



Redlands Coast
**Rural Enterprises
Industry Sector Plan**
2019 - 2024



Contents

Introduction	5
Objective of the Plan	7
Rural Enterprises Economic Profile	9
Industry Trends	14
Global Trends	15
Industry Issues and Gaps	17
Opportunities	19
Attract high-intensity, low-impact rural industries	20
Maintain strategic/significant local rural enterprise activities	25
Support development of agri-tourism products and services	26
Connect rural enterprises with education and training	28
Implementation Plan Summary	30
Implementation Plan 2019–2024	32
References	35

Introduction



Introduction

The Rural Enterprises Industry Sector Plan 2019-2024 (Plan) will contribute to the delivery of the key economic objectives of the Redland City Economic Development Framework 2014-2041 (the Framework).

The Plan has been developed as part of the Framework, which identifies Rural Enterprises as one of eight key industry sectors within Redlands Coast (see Figure 1).

The Plan has been developed in consultation with key stakeholders to understand the potential of the local industry and identify where rural enterprises can complement other industry sector plans (such as tourism and education and training).

The Plan outlines specific objectives and implementation actions for Redland City Council (Council) to pursue to best support the rural enterprises industry sector and strengthen its linkages with other key industries in the city. The purpose of the Plan is to identify Council's role in supporting the growth of the sector in line with the Framework's four growth objectives; population growth, economic growth, jobs growth and tourism growth, which are outlined in Figure 2.

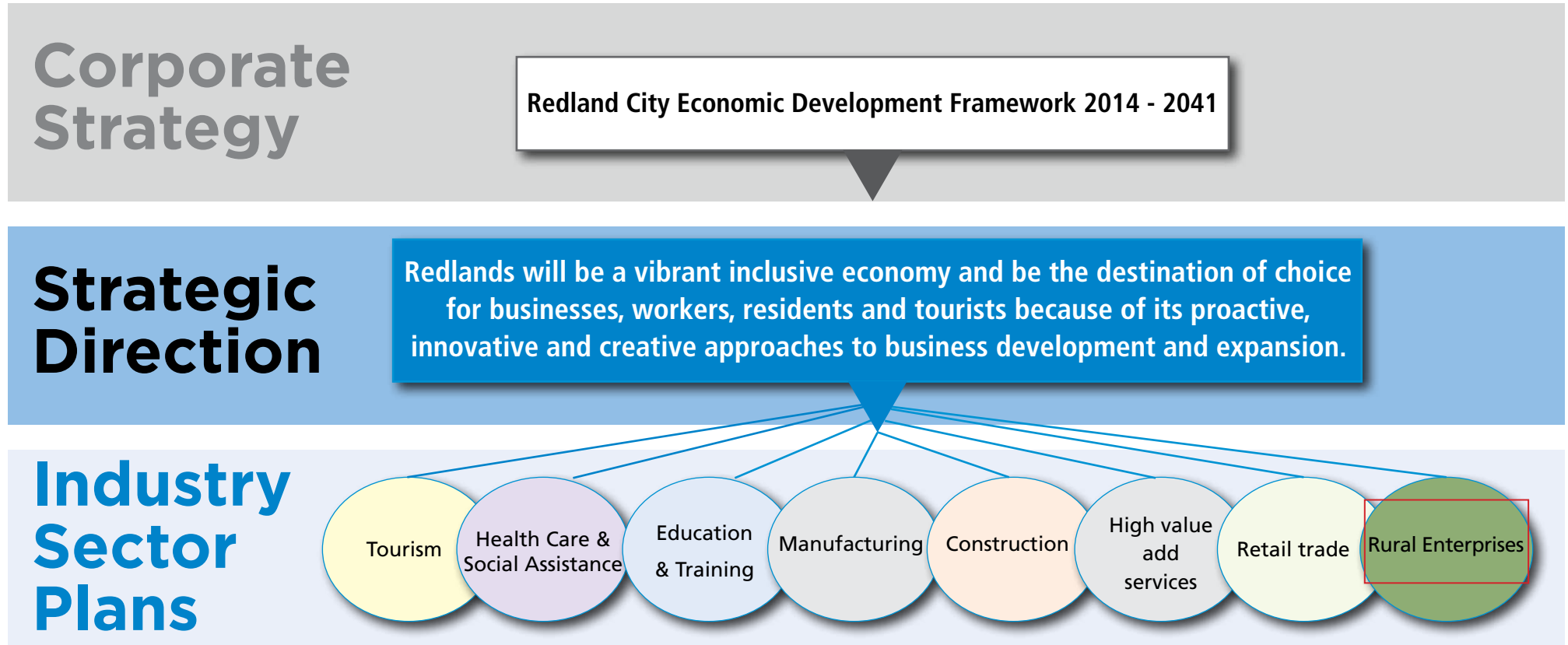
In order for Council to accomplish this, the Plan seeks to identify both existing strategic rural enterprise activities that can support and strengthen the local industry sector as well as new opportunities in which to expand the sector in response to identified challenges.

Rural enterprises is considered a traditional industry within the city, with a particularly strong presence in poultry farming. However, in recent years the industry has faced continued pressure from a number of emerging

challenges such as competing land use and higher productivity farming in competing regions.

Consultation with key local stakeholders as well as benchmarking against other local government areas has provided new hope for the future by highlighting key opportunities for growth and development of Redlands Coast's rural enterprises industry sector into the future.

Figure 1 Industry sector plan alignment



Objective of the Plan

The Framework identifies eight key industry sectors to help reach the city's four key growth targets by 2041.

The key growth measures providing the broad economic objectives for the Redlands to 2041 are:

• **Population Target** - 206,000 by 2041 at an annualised average growth rate of 1.2 per cent

• **Number of jobs** - 30,000 jobs to be created in the City by 2041

• **Gross Regional Product (GRP) Growth** - an economy worth \$6.8 billion by 2041

• **Tourism Growth** - to represent 2% of the Redland City economy

These growth objectives have guided the development and prioritisation of initiatives for Council to consider in the development of the Plan. This will help to ensure that activities undertaken to support rural enterprises through the implementation of the Plan contribute to positioning Redlands Coast to be successful in reaching its key economic growth objectives.

The Plan highlights actions under three identified objectives that will entail working collaboratively with the rural enterprises industry sector:

- investigate opportunities to support local rural enterprises
- attract investment in rural enterprises industry sector
- increase research and development opportunities and foster innovation in rural enterprises.

Figure 2: Framework growth objectives to achieve by 2041

ECONOMIC DEVELOPMENT FRAMEWORK 2014-2041



RURAL ENTERPRISE INDUSTRY SECTOR PLAN 2019-2024



Rural Enterprises Economic Profile

Rural enterprises is the eighth largest employment industry in the city, with local jobs predominantly in the food product manufacturing industry group.

The Redlands Coast economy is growing at a pace consistent with other local government areas in South East Queensland (SEQ). The diverse economy predominantly consists of population serving industries. While rural enterprises does not register as one of the city’s top performing industries, in terms of employment or number of businesses in operation, it is contributing to headline growth targets.

Table 1 outlines industries included in the rural enterprises industry sector under the Plan. The purpose is to capture the full extent of rural activities on Redlands Coast in both primary production (e.g. agriculture farming activities), and in first-stage processing (e.g. food product manufacturing).

This is to help ensure that the future growth of the sector can be measured in a consistent way.

The categories used to define rural enterprises within the city are in line with Council’s understanding of the industry and consistent with past industry studies and represent a broad range of rural enterprises.

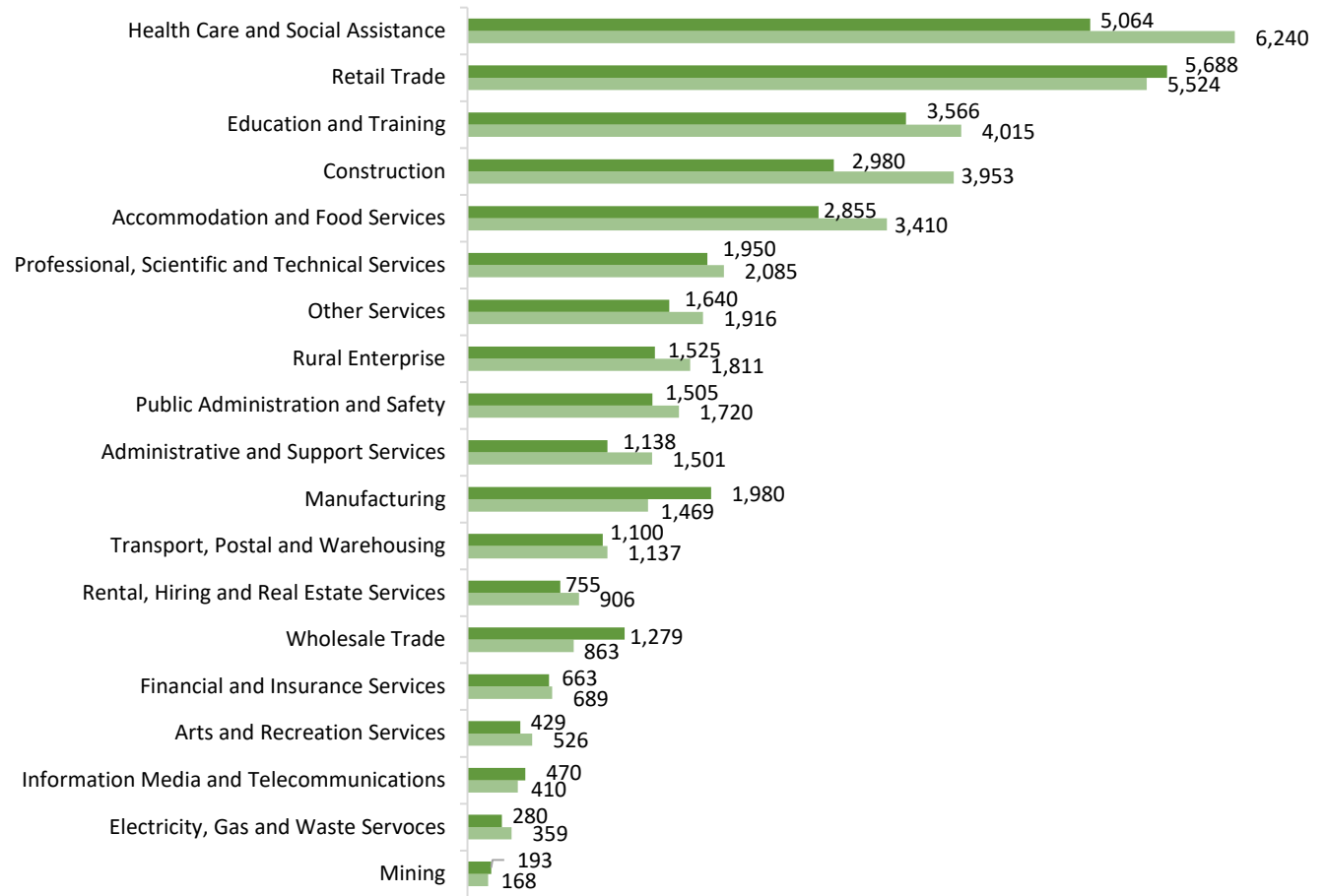
It is important to note that ‘Food Product Manufacturing’ and ‘Beverage and Tobacco Manufacturing’ is included within the overarching ‘Manufacturing’ ANZSIC industry classification as a key industry sector in its own right.

Table 1: Rural enterprises industry sector by ANZSIC classification

Related ANZSIC Industry Definition	Agriculture, Forestry and Fishing	Mining	Food Product Manufacturing	Beverage and Tobacco Product Manufacturing
Selected ANZSIC Group Definitions (used to define Rural Enterprises)	<ul style="list-style-type: none"> • Agriculture • Aquaculture • Forestry and Logging • Fishing, Hunting and Trapping • Agriculture, Forestry and Fishing Support Services 	<ul style="list-style-type: none"> • Other Non- Metallic Mineral Mining and Quarrying 	<ul style="list-style-type: none"> • Meat and Meat Product Manufacturing • Seafood Processing • Dairy Product Manufacturing • Fruit and Vegetable Processing • Grain Mill and Cereal Product Manufacturing • Bakery Product Manufacturing • Sugar and Confectionery Manufacturing • Other Food Product Manufacturing 	<ul style="list-style-type: none"> • Beverage Manufacturing • Cigarettes and Tobacco Product Manufacturing

The eight key industries identified in the Framework are represented in the top eight industries of employment with the exception of 'Manufacturing'. This is due to 'Food Product Manufacturing' and 'Beverage Manufacturing' being included as part of the 'Rural Enterprises' definition, and have therefore been excluded from the manufacturing employment figures (see Figure 3).

Figure 3: Redland City employment by industry, 2011 and 2016



Source: ABS 2011 and 2016

■ 2011 ■ 2016

Rural enterprises is ranked eighth (2016) in terms of employment within the city. It should be noted that a large portion of rural enterprises employment is typically associated with the 'Manufacturing' industry and to a lesser extent with the 'Mining' industry (see Table 2). As such, if 'Food Product Manufacturing' and 'Beverage Manufacturing' were not included within the rural enterprises count the manufacturing industry would be the sixth largest industry in terms of employment in the city, and rural enterprises would fall to 15th overall. This emphasises the importance of the food product and beverage manufacturing industries to rural enterprises in the city.

Table 2: Number of Redland City rural enterprises by employment size, 2011 and 2016

Industry	Non Employing	1-19 Employees	20-199 Employees	Total
Agriculture, Forestry and Fishing	168	50	3	221
Manufacturing	229	256	19	504
Mining	13	6	0	19

Source: ABS 2019

Agriculture business size

Agricultural activity does not offer a large employment opportunity in the city as the majority of 'Agriculture, Forestry and Fishing' businesses on Redlands Coast are non-employing businesses. Only one percent of 'Agriculture, Forestry and Fishing' businesses employ between 20–199 employees, and 23 per cent of businesses employ between 1–19 employees, while the remaining 76 per cent of businesses are non-employing.

Economic contribution

Council commissioned a report – *Key Sector Validation Assessment – Redland City Economic Development Framework 2014-2041* – which estimated that rural enterprises contribute \$80.5 million (1.1%) to the city's economic value. (REMPAN, 2018).

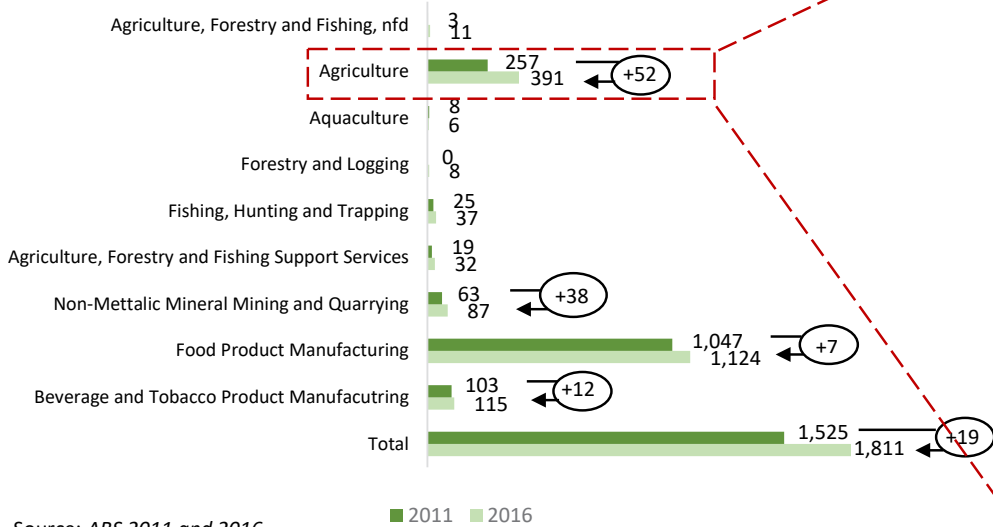
Composition of rural enterprises in the Redland City Local Government Area (LGA)

Rural enterprises employment is dominated by the 'Food Product Manufacturing' sector (see Figure 4), which employs approximately 62 per cent of total workers in this sector. The second largest employer of rural enterprises workers is the 'Agriculture' sector, which employs approximately 22 per cent of total employment in the city's rural enterprises industry sector.

Drivers of growth

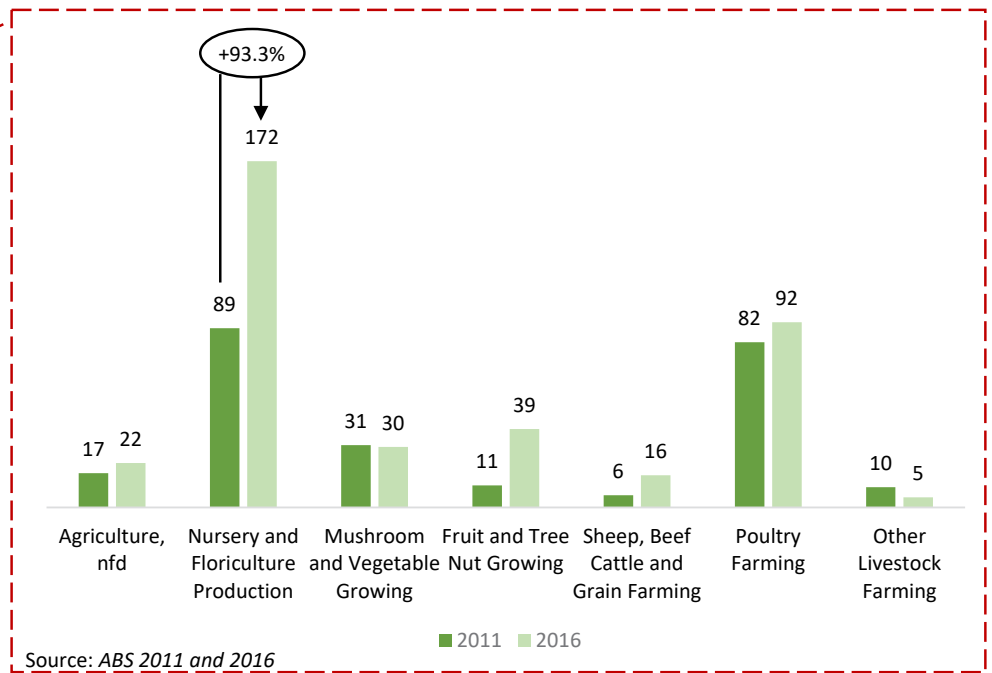
Agriculture experienced the largest growth out of rural enterprises industry sub-sectors between 2011 and 2016. This was mainly driven by growth in 'Nursery and Floriculture Production' (see Figure 5). This growth trend has been experienced throughout Queensland and, as such, is not a trend that has been isolated to the city.

Figure 4: Redland City employment by industry, 2011 and 2016



Source: ABS 2011 and 2016

Figure 5: Redland City agriculture employment by industry sub-group, 2011 and 2016



Source: ABS 2011 and 2016

The rural enterprises workforce of Southern Queensland

Regional LGAs tend to have a greater dependence on rural enterprises for their local workforce. The city’s rural enterprises industry represents approximately 4.5 per cent of the total workforce, which is a comparatively small representation when compared with other Southern Queensland LGAs (see Figure 6).

Rural enterprises in the context of a total workforce capacity

The regions in which the rural enterprises industry sector forms a large portion of employment are less populated areas of Queensland. This is unsurprising as more heavily populated/urban areas simply do not have the available land on which to conduct rural enterprises activities as population growth and urban development occurs (see Table 3).

Figure 6: Portion of local workforce in Rural Enterprises by select LGAs, 2011 and 2016

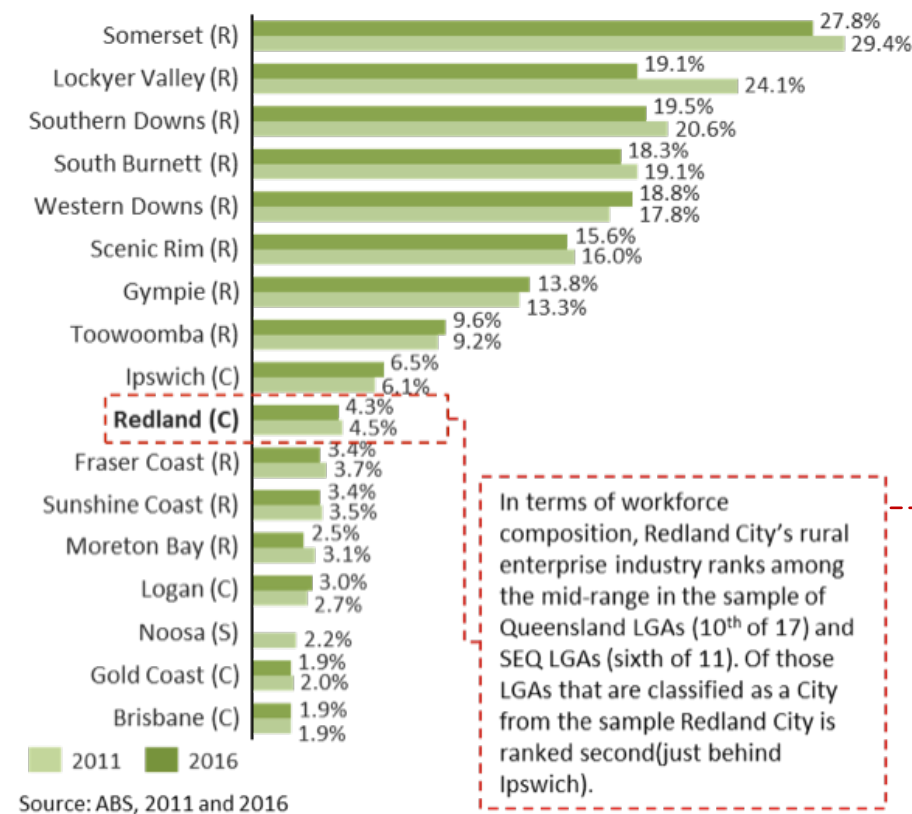


Table 3: Rural enterprises and total workforce by select LGAs, 2011 and 2016

LGA	SEQ	2011		2016	
		Rural Enterprise	Total Workforce	Rural Enterprise	Total Workforce
Somerset (R)		1,489	5,347	1,789	6,084
Lockyer Valley (R)	●	1,789	9,349	2,699	11,191
Southern Downs (R)	●	2,516	12,876	2,744	13,292
South Burnett (R)		1,935	10,570	2,119	11,067
Western Downs (R)		2,642	14,016	2,896	16,283
Scenic Rim (R)	●	1,702	10,881	1,983	12,372
Gympie (R)		1,948	14,149	2,085	15,693
Toowoomba (R)	●	5,796	60,324	6,386	69,324
Ipswich (C)	●	3,312	50,885	3,783	62,303
Redland (C)	●	1,525	35,445	1,811	40,583
Fraser Coast (R)		904	26,912	1,064	29,144
Sunshine Coast (R)	●	3,580	105,742	3,831	110,853
Moreton Bay (R)	●	2,277	89,482	3,482	113,007
Logan (C)	●	2,178	73,611	2,441	89,074
Noosa (S)		N/A	N/A	444	20,170
Gold Coast (C)	●	3,503	184,567	4,828	235,529
Brisbane (C)	●	12,205	631,989	13,558	714,200

Industry Trends

Rural enterprises in the regional economy

The majority of Queensland's agricultural production is located outside of the SEQ region, highlighting the impact urbanisation has had on agricultural production in the south east corner, and demonstrating the mutually exclusive nature of the two types of economic activity.

As the SEQ region becomes increasingly populated, demand for urban development is putting pressure on historically rurally zoned land with new urban growth areas identified. In Redlands Coast, 27 per cent of population growth to 2041 will occur in these new urban growth areas with the balance 73 per cent occurring as urban infill¹.

Poultry production, which has a long history in the city, has also experienced a shift. Evidence indicates that production is moving westward to the fringes of the urban centres of SEQ where opportunity to expand and scale-up is not limited.

Nursery and floriculture production is resisting the contraction trend with nurseries experiencing growth as consumer demand has increased. The consumers' increasing preference toward 'bringing the outdoors inside' has boosted plant sales. Local producers have benefited from this trend and invested more in staff and new technologies².

Rural enterprises in the global economy

Rural enterprises activities are, for the most part, centred on food production. The increasing demand for food on a global scale has pushed rural enterprises to be more efficient in order to keep pace with demand. The United Nations' Food and Agriculture Organisation (FAO) projects that global food demand will increase by 70 per cent by 2050.

As the world's population grows, more land will be needed for urban development. This will result in an increased risk of urban encroachment on traditional agricultural land. In many areas around the world this has resulted in the rural enterprises industry facing the challenge of increasing the supply of food while utilising less productive land.

As a potential solution to this challenge, technology advancement and new farming practices are being developed and adopted to maximise output on a limited amount of land. An example of this is the densely populated country of the Netherlands, which has more than 500 inhabitants per square kilometre (for comparison Redlands Coast has 270 inhabitants per square kilometre and Brisbane City has 880), yet it is the world's second highest exporter of food (as measured by value of goods).

One of the main reasons the Netherlands has managed to accomplish this is by use of greenhouses to grow produce. This technique, coupled with investment in research and the development to increase yield and decrease inputs used, has resulted in strong export performance.

On a global scale, the rural enterprises sector is extremely important as it is integral to food security. There are multiple drivers influencing activities that can have both a positive and negative impact on the growth of the sector.

The following section gives a snapshot of identified trends and their potential impact on Redlands Coast.

1 Shaping SEQ South East Queensland Regional Plan 2017
2 Redland City Bulletin 2 April 2019

Global Trends

Technology

Technology assists producers in a variety of ways. The advancement of technology is making food production more efficient. It also causes changes in labour market dynamics (less labour required). Consumers are also impacted by technology, which is an enabler for a high level of connectivity and influences their buying behaviour.

Impact

Businesses in the city are already implementing new technology in order to remain competitive in the market. Technology is enabling local rural enterprises businesses to increase productivity and cost efficiencies. Utilisation of ag-tech and innovative farming practices, such as vertical farming, can further increase rural enterprises activity in the city.

Increase in global demand for food

There is an increasing demand for food on a global scale, particularly for protein foods, niche primary products and agriculture scientific expertise. This is driven by an increase in wealth and population. The greatest growth in the demand for food is occurring in South East Asia, India and China.

Impact

As agricultural enterprises in the city are not primarily exporters to the global market, food manufacturing businesses in the rural enterprises supply chain are increasingly exporting to the global market. Higher international demand will have some impact on businesses located in the area and global demand will indirectly impact upon local market prices for produce.

Utilisation of land

Across the SEQ region, agricultural land is under some pressure from the encroachment of urban development on traditional agricultural land and resulting in the rural enterprise industry sector having to adapt. An example of this is the emerging urban farming trend that utilises limited land in order to maximise production in an urban environment.

Impact

Rural land is under pressure from the encroachment of urban development. This is limiting the growth of existing rural enterprises as well as limiting opportunities for new rural businesses to establish in the city.

Climate

The frequency and duration of extreme weather events impacts the sector's production abilities. This is a location-based issue as certain regions are more affected by climate change than others.

Impact

Climate is having a global impact on a wide range of industries. The location of Redlands Coast mitigates the impact of adverse weather conditions as the region is less prone to drought and other extreme weather events, leaving rural enterprises businesses less affected than other parts of the state.

Decrease in food price

Since 2011, FAO'S Food Price Index – which measures five community group price indices like meat, dairy, cereal and sugar – has declined by 27 per cent (from a high of 230 in 2011 to 168 in 2018). However, long-term food prices have remained relatively flat and stable.

Impact

A decrease in overall food price will impact upon the revenue received by rural enterprises within the city. Different food commodities have different price trends as well as different geographical locations, which are experiencing different trends in pricing.

Consumers

There is a consumer trend focusing on healthy lifestyle, with consumers spending more on 'healthy eating'. Increasingly consumers are concerned with how their food is produced and where it is sourced from (e.g. free range, organic, local).

Impact

As consumer trends change this will impact demand for locally grown produce, with it seen to be fresher and safer. Fresh food producers will have the opportunity to benefit if they position themselves to do so.



Industry Issues and Gaps

Redlands Coast's rural enterprises industry sector is relatively small compared to other areas of Queensland and is restricted by the common growing pains of urbanisation.

The local rural enterprises industry sector has a rich history and is central to the area's identity. However, industry trends highlight pressure from population increase and competing land use demands. Population growth has placed greater demand for urban development and, in return, has resulted in encroachment over land previously under cultivation. This has limited the city's ability to compete for rural enterprises activity on a scale that rivals the regional areas on the fringes of SEQ. The focus now must shift to the type of rural enterprises activities that best suit the modern Redlands Coast area.

Employment

Although the rural enterprises industry sector in the city has experienced growth in recent years, in terms of employment (2011–2016), the industry represents a small portion of employment in the city's economy (4.5%, 2016). Regions where rural enterprises activity is stronger in terms of production and employment are in less heavily populated areas in the western and northern regions of SEQ, with SEQ LGAs now consisting of a more highly-skilled knowledge workforce.

Key rural enterprises activities

Food product and beverage manufacturing make up approximately 62 per cent of employment in the industry sector, with a large portion of employment being concentrated in a few key businesses in the area. This represents a key strength as some businesses are well-established in the city. However, it also emphasises the importance of building and enhancing relationships between Council and business operators to help ensure sustained economic activity and investment, and that employment remains in the city.

Land use

The proximity of Redlands Coast to major employment and export hubs has contributed to the city being identified as in the South East Queensland Regional Plan 2017 (Regional Plan) as suitable to accommodate further urban growth. This includes a new urban community at Southern Redland Bay and a potential future growth area at Southern Thornlands. Council is required to investigate this area in the short-term, including its potential as a future employment area.

The Regional Plan recognises Redland City has a strong and vibrant rural economy with a mix of agricultural and horticultural uses. Opportunities to produce and add value to raw products to service niche-market, high-demand food and beverage industries are encouraged and the regulatory environment for growth in the sector has been improved in the new City Plan.

SWOT analysis summary

Stakeholders were asked to consider the strengths, weaknesses, opportunities, and threats for the rural enterprises industry within the city. The findings were consolidated into the following summary (see Table 4).

Table 4. SWOT analysis summary

<p>Strengths</p> <ul style="list-style-type: none"> Location/proximity to markets Established businesses Zoning/planning State Government agricultural research facility Skilled workforce Climate/soil type Access to Moreton Bay and islands Redlands Coast branding Rural amenity 	<p>Weaknesses</p> <ul style="list-style-type: none"> High cost of doing business High land values Water supply (urban water) Under-utilised land Employment concentration Transportation costs, infrastructure and facilities (islands)
<p>Opportunities</p> <ul style="list-style-type: none"> Tourism and outdoor recreation Technology Product positioning and branding Research, education and training and commercialisation Intensive small footprint emerging industries Clustering and supply chain enhancement 	<p>Threats</p> <ul style="list-style-type: none"> Reduced availability of productive agricultural land Demographic shifts Competition between councils Amendments to City Plan which inhibits sector growth

Opportunities

Overview

There are some key opportunities for Redlands rural enterprises stakeholders and Council to focus on in order to activate and grow the city's rural enterprises industry sector.

The identified opportunities include:

**Attract high intensity,
low impact rural industries**

**Increase support for
research and development**

**Maintain strategic/
significant local rural
enterprise activities**

**Support development
of agri-tourism
products and services**

**Connect rural
enterprises with
education and training.**

Exploring the identified opportunities

The following section expands on the identified opportunities and provides selected case studies.

The opportunities are assessed against their potential to contribute towards delivering the key economic growth objectives set in the Framework.

Attract high-intensity, low-impact rural industries

Redlands Coast has the pre-existing capacity to work with and establish emerging high-intensity, low-impact agricultural businesses in the city.

Overview

High-intensity, low-impact rural enterprises include businesses that produce high volumes of rural enterprises products on a comparatively smaller footprint of land (compared to traditional farming) and with minimal impact to the surrounding area. These types of capital intensive businesses are well-suited to areas where there is limited available land for rural use.

Redlands Coast's rural areas, proximity to markets and existing infrastructure provide an ideal match for these types of businesses. Vertical farming industries, for example, are able to operate on a small footprint, and produce a large amount of output, through the use of new technologies and automation in agriculture production. These types of high-intensity production practices are still emerging and are often difficult to classify, particularly with regard to planning policy. As a result, regions that are proactive in understanding and planning for this new type of agriculture production have the potential to cultivate new economic activity with significant growth potential.

Key points

- Vertical farming can operate on a small footprint – Redlands Coast has limited available land for agricultural use.
- Lower water use – Redlands Coast is reliant on town water and an industry that has a low dependence on water is ideal for the city.
- Use of existing infrastructure – insect farming can utilise existing disused poultry sheds to produce proteins.
- Low impact – fly farming and vertical farming have a low impact on the environment and on the surrounding urban environment relative to traditional agriculture production.
- Both vertical farming and fly farming are experiencing global growth.

CASE STUDY: Vertical Farming

The following case study outlines an example of a high-intensity, low-impact industry that would be well suited to Redlands Coast.

OVERVIEW

Controlled environment agriculture (CEA), commonly known as vertical farming, is the process of growing food or other agricultural products within factory conditions – and without the typical natural resources such as soil and sunlight.

This style of production may have the potential to benefit general agricultural production outside of urban areas where it is more commonly found. This is due to the style of production creating a more controlled production environment, irrespective of season. One acre of vertical farming can provide the produce equivalent of between 10–20 hectares of conventional production.

‘Vertical Farm Systems’ is located in Yandina on the Sunshine Coast.

KEY CHARACTERISTICS OF THE OPERATION INCLUDE:

- operates from a warehouse facility
- seed to harvest in a 28-day period (typical green produce, such as lettuce, mature in 45 to 55 days)
- the company originally had to get their components specially made – now it has 43 suppliers from around the world
- the system of three ‘climate cells’ can produce 500kg green products per week
- vertical farm system with three ‘climate cells’, which is fully automated cost \$1.2 million
- the company owners plan to export the machinery overseas, install it, commission it and stay on for 28 days to ensure the first successful crop.

KEY FACTS

- 87 per cent of the Australian population is living in urban areas.
- Population growth is particularly significant in major city centres, which are already home to 64 per cent of the population.
- A study by the University of Melbourne found that the reallocation of agricultural for urban use means Australia will eventually grow insufficient fruit and vegetables.
- Projects like Perth City Farm, Northey Street City Farm in Brisbane and Pocket City Farms in Sydney are examples of community-based urban farms that have a strong community and environmental focus.

IMPLICATIONS FOR REDLANDS COAST

Redlands Coast is well positioned to leverage a research facility to attract investors to the city. The facility offers a key differentiator for the area as it provides infrastructure needed for investors looking to establish agri-tech activities such as vertical farming.



Vertical farming at the QCDF

Increase support for research and development

Redlands Coast has quality access to a highly-skilled workforce and existing research facilities that could be leveraged to grow its agriculture research capability.

Overview

There is an opportunity for Redlands Coast to increase the support for local research and development through coordination with existing infrastructure such as the local Department of Agriculture and Fisheries (DAF) Redlands Research Facility, and emerging innovative businesses.

The Queensland Crop Development Facility (QCDF), which is owned and operated by DAF, is located at Cleveland. The facility grew from a general horticulture facility to focus on cut flowers, parks and gardens, landscape and turf industries as well as housing peak bodies for these industries. The site has recently hosted commercial entities in the fields mentioned above.

There is also a focus on servicing the needs of science groups – from DAF, Commonwealth Scientific and Industrial Research Organisation (CSIRO), Queensland University of Technology (QUT) and the University of Queensland (UQ) as well as a number of private companies that are not based on site.

The QCDF, which is positioned at Redlands Research Facility, has a complex of five glasshouses with 1350m² of environmentally-controlled space. Three of the glasshouses have met the specific facility requirements to deliver technical accreditation courses (such as Plant Containment Level 2 certification for genetically modified plants). The facility is a key differentiator for rural enterprises on Redlands Coast and its maintenance and growth is critical to the future of the local sector.

Actively seeking out and engaging early with businesses looking to undertake research and development can support the growth of local research and development. Council can play a role in assisting these businesses to identify

sites, suppliers and other stakeholders and to establish new supply chains in the city, and be at the forefront of new emerging industry activity.

Research focus

Council can explore avenues in which they can better facilitate further research and development utilisation of the facility by working with government, private organisations, researchers, educational institutions and other supply chain stakeholders from within and outside of Australia.

In particular, the DAF facility provides a focal point for attracting academic and industry partners to conduct research and development activities on site. This can in turn provide the city with exposure on a regional, statewide, national and international scale.

Key points

- The Redlands Research Facility is under-utilised, which provides potential investors with capacity to establish in the city.
- There are large established local rural enterprises that could be leveraged in the development of specific tertiary qualifications and the development of career pathways.
- Council is in a position to be approached by perspective investors wanting to establish themselves locally. Council can look at opportunities to leverage the Redlands Research Facility in order to attract further investment within relevant sectors (e.g. Agtech).

CASE STUDY: QCDF Research Facility

The following case study outlines a unique offering within Redlands Coast.

OVERVIEW

The Redlands Research Facility and QCDF is located at Cleveland in Redlands Coast. The facility is well positioned between Brisbane and Moreton Bay and takes full advantage of the 'krosnozem basalt' red soils of the area in order to conduct research and development projects onsite.

The Redlands Research Facility has evolved from a general horticulture facility to focus on servicing the needs of the nursery, cut flowers, parks and gardens, landscape and turf industries. It also houses peak bodies of these industries. In recent years, the site has also housed commercial entities.

RESEARCH FOCUS

Areas include:

- industry development to Queensland lifestyle horticulture industries
- contract research with industry – CSIRO, QUT, UQ and commercial clients
- biofuels research relating to the use of eucalyptus oils in fuel
- management of turf grasses with industry groups
- glasshouse, shade house and field site research for multiple client groups in horticulture, agriculture, technology and forestry
- ongoing support for DAF fisheries management and regulation.

CURRENT PROJECTS

- STRI Australia, a world leading sport's turf consultancy, has based its Australian research and consultancy services at the QCDF. The research is focussed on trials to improve the management and maintenance of turf.
- \$7.5 million pilot hydrogen plant research project. The plant will utilise solar electricity to generate hydrogen from salt water. The pilot project will involve QUT, Griffith University, Swinburne University of Technology, The University of Tokyo and industry partner Energy Developments Pty Limited.

- A two-year trial of 'concentrating solar photovoltaic technology' (CPV). QUT commenced a two-year trial utilising a CPV array which was designed and supplied by Japan's Sumitomo Electric Industries in 2017. The trial will track total power output from the array and investigate its economic applications.

IMPLICATIONS FOR REDLANDS COAST

The research facility provides the infrastructure needed to attract educational institutions as well as commercial entities wanting to conduct research and development activities in the city. There is the possibility of expanding the facility with adjacent land available. This expands the capacity of the facility for increased activity.

The projects housed at the facility can provide exposure on an international scale as numerous projects are collaborative efforts between international and local businesses/institutions.

The attraction of businesses to the city through research and development opportunities can have long term benefits to Redlands Coast. This benefit is derived from the evolution from conducting research and development at the facility to establishing a commercial presence within the city.



Turf production at the QCDF

CASE STUDY: Biofuels

The following case study outlines an example of research being conducted in Queensland and the impact it is having on Queensland.

OVERVIEW

It is Queensland's vision to have a \$1 billion sustainable and export orientated industrial biotechnology and bio-products sector. This industry focus is expected to attract significant international investment, and create high-value regional jobs.

Agriculture, plantation forestry, algae, organic and carbon-rich 'waste' streams could all be used as feedstocks in the future to generate a wide range of sustainable chemicals, fuels, synthetic rubber, cosmetics, detergents and textiles.

KEY INDUSTRY DRIVERS

- Increasing instability in crude oil markets.
- Decreasing environmental footprint of manufacturing.
- Increasing demand for sustainable products.

GLOBAL TREND

- Converting biomass into fuels, energy and chemicals has the potential to generate US\$230 billion to the global economy by 2020 (*World Economic Forum*).
- Brazil and the USA have strong mandates combined with research and investment in industrial biotechnology.
- Alberta, Canada, is a practical example of a combined state, multi-industry, and research effort to build on existing economic strengths in agriculture and expand their bio-industrial sector.

OPPORTUNITIES

- Queensland's highly-productive agricultural industry annually produces large quantities of potential non-food feedstocks required for the bioproducts sector.

- An industrial biotechnology and bioproducts sector could assist the agricultural sector to diversify by creating markets for existing and new products including cropping waste.

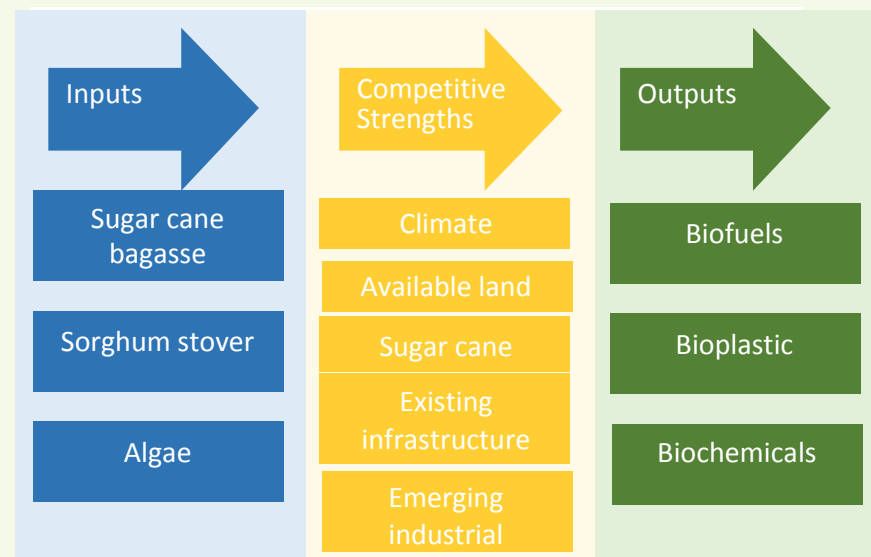
IMPLICATIONS FOR REDLANDS COAST

While Redlands Coast has moved away from broadacre agriculture, there is significant opportunity to consider energy solutions that draw on biofuel technology. Currently, there are research projects being undertaken at QCDF relating to biofuels from eucalyptus oils.

Energy cost is a consistent economic development challenge, which drives interest in the research and development of energy solutions.

Redlands Coast has the potential to attract research and development opportunities within this field through the use of the Redlands Research Facility.

Figure 7: The Queensland Government's Advancing Queensland – Biofutures 10 year roadmap action plan, 2016



Source: statedevelopment.qld.gov.au

Maintain strategic/significant local rural enterprise activities

Work with existing rural enterprise activities to maintain an appropriate level of activity to contribute towards the Framework's growth objectives

Overview

Redlands Coast is home to large established rural and primary industry businesses. These key businesses represent a large portion of rural enterprise activity in terms of employment and output within the industry. The future of these employers in the city is important for the sustainability of the sector.

Identifying significant existing local rural enterprise activities should seek to incorporate the broad range of rural enterprise activities, including quarrying, food and beverage production, nurseries, and poultry production.

Key points

- Through consultation it was identified that rural enterprises businesses in the city are seeking greater clarity regarding the zoning of land for rural enterprises.
- Uncertainty regarding the future use of land and regulatory compliance is reducing the attractiveness of the city for rural enterprises businesses, relative to other council areas.
- Existing rural businesses have shown interest in expanding and investing in the city but they have been deterred by a lack of clarity around planning processes.

Potential activities

- Streamlining planning processes to encourage further investment in the city.
- Establishing and enhancing relationships with local businesses to identify issues operators are facing.
- Consider impacts of urban encroachment on existing rural enterprises.



Sirromet Winery

Support development of agri-tourism products and services

There is an opportunity for Redlands Coast to leverage its natural assets and rural enterprises businesses to unlock new agri-tourism opportunities.

Overview

Developing local agri-tourism products and services can unlock new opportunities for Redlands Coast to connect tourism with rural enterprise activities. This supports a key objective of the Framework, to grow the local tourism economy, and would support the growth target by assisting local businesses to establish tourism products that meet the demands of domestic and international visitors seeking new and authentic rural experiences.

Key points

- Highlight what Redlands Coast has to offer by continuing to be proactive in marketing, including Redlands Coast food trails.
- Continue to work closely with businesses that have successfully established themselves as a visitor experience from rural enterprise beginnings.
- Engage with businesses to help identify opportunities to establish and develop new cultural/agri-tourism products that highlight traditional and emerging agricultural techniques.

Potential activities

- Further promotion of the existing regional Food Trail on the SEQ food trails website with the utilisation of Council's marketing resources.
- Supporting market readiness of businesses in the sector.
- Council can continue to be proactive in the attraction of further investment to grow rural enterprise businesses that can also support tourism in the city.



Bacchus Brewery

CASE STUDY: The Farm – Byron Bay

The following case study outlines an example of where rural enterprises and tourism industry sectors have been effectively integrated to act as key regional differentiators and economic drivers.

OVERVIEW

The Farm is a prime example of how rural enterprises can be successfully positioned to take advantage of agri-tourism. Established on an 80 hectare former dairy farm in 2013, its purpose is encapsulated by its motto of *'Grow, Feed, Educate'*.

The site consists of a traditional free-roam working farm, with its fruit, vegetables, nuts, meat, dairy, eggs and flowers used in the onsite restaurant, bakery and café, and sold in the produce store. The Farm offers tours, animal experiences, workshops and school holiday activities, making it suitable for all age groups.

One of the key differentiating factors of the Farm is its ability to capitalise on the natural assets of the Byron Bay region. The region has established itself as a major coastal tourist destination.

The NSW Department of Tourism study *'Travel to the North Coast NSW Region'* (2018) highlights that the North Coast, New South Wales area attracts 5.6 million domestic overnight visitors along with 353,700 international overnight visitors.

By contrast, businesses seeking to establish similar operations on Redlands Coast will be faced with challenges in building new visitation demand, rather than tapping into a large existing market.

The Farm capitalises on existing an already large visitation economy and existing infrastructure by providing a new visitor experience that diversifies the region's tourism product offering. Ultimately, this has contributed to visitors staying in the area for a longer period and increased local tourism spend.

AGRI-TOURISM TRENDS

The founders of The Farm, with an executive business background, understood the appeal of an accessible nature setting in an increasingly industrialised world. The Farm business model successfully capitalises on recent trends in agri-tourism, including:

- a desire to connect with nature for its purported mental and physical health benefits
- interest in understanding where our food comes from, and participating in the growing process
- a growing demand for organic and locally grown produce
- a desire for cruelty-free animal raising
- interest in learning about growing produce and keeping livestock, such as chickens
- restaurants increasingly using fresh ingredients from local suppliers
- a growing interest in sustainable farming and food practices.

IMPLICATIONS FOR REDLANDS COAST

The Farm exemplifies how traditional rural enterprises has been used to capitalise on agri-tourism trends, expand business and leverage regional natural assets.

Redlands Coast is geographically unique in that it is home to rural enterprises and also located near major urban centres. Identifying opportunities to support agri-tourism and build on Redlands Coast experiences is something the city could seek to achieve through rural enterprises product development.

Connect rural enterprises with education and training

Redlands Coast's existing assets and workforce could be leveraged as part of new education and training offerings in the city.

Overview

Redlands Coast has access to existing infrastructure and established rural enterprise businesses that could be used to develop career pathways for technical agri-education accreditations.

There is an opportunity to engage with education and training providers including tertiary institutions and industry to investigate demand for an agri-education facility. This will assist in the further integration of education and training rural enterprises activity in the Redlands Coast.

Universities currently have a presence in the city, including at the Redlands Research Facility in Cleveland. There could be opportunity for universities to increase their involvement in the city, specifically by utilisation of the research facility.

There is also opportunity to investigate demands for local businesses to partner with education and training organisations to offer rural enterprises related training.

Key points

- Explore opportunities to expand tertiary presence in the city within rural enterprises by increasing the utilisation of the Redlands Research Facility.
- Explore demand for education and training partnerships with local businesses and providers within the rural enterprises industry sector.

Potential activities

- Continue to leverage opportunities to attract education and training providers to the existing Redlands Research Facility.
- Identify skills gaps in the sector and match with training opportunities.
- Support local businesses looking to partner with education and training providers to offer on-the-job training opportunities.



Product testing at QCDF

Implementation plan



Implementation Plan Summary

Key opportunities to grow the Redlands Coast rural enterprises industry sector were consolidated into three key objectives that inform the Implementation Plan (see Table 5).

Table 5: Rural Enterprises Industry Sector Plan 2019–2024 Objectives

Plan Objectives	Alignment with Rural Enterprises Industry Sector Opportunities
Investigate opportunities to support local rural enterprises	Maintain strategic/significant local rural enterprise activities
Attract investment in rural enterprises industry sector	Attract high-intensity, low-impact industries Support development of agri-tourism products and services
Increase research and development opportunities and foster innovation in rural enterprises	Increase support for research and development Connect rural enterprises with education and training

The Implementation Plan contains actions required for the identified objectives to be achieved, which will assist the rural enterprises industry sector in supporting the City’s Framework economic growth objectives.

Actions will be implemented over the following time frames:

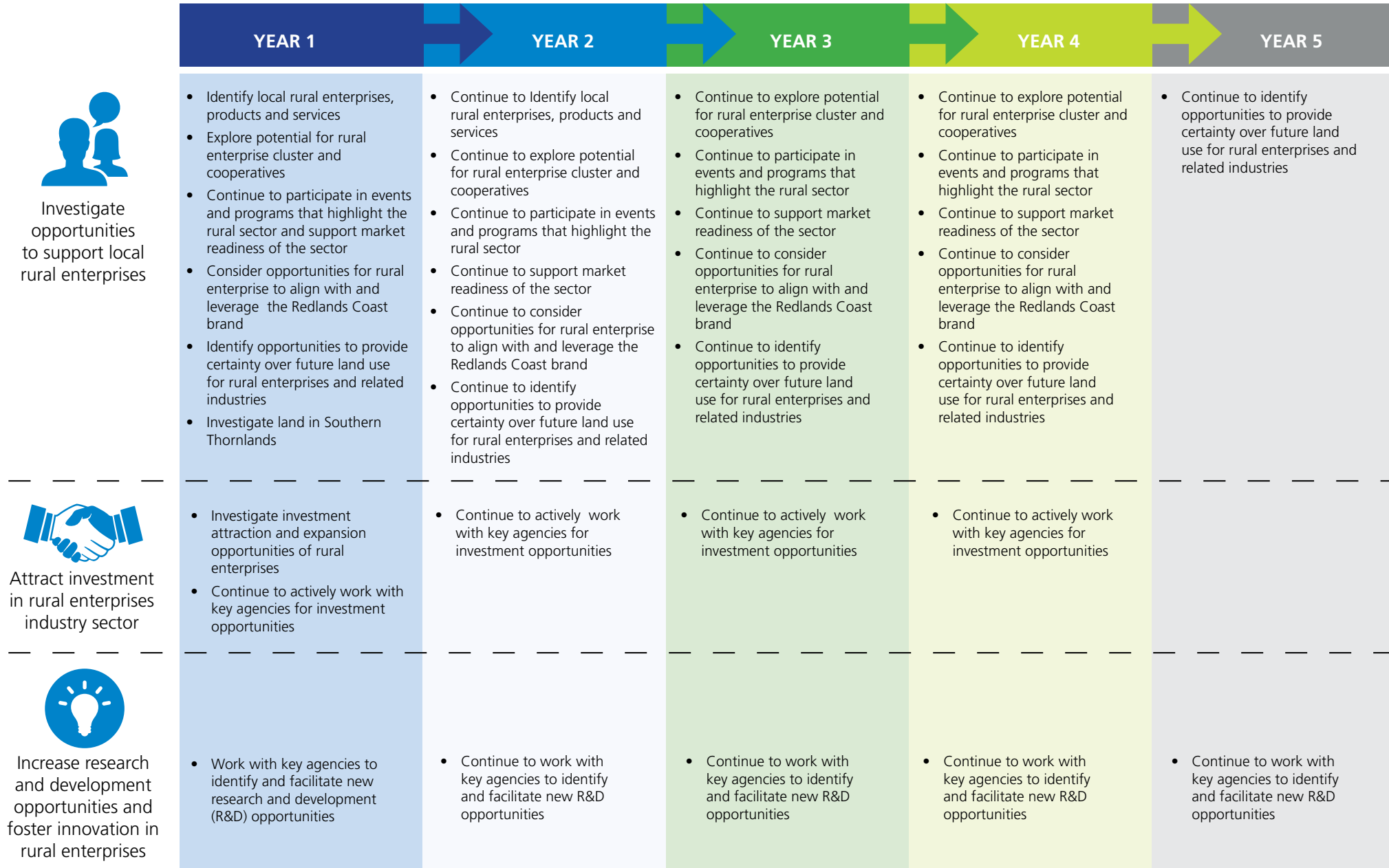
- **Short-term** – within the next one to two years (2020 – 2021)
- **Medium-term**– within the next three to four years (2022 – 2024)
- **Long-term** – after five or more years but may need to commence in the medium term (2024 onwards)
- **Ongoing** – actions will continually be progressed during the life of the Plan

Council could play a series of potential roles in engaging the sector and implementing the actions (see Table 6).

Table 6: Council Roles

Advocate	Attract and retain public, private and non-government investment that expands the economic base and improves service delivery in the city.
Regulate	Implement land use and infrastructure planning and policy development that will support the industry sector.
Partner	Strengthen existing links and networks and establish constructive working relationships with businesses, industry, and government to implement initiatives and to enhance supply chain links.
Facilitate	Enable the growth of emerging businesses by ensuring the provision of timely information, access to business grants, sponsorship and training opportunities.
Lead/Deliver	Take the lead and implement initiatives that will foster an environment that is conducive to business growth and expansion.

Figure 8 Implementation Plan Summary



Implementation Plan 2019–2024

Objective	Actions	Governance		Performance Measure	Resources	Timeframe
		Council's Role	Key Stakeholders			
Investigate opportunities to support local rural enterprises	Identify local rural enterprises, products and services	Facilitate	<ul style="list-style-type: none"> Redland City Council Chambers of Commerce Local business owners Department of Agriculture and Fisheries Department of State Development, Manufacturing Infrastructure and Planning State and Federal governments Industry Stakeholders 	Rural enterprises database developed	Activity funded in 2019-20 and subsequent activity may be subject to future budget bid	Short-term
	Explore potential for rural enterprise cluster and cooperatives to collaborate on growing the sector and related industries in the city including product and supply chain development	Facilitate	<ul style="list-style-type: none"> Rural enterprises sector Chambers of Commerce Quandamooka Yoolooburrabee Aboriginal Corporation Redlands Economic Development Advisory Board Redlands Innovation Advisory Group Logan and Redlands Regional Development Australia Committee State and Federal governments Industry Stakeholders Redlands Coast Tourism Subcommittee 	A framework for industry sector interaction developed	Activity funded in 2019-20 and subsequent activity may be subject to future budget bid	Short to Medium-term
	Continue to participate in events and programs that highlight the rural sector and support market readiness of the sector	Partner / Facilitate	<ul style="list-style-type: none"> Redland City Council South East Queensland Council of Mayors Local business owners Tourism Events Queensland Trade and Investment Queensland Tourism Australia Redlands Coast Tourism Subcommittee 	Key partnership opportunities identified Market readiness of the sector increased	Activity funded in 2019-20 and subsequent activity may be subject to future budget bids	Short to medium-term
	Consider opportunities for rural enterprises to align with and leverage the Redlands Coast brand	Advocate / Facilitate	<ul style="list-style-type: none"> Redland City Council Chambers of Commerce Local businesses Industry Stakeholders 	Key partnership opportunities identified	Activity funded in 2019-20 and subsequent activity may be subject to future budget bids	Short to medium-term

Objective	Actions	Governance		Performance Measure	Resources	Timeframe
		Council's Role	Key Stakeholders			
Investigate opportunities to support local rural enterprises continued...	Identify opportunities to provide greater certainty for future land use for rural enterprises and related industries, including consideration of economic implications of City Plan amendments on the rural sector	Regulate / Advocate / Facilitate	<ul style="list-style-type: none"> Redland City Council Department of State Development, Manufacturing, Infrastructure and Planning Landholder and industry Stakeholders 	Economic impacts of proposed City Plan amendments evaluated	Activity funded in 2019-20 and subsequent activity may be subject to future budget bids	Ongoing
	Investigate land in Southern Thornlands that has been identified as a Potential Future Growth Area in the Shaping South East Queensland Regional Plan 2017—41 as a future employment area for key industry sectors, including rural enterprises	Lead / Deliver	<ul style="list-style-type: none"> Redland City Council Department of State Development, Manufacturing, Infrastructure and Planning 	<ul style="list-style-type: none"> Investigative study completed and appropriately reflected in the City Plan SEQ Regional Plan requirement delivered 	Activity funded in 2019-20	Short-term
Attract investment in rural enterprises industry sector	Investigate investment attraction and expansion opportunities of rural enterprises	Lead / Deliver	<ul style="list-style-type: none"> Redland City Council Austrade Trade and Investment Queensland Department of Agriculture and Fisheries Department of State Development, Manufacturing, Infrastructure and Planning Brisbane Marketing Redlands Economic Development Advisory Board Industry stakeholders 	Redlands Coast Investment Attraction Plan developed	Activity funded in 2019-20 and subsequent activity may be subject to future budget bids	Short-term
	Continue to work actively with key agencies and peak bodies to identify and advocate for investment opportunities in the rural enterprises sector both domestically and internationally	Advocate / Partner	<ul style="list-style-type: none"> Redland City Council Redlands Economic Development Advisory Board Redlands Innovation Advisory Group South East Queensland Council of Mayors Logan and Redlands Regional Development Australia Committee Brisbane Marketing Queensland Government agencies Australian Government agencies Austrade Trade and Investment Queensland Industry stakeholders 	Investment opportunities identified	Activity funded in 2019-20 and subsequent activity may be subject to future budget bids	Short to Medium-term

Objective	Actions	Governance		Performance Measure	Resources	Timeframe
		Council's Role	Key Stakeholders			
Increase research and development opportunities and foster innovation in rural enterprises	Work with government, education and training sector and industry stakeholders to identify and facilitate new research and development opportunities; and identify and support commercialisation initiatives	Advocate / Facilitate	<ul style="list-style-type: none"> • Redland City Council • Department of Agriculture and Fisheries • Department of State Development, Manufacturing, Infrastructure and Planning • Department of Education, Small Business and Training • Universities • TAFE Queensland • Chambers of Commerce • Quandamooka Yoolooburrabee Aboriginal Corporation • Redlands Economic Development Advisory Board • Redlands Innovation Advisory Group • Local business owners • Potential investors • State and Federal governments • Industry Stakeholders 	<ul style="list-style-type: none"> • Queensland Government partnership developed and opportunities identified • Opportunities for commercialisation identified • Commercialisation initiatives supported 	Activity will be funded through future annual budget bids	Long-term

References

Australian Bureau of Statistics 2016, Census of population and housing (2016), TableBuilder. Findings based on use of ABS TableBuilder data.

Australian Bureau of Statistics 2011, Census of population and housing (2011), TableBuilder. Findings based on use of ABS TableBuilder data.

Australian Bureau of Statistics 2008, Australian and New Zealand Standard Industrial Classification (ANZSIC) (2006).

Australian Bureau of Statistics 2019, Counts of Australian Businesses, including entries and exits (June 2014 to June 2018).

Australian Bureau of Statistics 2018, Value of Agricultural Commodities Produced, Australia (2016 – 17).

AECOM 2013, Redlands Rural Futures Strategy.

Food and Agriculture Organisation of the United Nations 2009, 'How to feed the world 2050' (2009).

KPMG Enterprise 15 January 2019, Venture Pulse Q4 2018.

Accessed at: <https://assets.kpmg/content/dam/kpmg/xx/pdf/2019/01/kpmg-venture-pulse-q4-2018.pdf> Redland City Council 2014, Economic Development Framework 2014-41.

Redland City Council 2019, Redland City Plan (2018).

Redland City Bulletin 2 April 2019. Nurseries enjoy business boom thanks to popularity of indoor plants.

Accessed at <https://www.redlandcitybulletin.com.au/story/5987131/nurseries-enjoy-industry-growth/?cs=213>

REMPAN 2018, Key Sector Validation Assessment–Economic Development Framework 2014-2041.

The State of New South Wales, Destination NSW 2018, Travel to North Coast NSW region Year ended September 2018.

Access at <https://www.destinationnsw.com.au/wp-content/uploads/2019/01/travel-to-north-coast-nsw-region-snapshot-sept-2018.pdf?x15361>

The State of Queensland, Department of Agriculture and Fisheries 2018, Queensland Agtrends (October 2018).

Accessed at <https://publications.qld.gov.au/dataset/queensland-agtrends>

The State of Queensland, Department of Agriculture and Fisheries 2018, State of Agriculture Report 2018.

Accessed at https://www.daf.qld.gov.au/_data/assets/pdf_file/0007/1383928/State-of-Agriculture-Report.pdf

The State of Queensland, Department of Infrastructure, Local Government and Planning 2017. ShapingSEQ South East Queensland Regional Plan 2017.

Accessed at <https://dsdmipprd.blob.core.windows.net/general/shapingseq.pdf>

The State of Queensland, Department of State Development 2016, North Stradbroke Island Economic Transition Strategy September 2016.

Accessed at https://www.ditid.qld.gov.au/_data/assets/pdf_file/0004/1409215/nsi-economic-transition-strategy.pdf

The State of Queensland, Department of State Development, Manufacturing and Planning 2016, Queensland Biofutures 10-Year Roadmap and Action Plan (June 2016).

Accessed at <http://www.statedevelopment.qld.gov.au/resources/plan/biofutures/biofutures-10yr-roadmap-actionplan.pdf>

The State of Queensland (Queensland Treasury) 2019, Queensland Regional Profiles Redland (C) Local Government Area (LGA) (April 2019).

The State of Queensland, Tourism and Events Queensland 2017, Brisbane Regional Snapshot.

Accessed at <https://cdn2-teq.queensland.com/research-and-insights/domestic-research/regional-summaries/brisbane>

Contact Details

For information about economic development in the Redlands please contact Redland City Council on 3829 8999.

Disclaimer

The information contained in this document or its attachments is to the best of our knowledge accurate at the time of authorising the printing of the publication July 2019. Any representation, statement, opinion or advice, expressed or implied in this publication is made in good faith for general information purposes but and on the basis that the Redland City Council, its agents and employees are to the extent permissible by law, not liable (whether by reason of negligence, lack of care or otherwise) to any person for any damage or loss whatsoever which has occurred or may occur in relation to that person taking or not taking (as the case may be) action in respect of any representations, statement or advice referred to above.

