Accordingly, it aligns with a number of Victorian Government datasets. Victoria in Future 2016 is a key demographic input to SAM.

At a high level, VIF16 dwelling projections by SA2 are disaggregated to travel zones using a number of small area input sources on current and future development trends. Dwellings are then translated into population which is also aligned with VIF16 population projections by SA2. From this population is further segmented by age,

education and workforce status.  Resident education status (i.e. enrolled residents) are then used to forecasts enrolments at institutions.

On the employment side, official DEDJTR state wide employment by industry forecasts are also disaggregated to travel zones.  Employment by industry is systematically disaggregated to regions and then travel zones using a number of macro and small area input sources on current and future employment distribution and trends.