Fraser Coast Activity Centres & Employment Strategy

Final Report

August 2011

ECONOMIC ASSOCIATES

Fraser Coast Activity Centres & Employment Strategy

Final Report

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PREFACE

This individual planning study report was commissioned by the Fraser Coast Regional Council (Council) as part its Sustainable Growth Strategy project to assist and inform in the development of a new planning scheme for the entire local government area. It is important to understand that while the study report and its recommendations are a significant input, it does not necessarily represent the final integrated policy position of Council. Rather, the information will be used to assist the drafting of elements of the new planning scheme. The integration and balancing of a range of project inputs, community and State government engagement and other information which becomes available to Council will also influence the final policy content of the new planning scheme. Following an initial review by the State, a statutory public consultation process will occur where formal submissions are considered by Council and the State government before the planning scheme is finally adopted.

1 INTRODUCTION

GHD Pty Ltd has engaged Economic Associates in association with Leyshon Consulting to prepare the Activity Centres & Employment Strategy as part of the Fraser Coast Sustainable Growth Strategy.

As stated above, the Activity Centres & Employment Strategy is being prepared jointly by Economic Associates and Leyshon Consulting. Economic Associates focus is on commercial office and industrial land, while the focus of Leyshon Consulting is on retailing.

The purpose of the Activity Centres and Employment Strategy is to ensure sufficient land for retail, commercial and industrial uses is identified across an integrated network of activity centres and industrial areas throughout Fraser Coast Regional Council.

The Activity Centres and Employment Strategy:

- Provides an overview of the economic and demographic environment of Fraser Coast Regional Council and its component retail and employment catchments;
- Analyses the potential future economic environment of Fraser Coast Regional Council;
- Includes an employment projection model of the Fraser Coast region, which considers the potential structural change of the Fraser Coast regional economy;
- Provides an assessment of the Fraser Coast commercial office market, including:
- – Commercial office property market, including analysis of volume and value of commercial office sales and average prices;
- – Quantification of existing supply of commercial office space within Fraser Coast Regional Council;
- – Projected future employment in commercial office sectors and consequent office floor space demand; and
- – Assessment of need for additional commercial office space within Fraser Coast Regional Council;
- Provides an assessment of the Fraser Coast industrial land market, including:
- – Projected future employment in industrial sectors and consequent industrial land demand;
- – Industrial land property market, including analysis of volume and value of industrial land sales and average prices;
- – Quantification of existing supply of industrial land within Fraser Coast Regional Council; and
- – Assessment of need for additional industrial land within Fraser Coast Regional Council;
- Provides an assessment of the Fraser Coast retail market, including:
- – Retail property market, including analysis of volume and value of retail floor space sales and average prices;
- – Quantification of existing supply of retail floor space within Fraser Coast Regional Council;
- – Projected future retail expenditure and consequent retail floor space demand;

- Assessment of need for additional retail floor space within Fraser Coast Regional Council; and

- Provides recommendations regarding the establishment of an integrated centres hierarchy.

1.1 Report Structure

This draft report is structured as follows:

- Chapter 1: Introduction: This section provides an overview of the purpose of the Activity Centres & Employment Strategy;
- Chapter 2: Economic Overview: This section defines the catchments within Fraser Coast Regional Council and provides an overview of the economic environment of Fraser Coast Regional Council, including demography, population and household projections, enterprise activity and agricultural production;
- Chapter 3: Fraser Coast Property Market Overview: This section provides an overview of the retail, commercial and industrial property market within Fraser Coast Regional Council;
- Chapter 4: Existing Centres Network: This section outlines existing retail and commercial provision within the Fraser Coast's centres network;
- Chapter 5: Existing Industrial Areas: This section provides an overview of the existing industrial areas within Fraser Coast Regional Council;
- Chapter 6: Industrial Futures Diagnostics: This section provides analysis of the region's competitive advantages and identifies potential gaps within the region's supply chains and customer markets that could be developed;
- Chapter 7: Employment Model: This section outlines the assumptions and framework underlying the employment by industry projection model used to generate commercial office and industrial related employment for the catchments of Fraser Coast Regional Council;
- Chapter 8: Retail Market Assessment: This section provides an overview of future retail expenditure potential by both the resident population and tourists and assesses future retail floor space demand;
- Chapter 9: Commercial Office Market Assessment: This section provides an assessment of future commercial office floor space demand and commercial office need;
- Chapter 10: Industrial Land Market Assessment: This section provides analysis of industrial land demand projections and an assessment of future industrial land need;
- Chapter 11: Recommended Centres Strategy: This section provides justification regarding the current and proposed future structure of the retail and commercial centres network within Fraser Coast Regional Council; and
- Chapter 12: Industrial Future of Fraser Coast Regional Council: This section provides an overview of the desired future provision of industrial land within Fraser Coast Regional Council.

2 ECONOMIC OVERVIEW

2.1 Catchment Definition

In order to determine the needs of Fraser Coast Regional Council by locality, a number of catchments were defined. These catchments were determined through consultation between the project manager and Fraser Coast Regional Council and are based on ABS State Suburb boundaries.

The catchments within Fraser Coast Regional Council are as follows:

- Hervey Bay Urban;
- Maryborough Urban;
- Coastal Hervey Bay;
- Hinterland Hervey Bay;
- Maryborough Urban Surrounds;
- Rural South;
- Hervey Bay Urban Surrounds;
- Rural South West;
- Coastal Maryborough; and
- Fraser Island.

2.2 Socio-Economic Overview

A socio-economic profile of Fraser Coast Regional Council[1] as at the 1996, 2001 and 2006 Censuses of Population and Housing, benchmarked against Wide Bay – Burnett SD and Queensland is provided in Table 2.1[2]. This overview is provides a strategic context for this study. A more detailed socio-economic profile which outlines the differing characteristics of each catchment is provided in the Demographic Study prepared by Buckley Vann as part of the Fraser Coast Regional Councils Sustainable Growth Study.

A number of key points can be drawn from this profile:

- Fraser Coast Regional Council has a mature population compared with Wide Bay – Burnett SD and Queensland. The average age of residents in Fraser Coast Regional Council has been higher than in Wide Bay Burnett and Queensland at the time of the 1996, 2001 and 2006 Censuses;
- As of the 2006 Census, Fraser Coast Regional Council had a lower proportion of couple families with children households and a significantly higher proportion of couple families without children households than Queensland;

[1] Fraser Coast Regional Council includes the former local government areas of Hervey Bay, Maryborough, Tiaro and Woocoo.

[2] A socio-economic profile of the catchments within Fraser Coast Regional Council is provided within the demographic report.

- In 2006, over 40% of households in Fraser Coast Regional Council fully owned their home, compared with approximately 30% in Queensland. Between 1996 and 2006, there was a decrease in the proportion of households fully owning their home in Fraser Coast Regional Council. The proportion of households renting was lower in Fraser Coast Regional Council than in Queensland, but was similar to the Wide Bay Burnett average;
- On average, households within Fraser Coast Regional Council earned a lower income than the state average. The average monthly housing loan repayment and weekly rents in the Fraser Coast Regional Council were below the Queensland average;
- Fraser Coast Regional Council had a relatively high unemployment rate and low labour force participation rate compared with Wide Bay – Burnett SD and Queensland. The unemployment rate in Fraser Coast Regional Council decreased by 8.9% points between 1996 and 2006 compared with 4.9% points in Queensland;
- The proportion of residents within Fraser Coast Regional Council with a post-school qualification increased significantly between 1996 and 2006, but remained below the Queensland average. In 2006, the proportion of residents with a certificate in the Fraser Coast Regional Council was higher than Queensland;
- Fraser Coast Regional Council had a higher proportion of persons employed in lower white collar professions than Queensland. Between 1996 and 2006, Fraser Coast Regional Council recorded an increase in the proportion of persons employed in lower white collar professions and a decrease in the proportion of persons employed in upper white collar professions in Fraser Coast Regional Council; and
- In 2006, there were a high proportion of persons in Fraser Coast Regional Council employed in the retail trade, health care & social assistance and construction industries. Compared with Queensland, Fraser Coast Regional Council recorded a higher proportion of persons employed in accommodation & food services, and a lower proportion employed in professional & scientific services and wholesale trade.

Table 2.1: Socio-Economic Overview, Fraser Coast Regional Council, Wide Bay – Burnett SD and Queensland, 1996 to 2006

	Fraser Coast RC			Wide Bay - Burnett SD			Queensland		
	1996	2001	2006	1996	2001	2006	1996	2001	2006
Age Distribution									
0-14 years	21.2%	20.1%	19.0%	22.9%	21.5%	20.3%	21.9%	21.3%	20.4%
15-24 years	11.1%	10.4%	10.1%	11.7%	11.0%	10.6%	14.8%	13.8%	13.6%
25-34 years	11.7%	10.1%	9.3%	12.4%	10.8%	9.5%	15.2%	14.2%	13.3%
35-44 years	13.8%	13.2%	12.4%	14.3%	13.9%	12.9%	15.0%	14.9%	14.6%
45-54 years	12.8%	13.7%	13.7%	13.0%	13.9%	14.0%	12.7%	13.7%	13.7%
55-64 years	11.7%	13.4%	15.2%	10.8%	12.6%	14.6%	8.4%	9.7%	11.4%
65+ years	17.7%	19.0%	20.3%	14.9%	16.3%	18.1%	12.0%	12.4%	13.0%
Average age (years)	39.4	41.1	42.4	37.6	39.4	41.0	35.5	36.6	37.6
Household Type (% of dwellings)									
Couple families with children	29.0%	24.4%	23.9%	32.2%	27.3%	25.3%	33.7%	30.7%	29.4%
Couple families without children	29.6%	30.8%	32.1%	29.1%	29.8%	31.4%	25.0%	25.3%	26.0%
Single parent family	9.1%	10.3%	10.4%	9.1%	10.3%	10.5%	9.9%	10.8%	10.5%
Lone person households	20.1%	22.3%	21.9%	20.2%	22.3%	22.1%	20.6%	21.8%	21.0%
Average Household size	2.6	2.5	2.5	2.7	2.5	2.5	2.8	2.6	2.6
Household Finances									
% of households fully owning home	48.0%	46.2%	41.7%	47.6%	45.3%	40.6%	38.7%	36.6%	30.4%
% of households purchasing home	23.0%	20.7%	25.7%	21.4%	22.0%	27.0%	24.8%	25.8%	31.4%
% of households renting	26.0%	26.4%	25.5%	26.0%	26.6%	25.1%	31.8%	31.6%	30.0%
Average weekly household income	-	$658	$865	-	$685	$883	-	$905	$1,202
Average weekly family income	$648	$824	$1,083	$679	$861	$1,112	$918	$1,175	$1,499
Average monthly housing loan repayment	$697	$749	$1,128	$685	$742	$1,086	$870	$977	$1,475
Average weekly rent payment	$116	$128	$184	$104	$117	$166	$130	$154	$218
Labour Market									
Full-time employment (% labour force)	52.5%	50.5%	54.2%	55.9%	54.1%	55.9%	61.2%	58.6%	61.4%
Part-time employment (% labour force)	24.6%	28.0%	30.1%	24.1%	27.5%	29.8%	24.2%	26.6%	27.7%
Total employment (% labour force)	82.7%	86.2%	91.6%	85.1%	88.4%	92.4%	90.4%	91.8%	95.3%
Unemployment rate (% labour force)	17.3%	13.8%	8.4%	14.9%	11.6%	7.6%	9.6%	8.2%	4.7%
Participation rate (% of population > 15 years)	48.2%	45.9%	46.6%	52.9%	50.6%	50.3%	60.7%	60.6%	61.1%
Qualifications									
% of persons with a post-school qualification	23.3%	26.6%	31.9%	22.1%	25.7%	30.9%	27.6%	32.3%	37.5%
% of persons with Bachelor or higher	4.5%	5.7%	6.9%	4.6%	5.8%	6.9%	8.6%	10.8%	13.1%
% of persons with Diploma	4.4%	4.2%	5.3%	4.2%	4.0%	4.9%	5.4%	5.5%	6.6%
% of persons with Certificate	14.3%	16.6%	19.8%	13.4%	15.8%	19.0%	13.6%	16.0%	17.8%
Occupation									
Upper White Collar									
Managers	13.8%	13.0%	11.4%	17.4%	16.5%	14.3%	13.3%	12.9%	12.4%
Professionals	13.0%	13.4%	13.5%	11.8%	12.2%	12.4%	15.3%	16.4%	17.2%
Subtotal	26.8%	26.5%	24.9%	29.1%	28.7%	26.8%	28.6%	29.3%	29.6%
Lower White Collar									
Community & Personal Service Workers	8.8%	10.8%	11.3%	7.5%	9.0%	9.6%	8.1%	8.9%	9.1%
Clerical and Admin Workers	13.7%	13.2%	13.7%	11.8%	11.7%	12.1%	15.3%	15.0%	14.8%
Sales Workers	11.1%	11.6%	11.0%	9.5%	10.1%	10.1%	10.2%	10.7%	10.3%
Subtotal	33.6%	35.6%	36.0%	28.8%	30.8%	31.8%	33.6%	34.7%	34.2%
Upper Blue Collar									
Technicians & Trades Workers	16.7%	14.9%	16.3%	14.9%	13.7%	15.0%	15.6%	14.7%	15.3%
Subtotal	16.7%	14.9%	16.3%	14.9%	13.7%	15.0%	15.6%	14.7%	15.3%

	Fraser Coast RC			Wide Bay - Burnett SD			Queensland		
	1996	2001	2006	1996	2001	2006	1996	2001	2006
Lower Blue Collar									
Machinery Operators & Drivers	8.5%	7.5%	7.2%	9.1%	8.3%	8.0%	8.3%	7.8%	7.2%
Labourers	11.8%	13.2%	13.8%	15.3%	16.3%	16.6%	11.4%	11.5%	11.9%
Subtotal	20.2%	20.7%	21.0%	24.3%	24.7%	24.5%	19.7%	19.3%	19.1%
Employment by Industry (% of employees)									
Agriculture, forestry & fishing	5.8%	5.6%	3.6%	14.3%	14.2%	10.3%	5.2%	4.9%	3.4%
Mining	0.5%	0.3%	0.7%	0.9%	0.7%	1.0%	1.6%	1.2%	1.7%
Manufacturing	9.9%	10.0%	8.9%	10.3%	10.6%	9.8%	10.1%	10.5%	9.9%
Electricity, gas, water & waste services	1.5%	1.3%	1.6%	1.3%	1.3%	1.4%	0.9%	1.0%	1.0%
Construction	7.6%	6.8%	10.6%	6.4%	6.1%	8.9%	7.0%	6.9%	9.0%
Wholesale trade	3.8%	3.6%	2.5%	4.3%	4.4%	3.0%	5.3%	4.9%	3.9%
Retail trade	12.3%	13.6%	13.0%	10.9%	12.3%	12.6%	10.6%	11.5%	11.6%
Accommodation & food services	9.0%	8.9%	8.8%	6.6%	6.7%	7.0%	7.2%	7.4%	7.0%
Transport, postal & warehousing	4.7%	4.9%	4.7%	4.1%	4.3%	4.1%	5.1%	5.2%	5.1%
Information media & telecommunications	2.1%	1.6%	1.2%	1.5%	1.1%	1.0%	2.1%	1.9%	1.4%
Financial & insurance services	2.1%	1.8%	1.7%	2.0%	1.6%	1.6%	3.0%	2.8%	2.9%
Rental, hiring & real estate services	2.3%	1.8%	2.2%	1.7%	1.4%	1.7%	2.0%	2.0%	2.1%
Professional, scientific & technical services	2.8%	2.7%	3.2%	3.4%	2.6%	3.0%	5.5%	5.4%	5.6%
Administrative & support services	2.2%	2.9%	3.0%	1.7%	2.4%	2.6%	2.7%	3.2%	3.0%
Public administration & safety	5.1%	5.3%	6.0%	4.8%	4.8%	5.7%	6.3%	6.2%	6.7%
Education & training	8.3%	8.7%	8.1%	7.9%	8.3%	7.9%	7.5%	8.0%	7.6%
Health care & social assistance	10.4%	12.2%	12.8%	9.4%	10.1%	11.1%	9.2%	9.5%	10.2%
Arts & recreation services	0.8%	1.1%	0.8%	0.7%	0.9%	0.7%	1.5%	1.5%	1.4%
Other services	4.6%	4.4%	3.9%	3.8%	3.7%	3.6%	4.3%	4.0%	3.7%

Source: ABS 2006 Census of Population and Housing - 2nd release data

2.3 Population Projections

The population of Fraser Coast Regional Council is projected to increase from 96,242 persons in 2011 to 152,283 persons in 2031, or by 2.3% per annum. Within Fraser Coast Regional Council, Maryborough Urban Surrounds and Hervey Bay Urban are anticipated to record the highest average annual growth rates.

The rate of working age population growth is anticipated to be lower than total population growth within Fraser Coast Regional Council, with the incidence of persons of working age decreasing from 60.5% of the total population in 2011 to 58.0% of the population in 2031.

Table 2.2: Population and Household Projections, Fraser Coast Regional Council, 2011 to 2031

	2011	2016	2021	2026	2031	Ave. Ann. Growth, 2011-31
Total Population						
Hervey Bay Urban	46,697	53,872	62,452	73,105	85,575	3.1%
Maryborough Urban	24,725	25,986	27,583	29,278	30,772	1.1%
Coastal Hervey Bay	6,693	7,390	7,961	8,367	8,707	1.3%
Hinterland Hervey Bay	3,981	4,590	5,143	5,734	6,394	2.4%
Maryborough Urban Surrounds	3,111	3,270	3,610	4,607	5,880	3.2%
Rural South Catchment	3,496	3,964	4,406	4,937	5,531	2.3%
Hervey Bay Urban Surrounds	4,085	4,251	4,358	4,468	4,581	0.6%
Rural South West	2,111	2,388	2,650	2,969	3,278	2.2%
Coastal Maryborough	958	998	1,031	1,073	1,116	0.8%
Fraser Island	385	401	414	431	449	0.8%
Fraser Coast Regional Council	**96,242**	**107,110**	**119,609**	**134,970**	**152,283**	2.3%

	2011	2016	2021	2026	2031	Ave. Ann. Growth, 2011-31
Working Age Population (15-64 years)						
Hervey Bay Urban	27,207	31,204	35,961	41,846	48,692	3.0%
Maryborough Urban	14,816	15,414	16,195	17,012	17,694	0.9%
Coastal Hervey Bay	4,240	4,573	4,810	4,933	5,007	0.8%
Hinterland Hervey Bay	2,394	2,702	2,961	3,228	3,516	1.9%
Maryborough Urban Surrounds	2,202	2,303	2,530	3,212	4,079	3.1%
Rural South Catchment	2,333	2,603	2,847	3,138	3,457	2.0%
Hervey Bay Urban Surrounds	2,732	2,801	2,830	2,858	2,886	0.3%
Rural South West	1,355	1,493	1,613	1,757	1,885	1.7%
Coastal Maryborough	627	643	654	670	686	0.5%
Fraser Island	334	347	359	374	389	0.8%
Fraser Coast Regional Council	**58,239**	**64,084**	**70,759**	**79,028**	**88,291**	**2.1%**

Source: PIFU (2010) - small change medium series figures, Economic Associates estimates

2.4 Enterprise Activity

As of June 2009, there was an estimated 6,065 businesses[3] within Fraser Coast Regional Council, comprising:

- 3,885 businesses in the former Hervey Bay LGA;
- 1,557 businesses in the former Maryborough LGA;
- 623 businesses in the former combined Tiaro and Woocoo LGAs;

The proportion of employment within employing and non-employing (i.e. sole trader) businesses has been estimated based on data by employment size ranges.

As of June 2009, the proportion of employment in employing businesses in Fraser Coast Regional Council ranges between 70.6% (former combined Tiaro and Woocoo LGAs) and 92.5% (former Maryborough LGA).

[3] The 2009 business count data does not include public sector activity within the public administration & safety, education & training and health care & social assistance sectors.

Table 2.3: Distribution of Employment by Business Type, LGAs of Fraser Coast Regional Council

	Maryborough		Hervey Bay		Tiaro & Woocoo	
	% employing	% non-employing	% employing	% non-employing	% employing	% non-employing
Agriculture, Forestry and Fishing	62.7%	37.3%	81.7%	18.3%	62.3%	37.7%
Mining	99.6%	0.4%	100.0%	0.0%	-	-
Manufacturing	98.0%	2.0%	95.1%	4.9%	59.2%	40.8%
Electricity, Gas, Water and Waste Services	0.0%	100.0%	82.9%	17.1%	0.0%	100.0%
Construction	89.8%	10.2%	85.0%	15.0%	83.0%	17.0%
Wholesale Trade	90.0%	10.0%	77.8%	22.2%	82.9%	17.1%
Retail Trade	96.2%	3.8%	94.5%	5.5%	81.0%	19.0%
Accommodation and Food Services	98.6%	1.4%	97.4%	2.6%	92.3%	7.7%
Transport, Postal and Warehousing	97.1%	2.9%	84.1%	15.9%	83.6%	16.4%
Information Media and Telecommunications	0.0%	100.0%	0.0%	100.0%	-	-
Financial and Insurance Services	72.9%	27.1%	47.6%	52.4%	0.0%	100.0%
Rental, Hiring and Real Estate Services	53.0%	47.0%	85.2%	14.8%	78.4%	21.6%
Professional, Scientific and Technical Services	84.0%	16.0%	90.4%	9.6%	81.5%	18.5%
Administrative and Support Services	94.5%	5.5%	91.6%	8.4%	71.4%	28.6%
Public Administration and Safety	-	-	94.1%	5.9%	0.0%	100.0%
Education and Training	96.9%	3.1%	44.1%	55.9%	100.0%	0.0%
Health Care and Social Assistance	85.8%	14.2%	95.1%	4.9%	71.4%	28.6%
Arts and Recreation Services	82.9%	17.1%	95.1%	4.9%	0.0%	100.0%
Other Services	92.2%	7.8%	93.1%	6.9%	29.4%	70.6%
Not Classified	70.7%	29.3%	26.8%	73.2%	0.0%	100.0%
Total	**92.5%**	**7.5%**	**89.2%**	**10.8%**	**70.6%**	**29.4%**

Note 1: The business count data for public administration & safety, education & training and health care & social assistance includes private sector firms only.
Note 2: The not classified category consists of businesses that are yet to be coded to an industry.
Source: ABS (2011) Cat. No. 8165.0 – Counts of Australian Businesses, including entries and exits, June 2007 to June 2009

2.5 Agricultural Production

Agricultural production within the Fraser Coast Regional Council is reported for the following categories:

- Livestock;
- Horticulture; and
- Cropping.

The agricultural production data is reported by quantity (e.g. hectares of production, tonnage, etc) and, where available, by value of production[4].

Detailed tables reporting agricultural production data for Fraser Coast Regional Council are provided in Appendix A.

2.5.1 Livestock

Livestock (Production)

In Fraser Coast Regional Council, the most significant livestock commodities in 2005-06 were chicken layers and meat cattle. The number of chicken layers increased from 34,124 chickens in 2000-01 to 86,976 chickens in 2005-06, producing over one million dozen eggs in 2005-06. The number of meat cattle increased from 70,076 head in 2000-01 to 70,658 head in 2005-06, accounting for less than 1% of the Queensland herd.

Livestock Slaughtered (Value)

In 2005-06, the total value of slaughtered livestock in Fraser Coast Regional Council was $24.66 million, accounting for less than 1% of Queensland production by value. Slaughtered cattle and calves accounted for approximately 79.0% of the total slaughtered value in Fraser Coast Regional Council.

Livestock Products (Value)

The total value of livestock products in 2005-06 was approximately $4.54 million in Fraser Coast Regional Council (1.1% of Queensland production by value). The most significant livestock products in terms of value in Fraser Coast Regional Council were milk ($2.86 million) and eggs produced for human consumption ($1.66 million).

2.5.2 Horticulture

Nurseries, Cut Flowers, Cultivated Turf and Vegetables for Seed (Area)

In 2005-06, there was approximately 146 hectares of land in Fraser Coast Regional Council occupied by nurseries, cut flowers and cultivated turf enterprises, including 98 hectares of cultivated turf. The area of land occupied by nurseries, cut flowers and cultivated turf enterprises increased between 2000-01 and 2005-06.

[4] While quantities are reported for 2000-01 and 2005-06, value of production data is not available for 2000-01 and therefore only reported for 2005-06.

Nurseries, Cut Flowers, Cultivated Turf and Vegetables for Seed (Value)

The value of nursery output in 2005-06 was $4.99 million in Fraser Coast Regional Council, accounting for 2.8% of Queensland production by value. The value of cultivated turf was $2.74 million in 2005-06 accounting for 3.5% of Queensland production by value.

Fruit (Area)

In 2005-06, there were approximately 1,419 hectares of land occupied by fruit in Fraser Coast Regional Council accounting for 2.5% of the Queensland production area. In Fraser Coast Regional Council, the major fruit commodities in terms of area in 2005-06 were nuts (mostly macadamias) (118,457 trees or 5.5% of Queensland production by area) and plantation fruit (mostly pineapples) (530 hectares or 3.0% of Queensland production by area). Between 2000-01 and 2005-06, the number of nut trees increased while the area occupied by plantation fruit decreased.

Fruit (Production)

The volume of fruit produced in Fraser Coast Regional Council increased from 11,758 tonnes in 2000-01 to 12,921 tonnes in 2005-06. Plantation fruit (mostly pineapples) was the most significant fruit commodity in term of volume produced increasing from 10,278 tonnes in 2000-01 to 11,342 tonnes in 2005-06, accounting for 3.5% of production in Queensland. In 2005-06, there were 974 tonnes of nuts (mostly macadamias) produced in Fraser Coast Regional Council, accounting for 8.1% of Queensland production.

Fruit (Value)

In 2005-06, the total value of fruit in Fraser Coast Regional Council was $11.79 million including plantation fruit (mostly pineapples) ($5.57 million) and nuts (mostly macadamias) ($3.20 million). The value of nuts in Fraser Coast Regional Council accounted for 7.9% of the Queensland production by value.

Vegetables for Human Consumption (Area)

The total area occupied by vegetables for human consumption in Fraser Coast Regional Council increased from 138 hectares in 2000-01 to 157 hectares in 2005-06, accounting for less than 1% of the Queensland production area. Within Fraser Coast Regional Council, major vegetables for human consumption commodities in 2005-06, included:

- Pumpkins: 41 hectares;
- Zucchini and button squash: 40 hectares;
- French & runner beans: 20 hectares;
- Watermelons: 16 hectares; and
- Potatoes: 7 hectares.

Vegetables for Human Consumption (Production)

The volume of vegetables for human consumption produced in Fraser Coast Regional Council increased from 740 tonnes in 2000-01 to 1,611 tonnes in 2005-06, accounting for less than 1% of

Queensland production by value. Within Fraser Coast Regional Council, the major vegetables for human consumption commodities in 2005-06 included:

- Pumpkins: 602 tonnes;
- Zucchini and button squash: 287 tonnes;
- Potatoes: 163 tonnes;
- Eggplant: 148 tonnes; and
- French & runner beans: 131 tonnes.

Vegetables for Human Consumption (Value)

In 2005-06, the total value of vegetables for human consumption in Fraser Coast Regional Council was $2.92 million, accounting for less than 1% of Queensland production by value. Within Fraser Coast Regional Council, the major vegetables for human consumption commodities in 2005-06, included:

- Zucchini and button squash: $0.98 million;
- Pumpkins: $0.43 million;
- French & runner beans: $0.42 million;
- Mushrooms: $0.33 million; and
- Eggplant: $0.23 million.

2.5.3 Cropping

Crops

In Fraser Coast Regional Council, the only significant crop commodity in terms of both area and production was sugar cane. Sugar cane in Fraser Coast Regional Council occupied 10,923 hectares and produced 587,796 tonnes in 2005-06. The volume of sugar cane produced in Fraser Coast Regional Council decreased between 2000-01 and 2005-06. The value of sugar cane in 2005-06 was $16.46 million, accounting for 1.7% of Queensland production by value.

Summary

Within Fraser Coast Regional Council, the most significant commodities (by value) produced in 2005-06 were:

- Cattle and calves slaughtered: $19.47 million, or 0.5% of Queensland production by value;
- Sugar cane: $16.46 million, or 1.7% of Queensland production by value;
- Plantation fruit: $5.57 million, or 1.2% of Queensland production by value;
- Nurseries: $4.99 million, or 2.8% of Queensland production by value; and
- Nuts: $3.20 million, or 7.9% of Queensland production by value.

Although the aforementioned commodities were significant within Fraser Coast Regional Council, they contributed little to the Queensland production by value.

2.6 Implications for Commercial and Industrial Land Demand in Fraser Coast Regional Council

Fraser Coast Regional Council is characterised by a relatively mature population and low levels of labour force participation relative to regional and state averages. If the average age of the Fraser Coast region continues to increase, there could potentially be labour force shortages, particularly in regards to those occupations servicing the needs of the older non-working population (e.g. aged care services).

Within Fraser Coast Regional Council, the key population centres are Pialba, Maryborough Urban and Urangan. It is anticipated that a significant proportion of additional retail and commercial office floor space demand would be accommodated within these centres.

The business count data indicated that there were over 6,000 businesses within Fraser Coast Regional Council, with over half located within the former Hervey Bay local government area.

Agricultural production statistics indicated that the Fraser Coast region is not a significant contributor to Queensland production, suggesting that conflict between agricultural and industrial uses should be limited within the Fraser Coast region.

3 FRASER COAST PROPERTY MARKET OVERVIEW

3.1 Commercial Office & Retail Market Overview

To assess the "competitive market place" for commercial property in Fraser Coast Regional Council, typical market transactions sourced from the PDSLive and RPData property databases were analysed. Abnormalities such as intercompany transfers, transactions between family members and sales under duress were excluded from the analysis.

Contract dates were used for the assessment with transactions dating back to the 2000-01 financial year. Detailed field inspections have not been undertaken to verify individual sales records, although any obvious anomalies have been checked and details adjusted or removed from the data set as necessary.

Transactions were classified as:

- Commercial:
- – Professional Offices; and
- Retail:
- – Combined multi dwelling & shops;
- – Restaurant;
- – Retail warehouse;
- – Shopping group;
- – Shops – main retail;
- – Shops – secondary retail; and
- – Shops – single.

3.1.1 Annual Sales Value & Volume - Commercial Office

Database searches identified 89 commercial property sales in Fraser Coast Regional Council with a total value of approximately $69.03 million. Within Fraser Coast Regional Council, the majority of sales occurred in Maryborough (total value of $27.68 million) and Pialba (total value of $19.07 million).

The distribution of volume and value of commercial office sales in Fraser Coast Regional Council between 2000-01 and 2008-09 is summarised in Table 3.1.

Table 3.1: Volume and Value of Commercial Office Sales, Fraser Coast Regional Council, 2000-01 to 2008-09

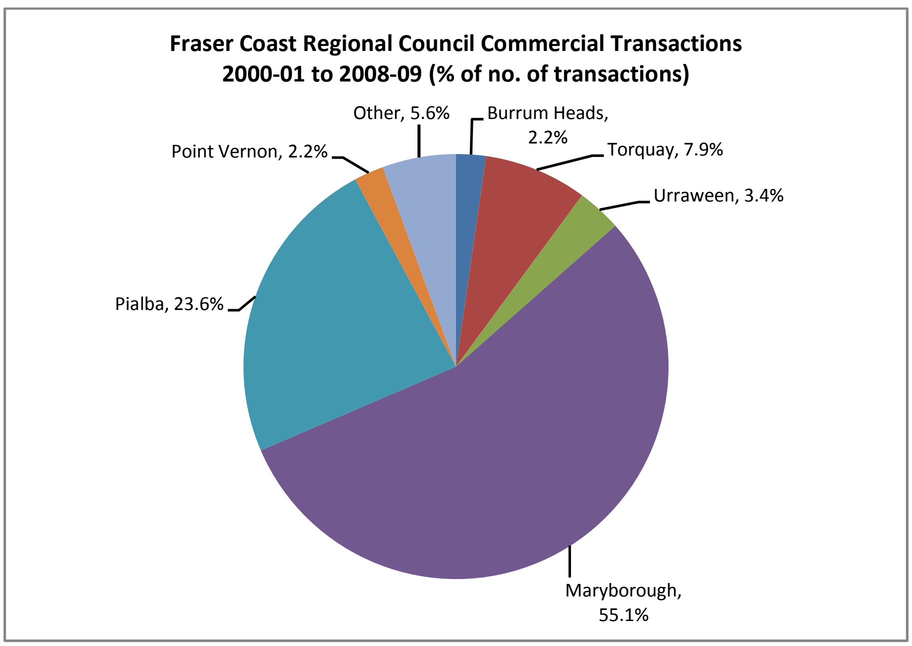
Precinct	Number of Sales	Total Value of Sales
Maryborough	49	$27,679,450
Pialba	21	$19,069,700
Torquay	7	$5,609,500
Urraween	3	$12,124,910
Burrum Heads	2	$660,000
Point Vernon	2	$1,795,000
Other Fraser Coast RC	5	$2,095,550
Total	**89**	**$69,034,110**

Source: Property Data Solutions

Maryborough accounted for over half the sales within Fraser Coast Regional Council between 2000-01 and 2008-09. Within Hervey Bay, Pialba accounted for 23.6% of commercial sales while Torquay accounted for 7.9% of sales.

Figure 3.1 below shows the commercial office transactions by locality for Fraser Coast Regional Council between 2000-01 and 2008-09.

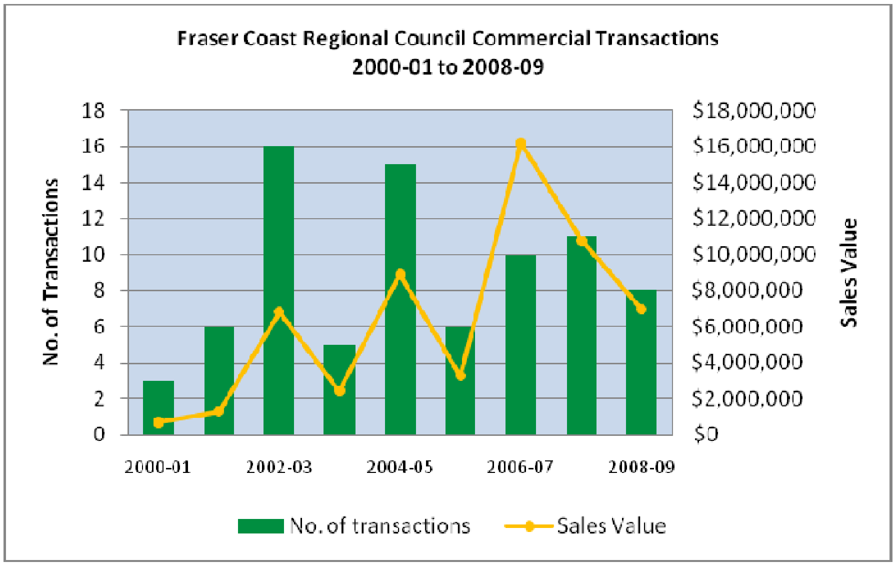
Figure 3.1: Commercial Office Transactions by Locality, Fraser Coast Regional Council, 2000-01 to 2008-09



Source: Property Data Solutions

Annual commercial office transactions in Fraser Coast Regional Council ranged between three sales (2000-01) and sixteen sales (2002-03) (Refer to Figure 5.2). The total value of sales in Fraser Coast Regional Council peaked in 2006-07 at $16.21 million before decreasing to $6.96 million in 2008-09.

Figure 3.2: Volume and Value of Commercial Transactions, Fraser Coast Regional Council, 2000-01 to 2008-09

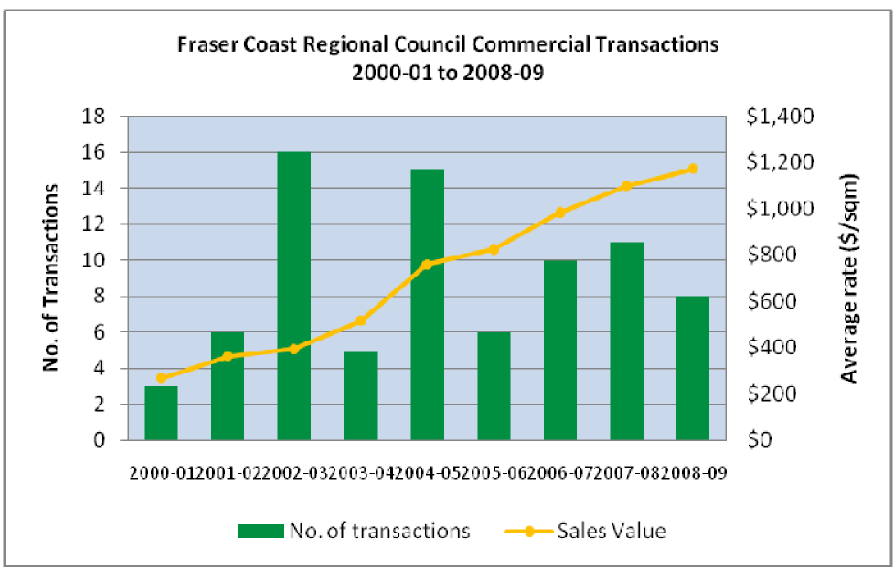


Source: Property Data Solutions

The average commercial office sales price per square metre in Fraser Coast Regional Council increased from $269/m^2 in 2000-01 to $1,173/m^2 in 2008-09. The largest increase in the average sales price per square metre was recorded between 2003-04 and 2004-05 (47.1%).

Figure 3.3 below shows the volume and average sales price per square metre of commercial offices sales in Fraser Coast Regional Council between 2000-01 and 2008-09.

Figure 3.3: Volume and Average Sales Price Per Square Metre, Commercial, Fraser Coast Regional Council, 2000-01 to 2008-09



Source: Property Data Solutions

3.1.2 Annual Sales Value & Volume – Retail

Database searches identified 260 retail sales in Fraser Coast Regional Council (refer to Table 3.2) with a total value of approximately $130.36 million. Within Fraser Coast Regional Council, the most significant localities in terms of the volume of transactions were Maryborough (total value of $32.69 million), Pialba (total value of $26.27 million), Torquay (total value of $23.29 million), Scarness (total value of $8.51 million) and Urangan (total value of $11.10 million).

Table 3.2: Volume and Value of Retail Sales, Fraser Coast Regional Council, 2000-01 to 2008-09

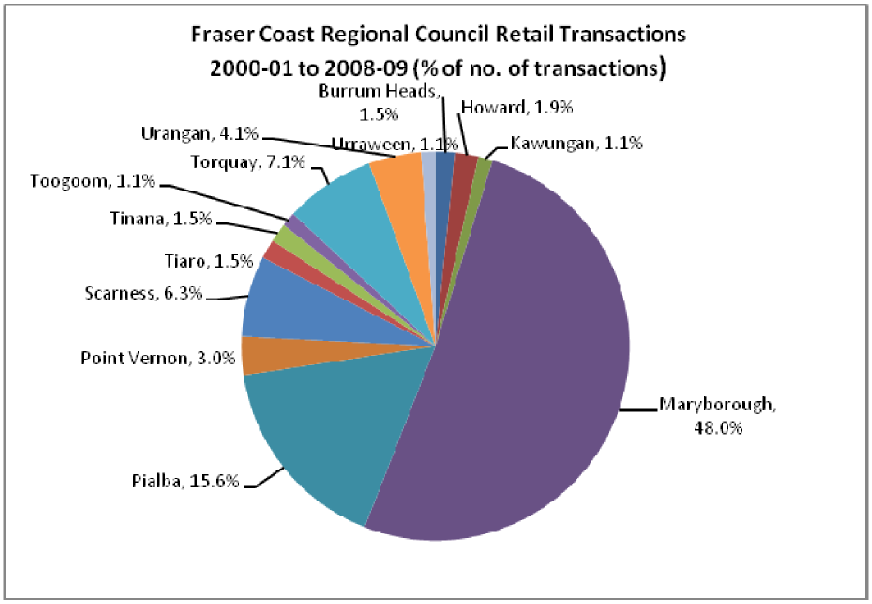
Precinct	Number of Sales	Total Value of Sales
Maryborough	123	$32,685,700
Pialba	41	$26,274,728
Torquay	19	$23,294,000
Scarness	17	$8,508,750
Urangan	11	$11,100,000
Point Vernon	8	$5,925,000
Howard	5	$1,045,000
Burrum Heads	4	$2,804,000
Tiaro	4	$785,000
Tinana	4	$1,651,500
Kawungan	3	$1,390,000
Toogoom	3	$2,458,600
Other Fraser Coast RC	18	$12,434,000
Total	**260**	**$130,356,278**

Source: Property Data Solutions

In Fraser Coast Regional Council, Maryborough accounted for approximately 47.3% of retail transactions. In Hervey Bay, Pialba accounted for 15.8% of sales, Torquay for 7.3% of sales and Urangan for 4.2% of sales.

Figure 3.4 below shows retail transactions by locality for Fraser Coast Regional Council between 2000-01 and 2008-09.

Figure 3.4: Retail Transactions by Locality, Fraser Coast Regional Council, 2000-01 to 2008-09

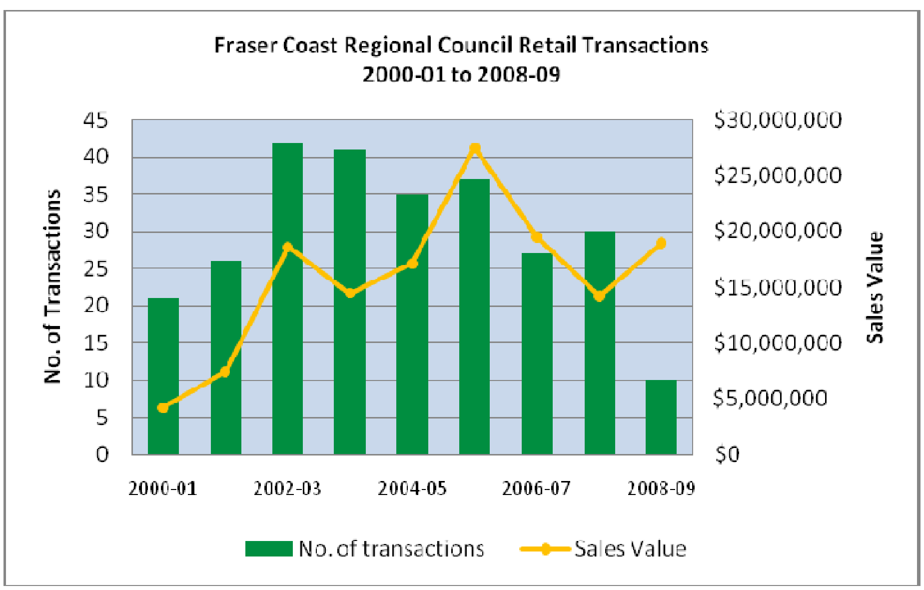


Source: Property Data Solutions

Retail transactions in Fraser Coast Regional Council fluctuated between ten sales (2008-09) and 42 sales (2002-03). The total value of retail sales peaked in 2005-06 at approximately $27.50 million.

Figure 3.5 below shows the volume and value of retail transactions in Fraser Coast Regional Council between 2000-01 and 2008-09.

Figure 3.5: Volume and Value of Retail Transactions, Fraser Coast Regional Council, 2000-01 to 2008-09

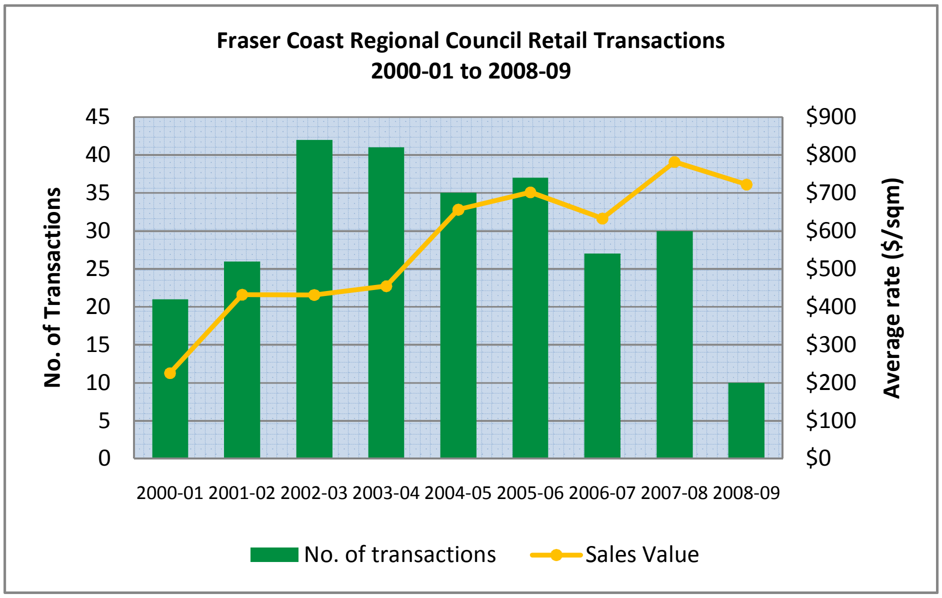


Source: Property Data Solutions

Between 2000-01 and 2008-09, there was an upwards trend in the average retail sales price per square metre in Fraser Coast Regional Council. The average retail sales price per square metre almost doubled from 2000-01 ($226/m^2) to 2002-03 ($433/m^2). The average retail sales price per square metre peaked in 2007-08 at $782/m^2, before decreasing to $722/m^2 in 2008-09.

Figure 3.6 below shows the volume and average sales price per square metre of retail sales in Fraser Coast Regional Council between 2000-01 and 2008-09.

Figure 3.6: Volume and Average Sales Price Per Square Metre, Retail, Fraser Coast Regional Council, 2000-01 to 2008-09



Source: Property Data Solutions

3.2 Industrial Land Market Overview

To assess the "competitive market place" for industrial land in Fraser Coast Regional Council, typical market transactions sourced from the PDSLive and RPData property databases were analysed. Abnormalities such as intercompany transfers, transactions between family members and sales under duress were excluded from the analysis.

Contract dates were used for the assessment with transactions dating back to the 2000-01 financial year. Detailed field inspections have not been undertaken to verify individual sales records, although any obvious anomalies have been checked and details adjusted or removed from the data set as necessary.

Transactions classified as 'industrial' include all zonings identified as relevant to industrial uses. This includes a wide range of industry, light industry, general industry, commercial industry, low impact industry, medium industry, heavy industry, service industry and noxious / offensive / hazardous industry zonings and their variations across the five current regional council areas and the various pre-March 2008 local government authorities that make up these regions.

It is worth noting that for some of the smaller pre-March 2008 local government authorities, zoning and land use descriptors are incomplete or ambiguous. While every effort has been made to include industrial related property from these areas in the analysis, it is likely that some of this data has been unintentionally excluded. The impacts on the overall analysis, however, are likely to be minimal as the affected localities are small and contain little industrial property.

Transactions were classified as either unserviced allotments, serviced vacant industrial allotments or serviced and developed industrial allotments. A number of encumbered allotments have also been identified in the analysis. The definitions for each allotment type are as follows:

- *Unserviced allotments*: Large vacant and improved home sites with an industrial zoning although with an existing residential use (land use classifications Large Homesite - Vacant and Large Homesite - Dwelling).
- *Serviced vacant industrial allotments*: Serviced vacant industrial allotments ranging from smaller sized service and light industry zoned allotments to larger general industry zoned allotments (land use classification Vacant Urban Land). Note that some adjustments have been made to transactions initially identified as unserviced industrial allotments based on the land prices achieved.
- *Serviced and developed industrial allotments*: Improved allotments with land uses such as strata industrial units, warehouse and bulk stores, manufacturing plants, transport depots and light industry.
- *Encumbered allotments*: Improved allotments with land uses such as single unit dwellings, retail activities, multiple unit dwellings and hotels/taverns.

3.2.1 Annual Sales Volumes and Value

Database searches identified 614 relevant transactions across Fraser Coast Regional Council from 2000-01 to 2008-09. This represented $216.552 million worth of investment. Given the time between contract date and settlement data and delays in details subsequently being entered into government databases, it is likely that some data for 2008-09 would have been outstanding at the time the data was collated. It has been assumed, however, that the data presented for 2008-09 covers a majority of the year and is representative of market conditions.

Of the 614 relevant transactions in the Fraser Coast Regional Council, Hervey Bay and Maryborough were the dominant markets. In Hervey Bay, most activity occurred in Pialba (162 transactions), Urangan (147 transactions) and the Dundowran area (58 transactions).

In Maryborough, 116 transactions were recorded in the Central Maryborough area, with 31 in Granville, 29 in Maryborough West and 19 in Tinana.

The distribution of the volume and value of industrial land sales in Fraser Coast Regional Council between 2000-01 and 2008-09 is summarised in Table 3.3.

Table 3.3: Volume and Value of Industrial Land Sales, Fraser Coast Regional Council, 2000-01 to 2008-09

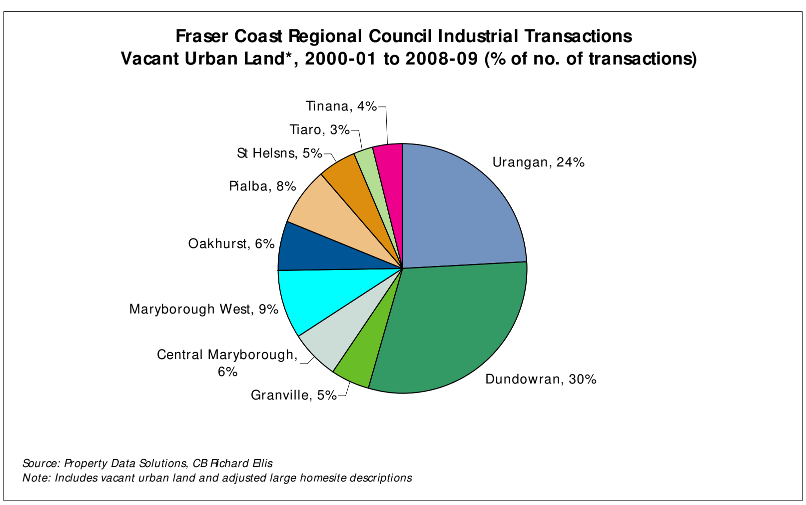
Precinct	Number of Sales	Total Value of Sales
Pialba	162	$84,601,835
Urangan	147	$47,394,618
Central Maryborough	116	$29,478,653
Dundowran	58	$27,077,009
Granville	31	$7,189,000
Maryborough West	29	$7,391,952
Oakhurst	20	$1,942,950
Tinana	19	$6,583,300
St Helens	13	$1,874,900
Tiaro	13	$1,507,000
Other Fraser Coast RC	6	$1,511,000
Total	**614**	**$216,552,217**

Less than 10% of sales (46) were classified as unserviced allotment sales. These sales covered 64.6 hectares of land area. Sales were predominately located in the Dundowran area in Hervey Bay (17) with eight sales identified in Urangan (also in Hervey Bay) and six in St Helens (in Maryborough).

The turnover of serviced vacant allotments has also been modest. A total of 79 sales were identified over the 2000-01 to 2008-09 period generating $19.780 million worth of investment. The sales covered 27.4 hectares of actual land area. Over half of the identified sales were in two locations in Hervey Bay, these being Dundowran (24 sales) and Urangan (19 sales).

Figure 3.7 below summarises the distribution of vacant urban land transactions by locality in Fraser Coast Regional Council in the 2000-01 to 2008-09 period.

Figure 3.7: Vacant Urban Land Transactions by Locality, Fraser Coast Regional Council, 2000-01 to 2008-09

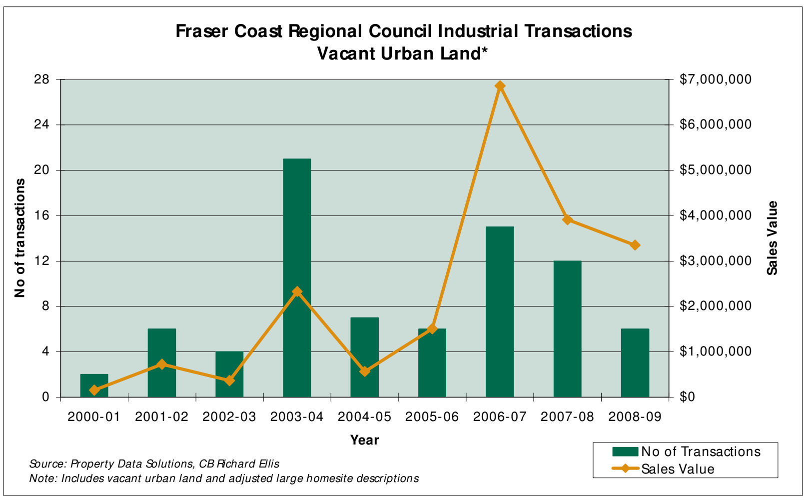


Vacant urban land sales volumes in Fraser Coast Regional Council were highest in 2003-04, with 21 sales identified, including 13 in the Urangan area. Less than 15 sales were recorded in all other years in the 2000-01 to 2008-09 period.

Dundowran has been most active in terms of sales volumes since 2006-07. In Dundowran, rates per square metre ranged from $20/m^2$ to $50/m^2$ on average from 2001-02 to 2004-05 before steadily increasing each year and reaching an average of $107/m^2$ in 2008-09.

Figure 3.8 below summaries the volume and value of urban land transactions in Fraser Coast Regional Council between 2000-01 and 2008-09.

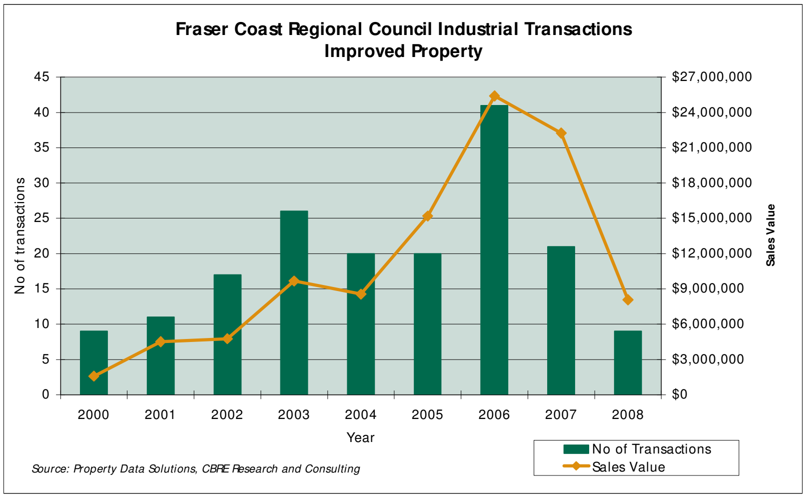
Figure 3.8: Volume and Value of Vacant Urban Land Transactions, Fraser Coast Regional Council, 2000-01 to 2008-09



A total of 174 sales of serviced and developed property with industrial zonings were identified in Fraser Coast Regional Council over the 2000-01 to 2008-09 period, totalling just over $100 million worth of investment activity. Sales volumes reduced significantly in 2008-09, to nine transactions, falling from a peak of 41 sales in 2006-07. The reduced number of sales since 2006-07 largely reflects the impacts of the global economic downturn on property since late 2007.

Figure 3.9 below summaries the volume and value of improved property transactions in Fraser Coast Regional Council between 2000-01 and 2008-09.

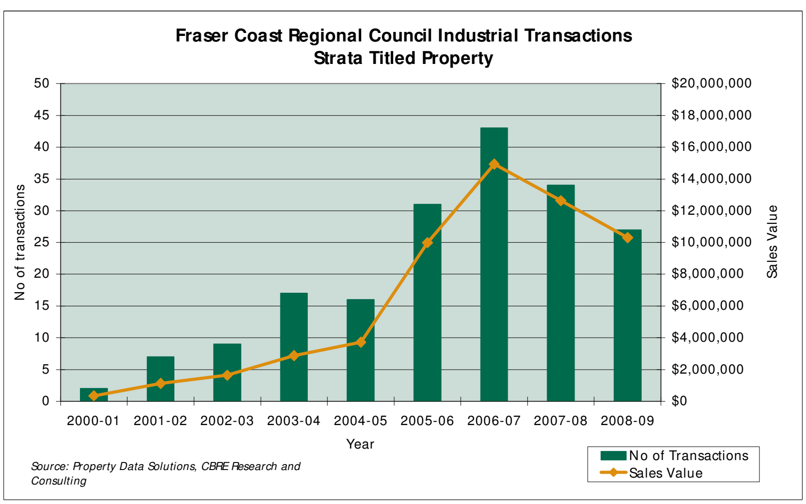
Figure 3.9: Volume and Value of Improved Property Transactions, Fraser Coast Regional Council, 2000-01 to 2008-09



There were 186 strata titled sales in Fraser Coast Regional Council between 2000-01 and 2008-09, with a total value just over $57.6 million. In Hervey Bay, Pialba (99) and Urangan (79) were the dominant localities. Activity increased steadily from almost no sales in 2000-01 and peaked in the 2006-07 financial year at 43 sales, but has eased in the two subsequent years, although not to the same extent as for improved property transactions, suggesting demand remains for this industrial property type.

Figure 3.10 below summaries the volume and value of strata titled property transactions in Fraser Coast Regional Council between 2000-01 and 2008-09.

Figure 3.10: Volume and Value of Strata Titled Property Transactions, Fraser Coast Regional Council, 2000-01 to 2008-09



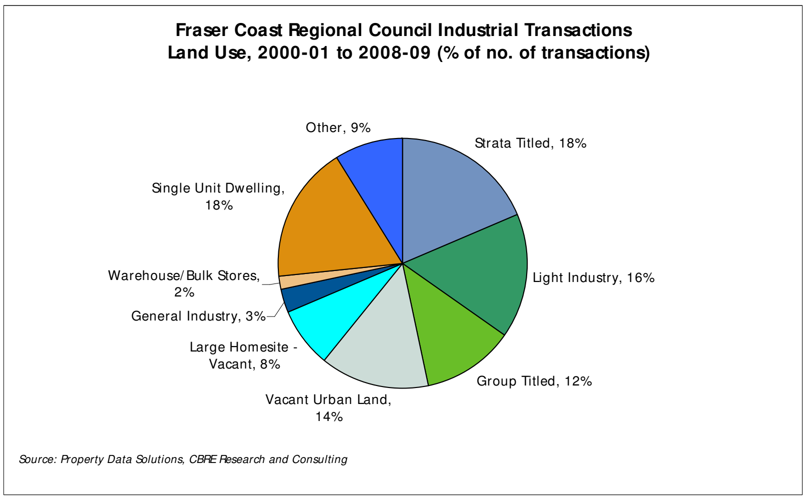
There were 129 encumbered sales, with the majority occupied by single unit dwellings, predominately in the Central Maryborough area.

3.2.2 Land Use

Properties described as strata titled under a building unit plan were the most common property to change hands over the 2000-01 to 2008-09 study period, accounting for 18% of sales. Single unit dwellings (18%) and light industry (16%) were the next most common property types. Property identified as vacant urban land made up 14% of transactions with a further 8% classified as large homesite – vacant.

Figure 3.11 below summaries industrial transactions by land use in Fraser Coast Regional Council between 2000-01 and 2008-09.

Figure 3.11: Industrial Transactions by Land Use, Fraser Coast Regional Council, 2000-01 to 2008-09



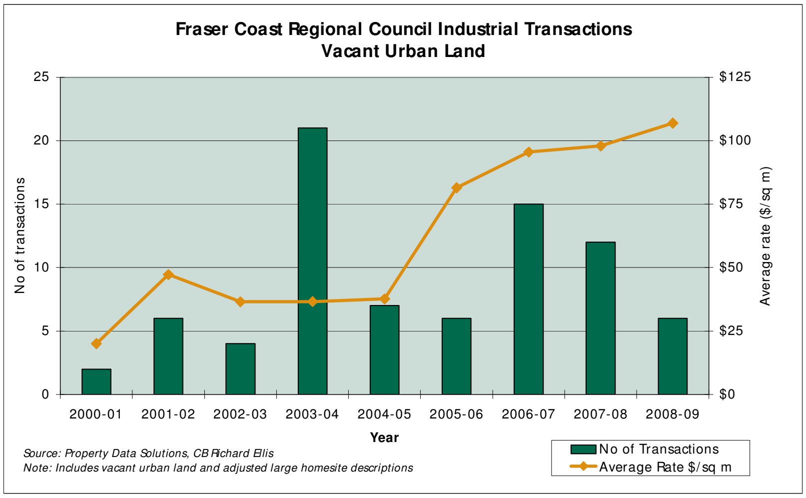
3.2.3 Land Prices

Average rates per square metre for serviced vacant urban land allotments with industrial zonings across the area changed little during the three years from 2002-03 to 2004-05. Thereafter, prices have shown a solid upward trend.

Average rates per square metre for serviced vacant industrial allotments sold between 2001-02 and 2004-05 were between $20/m^2 and $50/m^2 Since then, prices have risen each year and reaching an average of $107/m^2 in 2008-09. Rates as high as $143/m^2 were achieved in Dundowran.

Figure 3.12 summarises the volume and average sales price per square meter for vacant urban land in Fraser Coast Regional Council between 2000-01 and 2008-09.

Figure 3.12: Volume and Average Sales Price Per Square Metre, Vacant Urban Land, Fraser Coast Regional Council, 2000-01 to 2008-09



4 EXISTING CENTRES NETWORK

Leyshon Consulting's 2009 study of the retail hierarchy in the former Hervey Bay LGA observed that Hervey Bay did not have a clearly dominant shopping centre or retail precinct. Both the Boat Harbour Drive precinct and Pialba Place operated as the two dominant, albeit different, centres in Hervey Bay.

This situation has been further complicated by the incorporation of the former Maryborough LGA into Fraser Coast Regional Council. Maryborough itself is a significant retail centre containing some 55,000m^2 of retail floorspace. As discussed later in this report, the extent of floorspace in Maryborough is actually greater than that found in the Pialba precinct and not significantly less than that found in the Boat Harbour Drive precinct in Hervey Bay.

In terms of commercial office floor space provision, Maryborough is the major centre within Fraser Coast, with an estimated 36,800m^2 of floorspace. Significant occupied commercial office floorspace was also identified in Pialba Place (21,600m^2), although a further 4,100m^2 of commercial office floor space was identified as vacant.

Table 4.1 below provides a summary of the existing retail and commercial centres hierarchy in Fraser Coast Regional Council.

Table 4.1: Fraser Coast Regional Council Retail / Commercial Centre Hierarchy, 2010

Centre	Retail floorspace (m^2)	Commercial Office floorspace (m^2)	Vacant floorspace (m^2)	Major Tenants
Major				
Pialba Place	30,000	21,600	5,063	Big W, Woolworths, Coles, Officeworks
Boat Harbour Drive	69,000	8,600	3,600	Target, Supa IGA, ALDI, Bunnings
Maryborough	55,700	36,800	3,832	Big W, Coles, Woolworths, ALDI, Bi Lo
District				
Urangan	5,000	1,200	0	Woolworths
Eli Waters	11,500	100	55	Woolworths, Harvey Norman
Specialist				
Scarness	3,200	3,200	85	Foodworks
Torquay	9,100	4,300	50	Foodworks, IGA Express, Betta Electrical
Urangun	1,800	Neg.		
Local				
Tiaro	725	neg.	0	Foodworks
Burrum Heads	850	neg.	20	-
Craignish	650	neg.	0	Foodworks
Kawangan	600	neg.	0	Foodworks
Howard	950	neg.	25	-
Tinana	1,200	neg.	0	Foodworks
Point Vernon	450	neg.	0	-
River Heads	1,100	neg.	40	-
Torquay	950	neg.	0	Foodworks

Note: The commercial floor space estimate for Pialba Place excludes the 2,587m^2 commercial office yet to be constructed.
Source: Urbis (2009), Leyshon Consulting and Economic Associates surveys, 2010

4.1 Major Centres

4.1.1 Pialba Place

The Pialba Place precinct includes retailing along Main Street and Torquay Road as well as two significant semi-enclosed retail centres–namely Pialba Place and Bay Plaza. This area is depicted in Figure 4.1.

The Pialba Place centre contains some 15,000m^2 of retail floorspace and is anchored by a Big W discount department store (DDS) and Coles supermarket.

Immediately to the east of Pialba Place is the Bay Plaza shopping centre which is anchored by a Woolworths supermarket. Bay Plaza has recently undergone an upgrade and contains some 6,000m^2 of retail floorspace.

Main Street and Torquay Road contain about 8,000m^2 of strip-style retailing. There are no significant anchor tenants in this area. The recent addition of an Officeworks store on Torquay Road is as close as this area comes to having an anchor tenant.

There was an estimated 21,600m^2 of occupied commercial office floorspace within the Pialba Place precinct, with health care & social assistance businesses accounting for a significant proportion of total floor space. An estimated 4,100m^2 of commercial office floor space was identified as vacant along Torquay Road and Main Street. In addition to the existing 25,700m^2 of commercial office floor space (occupied and vacant), there was a vacant site on Torquay Road with 2,587m^2 of commercial office to be constructed, with most tenancies leased or sold at the time the inventory was conducted.

Although the Pialba Place precinct is relatively close to retailing along Boat Harbour Drive, the intensity of retail activities along Main Street, which links Pialba Place to Boat Harbour Drive, diminishes substantially to the south of the Old Maryborough Road. This means that Pialba Place is not connected with Boat Harbour Drive by a continuous retail precinct. Moreover, the distance between the two main retail nodes of Pialba Place and Boat Harbour Drive is considerable–about 900 metres. This is beyond normally acceptable walking distances having regard to Queensland's subtropical environment.

That part of Main Street between Old Maryborough Road and Boat Harbour Drive is principally a commercial precinct and it is notable that the Bendigo Bank has recently opened new premises in the area.

For these reasons it is our opinion that local residents are likely to regard Pialba Place as being quite a separate retail destination to Boat Harbour Drive. In May 2010 Pialba Place had vacant retail floorspace of only some 969m^2. This represents a vacancy rate of only 3.2% which is considered quite low.

In our experience vacancy rates of up to 5% are considered low. Vacancy rates above 10% are high and are usually regarded as a cause for some concern.

4.1.2 Boat Harbour Drive

The Boat Harbour Drive precinct contains both traditional and bulky goods or showroom-style retailing.

The most dominant individual retail centre in this precinct is the former Centro Hervey Bay (now Stocklands) which contains 15,582m^2 of retail and related floorspace. Centro Hervey Bay is anchored by a Target DDS and an IGA supermarket. Council has approved the expansion of the centre by a further 18,430m^2 of floorspace. The proposed expansion is to include a new Kmart DDS, an expansion of the existing Target DDS, a new Coles supermarket, additional mini-majors, a further 6,590m^2 of retail floorspace and 2,988m^2 of non-retail specialties.

When complete the total floor area of the expanded centre will be 37,543m^2 making it the single largest retail centre within the Fraser Coast area.

Adjacent to Stocklands Hervey Bay is a mixed use centre known as Bay Central. Bay Central contains around 7,500m^2 of retail/commercial floorspace. Its major retailers include Retrovision and Captain Snooze. The centre is notable, however, for containing representation by all of the major banks namely Commonwealth, ANZ, NAB, Westpac and Suncorp, a wide range of financial service providers and a post office.

The owners of Bay Central lodged an application with Council to add a further 3,000m^2 of retail floorspace to the centre. This was subsequently approved.

On the opposite or northern side of Boat Harbour Drive is a series of showroom developments with the main focus being a development known as the Pialba Commercial Centre. This centre contains some 12,000m^2 and accommodates a number of showroom retailers including Supa Cheap Auto, The Good Guys, Fantastic Furniture, Beacon Lighting and a cinema complex. Other retail tenants in this precinct include BCF (Boating, Camping and Fishing), Drummond Golf and Dick Smith.

The Boat Harbour Drive precinct also contains two freestanding stores–Bunnings and ALDI–as well as a small supermarket-anchored shopping centre of about 1,900m^2 known as Fraser Shores Shopping Centre. In total, including bulky goods floorspace, the Boat Harbour Drive precinct contains in the order of 60,000m^2 of retail floorspace.

Our survey undertaken in May 2010 found the Boat Harbour Drive precinct had vacant retail floorspace of some 3,600m^2. The majority of this was found in the showroom/retail precincts rather than the Centro centre or Fraser Shores. The overall vacancy rate was 5.2% which is considered relatively low given that vacancy rates well in excess of 10% have existed in this precinct in the past.

There was an estimated 8,600m^2 of commercial office floor space within the Boat Harbour Drive precinct, with health care & social assistance and financial & insurance services the dominant tenancy type.

4.1.3 Maryborough

The Maryborough CBD contains sub-regional-scale retailing which extends over a significant area equivalent to nine city blocks. The centre contains two enclosed centres–namely Station Square and Maryborough Plaza which anchor the north-western and south-eastern ends of the CBD area respectively.

Commercial office tenancies were located within both the Maryborough Commercial Centre Core and Maryborough City Remainder zone, with activity located on Bazaar, Ellena, Kent, March, Richmond, Sussex, Wharf, Alice, Ferry and Lennox Streets. Health care & social assistance and public & administrative services were the key commercial office sectors within Maryborough, together accounting for over half of all commercial office floor space.

A number of government agencies are located within Maryborough, including Emergency Services (North Coast Regional office), the Fraser Coast Regional Council Administration Centre, Education Queensland, the Department of Employment, Economic Development & Innovation (DEEDI), Corrective Services and the Department of Housing.

Station Square is a sub-regional shopping centre of 16,500m^2 anchored by a Big W and a Bi-Lo supermarket. The centre was developed on former rail yards and is somewhat disconnected from the balance of the Maryborough CBD.

Two applications has been lodged with Council to significantly expand Station Square.. The first application envisages the addition of a Target DDS, the expansion of the existing Bi Lo and its conversion to Coles, and additional specialty floorspace. In total this application would add 6,970 sq.m to the centre.

The second application includes a 4 storey business centre, a Woolworths supermarket, an expansion of the Big W DDS, additional mini-majors and additional specialties. This application would expand the centre by 15,100 sq.m.

Maryborough Plaza is located on the southern fringe of the Maryborough CBD and contains some 6,000m^2 of retail floorspace. The centre has two supermarkets namely a Food-for-Less and a Foodworks. At the time of preparation of this Report the centre had significant vacancies of some 1,500m^2 (25%). The actual vacancy rate in fact may be higher than this estimate as a number of the tenants in the shopping centre appear to be marginal in nature and are likely to be on short-term tenancy agreements. It is fair to say that Maryborough Plaza is run down and in urgent need of refurbishment.

Elsewhere in the CBD there are two supermarkets–namely Woolworths on the corner of Adelaide and Sussex Streets, in addition to a small ALDI supermarket (348 Alice Street).

There is also a significant component of retailing in the CBD on Kent and Adelaide Streets. In total vacancies of some 2,218m^2 exist in these areas with the extent of vacancies increasing with the distance from Station Square.

Overall the vacancy rate for Maryborough CBD was around 6.7%. While this was the highest of any centre in Fraser Coast area, is not at a level which gives rise to particular concern.

4.2 District Centres

There are two district centres within the Fraser Coast, namely Urangan Central and Eli Waters. Both centres are distinguished from other lower order centres by virtue of the fact they contain full-line supermarkets.

Urangan Central primarily serves residents of the eastern parts of Hervey Bay. It contains some 5,000m^2 of retail floorspace and is anchored by a Woolworths supermarket of 3,400m^2. The centre also contains a Woolworths/Caltex Petrol Station and is well located on the sub-arterial road network in Hervey Bay. The centre has no vacancies and does not appear to have substantial capacity for expansion.

Within Urangan, an estimated 1,200m^2 of commercial office floor space was identified along The Esplanade and within Urangan Central.

The Eli Waters centre contains some 5,500m^2 and is located on the western urban fringe of Hervey Bay. Following a period of unsuccessful trading Eli Waters was redeveloped in 2007 with the inclusion of a Woolworths supermarket.

Adjacent to the Eli Waters centre is a small bulky goods precinct containing a Harvey Norman store and Forty Winks. There appears to be limited capacity for expansion of Eli Waters. This is regarded as an important issue because effectively at present Eli Waters provides retail services, not only to residents of the surrounding area but also those along the coastal strip extending to the west of Hervey Bay.

At the time of preparation of this report Eli Waters only had one small vacant shop of approximately 55m^2.

4.3 Specialist Centres

The centres of Scarness and Torquay in Hervey Bay are atypical as far as traditional retail hierarchies are concerned. Both centres are relatively significant in floorspace terms. Scarness accommodates around 3,600m^2 of retailing while Torquay contains some 9,000m^2. Both centres also contain a considerable component of non-retail commercial floorspace.

Although neither centre contains a major supermarket (both have small Foodworks/IGA stores) they have a very substantial component of restaurants, cafés and other clothing and homewares retailers oriented toward the tourist and visitor market.

Scarness and Torquay owe their character to their beachside location. Both centres also contain significant components of contemporary residential development which further distinguishes them from other centres within the retail hierarchy in the Fraser Coast.

In May 2010 both centres contained very limited vacancies namely 85m^2 in Scarness and 50m^2 in Torquay.

A small specialist centre also exists at Urangan adjacent to the Peppers Resort and beneath the Sporties Club. The centre only contains some 1,800 sq.m spread over Charlton Esplanade and Pier Street. This precinct has no major anchor tenant.

Similarly, a small cluster of tourist orientated retail uses is located at Boat Harbour.

4.4 Local Centres

There are also a number of small local/neighbourhood centres within the Fraser Coast region which essentially provide a limited convenience service for residents of these areas and tourists/visitors staying in caravan parks and the like. Such centres are found at Torquay (Bideford Street), Burrum Heads, River Heads, Craignish, Tiaro, Kawungan (corner Main Street and Doolong Roads), Point Vernon, Howard, Tinana and Dundowran (refer to Table 4.1). These centres usually contain less than 1,200m^2 of retail floorspace.

A survey conducted by Leyshon Consulting in May 2010 indicated that these centres have very few vacancies. These centres also had very limited commercial office activity.

Overall, the current system of centres in the Fraser Coast Region appears to be operating successfully with vacancy rates relatively low. Where such vacancies are evident they are usually on the margin of centres or are in space which is either old and/or requires refurbishment to bring it up to acceptable contemporary retailing standards.

5 EXISTING INDUSTRIAL AREAS

Within Fraser Coast Regional Council, there were a number of industrial areas identified with an estimated 216 industrial businesses. The most significant industrial sectors were the large footprint & general industry (11.6% of allotments) and service industry (8.0% of allotments) sectors. Major industrial sub-sectors were repair & maintenance (4.2% of allotments), fabricated metal product manufacturing (3.6% of allotments), wood product manufacturing (3.4% of allotments), construction (2.9% of allotments) and basic material wholesaling (2.5% of allotments).

Within Fraser Coast there were 389.49 hectares of vacant land identified, approximately 76% of which is considered developable. Generally there was not a high level of infiltration of industrial areas by non-industrial commercial use. However, there were a significant number of remnant houses in various industrial areas.

The inventory presented below excludes Maryborough's Marine Precinct (36 hectares) and the Owanyilla Industrial Estate (approximately 108 hectares), as these are both special opportunity areas and not suitable for general industrial requirements.

5.1 Maryborough

5.1.1 Maryborough

The Maryborough industrial area is located next to the Mary River and has an estimated 54 industrial businesses. The most significant industrial sectors within the Maryborough industrial area were the large footprint & general industry (8.0% of allotments) and service industry (6.4% of allotments) sectors. Major industrial sub-sectors within the industrial area included repair & maintenance (5.2% of allotments), wood product manufacturing (2.4% of allotments), fabricated metal product manufacturing (2.0% allotments) and water transport (2.0% of allotments).

Within Maryborough industrial area there were 108.72 hectares of vacant land identified, approximately 70% of which is developable.

5.1.2 Maryborough West

The Maryborough West industrial area is located to the north-west of the Maryborough city centre and to the east of the Mary River. The industrial area had an estimated 41 industrial businesses including large footprint & general industry (24.8% of allotments) and warehousing & storage (8.6% of allotments) enterprises. Major industrial sub-sectors in the Maryborough West industrial area included wood product manufacturing (10.5% of allotments), fabricated metal product manufacturing (7.6% of allotments) and basic material wholesaling (4.8% of allotments). Within the industrial area there were 127.00 hectares of vacant land identified, approximately 55% of which is considered developable.

5.1.3 Tinana

Tinana is located in Maryborough to the west of the city centre and south of the Mary River. There were an estimated 27 industrial businesses identified within Tinana industrial area with major industrial sub-sectors including fabricated metal product manufacturing (8.1% of allotments), repair & maintenance (8.1% of allotments) and road transport (8.1% of allotments). There were 4.82 hectares of vacant land identified, including 4.14 hectares of developable vacant land.

5.1.4 Granville

The Granville industrial area is located to the west of the Maryborough city centre and had an estimated five industrial businesses. Industrial uses within the Granville industrial area included two wood product manufacturing businesses and one each of construction services, repair & maintenance and water transport businesses. There were 12.33 hectares of vacant land identified, with 11.87 hectares considered developable.

5.1.5 Oakhurst

Oakhurst industrial area is located to the west of the Maryborough West industrial area with businesses on Precision Drive, Maryborough-Biggenden Road and Quarry Road. Located within the Oakhurst industrial area were two fabricated metal product manufacturing businesses and one each of polymer product manufacturing, repair & maintenance and motor vehicle & motor vehicle parts wholesaling businesses. Within Oakhurst industrial area there was 1.05 hectares of developable vacant land identified.

5.1.6 St Helens

The St Helens industrial area is located to the north of Maryborough and included businesses located on Gladys Street, Saltwater Creek Road, Phillip Court and Lucas Court. Businesses within the St Helens industrial area were either wholesale businesses (five businesses) or retail businesses (two businesses). There were 2.29 hectares of developable vacant land identified within the St Helens industrial area.

5.2 Hervey Bay

5.2.1 Urangan

The Urangan industrial area is located to the north-east of Hervey Bay and has an estimated 45 industrial businesses. The most significant industrial sectors in the Urangan industrial area were the large footprint & general industry (13.9% of allotments) and service industry (10.9% of allotments) sectors. There were a relatively high proportion of non-industrial commercial uses in the Urangan industrial area, compared with the other industrial areas within Fraser Coast Regional Council. There were 36.52 hectares of vacant land identified within the industrial area, nearly all of which was considered developable.

5.2.2 Dundowran

The Dundowran industrial area is located to the north of Hervey Bay and to the west of Urangan and has an estimated 29 industrial businesses. The most significant industrial subsectors in the Dundowran industrial area were construction services (9.1% of allotments), basic material wholesaling (4.5% of allotments) and fabricated metal product manufacturing (3.6% of allotments). The Dundowran industrial area had a high proportion of non-industrial commercial uses relative to the other industrial areas within Fraser Coast Regional Council. There were 73.88

hectares of vacant land within the industrial area, including 70.94 hectares of developable vacant land.

5.2.3 Howard

The Howard industrial area is located to the north of Maryborough and includes Howard Motor Repairs on William Street and Howard Sawmill and a landscaping business on Old Bruce Highway.

5.2.4 Eurong

The Eurong industrial area is located on Fraser Island and is occupied by the Fraser Coast Regional Council Waste Transfer Station.

5.3 Woocoo

5.3.1 Brooweena

The Brooweena industrial area is located to the west of Maryborough and includes two wood product manufacturing businesses and the council depot. There were 5.24 hectares of vacant land identified within Brooweena industrial area, including 4.07 hectares of developable vacant land.

5.3.2 North Aramara

The North Aramara industrial area is located to the west of Maryborough and has 1.60 hectares of vacant land including, 1.48 hectares of developable vacant land.

5.3.3 Tiaro

The Tiaro industrial area is located to the south of Maryborough and has limited industrial activity. There were 16.06 hectares of developable vacant land identified within the Tiaro industrial area.

Table 5.1: Existing Industrial Land within Fraser Coast Regional Council

Industry	Maryborough		Maryborough West		Tinana		Granville		Oakhurst		St Helens		Urangan		Dundowran		Howard		Brooweena		Tiaro		Fraser Coast RC	
	no.	% o total	no.	% of total	no.	% of total	no.	% of total	no.	% of total	no.	% of total	no.	% o total	no.	% of total	no.	% of total	no.	% of total	no.	% of total	no.	% of total
Large Footprint & General Industry																								
Beverage & Tobacco Product Mfg	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%
Food Product Mfg	1	0.4%	2	1.9%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	3	2.2%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	6	0.8%
Wood Product Mfg	6	2.4%	11	10.5%	1	1.6%	2	10.0%	0	0.0%	0	0.0%	3	2.2%	0	0.0%	1	33.3%	2	40.0%	0	0.0%	26	3.4%
Pulp, Paper & Converted Paper Product Mfg	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%
Petroleum & Coal Product Mfg	1	0.4%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	1	0.7%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	2	0.3%
Basic Chemical & Chemical Product Mfg	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%
Polymer Product & Rubber Product Mfg	0	0.0%	0	0.0%	0	0.0%	0	0.0%	1	5.6%	0	0.0%	1	0.7%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	2	0.3%
Non-Metallic Mineral Product Mfg	1	0.4%	1	1.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	4	2.9%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	6	0.8%
Primary Metal & Metal Product Mfg	2	0.8%	2	1.9%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	2	1.5%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	6	0.8%
Fabricated Metal Product Mfg	5	2.0%	8	7.6%	5	8.1%	0	0.0%	2	11.1%	0	0.0%	3	2.2%	4	3.6%	0	0.0%	0	0.0%	0	0.0%	27	3.6%
Transport Equipment Mfg	3	1.2%	0	0.0%	1	1.6%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	2	1.8%	0	0.0%	0	0.0%	0	0.0%	6	0.8%
Machinery & Equipment Mfg	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%
Furniture & Other Mfg	1	0.4%	2	1.9%	2	3.2%	0	0.0%	0	0.0%	0	0.0%	2	1.5%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	7	0.9%
Subtotal	20	8.0%	26	24.8%	9	14.5%	2	10.0%	3	16.7%	0	0.0%	19	13.9%	6	5.5%	1	33.3%	2	40.0%	0	0.0%	88	11.6%
Service Industry																								
Textile, Leather, Clothing & Footwear Mfg	1	0.4%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	1	0.1%
Printing[1]	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	4	2.9%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	4	0.5%
Publishing[2]	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%
Construction Services	2	0.8%	1	1.0%	3	4.8%	1	5.0%	0	0.0%	0	0.0%	5	3.6%	10	9.1%	0	0.0%	0	0.0%	0	0.0%	22	2.9%
Heavy & Civil Engineering Construction	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	2	1.8%	0	0.0%	0	0.0%	0	0.0%	2	0.3%
Repair & Maintenance	13	5.2%	3	2.9%	5	8.1%	1	5.0%	1	5.6%	0	0.0%	6	4.4%	2	1.8%	1	33.3%	0	0.0%	0	0.0%	32	4.2%
Subtotal	16	6.4%	4	3.8%	8	12.9%	2	10.0%	1	5.6%	0	0.0%	15	10.9%	14	12.7%	1	33.3%	0	0.0%	0	0.0%	61	8.0%
Warehousing & Storage																								
Basic Material W'saling	3	1.2%	5	4.8%	2	3.2%	0	0.0%	0	0.0%	2	11.8%	1	0.7%	5	4.5%	1	33.3%	0	0.0%	0	0.0%	19	2.5%
Machinery & Equipment W'saling	0	0.0%	1	1.0%	0	0.0%	0	0.0%	0	0.0%	1	5.9%	1	0.7%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	3	0.4%
Motor Vehicle & Motor Vehicle Parts W'saling	0	0.0%	0	0.0%	2	3.2%	0	0.0%	1	5.6%	1	5.9%	1	0.7%	1	0.9%	0	0.0%	0	0.0%	0	0.0%	6	0.8%
Grocery, liquor & tobacco product W'saling	2	0.8%	1	1.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	3	2.2%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	6	0.8%
Other Goods W'saling	3	1.2%	1	1.0%	1	1.6%	0	0.0%	0	0.0%	1	5.9%	0	0.0%	2	1.8%	0	0.0%	0	0.0%	0	0.0%	8	1.1%
Warehousing & Storage Services	1	0.4%	1	1.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	1	0.7%	1	0.9%	0	0.0%	0	0.0%	0	0.0%	4	0.5%
Subtotal	9	3.6%	9	8.6%	5	8.1%	0	0.0%	1	5.6%	5	29.4%	7	5.1%	9	8.2%	1	33.3%	0	0.0%	0	0.0%	46	6.1%
Transport Uses																								
Motor Vehicle & Motor Vehicle Parts Retailing	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%
Road Transport	2	0.8%	0	0.0%	5	8.1%	0	0.0%	0	0.0%	0	0.0%	2	1.5%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	9	1.2%
Rail Transport	1	0.4%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	1	0.1%
Water Transport	5	2.0%	0	0.0%	0	0.0%	1	5.0%	0	0.0%	0	0.0%	2	1.5%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	8	1.1%
Air & Space Transport	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%
Other Transport	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%
Transport Support Services	0	0.0%	2	1.9%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	2	0.3%
Postal & Courier Pick-Up and	1	0.4%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	1	0.1%

Industry	Maryborough		Maryborough West		Tinana		Granville		Oakhurst		St Helens		Urangan		Dundowran		Howard		Brooweena		Tiaro		Fraser Coast RC	
	no.	% o total	no.	% of total	no.	% of total	no.	% of total	no.	% of total	no.	% of total	no.	% o total	no.	% of total	no.	% of total	no.	% of total	no.	% of total	no.	% of total
Delivery Services																								
Subtotal	9	3.6%	2	1.9%	5	8.1%	1	5.0%	0	0.0%	0	0.0%	4	2.9%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	21	2.8%
Non-industrial land uses																								
Vacant Unit	10	4.0%	0	0.0%	8	12.9%	2	10.0%	1	5.6%	0	0.0%	5	3.6%	5	4.5%	0	0.0%	0	0.0%	0	0.0%	31	4.1%
Vacant Land	69	27.5%	37	35.2%	18	29.0%	5	25.0%	8	44.4%	7	41.2%	58	42.3%	52	47.3%	0	0.0%	2	40.0%	18	66.7%	275	36.2%
Under Construction	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	1	0.7%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	1	0.1%
House	106	42.2%	21	20.0%	1	1.6%	5	25.0%	0	0.0%	0	0.0%	0	0.0%	5	4.5%	0	0.0%	0	0.0%	5	18.5%	145	19.1%
Not Stated/Unknown	3	1.2%	2	1.9%	1	1.6%	3	15.0%	2	11.1%	3	17.6%	2	1.5%	3	2.7%	0	0.0%	0	0.0%	4	14.8%	23	3.0%
Retail	4	1.6%	1	1.0%	3	4.8%	0	0.0%	0	0.0%	2	11.8%	5	3.6%	2	1.8%	0	0.0%	0	0.0%	0	0.0%	17	2.2%
Commercial	3	1.2%	3	2.9%	3	4.8%	0	0.0%	0	0.0%	0	0.0%	15	10.9%	10	9.1%	0	0.0%	0	0.0%	0	0.0%	34	4.5%
Other	2	0.8%	0	0.0%	1	1.6%	0	0.0%	2	11.1%	0	0.0%	6	4.4%	4	3.6%	0	0.0%	1	20.0%	0	0.0%	17	2.2%
Subtotal	197	78.5%	64	61.0%	35	56.5%	15	75.0%	13	72.2%	12	70.6%	92	67.2%	81	73.6%	0	0.0%	3	60.0%	27	100.0%	543	71.5%
Total	251	100.0%	105	100.0%	62	100.0%	20	100.0%	18	100.0%	17	100.0%	137	100.0%	110	100.0%	3	100.0%	5	100.0%	27	100.0%	759	100.0%
Vacant Industrial Land (ha)	108.72	-	127.00	-	4.82	-	12.33	-	1.05	-	2.29	-	108.72	-	127.00	-	4.82	-	12.33	-	1.05	-	2.29	-
Vacant & Developable Industrial Land (ha)	75.63	-	70.35	-	4.14	-	11.87	-	1.05	-	2.29	-	75.63	-	70.35	-	4.14	-	11.87	-	1.05	-	2.29	-

Note 1: Including the reproduction of recorded media
Note 2: Except internet and music publishing
Source: Data provided by GHD Pty Ltd

6 INDUSTRIAL FUTURES DIAGNOSTICS

The purpose of the industrial futures diagnostics is to objectively assess potential opportunities for development of new and emerging industry sectors and the potential expansion or evolution of existing industry sectors by identifying the region's locational advantages, resources and capabilities.

The analysis identifies industry sectors in which the region possesses a competitive advantage and then identifies those sectors' supply chain and customer market sectors. Potential opportunities are identified by considering the opportunity for supply chain and customer market sectors to establish within the region.

6.1 Industry Sectors with Regional Competitive Advantage

6.1.1 Identification of Regionally Competitive Sectors

Shift-Share Analysis

Shift-share analysis looks at the changing mix of employment within a given region and indicates whether employment in each industry sector is shifting towards or away from the region.

Shift-share analysis has been conducted on the resident population for Fraser Coast Regional Council between 1996 and 2006[5].

Between 1996 and 2006, employment within Fraser Coast Regional Council has increased by 8,044 persons, with the increase higher in the 2001 to 2006 period.

Within Fraser Coast Regional Council, key sectors of growth in the 1996 to 2006 period were:

- Health care & social assistance – increase of 1,586 persons or 19.7% of total growth;
- Construction – increase of 1,553 persons or 19.3% of total growth;
- Retail trade – increase of 1,221 persons or 15.2% of total growth;
- Public administration & safety – increase of 684 persons or 8.5% of total growth; and
- Manufacturing – increase of 672 persons or 8.4% of total growth.

Agriculture, forestry & fishing, information media & telecommunications and wholesale trade were the only sectors to record a decline in employment between 1996 and 2006.

Table 6.1 below summarises the results of the shift share analysis for Fraser Coast Regional Council between 1996 and 2006.

[5] The shift-share analysis has been conducted for the resident population, rather than the working population given the relative availability of data from the 1996, 2001 and 2006 Censuses.

Table 6.1: Shift-Share Analysis, Fraser Coast Regional Council, 1996-2006

	Fraser Coast Regional Council	
	1996-06	**2001-06**
Agriculture, forestry & fishing	-2.7%	-3.5%
Mining	1.2%	2.1%
Manufacturing	6.1%	5.1%
Electricity, gas, water & waste services	2.0%	2.8%
Construction	19.3%	24.0%
Wholesale trade	-1.1%	-1.1%
Retail trade	15.2%	11.2%
Accommodation & food services	8.4%	8.4%
Transport, postal & warehousing	4.5%	4.0%
Information media & telecommunications	-1.2%	-0.1%
Financial & insurance services	0.3%	1.1%
Rental, hiring & real estate services	2.1%	3.7%
Professional, scientific & technical services	4.2%	4.7%
Administrative & support services	5.4%	3.6%
Public administration & safety	8.5%	8.2%
Education & training	7.5%	5.9%
Health care & social assistance	19.7%	15.0%
Arts & recreation services	1.0%	-0.2%
Other services	2.0%	2.4%
Inadequately described/Not stated	-2.2%	2.8%
Total	**8,044**	**6,974**

Source: ABS 2006 Census of Population and Housing, Economic Associates calculations

Location Quotient Analysis

Location quotient analysis compares the industry structure of the local economy to the industry structure of the reference economy to identify specialisations in the local economy. A location quotient exceeding one would suggest that the local economy is more concentrated in the industry sector that the reference economy.

In 2006, industries within Fraser Coast Regional Council with a location quotient greater than one relative to Queensland were:

- Electricity, gas, water & waste services: location quotient of 1.85 relative to Queensland;
- Retail trade: location quotient of 1.22 relative to Queensland;
- Accommodation & food services: location quotient of 1.37 relative to Queensland;
- Rental, hiring & real estate services: location quotient of 1.12 relative to Queensland;
- Education & training: location quotient of 1.17 relative to Queensland;
- Health care & social assistance: location quotient of 1.34 relative to Queensland; and
- Other services: location quotient of 1.06 relative to Queensland.

Table 6.2: Location Quotient Analysis, Fraser Coast Regional Council, 2006

	Employment by Industry		Location Quotient
	Fraser Coast RC	Queensland	Fraser Coast RC
Agriculture, forestry & fishing	3.4%	3.4%	0.99
Mining	0.4%	1.7%	0.25
Manufacturing	9.3%	9.9%	0.93
Electricity, gas, water & waste services	1.9%	1.0%	1.85
Construction	8.0%	8.9%	0.89
Wholesale trade	2.6%	4.0%	0.64
Retail trade	14.4%	11.8%	1.22
Accommodation & food services	9.6%	7.0%	1.37
Transport, postal & warehousing	4.3%	5.1%	0.85
Information media & telecommunications	1.4%	1.5%	0.92
Financial & insurance services	1.8%	2.9%	0.60
Rental, hiring & real estate services	2.4%	2.2%	1.12
Professional, scientific & technical services	3.2%	5.8%	0.55
Administrative & support services	2.8%	3.1%	0.92
Public administration & safety	6.6%	6.8%	0.96
Education & training	9.2%	7.8%	1.17
Health care & social assistance	13.9%	10.4%	1.34
Arts & recreation services	0.7%	1.4%	0.51
Other services	4.1%	3.8%	1.06
Inadequately described/Not stated	0.1%	1.4%	0.08

Note: Working population profile data from the 2006 Census was used in this analysis.
Source: ABS 2006 Census of Population and Housing, Economic Associates calculations

Summary

The shift-share analysis and location quotient analysis has highlighted a number of key industry sectors within Fraser Coast Regional Council including:

- Manufacturing;
- Electricity, gas, water & waste services;
- Construction;
- Health care & social assistance;
- Public administration & safety;
- Retail trade; and
- Accommodation & food services.

The health care & social assistance and public administration & safety sectors are commercial office users, whereas the manufacturing sector requires industrial land for operations.

It is anticipated that the health care & social assistance sector will continue to be important within Fraser Coast Regional Council, given the ageing demographic within the region. Public administration and safety is also anticipated to remain significant within the region, unless there is a significant reduction in regional operations for state government departments.

The manufacturing sector is particularly dominant in the former Maryborough local government area.

7 EMPLOYMENT MODEL

7.1 Methodology for Developing Commercial Office Space and Industrial Land Demand Projections

Commercial office space and industrial land demand projections in this report are based on employment projections for Fraser Coast Regional Council for industry sectors which require commercial office space and industrial land. Key industry sectors for commercial office space and industrial land typically include:

- Commercial office space:
- – Financial & insurance services;
- – Professional, scientific & technical services;
- – Health care & social assistance;
- – Rental, hiring & real estate services;
- – Public administration & safety;
- – Information, media & telecommunications; and
- – Administrative & support services;
- Industrial land:
- – Manufacturing;
- – Transport & storage; and
- – Wholesale trade.

Employment projections are based on:

- The net available workforce rate, which is derived using:
- – Employment retention (jobs balance) rates by industry sector (working population by industry divided by resident population employment by industry);
- – Labour force participation and unemployment rates;;
- Industry share of employment for relevant sectors; and
- Working age (persons aged 15 to 64 years) population projections.

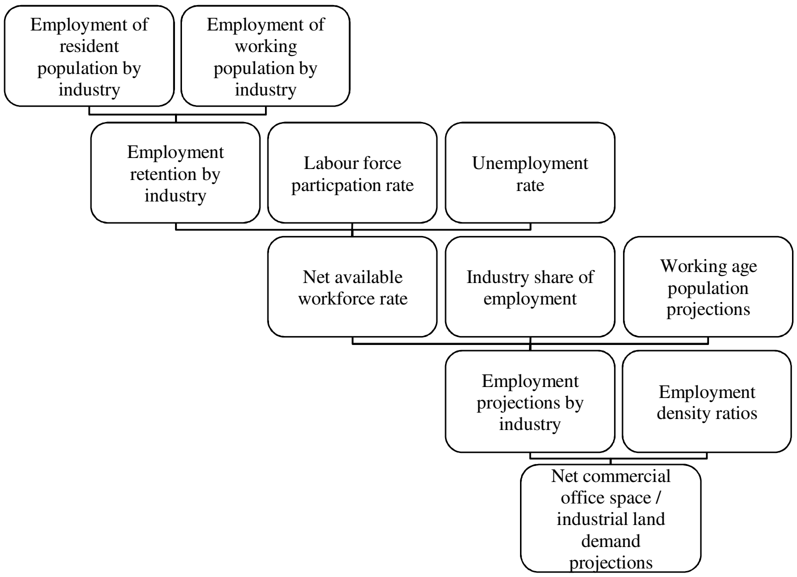
Commercial office demand is derived by applying employment density ratios (floor space per employee) for each industry sector to the employment projections for industry sectors requiring commercial office space and making allowance for home based business.

Net industrial land demand (or allotment demand) is derived by applying employment density ratios (employees per hectare) for each industry sector to the employment projections for industry sectors requiring industrial land.

Gross industrial land demand projections are derived by adding an allowance for services, buffers and open space to the net industrial land demand projections.

Figure 7.1 below is a flowchart of the process of calculating commercial office space and industrial land demand projections.

Figure 7.1: Methodology for preparing industrial land and commercial office space demand projections



7.2 Model Assumptions

7.2.1 Working Age Population

As highlighted in Section 2.2 of the report, the projected incidence of persons aged 15-64 years in Fraser Coast Regional Council is projected to decline from 60.5% of persons in 2011 to 58.0% of persons in 2031.

The rate of decline in the incidence of the working age population is projected to be lowest in Hervey Bay Urban, Maryborough Urban Surrounds and Fraser Island.

Table 7.1: Projected Incidence of Persons Aged 15-64 Years by Catchment, 2011-31

	2011	2016	2021	2026	2031
Working Age Population (15-64 years)					
Hervey Bay Urban	27,207	31,204	35,961	41,846	48,692
Maryborough Urban	14,816	15,414	16,195	17,012	17,694
Coastal Hervey Bay	4,240	4,573	4,810	4,933	5,007
Hinterland Hervey Bay	2,394	2,702	2,961	3,228	3,516
Maryborough Urban Surrounds	2,202	2,303	2,530	3,212	4,079
Rural South Catchment	2,333	2,603	2,847	3,138	3,457
Hervey Bay Urban Surrounds	2,732	2,801	2,830	2,858	2,886
Rural South West	1,355	1,493	1,613	1,757	1,885
Coastal Maryborough	627	643	654	670	686
Fraser Island	334	347	359	374	389
Fraser Coast Regional Council	**58,239**	**64,084**	**70,759**	**79,028**	**88,291**
% of Total Population					
Hervey Bay Urban	58.3%	57.9%	57.6%	57.2%	56.9%
Maryborough Urban	59.9%	59.3%	58.7%	58.1%	57.5%
Coastal Hervey Bay	63.3%	61.9%	60.4%	59.0%	57.5%
Hinterland Hervey Bay	60.1%	58.9%	57.6%	56.3%	55.0%
Maryborough Urban Surrounds	70.8%	70.4%	70.1%	69.7%	69.4%
Rural South Catchment	66.7%	65.7%	64.6%	63.6%	62.5%
Hervey Bay Urban Surrounds	66.9%	65.9%	64.9%	64.0%	63.0%
Rural South West	64.2%	62.5%	60.9%	59.2%	57.5%
Coastal Maryborough	65.4%	64.4%	63.5%	62.5%	61.5%
Fraser Island	86.6%	86.6%	86.6%	86.6%	86.6%
Fraser Coast Regional Council	**60.5%**	**59.8%**	**59.2%**	**58.6%**	**58.0%**

Source: PIFU (2010) - small change medium series figures, Economic Associates estimates

7.2.2 Labour Force Participation Rate

Labour force participation rates stayed relatively stable in Fraser Coast Regional Council between 1996 and 2006.

Participation rates are anticipated to trend upwards in the Fraser Coast Regional Council in response to a tightening labour market associated with an ageing population. Overall, the labour force participation rate is assumed to increase from 57.4% in 2006 to 69.0% in 2031.

Table 7.2 below summarises the historical and projected trends in labour force participation in Fraser Coast Regional Council and its component catchments between 2006 and 2031.

Table 7.2: Projected Labour Force Participation Rate by Catchment, 2006-2031

	2006	2011	2016	2021	2026	2031
Hervey Bay Urban	49.5%	51.5%	53.5%	55.5%	57.5%	59.5%
Maryborough Urban	68.2%	70.9%	73.7%	76.4%	79.2%	82.0%
Coastal Hervey Bay	60.9%	63.3%	65.8%	68.3%	70.7%	73.2%
Hinterland Hervey Bay	53.5%	55.7%	57.8%	60.0%	62.2%	64.3%
Maryborough Urban Surrounds	63.0%	65.6%	68.1%	70.7%	73.2%	75.8%
Rural South Catchment	55.3%	57.5%	59.8%	62.0%	64.3%	66.5%
Hervey Bay Urban Surrounds	72.7%	75.6%	78.5%	81.5%	84.4%	87.4%
Rural South West	73.6%	76.6%	79.5%	82.5%	85.5%	88.5%
Coastal Maryborough	40.4%	42.0%	43.7%	45.3%	46.9%	48.6%
Fraser Island	53.5%	55.7%	57.9%	60.0%	62.2%	64.4%
Fraser Coast Regional Council	57.4%	59.7%	62.0%	64.4%	66.7%	69.0%

Source: PIFU (2010) - small change medium series figures , Economic Associates estimates

7.2.3 Unemployment Rate

Precisely predicting employment levels into the future is difficult because of the cyclical nature of economic activity and employment. The unemployment rate in Fraser Coast Regional Council is assumed to continue to decrease from 8.4% in 2005 to 6.2% in 2031. Unemployment rates summarised in Table 7.3 pertain to the assumed long term trend unemployment rate. Actual unemployment rates are expected to oscillate around the long term trend line.

Table 7.3 below presents the projected unemployment rate by catchment between 2006 and 2031.

Table 7.3: Projected Unemployment Rate by Catchment, 2006-2031

	2006	2011	2016	2021	2026	2031
Hervey Bay Urban	9.0%	8.5%	8.0%	7.6%	7.1%	6.6%
Maryborough Urban	8.3%	7.8%	7.4%	7.0%	6.5%	6.1%
Coastal Hervey Bay	5.7%	5.4%	5.1%	4.8%	4.5%	4.2%
Hinterland Hervey Bay	10.1%	9.6%	9.0%	8.5%	8.0%	7.4%
Maryborough Urban Surrounds	7.0%	6.6%	6.2%	5.9%	5.5%	5.1%
Rural South Catchment	11.8%	11.2%	10.6%	9.9%	9.3%	8.7%
Hervey Bay Urban Surrounds	8.3%	7.9%	7.4%	7.0%	6.5%	6.1%
Rural South West	6.7%	6.4%	6.0%	5.7%	5.3%	5.0%
Coastal Maryborough	9.4%	8.9%	8.4%	7.9%	7.4%	6.9%
Fraser Island	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Fraser Coast Regional Council	8.4%	8.0%	7.5%	7.1%	6.6%	6.2%

Source: PIFU (2010) - small change medium series figures , Economic Associates estimates

7.2.4 Employment Retention

Employment retention (also known as 'jobs balance') refers to the share of the resident workforce by industry (employment by industry by place of residence) that is retained within a particular region.

The ratio is as follows:

(Employment by industry by place of employment)
divided by
(Employment by industry by place of usual residence)

A jobs balance rate of less than 100% indicates that some employed residents of a particular region work in a different region (i.e. employment leakage). Jobs balance rates greater than 100% suggest a net inflow of workers within that sector from other regions.

It has been assumed that over the next 20 years to 2031, employment retention in Fraser Coast Regional Council is to increase in those sectors which currently record an employment retention rate below 80%.

Employment retention assumptions for each catchment are based on the projected trends within the relevant former local government area.

Table 7.4 below summarises the anticipated employment retention rates by industry for Fraser Coast Regional Council.

Table 7.4: Projected Employment Retention, Fraser Coast Regional Council by former LGA boundary, 2006 to 2031

	2006	2011	2016	2021	2026	2031
Maryborough						
Agriculture, forestry and fishing	89.7%	79.0%	79.2%	79.4%	79.7%	79.9%
Mining	100.0%	116.7%	122.6%	128.5%	134.4%	140.3%
Manufacturing	140.8%	123.5%	123.3%	123.3%	123.3%	123.4%
Electricity, gas, water and waste services	167.4%	147.0%	147.0%	147.0%	147.0%	147.0%
Construction	100.4%	88.2%	88.2%	88.2%	88.2%	88.3%
Wholesale trade	116.4%	102.6%	103.1%	103.5%	103.9%	104.3%
Retail trade	126.9%	111.6%	111.7%	111.8%	112.0%	112.1%
Accommodation and food services	112.1%	98.7%	99.0%	99.3%	99.6%	99.8%
Transport, postal and warehousing	129.5%	113.4%	113.1%	112.8%	112.5%	112.2%
Information media and telecommunications	129.4%	113.2%	112.8%	112.3%	111.9%	111.5%
Financial and insurance services	152.6%	134.8%	135.5%	136.2%	136.9%	137.6%
Rental, hiring and real estate services	143.4%	125.9%	125.9%	125.9%	125.9%	125.9%
Professional, scientific and technical services	128.8%	113.1%	113.1%	113.1%	113.1%	113.1%
Administrative and support services	131.2%	115.3%	115.3%	115.3%	115.3%	115.3%
Public administration and safety	157.0%	137.9%	138.0%	138.0%	138.0%	138.0%
Education and training	139.0%	122.1%	122.1%	122.1%	122.1%	122.1%
Health care and social assistance	147.5%	129.6%	129.6%	129.6%	129.6%	129.6%
Arts and recreation services	155.9%	137.1%	137.2%	137.3%	137.5%	137.6%
Other services	130.3%	114.4%	114.4%	114.3%	114.3%	114.3%
Inadequately described / not stated	5.9%	12.3%	19.4%	26.5%	33.6%	40.7%
Total	130.1%	114.7%	115.0%	115.3%	115.5%	115.8%
Hervey Bay						
Agriculture, forestry and fishing	68.0%	71.1%	72.2%	73.3%	74.4%	75.5%
Mining	17.9%	34.0%	42.2%	50.3%	58.5%	66.7%
Manufacturing	66.3%	69.3%	70.4%	71.5%	72.7%	73.9%
Electricity, gas, water and waste services	72.3%	74.9%	75.3%	75.7%	76.2%	76.6%
Construction	59.4%	62.2%	63.2%	64.2%	65.2%	66.2%
Wholesale trade	85.4%	88.6%	89.2%	89.8%	90.4%	91.0%
Retail trade	89.6%	92.3%	92.3%	92.3%	92.4%	92.4%
Accommodation and food services	90.9%	93.7%	93.7%	93.7%	93.7%	93.7%
Transport, postal and warehousing	64.4%	67.1%	68.0%	68.8%	69.6%	70.5%
Information media and telecommunications	84.3%	87.8%	88.7%	89.6%	90.5%	91.4%
Financial and insurance services	83.6%	86.2%	86.2%	86.2%	86.3%	86.3%
Rental, hiring and real estate services	90.5%	93.4%	93.5%	93.6%	93.7%	93.8%
Professional, scientific and technical services	82.7%	85.3%	85.3%	85.4%	85.4%	85.5%
Administrative and support services	67.6%	70.2%	70.7%	71.2%	71.7%	72.2%
Public administration and safety	72.1%	75.4%	76.5%	77.7%	78.8%	80.0%
Education and training	88.0%	90.7%	90.8%	90.8%	90.8%	90.8%
Health care and social assistance	82.0%	84.5%	84.5%	84.5%	84.5%	84.5%

	2006	2011	2016	2021	2026	2031
Arts and recreation services	69.1%	72.0%	72.7%	73.5%	74.2%	75.0%
Other services	84.0%	86.6%	86.6%	86.6%	86.6%	86.6%
Inadequately described / not stated	2.9%	10.3%	17.7%	25.1%	32.5%	39.8%
Total	76.2%	79.3%	80.0%	80.6%	81.2%	81.8%
Tiaro						
Agriculture, forestry and fishing	58.5%	95.5%	95.6%	95.6%	95.6%	95.7%
Mining	19.3%	57.7%	72.6%	87.4%	102.3%	117.1%
Manufacturing	26.6%	44.5%	45.7%	47.1%	48.7%	50.5%
Electricity, gas, water and waste services	0.0%	16.0%	32.0%	48.0%	64.0%	80.0%
Construction	19.5%	33.6%	35.3%	37.1%	38.8%	40.6%
Wholesale trade	50.6%	84.3%	86.1%	88.0%	89.9%	91.9%
Retail trade	25.4%	43.8%	46.3%	49.0%	51.8%	54.7%
Accommodation and food services	16.8%	28.5%	29.5%	30.5%	31.5%	32.5%
Transport, postal and warehousing	21.9%	39.3%	42.7%	46.1%	49.4%	52.6%
Information media and telecommunications	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
Financial and insurance services	16.7%	37.8%	48.4%	58.9%	69.5%	80.0%
Rental, hiring and real estate services	26.6%	44.5%	45.5%	46.5%	47.5%	48.5%
Professional, scientific and technical services	13.6%	23.2%	24.2%	25.2%	26.2%	27.2%
Administrative and support services	26.2%	43.9%	44.9%	45.9%	46.9%	47.9%
Public administration and safety	37.7%	63.2%	64.8%	66.4%	68.0%	69.6%
Education and training	31.8%	54.1%	56.3%	58.5%	60.7%	62.8%
Health care and social assistance	9.9%	20.3%	24.3%	28.4%	32.5%	36.5%
Arts and recreation services	0.0%	16.0%	32.0%	48.0%	64.0%	80.0%
Other services	10.4%	23.6%	30.1%	36.6%	43.0%	49.3%
Inadequately described / not stated	2.7%	11.1%	17.7%	24.3%	30.9%	37.5%
Total	28.3%	48.4%	50.4%	52.5%	54.6%	56.8%
Woocoo						
Agriculture, forestry and fishing	50.2%	92.5%	92.9%	93.4%	93.9%	94.4%
Mining	0.0%	16.0%	32.0%	48.0%	64.0%	80.0%
Manufacturing	16.0%	31.6%	33.9%	36.4%	38.9%	41.5%
Electricity, gas, water and waste services	5.5%	24.4%	38.8%	53.2%	67.6%	82.0%
Construction	12.5%	24.5%	26.0%	27.6%	29.2%	30.7%
Wholesale trade	17.3%	39.7%	47.4%	54.6%	61.6%	68.1%
Retail trade	2.7%	15.2%	25.5%	35.9%	46.3%	56.8%
Accommodation and food services	3.2%	8.4%	10.8%	13.3%	15.8%	18.2%
Transport, postal and warehousing	15.5%	32.5%	36.6%	40.6%	44.6%	48.5%
Information media and telecommunications	0.0%	16.0%	32.0%	48.0%	64.0%	80.0%
Financial and insurance services	7.8%	23.1%	32.0%	40.9%	49.7%	58.6%
Rental, hiring and real estate services	0.0%	16.0%	32.0%	48.0%	64.0%	80.0%
Professional, scientific and technical services	18.2%	34.3%	35.3%	36.3%	37.3%	38.3%
Administrative and support services	8.4%	16.4%	17.4%	18.4%	19.4%	20.4%
Public administration and safety	10.8%	25.7%	31.5%	37.3%	43.1%	48.9%
Education and training	15.8%	32.6%	36.1%	39.7%	43.2%	46.8%
Health care and social assistance	2.4%	16.9%	29.3%	41.7%	54.2%	66.6%
Arts and recreation services	18.2%	39.3%	45.3%	51.3%	57.3%	63.3%
Other services	13.1%	30.8%	37.4%	44.1%	50.6%	57.1%
Inadequately described / not stated	0.0%	16.0%	32.0%	48.0%	64.0%	80.0%
Total	**15.9%**	**34.4%**	**39.7%**	**45.2%**	**50.7%**	**56.3%**

Source: Economic Associates estimates

7.2.5 Employment by Industry

The economic structure of Fraser Coast Regional Council is expected to evolve throughout the projection period. These changes are likely to be gradual, however major developments may result in a significant restructuring of the economy. Assumptions made regarding the likely economic structural change within Fraser Coast Regional Council has been based on consultation findings, regional planning intents, regional input-output tables, a review of recent development applications and approvals, major projects proposed for the region and the findings of field investigations.

There is anticipated to be a gradual increase in the incidence of industrial employment, mainly at the expense of employment in the agriculture, forestry & fishing sector throughout the region.

Table 7.5 summarises the anticipated structural change in employment by industry within Fraser Coast Regional Council.

Table 7.5: Employment by Industry, Fraser Coast Regional Council by former LGA boundary, 2006 to 2031

	2006	2011	2016	2021	2026	2031
Maryborough						
Agriculture, forestry and fishing	2.3%	2.1%	2.0%	1.9%	1.7%	1.6%
Mining	0.9%	0.6%	0.6%	0.5%	0.5%	0.4%
Manufacturing	13.0%	13.1%	13.2%	13.4%	13.5%	13.6%
Electricity, gas, water and waste services	2.1%	2.1%	2.1%	2.1%	2.1%	2.1%
Construction	6.8%	6.8%	6.7%	6.7%	6.7%	6.6%
Wholesale trade	2.4%	2.4%	2.4%	2.4%	2.4%	2.4%
Retail trade	13.5%	13.6%	13.7%	13.7%	13.8%	13.8%
Accommodation and food services	7.7%	7.7%	7.7%	7.6%	7.6%	7.6%
Transport, postal and warehousing	5.5%	5.6%	5.7%	5.8%	5.9%	6.0%
Information media and telecommunications	1.8%	1.8%	1.9%	1.9%	1.9%	1.9%
Financial and insurance services	1.4%	1.4%	1.4%	1.4%	1.4%	1.4%
Rental, hiring and real estate services	1.4%	1.4%	1.4%	1.4%	1.4%	1.4%
Professional, scientific and technical services	2.5%	2.5%	2.5%	2.4%	2.4%	2.4%
Administrative and support services	3.0%	3.0%	2.9%	2.9%	2.9%	2.9%
Public administration and safety	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%
Education and training	8.3%	8.3%	8.3%	8.3%	8.3%	8.3%
Health care and social assistance	13.5%	13.5%	13.4%	13.4%	13.4%	13.4%
Arts and recreation services	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%
Other services	3.9%	3.9%	4.0%	4.0%	4.0%	4.0%
Inadequately described / not stated	2.1%	2.1%	2.1%	2.1%	2.1%	2.0%
Total	**100.0%**	**100.0%**	**100.0%**	**100.0%**	**100.0%**	**100.0%**
Hervey Bay						
Agriculture, forestry and fishing	1.9%	1.8%	1.7%	1.5%	1.4%	1.3%
Mining	0.7%	0.5%	0.4%	0.4%	0.3%	0.3%
Manufacturing	6.3%	6.5%	6.7%	6.9%	7.1%	7.3%
Electricity, gas, water and waste services	1.5%	1.5%	1.5%	1.5%	1.5%	1.5%
Construction	13.2%	13.1%	13.1%	13.0%	12.9%	12.9%
Wholesale trade	2.4%	2.4%	2.4%	2.3%	2.3%	2.3%
Retail trade	13.7%	13.8%	13.8%	13.8%	13.9%	13.9%
Accommodation and food services	10.5%	10.5%	10.5%	10.5%	10.5%	10.5%
Transport, postal and warehousing	4.0%	4.1%	4.1%	4.2%	4.3%	4.4%
Information media and telecommunications	1.0%	1.0%	1.1%	1.1%	1.1%	1.1%
Financial and insurance services	1.7%	1.7%	1.7%	1.7%	1.7%	1.7%
Rental, hiring and real estate services	2.7%	2.7%	2.7%	2.7%	2.7%	2.6%
Professional, scientific and technical services	3.6%	3.6%	3.6%	3.6%	3.6%	3.6%
Administrative and support services	3.1%	3.1%	3.1%	3.1%	3.1%	3.1%
Public administration and safety	5.1%	5.1%	5.1%	5.1%	5.1%	5.1%
Education and training	8.3%	8.3%	8.3%	8.3%	8.3%	8.3%
Health care and social assistance	12.9%	12.9%	12.9%	12.8%	12.8%	12.8%
Arts and recreation services	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%
Other services	4.0%	4.0%	4.0%	4.0%	4.0%	4.0%
Inadequately described / not stated	2.7%	2.7%	2.7%	2.7%	2.7%	2.6%

	2006	2011	2016	2021	2026	2031
Total	**100.0%**	**100.0%**	**100.0%**	**100.0%**	**100.0%**	**100.0%**
Tiaro						
Agriculture, forestry and fishing	16.5%	15.6%	14.7%	13.8%	12.9%	12.0%
Mining	1.2%	0.8%	0.7%	0.6%	0.6%	0.5%
Manufacturing	12.3%	12.6%	12.8%	13.0%	13.3%	13.5%
Electricity, gas, water and waste services	1.1%	1.1%	1.1%	1.1%	1.1%	1.2%
Construction	8.5%	8.5%	8.6%	8.6%	8.7%	8.7%
Wholesale trade	3.2%	3.3%	3.3%	3.4%	3.5%	3.5%
Retail trade	10.5%	10.7%	10.8%	11.0%	11.1%	11.3%
Accommodation and food services	4.9%	5.0%	5.0%	5.0%	5.1%	5.1%
Transport, postal and warehousing	6.5%	6.7%	6.8%	6.9%	7.1%	7.2%
Information media and telecommunications	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Financial and insurance services	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%
Rental, hiring and real estate services	1.4%	1.4%	1.4%	1.5%	1.5%	1.5%
Professional, scientific and technical services	1.7%	1.7%	1.7%	1.7%	1.7%	1.7%
Administrative and support services	2.6%	2.6%	2.6%	2.6%	2.7%	2.7%
Public administration and safety	6.1%	6.1%	6.2%	6.2%	6.3%	6.3%
Education and training	6.3%	6.3%	6.4%	6.4%	6.5%	6.5%
Health care and social assistance	8.7%	8.8%	8.9%	9.0%	9.0%	9.1%
Arts and recreation services	0.2%	0.2%	0.3%	0.3%	0.3%	0.3%
Other services	3.6%	3.7%	3.7%	3.8%	3.9%	3.9%
Inadequately described / not stated	4.1%	4.2%	4.2%	4.2%	4.3%	4.3%
Total	**100.0%**	**100.0%**	**100.0%**	**100.0%**	**100.0%**	**100.0%**
Woocoo						
Agriculture, forestry and fishing	15.7%	14.9%	14.0%	13.1%	12.3%	11.4%
Mining	0.7%	0.7%	0.6%	0.5%	0.5%	0.4%
Manufacturing	12.0%	12.2%	12.4%	12.5%	12.7%	12.9%
Electricity, gas, water and waste services	2.0%	2.0%	2.0%	2.0%	2.1%	2.1%
Construction	7.2%	7.3%	7.3%	7.3%	7.4%	7.4%
Wholesale trade	2.7%	2.8%	2.8%	2.9%	2.9%	3.0%
Retail trade	8.2%	8.3%	8.4%	8.5%	8.6%	8.7%
Accommodation and food services	3.4%	3.4%	3.4%	3.5%	3.5%	3.5%
Transport, postal and warehousing	5.8%	5.9%	6.1%	6.2%	6.3%	6.4%
Information media and telecommunications	1.3%	1.4%	1.4%	1.4%	1.5%	1.5%
Financial and insurance services	1.4%	1.4%	1.4%	1.4%	1.4%	1.4%
Rental, hiring and real estate services	1.8%	1.8%	1.8%	1.8%	1.8%	1.9%
Professional, scientific and technical services	1.4%	1.4%	1.4%	1.4%	1.4%	1.4%
Administrative and support services	2.6%	2.6%	2.6%	2.6%	2.7%	2.7%
Public administration and safety	8.7%	8.8%	8.8%	8.9%	9.0%	9.0%
Education and training	6.6%	6.7%	6.7%	6.8%	6.8%	6.9%
Health care and social assistance	12.0%	12.1%	12.2%	12.3%	12.4%	12.5%
Arts and recreation services	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%
Other services	3.3%	3.4%	3.4%	3.5%	3.5%	3.6%
Inadequately described / not stated	2.5%	2.5%	2.6%	2.6%	2.6%	2.6%
Total	**100.0%**	**100.0%**	**100.0%**	**100.0%**	**100.0%**	**100.0%**

Note: Structural changes have been calculated at the two digit ANZSIC level, but are aggregated to the one digit ANZSIC level above for reporting convenience
Source: Economic Associates estimates

7.3 Projected Employment by Catchment

In projecting employment by industry within each catchment, the following assumptions have been made:

- Projected employment by industry is consistent across the LGA in which it is contained;
- Projected employment retention by industry is consistent across the LGA in which it is contained.

The results of the analysis have been presented at the one digit ANZSIC level, aggregated up from the two digit ANZSIC level for conciseness. However, employment projections at the two digit ANZSIC level are used in projecting commercial office floor space demand and industrial land demand (refer to Chapters 5 and 6).

7.3.1 Catchments within the former Maryborough LGA

In the former Maryborough LGA, there are four catchments, these being:

- Maryborough Urban;
- Maryborough Urban Surrounds;
- Central Maryborough; and
- Fraser Island[6].

By 2031, employment within each catchment is projected to be:

- Maryborough Urban – 15,787 persons;
- Maryborough Urban Surrounds – 3,399 persons;
- Central Maryborough – 360 persons; and
- Fraser Island – 290 persons.

Table 7.6: Projected Employment by Industry, Catchments within the former Maryborough LGA, 2011-2031

	2011	2016	2021	2026	2031
Maryborough Urban					
Agriculture, forestry and fishing	163	166	170	172	172
Mining	72	74	76	76	74
Manufacturing	1,566	1,715	1,895	2,094	2,289
Electricity, gas, water and waste services	305	331	362	395	427
Construction	577	624	680	741	799
Wholesale trade	240	262	288	317	344
Retail trade	1,469	1,604	1,766	1,944	2,116
Accommodation and food services	732	796	872	956	1,036
Transport, postal and warehousing	612	674	748	830	911
Information media and telecommunications	200	220	243	268	293
Financial and insurance services	189	206	226	249	270
Rental, hiring and real estate services	176	191	209	229	247
Professional, scientific and technical services	269	292	319	348	377

[6] While the Fraser Island catchment is contained within both the former Maryborough and Hervey Bay LGAs, over 50% of the population is contained within the former Maryborough LGA.

	2011	2016	2021	2026	2031
Administrative and support services	329	357	390	426	461
Public administration and safety	974	1,056	1,154	1,262	1,364
Education and training	981	1,064	1,163	1,271	1,374
Health care and social assistance	1,688	1,830	2,001	2,187	2,364
Arts and recreation services	92	100	110	120	130
Other services	437	476	523	575	624
Inadequately described / not stated	25	42	63	87	114
Total	**11,097**	**12,079**	**13,258**	**14,546**	**15,787**
Maryborough Urban Surrounds					
Agriculture, forestry and fishing	23	23	25	30	37
Mining	10	10	11	13	16
Manufacturing	218	240	277	370	493
Electricity, gas, water and waste services	42	46	53	70	92
Construction	80	87	99	131	172
Wholesale trade	33	37	42	56	74
Retail trade	205	224	258	343	456
Accommodation and food services	102	111	127	169	223
Transport, postal and warehousing	85	94	109	146	196
Information media and telecommunications	28	31	35	47	63
Financial and insurance services	26	29	33	44	58
Rental, hiring and real estate services	25	27	31	40	53
Professional, scientific and technical services	37	41	47	61	81
Administrative and support services	46	50	57	75	99
Public administration and safety	136	148	169	223	294
Education and training	137	149	170	224	296
Health care and social assistance	235	256	292	386	509
Arts and recreation services	13	14	16	21	28
Other services	61	67	76	101	134
Inadequately described / not stated	3	6	9	15	24
Total	**1,545**	**1,689**	**1,937**	**2,567**	**3,399**
Central Maryborough					
Agriculture, forestry and fishing	4	4	4	4	4
Mining	2	2	2	2	2
Manufacturing	39	42	45	48	52
Electricity, gas, water and waste services	8	8	9	9	10
Construction	14	15	16	17	18
Wholesale trade	6	6	7	7	8
Retail trade	36	39	42	45	48
Accommodation and food services	18	19	21	22	24
Transport, postal and warehousing	15	16	18	19	21
Information media and telecommunications	5	5	6	6	7
Financial and insurance services	5	5	5	6	6
Rental, hiring and real estate services	4	5	5	5	6
Professional, scientific and technical services	7	7	8	8	9
Administrative and support services	8	9	9	10	10
Public administration and safety	24	26	27	29	31
Education and training	24	26	28	29	31
Health care and social assistance	42	45	47	51	54
Arts and recreation services	2	2	3	3	3
Other services	11	12	12	13	14
Inadequately described / not stated	1	1	1	2	3
Total	**275**	**295**	**314**	**336**	**360**
Fraser Island					
Agriculture, forestry and fishing	3	3	3	3	3
Mining	1	1	1	1	1
Manufacturing	30	33	35	39	42

	2011	2016	2021	2026	2031
Electricity, gas, water and waste services	6	6	7	7	8
Construction	11	12	13	14	15
Wholesale trade	5	5	5	6	6
Retail trade	28	31	33	36	39
Accommodation and food services	14	15	16	18	19
Transport, postal and warehousing	12	13	14	15	17
Information media and telecommunications	4	4	5	5	5
Financial and insurance services	4	4	4	5	5
Rental, hiring and real estate services	3	4	4	4	5
Professional, scientific and technical services	5	6	6	6	7
Administrative and support services	6	7	7	8	8
Public administration and safety	19	20	22	23	25
Education and training	19	20	22	23	25
Health care and social assistance	32	35	37	40	43
Arts and recreation services	2	2	2	2	2
Other services	8	9	10	11	11
Inadequately described / not stated	0	1	1	2	2
Total	**213**	**231**	**248**	**268**	**290**

Source: Economic Associates estimates

7.3.2 Catchments within the former Hervey Bay LGA

In the former Hervey Bay LGA, there are four catchments, these being:

- Hervey Bay Urban;
- Coastal Hervey Bay;
- Hinterland Hervey Bay;
- Hervey Bay Urban Surrounds.

By 2031, employment in each of the catchments is projected to be:

- Hervey Bay Urban – 17,896 persons;
- Coastal Hervey Bay –4,612 persons;
- Hinterland Hervey Bay – 2,751 persons; and
- Hervey Bay Urban Surrounds– 3,853 persons.

Table 7.7: Projected Employment by Industry, Catchments within the former Hervey Bay LGA, 2011-2031

	2011	2016	2021	2026	2031
Hervey Bay Urban					
Agriculture, forestry and fishing	152	168	185	202	217
Mining	19	25	32	37	42
Manufacturing	542	660	805	976	1,177
Electricity, gas, water and waste services	137	159	187	218	252
Construction	982	1,155	1,362	1,598	1,863
Wholesale trade	253	294	343	398	459
Retail trade	1,528	1,782	2,085	2,428	2,809
Accommodation and food services	1,186	1,377	1,604	1,859	2,141
Transport, postal and warehousing	329	395	475	569	677
Information media and telecommunications	110	131	157	186	220

	2011	2016	2021	2026	2031
Financial and insurance services	180	210	244	283	326
Rental, hiring and real estate services	299	348	406	471	543
Professional, scientific and technical services	370	430	501	581	669
Administrative and support services	264	309	362	423	490
Public administration and safety	464	547	647	761	889
Education and training	909	1,055	1,230	1,426	1,643
Health care and social assistance	1,310	1,521	1,772	2,054	2,366
Arts and recreation services	61	71	84	98	114
Other services	416	485	568	662	767
Inadequately described / not stated	33	66	109	163	231
Total	**9,543**	**11,188**	**13,158**	**15,391**	**17,896**
Coastal Hervey Bay					
Agriculture, forestry and fishing	40	46	50	53	56
Mining	5	7	9	10	11
Manufacturing	142	179	218	258	303
Electricity, gas, water and waste services	36	43	51	58	65
Construction	257	313	370	423	480
Wholesale trade	66	80	93	105	118
Retail trade	401	484	566	642	724
Accommodation and food services	311	374	435	492	552
Transport, postal and warehousing	86	107	129	151	175
Information media and telecommunications	29	36	42	49	57
Financial and insurance services	47	57	66	75	84
Rental, hiring and real estate services	79	94	110	125	140
Professional, scientific and technical services	97	117	136	154	173
Administrative and support services	69	84	98	112	126
Public administration and safety	122	149	176	201	229
Education and training	238	286	334	377	423
Health care and social assistance	344	413	481	543	610
Arts and recreation services	16	19	23	26	29
Other services	109	132	154	175	198
Inadequately described / not stated	9	18	30	43	59
Total	**2,502**	**3,037**	**3,571**	**4,071**	**4,612**
Hinterland Hervey Bay					
Agriculture, forestry and fishing	19	23	26	30	33
Mining	2	3	4	5	7
Manufacturing	67	89	114	143	181
Electricity, gas, water and waste services	17	22	26	32	39
Construction	122	156	192	234	286
Wholesale trade	31	40	48	58	71
Retail trade	190	241	294	356	432
Accommodation and food services	148	186	226	272	329
Transport, postal and warehousing	41	53	67	83	104
Information media and telecommunications	14	18	22	27	34
Financial and insurance services	22	28	34	41	50
Rental, hiring and real estate services	37	47	57	69	83
Professional, scientific and technical services	46	58	71	85	103
Administrative and support services	33	42	51	62	75
Public administration and safety	58	74	91	112	137
Education and training	113	143	174	209	253
Health care and social assistance	163	206	250	301	364
Arts and recreation services	8	10	12	14	18
Other services	52	66	80	97	118
Inadequately described / not stated	4	9	15	24	35
Total	**1,187**	**1,512**	**1,857**	**2,256**	**2,751**

	2011	2016	2021	2026	2031
Hervey Bay Urban Surrounds					
Agriculture, forestry and fishing	21	23	27	36	47
Mining	3	4	5	7	9
Manufacturing	76	92	118	172	253
Electricity, gas, water and waste services	19	22	27	38	54
Construction	137	161	199	282	401
Wholesale trade	35	41	50	70	99
Retail trade	213	249	305	428	605
Accommodation and food services	165	193	234	328	461
Transport, postal and warehousing	46	55	69	100	146
Information media and telecommunications	15	18	23	33	47
Financial and insurance services	25	29	36	50	70
Rental, hiring and real estate services	42	49	59	83	117
Professional, scientific and technical services	51	60	73	102	144
Administrative and support services	37	43	53	75	106
Public administration and safety	65	77	95	134	191
Education and training	127	148	180	252	354
Health care and social assistance	182	213	259	362	509
Arts and recreation services	8	10	12	17	25
Other services	58	68	83	117	165
Inadequately described / not stated	5	9	16	29	50
Total	**1,329**	**1,565**	**1,923**	**2,716**	**3,853**

Source: Economic Associates estimates

7.3.3 Catchments within the former Tiaro and Woocoo LGAs

In the former Tiaro and Woocoo LGAs there are two catchments within Fraser Coast Regional Council, these being:

- Rural South (former Tiaro LGA); and
- Rural South West (former Woocoo LGA).

By 2031, employment in these catchments is projected to be:

- Rural South (former Tiaro LGA) – 1,190 persons; and
- Rural South West (former Woocoo LGA) – 892 persons.

Table 7.8: Projected Employment by Industry, Catchments within the former Tiaro and Woocoo LGAs, 2011-2031

	2011	2016	2021	2026	2031
Rural South					
Agriculture, forestry and fishing	177	195	209	225	240
Mining	5	7	9	11	12
Manufacturing	66	81	97	118	143
Electricity, gas, water and waste services	2	5	9	13	19
Construction	34	42	51	61	74
Wholesale trade	33	40	48	57	68
Retail trade	56	70	85	105	129
Accommodation and food services	17	20	24	29	35
Transport, postal and warehousing	31	40	51	64	79
Information media and telecommunications	0	0	0	0	0
Financial and insurance services	3	5	6	9	12
Rental, hiring and real estate services	8	9	11	13	15
Professional, scientific and technical services	5	6	7	8	10

	2011	2016	2021	2026	2031
Administrative and support services	14	16	19	23	27
Public administration and safety	46	56	66	78	93
Education and training	41	50	60	72	86
Health care and social assistance	21	30	40	53	70
Arts and recreation services	0	1	2	3	4
Other services	10	16	22	30	40
Inadequately described / not stated	5	10	16	24	34
Total	**575**	**699**	**832**	**996**	**1,190**
Rural South West					
Agriculture, forestry and fishing	133	145	154	164	171
Mining	1	2	3	4	5
Manufacturing	37	47	57	70	85
Electricity, gas, water and waste services	5	9	14	20	27
Construction	17	21	25	31	36
Wholesale trade	11	15	20	26	32
Retail trade	12	24	38	57	79
Accommodation and food services	3	4	6	8	10
Transport, postal and warehousing	19	25	31	40	49
Information media and telecommunications	2	5	9	13	19
Financial and insurance services	3	5	7	10	13
Rental, hiring and real estate services	3	6	11	17	24
Professional, scientific and technical services	5	6	7	8	9
Administrative and support services	4	5	6	7	9
Public administration and safety	22	31	42	55	70
Education and training	21	27	34	42	51
Health care and social assistance	20	40	64	95	132
Arts and recreation services	2	3	4	5	6
Other services	10	14	19	25	32
Inadequately described / not stated	4	9	16	24	33
Total	**334**	**444**	**567**	**721**	**892**

Source: Economic Associates estimates

8 RETAIL MARKET ASSESSMENT

8.1 Catchment Definition

Although it is relevant for a study such as this to examine the demand for additional retail floorspace in overall terms–that is, based on total population growth within the Fraser Coast Regional Council area (FCRCA) – it is more relevant to examine growth prospects within the catchments of its major centres.

All the FCRCA's major retail centres have overlapping trade areas or catchment. Larger centres such as Maryborough, Boat Harbour Drive and Pialba Place have extensive trade areas which overlap with those of the smaller centres such as Eli Waters, Urangan Central et cetera. In addition, bulky goods precincts such as that found on Boat Harbour Drive tend to have wide regional catchments which incorporate all of the FCRCA.

For the purposes of analysis specific planning catchments for the major centres have been identified and are set out in Table 8.1. In relation to this analysis, the Primary Trade Area (PTA) is the area from which the centre will attract most of its sales (usually about 55%-65%). The Secondary Trade Area (STA) usually supplies 15%-20% of a centre's sales.

Table 8.1: Indicative Trade Areas – Major Centres, Fraser Coast Regional Council, 2010

Centre	PTA Planning Catchments	STA Planning Catchments
Pialba Place	• Hervey Bay Urban, • Hervey Bay Urban Surrounds, • Hinterland Hervey Bay	• Maryborough Urban, • Maryborough Urban Surrounds, • Coastal Maryborough, • Rural South/South West
Boat Harbour Drive	• Hervey Bay Urban, • Hervey Bay Urban Surrounds, • Hinterland Hervey Bay	• Maryborough Urban, • Maryborough Urban Surrounds, • Coastal Maryborough, • Rural South/South West
Maryborough	• Maryborough Urban, • Maryborough Urban Surrounds, • Coastal Maryborough	• Rural South/South West
Urangan	• Urangan District	• Part Pialba District
Eli Waters	• Pialba District	• Part Hervey Bay Urban Surrounds

Note: Catchments were defined for the purposes of this study by Fraser Coast Regional Council

Based on research undertaken by various organisations, it is clear that the major centres located within Hervey Bay namely the Boat Harbour Drive precinct and Pialba Place draw the majority of their trade from the Hervey Bay urban area, the Hervey Bay surrounds and the Hervey Bay coastal area. These centres have an STA which includes Maryborough urban, Maryborough urban surrounds and coastal Maryborough. The rural south and south-west form what could be described as the Tertiary Trade Area (TTA) for these centres.

Maryborough by contrast has a more restricted trade area than the centres in Hervey Bay. The PTA includes the Maryborough urban area, Maryborough urban surrounds and the Maryborough coastal area. The rural south and south-west form an STA for the Maryborough CBD. It is possible that some residents of the area defined as "Hinterland Hervey Bay" also shop in Maryborough from time to time, however, it is unlikely to be regarded as their major centre.

Eli Waters and Urangan Central have relatively restricted trade areas. The Eli Waters centre draws most of its trade from the Pialba district together with coastal Hervey Bay. Urangan Central meanwhile derives most of its trade from the Urangan catchment area and some from the eastern parts of Pialba.

It is impossible to define catchments in a traditional sense for Scarness ,Torquay and the small specialist node at Urangan. Firstly, as noted previously, the centres have a very high component of tourist/visitor trade. Secondly, because of their beachside location and entertainment functions, their trade area effectively extends throughout urban Hervey Bay and the surrounding area, as well as attracting trade from residents of Maryborough.

8.2 Socio-Economic Profile of Catchments

From a retailing perspective there are a number of demographic attributes which have more significant influence on retail demand than others. These attributes are:

- Age structure;
- Household structure;
- Occupational structure;
- Unemployment rate; and
- Average household income.

8.2.1 Hervey Bay Trade Area

For the purposes of analysis, the demographic attributes of the Hervey Bay Main Trade Area[7] (MTA) and the Maryborough MTA (Maryborough urban area plus rural areas) have been summarised. As indicated in Table 8.2, the Hervey Bay MTA had a population count of 85,081 persons on Census night in August 2006. The key demographic attributes of this trade area population in 2006 can be summarised as follows.

Age Structure

As indicated in Table 8.2, the Hervey Bay MTA had an older population profile compared to Non Metropolitan Queensland (Queensland minus South East Queensland). At the 2006 Census 41% of the population was aged over 50 years compared to only 30.7% in Non Metropolitan Queensland. If current trends continue, it seems likely that close to 45% of the MTA's population will be aged 50+ years by 2016.

Household Structure

As a consequence of its older age structure, the Hervey Bay MTA in 2006 had a lower proportion of traditional families (couples plus dependent children). Overall 26.1% of all households were represented by traditional households compared with 31.3% in Non Metropolitan Queensland. There was a much higher concentration of couples without children (35.7%) and lone person

[7] The Main Trade Area is the combined primary and secondary trade areas.

households (24.3%) compared to their respective groups in Non Metropolitan Queensland population. Together these two households types accounted for 60% of all households compared with 52.9% in Non Metropolitan Queensland.

Unemployment

In 2006 the unemployment rate in the Hervey Bay MTA at 8.7% was almost double that of Non Metropolitan Queensland average (4.8%).

Occupation Structure

The Hervey Bay MTA had a lower incidence of persons employed in upper white-collar occupations (managers and professionals) namely 23.9% compared with 27.0% in Non Metropolitan Queensland. There was a higher proportion of persons employed in community and personal services, clerical and administrative jobs and sales occupations.

Household Income

At the 2006 Census the average annual household income in the Hervey Bay MTA was significantly below that in Non Metropolitan Queensland. As indicated in Table 8.2, the average household income in the Hervey Bay MTA is estimated at $45,038 ($2006) being 21.4% below the average for Non Metropolitan Queensland of $57,327 per household per annum.

Table 8.2: Socio-Economic Profile, Hervey Bay MTA and Non Metropolitan Queensland, 2006

Variable	PTA	STA	Total Trade Area	Non Metropolitan QLD
Population Count, 2006 (No. Persons)	51,962	33,119	85,081	1,369,917
Age Structure				
0-9 years	11.9%	12.7%	12.2%	14.3%
10-19 years	13.2%	13.6%	13.4%	14.6%
20-29 years	8.2%	9.1%	8.6%	11.9%
30-39 years	10.6%	11.8%	11.1%	13.7%
40-49 years	13.4%	14.2%	13.7%	14.8%
50-59 years	14.6%	15.0%	14.8%	13.1%
60+ years	28.1%	23.6%	26.2%	17.6%
Total	100.0%	100.0%	100.0%	100.0%
Household Structure				
Family Households				
Couples & Children	25.1%	27.7%	26.1%	31.3%
Couples Only	37.3%	33.1%	35.7%	30.0%
Single Parents	11.7%	11.8%	11.7%	11.3%
Other	0.7%	1.0%	0.8%	1.0%
Total Family	*74.8%*	*73.6%*	*74.3%*	*73.6%*
Non-Family Households				
Lone Person	23.4%	25.6%	24.3%	22.9%
Group	1.8%	0.8%	1.4%	3.5%
Total Non-Family	25.2%	26.4%	25.7%	26.4%
Total Households	100.0%	100.0%	100.0%	100.0%
Average Household Size (persons/dwelling)	2.46	2.46	2.46	2.59
Occupational Structure				

Variable	PTA	STA	Total Trade Area	Non Metropolitan QLD
Managers	10.6%	11.2%	10.8%	13.8%
Professionals	14.1%	11.6%	13.1%	13.2%
Technicians & Trade Workers	16.8%	15.8%	16.4%	16.3%
Community & Personal Service Workers	11.7%	11.2%	11.5%	9.2%
Clerical & Administrative Workers	13.0%	14.9%	13.8%	12.5%
Sales Workers	12.0%	9.9%	11.2%	9.2%
Machinery Operators & Drivers	6.0%	9.2%	7.3%	9.3%
Labourers	13.8%	14.7%	14.1%	14.6%
Inadequately Described/Not Stated	2.0%	1.5%	1.8%	1.9%
Total	100.0%	100.0%	100.0%	100.0%
Unemployment Rate	8.9%	8.3%	8.7%	4.8%
Annual Household Income				
Nil/Negative	1.2%	0.8%	1.0%	1.2%
$0-$7,799	1.5%	1.9%	1.6%	1.5%
$7,800-$12,999	7.2%	7.9%	7.5%	5.9%
$13,000-$18,199	10.2%	11.6%	10.7%	8.3%
$18,200-$25,999	12.8%	10.9%	12.1%	6.9%
$26,000-$33,799	17.5%	15.7%	16.8%	13.1%
$33,800-$41,599	7.9%	8.5%	8.2%	7.6%
$41,600-$51,999	8.0%	8.9%	8.3%	8.0%
$52,000-$62,399	12.5%	12.6%	12.6%	13.1%
$62,400-$72,799	5.5%	5.9%	5.6%	6.7%
$72,800-$88,399	5.4%	5.8%	5.6%	8.0%
$88,400-$103,999	3.5%	3.4%	3.5%	6.4%
$104,000-$129,999	3.2%	3.5%	3.3%	5.9%
$130,000-$155,999	1.9%	1.3%	1.7%	4.2%
Above $156,000	1.7%	1.3%	1.5%	3.2%
Total	100.0%	100.0%	100.0%	100.0%
Average Household Income ($2006)	$45,384	$44,599	$45,083	$57,327

Source: 2006 Census of Population & Housing - 2nd release data

8.2.2 Maryborough Trade Area

The Maryborough MTA in 2006 exhibited similar demographic characteristics compared to those found in Hervey Bay. A summary of key demographic data for the Maryborough MTA is provided in Table 8.3.

Age Structure

As indicated in Table 8.3, the Maryborough MTA had a similarly older age profile to Hervey Bay with 38.6% of residents being aged 50+ in 2006 compared with 41.1% in the Hervey Bay MTA and 30.7% in Non Metropolitan Queensland.

Household Structure

The household structure of the Maryborough MTA in 2006 also exhibited an under-representation of traditional households (27.7%) compared to 31.3% in Non Metropolitan Queensland and a higher incidence of couples without children (33.1%) and lone person households (25.6%).

Unemployment

The unemployment rate in the Maryborough MTA in 2006 at 8.3% was slightly less than Hervey Bay but still well above the average for Non Metropolitan Queensland (4.8%).

Occupation Structure

Like the Hervey Bay MTA, the Maryborough MTA in 2006 had an under-representation of upper white-collar occupations–22.8% compared to 27.0% in Non Metropolitan Queensland.

Household Income

The average household income at the 2006 Census in the Maryborough MTA was $44,599 per household per annum – **22.2% below** the average for Non Metropolitan Queensland ($57,327 per household per annum ($2006)).

Table 8.3: Socio-Economic Profile, Maryborough MTA and Non Metropolitan Queensland, 2006

Variable	PTA	STA	Total Trade Area	Non Metropolitan QLD
Population Count, 2006 (No. Persons)	26,074	7,045	33,119	1,369,917
Age Structure				
0-9 years	13.1%	11.1%	12.7%	14.3%
10-19 years	13.8%	12.8%	13.6%	14.6%
20-29 years	10.0%	5.8%	9.1%	11.9%
30-39 years	12.0%	11.0%	11.8%	13.7%
40-49 years	13.7%	16.1%	14.2%	14.8%
50-59 years	13.8%	19.4%	15.0%	13.1%
60+ years	23.6%	23.8%	23.6%	17.6%
Total	100.0%	100.0%	100.0%	100.0%
Household Structure				
Family Households				
Couples & Children	27.7%	27.5%	27.7%	31.3%
Couples Only	31.1%	40.5%	33.1%	30.0%
Single Parents	12.5%	9.2%	11.8%	11.3%
Other	1.0%	0.8%	1.0%	1.0%
Total Family	*72.3%*	*78.0%*	*73.6%*	*73.6%*
Non-Family Households				
Lone Person	26.7%	21.5%	25.6%	22.9%
Group	1.0%	0.4%	0.8%	3.5%
Total Non-Family	27.7%	22.0%	26.4%	26.4%
Total Households	100.0%	100.0%	100.0%	100.0%
Average Household Size (persons/dwelling)	2.45	2.47	2.46	2.59
Occupational Structure				
Managers	9.2%	18.8%	11.2%	13.8%
Professionals	12.3%	8.9%	11.6%	13.2%
Technicians & Trade Workers	16.1%	14.5%	15.8%	16.3%
Community & Personal Service Workers	11.4%	10.6%	11.2%	9.2%
Clerical & Administrative Workers	15.5%	12.7%	14.9%	12.5%
Sales Workers	10.8%	6.5%	9.9%	9.2%
Machinery Operators & Drivers	8.8%	10.6%	9.2%	9.3%
Labourers	14.4%	15.6%	14.7%	14.6%
Inadequately Described/Not Stated	1.5%	1.8%	1.5%	1.9%

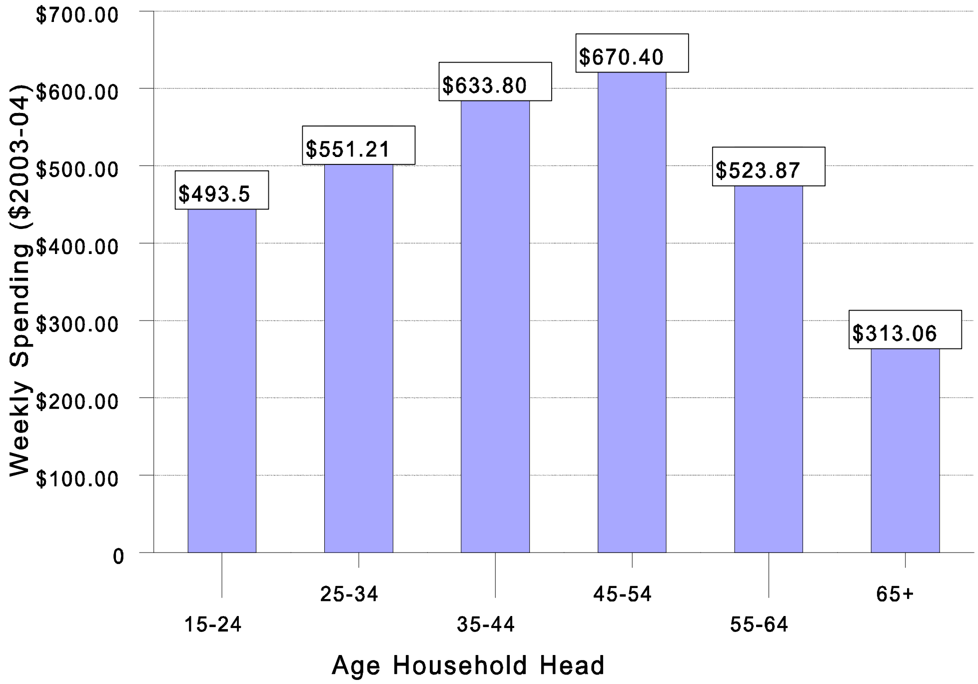
Variable	PTA	STA	Total Trade Area	Non Metropolitan QLD
Total	100.0%	100.0%	100.0%	100.0%
Unemployment Rate	8.1%	9.5%	8.3%	4.8%
Annual Household Income				
Nil/Negative	0.8%	1.0%	0.8%	1.2%
$0-$7,799	1.6%	3.0%	1.9%	1.5%
$7,800-$12,999	7.7%	8.5%	7.9%	5.9%
$13,000-$18,199	12.2%	9.7%	11.6%	8.3%
$18,200-$25,999	9.9%	14.5%	10.9%	6.9%
$26,000-$33,799	15.8%	15.4%	15.7%	13.1%
$33,800-$41,599	8.5%	8.6%	8.5%	7.6%
$41,600-$51,999	9.0%	8.8%	8.9%	8.0%
$52,000-$62,399	12.6%	11.8%	12.6%	13.1%
$62,400-$72,799	5.9%	5.9%	5.9%	6.7%
$72,800-$88,399	6.1%	4.8%	5.8%	8.0%
$88,400-$103,999	3.7%	2.4%	3.4%	6.4%
$104,000-$129,999	3.6%	3.1%	3.5%	5.9%
$130,000-$155,999	1.4%	1.0%	1.3%	4.2%
Above $156,000	1.2%	1.5%	1.3%	3.2%
Total	100.0%	100.0%	100.0%	100.0%
Average Household Income ($2006)	$45,175	$42,411	$44,599	$57,327

Source: 2006 Census of Population & Housing – 2nd release data

8.2.3 Summary

In summary, the demography of both the Hervey Bay and Maryborough MTAs can be expected to translate into a below average demand for retail floorspace on a per capita basis. It is important to note in this regard that detailed surveys of household expenditure trends by the ABS (Household Expenditure Survey 2003-04 for instance) have shown that household expenditure on retail goods and services declines sharply once households are headed by persons over the age 55 years (Figure 8.1).

Figure 8.1: Household Retail Spending by Age of Household Head



Source: ABS Household Expenditure Survey 2003-04

If the process of population ageing in the Fraser Coast continues, it is likely that average per capita expenditure levels on retail goods and services could actually decrease in real terms in the foreseeable future.

8.3 Retail Demand Assessment

An estimate of the potential demand for additional retail floorspace has been prepared for Fraser Coast Regional Council. This is based on the population projections which were prepared for Council by PIFU (refer to Table 2.2). PIFU estimate the resident population for the Fraser Coast Regional Council area will increase from 96,242 persons in 2011 to 152,283 persons in 2031. This constitutes growth of +56,041 persons over the forecast period or an increase of +43.7%. The major increases in population by catchment area will be as follows:

- Hervey Bay Urban ... +38,878 persons
- Maryborough Urban ... +6,047 persons.

The projected population growth will be a direct "driver" of retail expenditure growth and hence retail floorspace demand as discussed below.

In relation to spending by Fraser Coast residents, estimates of average per capita retail spending levels in 2011 ($2010) have been prepared based on data derived from the following sources:

- ABS Census 2006 – estimated average household income levels by catchment area;
- ABS 2003-04 Household Expenditure Survey (HES); and
- ABS Average Weekly Earnings data 2006-10;

- ABS Retail turnover data Queensland 2006-10; and
- ABS Consumer Price Index data Queensland 2006-10.

Average annual per capita retail spending in the Fraser Coast area is estimated at $9,130 per capita ($2010) in 2011. Average per capita spending varies from an estimated low of $7,547 per capita per annum (Fraser Island) to a high of $9,340 per capita per annum in the Hervey Bay Urban Surrounds catchment.

8.3.1 Resident Expenditure

Utilising the data sources noted above, estimates of average per capita retail spending rates in the Fraser Coast Council area were prepared by catchment areas. These estimates are provided in Appendix D.

As indicated in Appendix D, total available retail spending generated by residents in 2011 is estimated at some $878.6 million per annum ($2010). By 2031 total available retail spending is estimated to have increased to $1.539 billion ($2010). This represents a real increase in annual available spending of +$660.2 million over the 21 year forecast period.

Assuming an average floorspace productivity rate of $5,500/m^2 per annum for new retail floorspace, an increase in annual available retail spending of some $660.2 million would give rise to a nominal total demand for some 120,044m^2 of additional retail floorspace.

8.3.2 Floorspace Supply

Table 8.4 provides an estimate of the over- and under-supply of retail floorspace in the Fraser Coast Regional Council area in 2009. It should be noted that there are some critical assumptions on which this analysis of under-/over-supply is based. It has been assumed that the average floorspace productivity level of existing retail floorspace is $4,700/m^2 per annum ($2010). This estimate is based on observed retail sales data for both planned and strip type centres in locations in Queensland comparable to Hervey Bay/Maryborough.

This measure is used to convert the estimated volume of resident-based spending into an indicative demand for retail floorspace in the Hervey Bay catchment. The measure also represents what is considered a reasonable floorspace productivity rate–namely one that makes allowance for the differential turnovers of older space (lower turnover) and that of new floorspace (higher).

Table 8.4: Estimated Demand for Retail Floorspace – Fraser Coast Regional Council, 2009 (2010 dollars)

Factor	Fraser Coast Regional Council
Estimated Resident Population	96,242
Average Spending ($ per capita per annum)	$9,202
Total Available Retail Spending ($million per annum)	$885.6
Supply / Demand Balance (sqm)	
Total Indicative Demand	188,430
Existing Supply	190,450
Over-/Under-Supply	2,020

Note: The supply demand balance calculation assumed average floorspace productivity rate of $4,700/m^2 per annum ($2010)
Source: Leyshon Consulting estimates, March 2011

As indicated in Table 8.3, the Fraser Coast Region is estimated have contained approximately 190,450m^2 of retail floorspace in 2009.

Applying the average turnover standard of $4,700/m^2 per annum produces an indicative demand for retail floorspace in the Fraser Coast Regional Council area of some 188,430m^2 in 2009. Taking into account the estimated existing supply this suggests a slight over-supply of +2,020m^2 in 2009.

It also needs to be recognised that the analysis detailed in Table 8.3 assumes that all of the spending by Fraser Coast residents is undertaken within the Fraser Coast Region itself. For instance, a certain proportion of retail spending will always "escape" from the Fraser Coast to other surrounding areas including the Sunshine Coast and particularly to Brisbane. It is very difficult, if not impossible, to determine accurately the precise extent of this escape spending. This is particularly so for an economic region such as Fraser Coast which benefits substantially from retail spending by tourists and visitors.

That said, an approximation of the level of escape spending can be inferred by estimating the volume of floorspace at shopping centres on the Fraser Coast which is supported by spending by tourists and visitors. The quantum of floorspace which is supported by tourists and visitors spending–when deducted from the total existing floorspace supply–provides an insight into the net floorspace which is supported by resident-generated spending. This in turn permits a broad estimation of the proportion of resident-based demand which is escaping to other centres located outside of the Fraser Coast Region.

8.3.3 Tourist / Visitor Retail Expenditure

Tourists and visitors are also responsible for a substantial volume of spending at certain centres on the Fraser Coast. Centres such as Pialba, Scarness and Torquay benefit from substantial volumes of spending by tourists and visitors.

In the year to December, 2009 the Fraser Coast recorded some 785,000 domestic visitors. As indicated in Table 8.4 this was an overall decline of -2% over the level in the year to December, 2008.

Table 8.5: Tourist and Visitor Numbers – Fraser Coast, 2009

Factor	Visitors	Holiday	Visiting Friends and Relatives (VFR)	Business
Domestic Overnight	785,000	398,000	272,000	84,000
Annual Change (%)[1]	-2	28	-20	-34
Trend Change (%)[2]	0	3	-2	-11
International Overnight	191,000	182,000	8,000	n.p.
Annual Change (%)	-5	-4	-20	n.p.
Trend Change (%)	1	1	4	n.p.
Total	976,000	580,000	280,000	n.p.
Annual Change (%)	-2	16	-20	n.p.

Note 1: Annual change refers to the percentage change between the year ended December 2009 and the year ended December 2008
Note 2: Trend change refers to the percentage change between the trhee years to December 2008 and the three years to December 2009.
Source: Tourism Queensland, 2010

In total the Fraser Coast had some 191,000 international visitors in the year to December, 2009–a decline of -5% over the previous year.

Total visitor nights on the Fraser Coast were estimated in the year to December, 2009 as follows:

- Domestic visitors - 3,105,000 nights
- International visitors - 753,000 nights
- Total - 3,858,000 nights

Precise data on spending by overnight visitors to the Fraser Coast in 2009 are not available. Tourism Research Australia (TRA) in its quarterly Travel by Australians – December 2009 Quarterly Results of National Visitor Survey estimated domestic overnight visitor expenditure in regional Queensland at approximately $136 per visitor per night ($2009). In the absence of specific figures for the Fraser Coast this has been used as an assumption in the following analysis.

The TRA also estimated that expenditure by overnight visitors in Australia in the year to December, 2009 on retail-type goods and services broadly accounted for approximately 54.4% of all spending on other expenditure items including accommodation, meals, liquor, retail purchases and the like excluding long distance transport costs.

Included in retail-type expenditure are the following categories:

- Takeaway and restaurant meals
- Groceries et cetera for self-catering
- Alcohol and drinks (not elsewhere included)
- Shopping, gifts and souvenirs.

It should be noted that the expenditure figures quoted above are based on a survey of persons over the age of 15. Clearly a substantial number of tourists to the Fraser Coast (and elsewhere) are under the age of 15. For instance in Australia at present approximately 19% of the population is aged less than 15 years. Accordingly, it is considered appropriate to discount this expenditure figure on a per capita basis by 19% to $110 per visitor night to take account of visitors under the age of 15.

As indicated in Table 8.5, it is estimated that total visitor spending on the Fraser Coast in the year to December, 2009 was in the order of $424.4 million per annum excluding long distance travel. Retail-type spending is estimated to be in the order of $230.9 million per annum in the year to December, 2009.

Table 8.6: Estimated Tourist & Visitor Spending – Fraser Coast, 2009 ($2009)

Factor	2009
Total Tourist / Visitor Nights (millions)	3.858
Average spending ($ / person / night)	$110
Total Tourist / Visitor Spending ($ million)	$424.4
Retail Type Spending	54.4%
Total Tourist / Visitor Retail Type Spending ($ million)	$230.9
Retail Floorspace Supported by Total Tourist / Visitor Type Spending (m^2)	41,975

Source: Leyshon Consulting Estimates, May 2010

A broad estimate of the amount of retail floorspace such expenditure might support within the FCRCA has been prepared. In doing so, a higher floorspace productivity rate than that applied to the analysis of resident-based spending has been applied. The principal reason for this is that spending by tourist and visitors is likely to be concentrated in higher turnover categories such as fast food, alcohol, clothing and footwear, gift-ware et cetera than those retail categories which have lower average turnover characteristics such as furniture and floor coverings, domestic appliances, whitegoods, hardware and the like.

Adopting an assumption of some $5,500/m^2 per annum in 2009 as far as visitor retail spending is concerned, it is estimated that spending by tourists and visitors to the Fraser Coast could have potentially supported up to 41,975m^2 of retail floorspace in 2009.

Based on trends in the tourism sector evident at the time this Report was prepared it has been assumed that little growth in tourist spending would have occurred between 2009-11.

8.3.4 Escape Retail Spending

Using this estimate a broad measure of escape spending can be derived by deducting the amount of floorspace supported by tourist and visitor spending from the existing supply and comparing it to the indicative demand for floorspace generated by resident-based spending. This calculation suggests in summary that escape expenditure, as far as residents of the Fraser Coast are concerned, could be as high as 21.2% as follows:

- Existing supply - 190,450m^2
- Less floorspace supported by tourism - 41,975m^2
- Net space supported by resident spending - 148,475m^2
- Indicative resident demand - 188,430m^2
- Indicative escape - 39,955m^2
- Escape percentage - 21.2%.

In broad terms, the escape demand for retail floorspace indicated above (39,955m^2) is equivalent to an outflow of spending by residents in the order of $190 million per annum. It is important to note, however, that at present the inflow of spending by tourists and visitors on an annual basis is very similar to the projected outflow of "escape" resident spending.

Escape spending of this magnitude is not surprising given the Fraser Coast does not have a department store such as Myer or David Jones and has an under-supply of certain retail categories such as national chain fashion and footwear outlets.

In any event, it needs to be recognised that regional areas like the Fraser Coast invariably will have a relatively significant component of escape spending and particularly in this case given the proximity of the Fraser Coast to the Sunshine Coast and Brisbane both of which contain a wide array of retail services which will always attract inbound expenditure from other regions of Queensland. In addition, what is often overlooked is that residents of every region undertake a significant proportion of their annual expenditure on retail goods and services while on holidays whether it be to other regions of Australia or overseas, and increasingly on internet-based shopping.

8.3.5 Projected Retail Demand

The projected growth within what could best be described as the PTAs of the two major centres in the Fraser Coast–namely Hervey Bay and Maryborough has been analysed. In defining these areas it has been assumed that Hervey Bay's PTA includes the following catchment areas:

- Hervey Bay Urban;
- Coastal Hervey Bay;
- Hinterland Hervey Bay;
- Hervey Bay Urban Surrounds; and
- Fraser Island.

In relation to Maryborough, it has been assumed its PTA comprises the following:

- Maryborough Urban;
- Maryborough Urban Surrounds; and
- Coastal Maryborough.

It should be noted that Hervey Bay (Pialba Place and Boat Harbour Drive) capture some spending from the Maryborough PTA principally because Hervey Bay contains such a significant component of bulky goods floorspace: this is not provided within Maryborough.

Demand in Major Centres

Based on data contained in Appendix D, the estimated growth in population and retail spending in the two major centres is summarised in Table 8.6. Some estimates of the indicative increase in floorspace demand between 2011 and 2031 are also provided.

Table 8.7: Estimated Population & Retail Spending Growth – Major Centres, 2011-31 ($2010)

Major Centre	Population Increase	Spending Increase ($million per annum)	Indicative Floorspace Increase
Major Centre			
Hervey Bay	43,865	$508.6	92,490
Maryborough	8,974	$117.8	21,465

Source: Leyshon Consulting estimates, 2011

In summary, between 2011 and 2031 it is estimated that there will be extremely strong growth in annual available spending within the Hervey Bay trade area (+$508.6 million). This will give rise to an indicative demand for additional retail floorspace of up to 92,500m^2. In the Maryborough catchment, population growth will lift annual available spending by an estimated $117.8 million between 2011 and 2031 implying demand for up to 21,465m^2 of additional retail floorspace.

The increase in floorspace projected for Hervey Bay is very significant given that Pialba Place and Boat Harbour Drive collectively already contain around 100,000m^2 of retail floorspace. In this context the growth projected for 2011-31 translates into floorspace demand almost equivalent to the replication of these two centres.

Supermarket Floor Space Demand

Supermarket spending and demand for floorspace is a key driver of the development of new centres particularly as supermarkets capture around 31% of all retail spending in Queensland. As summarised in Table 8.7, the projected increase in annual available supermarket spending in the Hervey Bay catchment between 2011 and 2031 ($162.8 million) would justify an additional 16,280m^2 of supermarket floorspace. This is equivalent to four to five full-line stores.

Table 8.8: Estimated Growth in Supermarket Expenditure and Floor Space – Major Centres, 2011-31 ($2010)

Major Centre	Spending Increase ($ million per annum)	Supportable Floorspace (m^2)	Indicative Number of Full-Line Stores
Hervey Bay	$162.8	16,280	4-5
Maryborough	$37.7	3,700	1

Source: Leyshon Consulting Estimates, 2011

In the Maryborough catchment forecast growth in annual available supermarket spending is a more conservative ($37.7 million). This would give rise to estimated additional demand for 3,700m^2 of supermarket floorspace or around one new full-line supermarket.

DDS / Department Store Floor Space Demand

It is also relevant to consider what the projected population increase may mean with respect to DDSs and department stores. In the Hervey Bay catchment, for instance, growth of 43,865 persons between 2011 and 2031 would be sufficient to support an additional DDS. It is difficult, however, to envisage whether development of another DDS will actually eventuate because–assuming the Centro Hervey Bay centre is expanded as is currently proposed–the Pialba Place/Boat Harbour Drive area will soon contain Big W, Target and Kmart DDSs.

As discussed later in this Report, there is some prospect of a DDS anchored centre being viable in the Nikenbah area over the longer term.

It is also considered relevant to note that by 2026 the projected total population of the Fraser Coast region will be some 135,000 persons. This is sufficient to justify the development of a department store such as Myer. That said, recently developed department stores by Myer are in the order of only 10,000-12,000m^2. In our opinion, Hervey Bay in general and the Boat Harbour Drive precinct in particular, is considered to be a logical location within the Fraser Coast for such a store.

Demand for New Centres

Over and above development which might be concentrated in the major centres of Hervey Bay and Maryborough, there will be a need for new neighbourhood centres to service significant residential growth projected for areas such as Urangan South (south of Boundary Road and west of Walkers Road), Doolong Flats and particularly in the Nikenbah area to the west of the Maryborough/Hervey Bay Road and to the south of Mountain Road.

Prima facie between 2011 and 2021 each of these appears capable of accommodating centres anchored by a full-line supermarket although the time-frame for this to occur is more likely to be between 2016 and 2031.

The establishment of a supermarket anchored centre along Boat Harbour Drive between Pialba and Urangan Central is worthy of closer examination given the difficulties associated with expanding the current supermarket "offer" at Urangan, Torquay and Scarness. A centre in this general location could in the short to medium term (5-10years) serve the population growth projected to occur in the South Urangan area until that are warrants a supermarket in its own right.

9 COMMERCIAL OFFICE MARKET ASSESSMENT

9.1 Commercial Office Demand

9.1.1 Drivers of Commercial Office Demand

Demand for goods and services stimulate investment in productive capacity, which in turn results in increasing demand for land to accommodate employment. Therefore, there is a positive correlation between general levels of economic activity within the economy and demand for commercial office space.

Employment in industry sectors, which utilise commercial office space, can be considered to be the key drivers for commercial office space demand. Using employment growth as a proxy for economic growth it is possible to estimate the future demand for commercial office space in a given region.

9.1.2 Employment in Industries Requiring Commercial Office Space

The key industry sectors requiring commercial office space are:

- Financial & insurance services
– Finance;
– Insurance & superannuation funds;
– Auxiliary finance & insurance services;
– Finance & insurance services, nfd;
- Professional, scientific & technical services
– Professional, scientific & technical services[8];
– Professional, scientific & technical services, nfd;
– Computer system design and related services;
- Health care & social assistance
– Medical & other health care services;
- Rental, hiring & real estate services
– Property operators & real estate services;
- Public administration & safety
– Public administration;
- Information media & telecommunications
– Internet publishing & broadcasting;
– Internet service providers, web search portals and data processing services; and

[8] Except computer services design and related services

- Administrative & support services
  – Administrative services.

9.1.3 Employment Projections for Commercial Office Space

Employment within Commercial Office Sectors

The number of persons employed in commercial office sectors in Fraser Coast Regional Council is projected to increase from 4,424 persons in 2011 to 7,950 persons in 2031. Within Fraser Coast Regional Council, the Hervey Bay Urban and Maryborough Urban catchments are anticipated to have the highest number of persons employed in commercial office sectors.

Table 9.1: Projected Employment in Commercial Office Sectors by Catchment, Fraser Coast Regional Council, 2011 to 2031

Catchment	2011	2016	2021	2026	2031
Hervey Bay Urban	1,560	1,817	2,123	2,467	2,850
Maryborough Urban	1,806	1,959	2,143	2,344	2,535
Coastal Hervey Bay	194	246	300	362	438
Hinterland Hervey Bay	217	254	310	435	614
Maryborough Urban Surrounds	252	274	313	414	546
Rural South Catchment	63	77	92	109	130
Hervey Bay Urban Surrounds	217	254	310	435	614
Rural South West	34	50	69	93	119
Coastal Maryborough	45	48	51	54	58
Fraser Island	35	37	40	43	47
Fraser Coast Regional Council	**4,424**	**5,017**	**5,751**	**6,756**	**7,950**

Source: Economic Associates estimates

Employment within Commercial Office Space

Employing businesses typically use purpose built commercial office space to conduct their business activities. However, in the case of sole traders, a significant proportion choose to operate their business within their home (home based businesses). As such, the bulk of dedicated commercial office floor space demand would be generated by employing businesses, with only a proportion of sole traders seeking dedicated office space. This analysis of commercial office demand estimates demand for dedicated commercial office space by employing business and a proportion of sole traders and homed based office demand by the remaining sole traders.

The analysis below provides estimates regarding employment within employing businesses versus sole trader enterprises.

The proportion of businesses which employ staff has been estimated through use of business count data by number of employees for each former LGA within Fraser Coast Regional Council and is summarised in Table 9.2. In the case of the public administration & safety sector, it has been assumed that 100% of employment is within employing businesses.

There were no employing information media & telecommunications businesses identified within Fraser Coast Regional Council.

Table 9.2: Proportion of Total Employment within Businesses that Employ Staff, Fraser Coast Regional Council by former Local Government Area

Commercial Office Sectors	Hervey Bay	Maryborough	Tiaro	Woocoo
Financial & Insurance Services	50%	75%	0%	0%
Professional, Scientific & Technical Services	90%	85%	80%	80%
Health Care & Social Assistance	95%	85%	70%	70%
Rental, Hiring & Real Estate Services	85%	55%	80%	80%
Public Administration & Safety	100%	100%	100%	100%
Information Media & Telecommunications	0%	0%	0%	0%
Administrative & Support Services	90%	95%	70%	70%

Note: Incidences have been round to nearest 5%
Source: ABS Business Count Data

By 2031, it is anticipated that the catchments with the highest number of workers in employing businesses are anticipated to be:

- Hervey Bay Urban (2,502 persons in employing businesses); and
- Maryborough Urban (2,238 persons in employing businesses).

On the other hand, the number of sole traders / home based businesses is projected to be highest in:

- Hervey Bay Urban (348 sole traders / home based businesses); and
- Maryborough Urban (297 sole traders / home based businesses).

Table 9.3: Projected Employment in Commercial Office Space for Employing Businesses & Sole Traders / Home Based Businesses, Fraser Coast Regional Council, 2009 to 2031

Catchment	2011	2016	2021	2026	2031
Employing Businesses					
Hervey Bay Urban	1,368	1,594	1,862	2,165	2,502
Maryborough Urban	1,595	1,730	1,893	2,069	2,238
Coastal Hervey Bay	359	433	505	573	645
Hinterland Hervey Bay	170	215	263	317	385
Maryborough Urban Surrounds	222	242	277	365	482
Rural South Catchment	56	67	78	93	109
Hervey Bay Urban Surrounds	191	223	272	382	539
Rural South West	28	39	52	68	87
Coastal Maryborough	40	42	45	48	51
Fraser Island	31	33	35	38	41
Fraser Coast Regional Council	**4,058**	**4,618**	**5,283**	**6,119**	**7,079**
Sole Traders / Home Based Businesses					
Hervey Bay Urban	192	224	261	302	348
Maryborough Urban	211	229	251	274	297
Coastal Hervey Bay	50	61	71	80	90
Hinterland Hervey Bay	24	30	37	44	53
Maryborough Urban Surrounds	29	32	37	48	64
Rural South Catchment	8	10	13	17	21
Hervey Bay Urban Surrounds	27	31	38	53	75
Rural South West	7	11	17	24	33
Coastal Maryborough	5	6	6	6	7
Fraser Island	4	4	5	5	5
Fraser Coast Regional Council	**558**	**638**	**734**	**854**	**993**

Catchment	2011	2016	2021	2026	2031

Source: Economic Associates estimates derived from Table 5.1 and Table 5.2.

Commercial Office Floor Space Demand

In converting employment estimates to commercial office floor space demand estimates, it has been assumed that employing businesses in Fraser Coast Regional Council provide an average of 17.5m^2 per employee.

In the case of sole traders and home based businesses, it has been assumed that 50% of all employment would require office space. Given that each one of these businesses requiring commercial office space would only house a single worker, it has been assumed that 25m^2 per worker would be required.

Total commercial office floor space demand in Fraser Coast Regional Council is projected to increase from 77,991m^2 in 2011 to 136,285m^2 in 2031. Hervey Bay Urban and Maryborough Urban are projected to remain the key areas of demand within Fraser Coast Regional Council.

Table 9.4: Commercial Office Floor Space Demand, Fraser Coast Regional Council by Catchment, 2011 to 2031

Catchment	2011	2016	2021	2026	2031
Employing Businesses					
Hervey Bay Urban	23,940	27,886	32,593	37,890	43,790
Maryborough Urban	27,915	30,282	33,123	36,215	39,169
Coastal Hervey Bay	6,278	7,569	8,844	10,022	11,286
Hinterland Hervey Bay	2,979	3,768	4,599	5,554	6,731
Maryborough Urban Surrounds	3,887	4,235	4,840	6,391	8,433
Rural South Catchment	976	1,170	1,374	1,622	1,911
Hervey Bay Urban Surrounds	3,334	3,900	4,762	6,687	9,427
Rural South West	486	683	910	1,195	1,516
Coastal Maryborough	691	740	784	837	892
Fraser Island	536	579	620	668	720
Fraser Coast Regional Council	71,022	80,814	92,450	107,080	123,874
Sole Traders / Home Based Businesses					
Hervey Bay Urban	2,406	2,794	3,256	3,775	4,350
Maryborough Urban	2,637	2,863	3,134	3,428	3,711
Coastal Hervey Bay	631	758	884	998	1,121
Hinterland Hervey Bay	299	378	460	553	669
Maryborough Urban Surrounds	367	400	458	605	799
Rural South Catchment	95	126	163	209	264
Hervey Bay Urban Surrounds	335	391	476	666	936
Rural South West	83	142	214	304	408
Coastal Maryborough	65	70	74	79	85
Fraser Island	51	55	59	63	68
Fraser Coast Regional Council	6,969	7,978	9,176	10,681	12,411
Total					
Hervey Bay Urban	26,346	30,681	35,850	41,664	48,139
Maryborough Urban	30,552	33,145	36,257	39,643	42,880
Coastal Hervey Bay	6,908	8,328	9,728	11,021	12,407
Hinterland Hervey Bay	3,278	4,146	5,059	6,107	7,400
Maryborough Urban Surrounds	4,254	4,636	5,298	6,996	9,232
Rural South Catchment	1,071	1,297	1,537	1,830	2,175

Catchment	2011	2016	2021	2026	2031
Hervey Bay Urban Surrounds	3,669	4,291	5,238	7,353	10,364
Rural South West	569	825	1,124	1,498	1,924
Coastal Maryborough	757	810	859	916	977
Fraser Island	586	634	678	731	788
Fraser Coast Regional Council	77,991	88,792	101,626	117,761	136,285

Source: Economic Associates estimates

Incremental Commercial Office Floor Space Demand

Between 2011 and 2031, demand for commercial office floor space within Fraser Coast Regional Council is projected to increase by 58,295m^2, with an additional 52,852m^2 demanded by employing businesses and an additional 5,442m^2 demanded by sole traders.

Table 9.5: Incremental Commercial Office Floor Space Demand, Fraser Coast Regional Council, 2016-2031

Catchment	2016	2021	2026	2031
Employing Businesses				
Hervey Bay Urban	3,946	8,653	13,949	19,849
Maryborough Urban	2,367	5,208	8,300	11,254
Coastal Hervey Bay	1,292	2,567	3,745	5,008
Hinterland Hervey Bay	789	1,620	2,575	3,752
Maryborough Urban Surrounds	348	953	2,504	4,545
Rural South Catchment	195	398	646	935
Hervey Bay Urban Surrounds	566	1,429	3,353	6,094
Rural South West	197	424	708	1,029
Coastal Maryborough	49	93	146	201
Fraser Island	43	84	132	184
Fraser Coast Regional Council	**9,792**	**21,428**	**36,058**	**52,852**
Sole Traders / Home Based Businesses				
Hervey Bay Urban	388	851	1,369	1,944
Maryborough Urban	226	496	791	1,074
Coastal Hervey Bay	128	253	368	490
Hinterland Hervey Bay	78	160	254	369
Maryborough Urban Surrounds	33	91	238	432
Rural South Catchment	32	68	114	170
Hervey Bay Urban Surrounds	56	141	331	601
Rural South West	59	131	221	325
Coastal Maryborough	5	9	14	19
Fraser Island	4	8	13	18
Fraser Coast Regional Council	**1,009**	**2,207**	**3,712**	**5,442**
Hervey Bay Urban	4,334	9,504	15,318	21,793
Maryborough Urban	2,593	5,705	9,091	12,328
Coastal Hervey Bay	1,419	2,819	4,112	5,498
Hinterland Hervey Bay	867	1,780	2,829	4,122
Maryborough Urban Surrounds	381	1,043	2,742	4,977
Rural South Catchment	226	466	760	1,105
Hervey Bay Urban Surrounds	622	1,569	3,684	6,695
Rural South West	256	554	929	1,355
Coastal Maryborough	54	102	160	220
Fraser Island	48	92	145	202
Fraser Coast Regional Council	**10,801**	**23,635**	**39,770**	**58,295**

Catchment	2016	2021	2026	2031

Source: Economic Associates estimates

9.2 Commercial Office Needs Assessment

9.2.1 Supply Demand Balance

The supply demand balance has been presented at the former local government area level to provide an indication of where there are shortages in the provision of commercial office floor space.

At present, the estimates suggest that there is sufficient commercial office floor space supply in Fraser Coast Regional Council.

By 2031, the projected shortages in commercial office floor space are projected to be:

- 16,454m^2 in Maryborough;
- 29,959m^2 in Hervey Bay;
- 2,175m^2 in Tiaro; and
- 1,924m^2 in Woocoo.

Table 9.6: Supply Demand Balance by former LGA, Fraser Coast Regional Council

	2011	2016	2021	2026	2031
Supply					
Maryborough	37,422	37,422	37,422	37,422	37,422
Hervey Bay	45,597	48,351	48,351	48,351	48,351
Tiaro	0	0	0	0	0
Woocoo	0	0	0	0	0
Fraser Coast RC	83,019	85,773	85,773	85,773	85,773
Demand					
Maryborough	36,149	39,224	43,091	48,287	53,876
Hervey Bay	40,202	47,445	55,875	66,145	78,310
Tiaro	1,071	1,297	1,537	1,830	2,175
Woocoo	569	825	1,124	1,498	1,924
Fraser Coast RC	77,991	88,792	101,626	117,761	136,285
Supply-Demand Balance					
Maryborough	1,273	-1,802	-5,669	-10,865	-16,454
Hervey Bay	5,395	906	-7,524	-17,794	-29,959
Tiaro	-1,071	-1,297	-1,537	-1,830	-2,175
Woocoo	-569	-825	-1,124	-1,498	-1,924
Fraser Coast RC	5,028	-3,019	-15,854	-31,988	-50,513

Note: A negative (positive) supply demand balance suggests a shortage (excess supply) of commercial office floor space.
Source: Economic Associates estimates

10 INDUSTRIAL LAND MARKET ASSESSMENT

10.1 Industrial Land Demand

10.1.1 Drivers of Industrial Land Demand

Demand for goods and services stimulates investment in productive capacity, which in turn results in increasing demand for land to locate production facilities and accommodate employees. Therefore, there is a positive correlation between general levels of economic activity within the economy and demand for industrial land.

Labour productivity and employment are also considered to have a positive relationship with the demand for industrial land. Employment in industry sectors which utilise industrial land is considered to be the key direct driver of demand for industrial land. Using employment growth as a proxy for economic growth, it is possible to estimate the future demand for industrial land in a given region.

Industrial land demand estimates are presented at both the former local government area level and the catchment level.

10.1.2 Industrial Area Employment Projections

Industry Sectors in Industrial Estates

Certain key industries tend to locate in industrial estates. The key industry sectors which are broadly considered to locate in industrial areas include:

- Manufacturing;
- Warehousing & storage services; and
- Wholesale trade.

Industrial activity can be classified into four main categories, these being:

- Large Footprint & General Industry: sheet metal fabrication, welding shops, food & beverage manufacturing, concrete product manufacturing, cement batching plants, large equipment or machinery repair, etc;
- Service Industry: construction services, printers, locksmiths, canvas repair, etc;
- Warehousing & Storage: landscape supplies, storage units, equipment hire, etc; and
- Transport uses: truck and agricultural machinery sales and servicing, road transport depots, tyre sales, etc.
- The two digit ANZSIC classifications contained within each category are:
- Large Footprint & General Industry[9]:

[9] Typically the distinction between general industry and high impact or large footprint industry is based on the scale of a particular operation in addition to its industry classification. As such, they are grouped for the purposes of these demand projections.

- Beverage & tobacco product manufacturing;
- Food product manufacturing;
- Wood product manufacturing;
- Pulp, paper & converted paper product manufacturing;
- Petroleum & coal product manufacturing;
- Basic chemical & chemical product manufacturing;
- Polymer product & rubber product manufacturing;
- Non-metallic mineral product manufacturing;
- Primary metal & metal product manufacturing;
- Machinery & equipment manufacturing;
- Fabricated metal product manufacturing;
- Transport equipment manufacturing; and
- Furniture and other manufacturing.

• Service Industry:

- Textile, clothing, leather & footwear manufacturing;
- Printing (including reproduction of recorded media);
- Publishing (except internet & music publishing);
- Construction services; and
- Repair and Maintenance.

• Warehousing & Storage:

- Basic material wholesaling;
- Machinery & equipment wholesaling;
- Motor vehicle & motor vehicle parts wholesaling;
- Grocery, liquor & tobacco product wholesaling;
- Other goods wholesaling; and
- Warehousing & storage services.

• Transport Uses:

- Motor vehicle & motor vehicle parts retailing;
- Road transport;
- Rail transport;
- Transport support services; and
- Postal and courier pick-up and delivery services.

Projected Industrial Employment by former Local Government Area

In Fraser Coast Regional Council, employment in industrial sectors in 2011 is estimated at 7,067 workers, comprising:

- 3,038 workers in the former Hervey Bay LGA;
- 3,777 workers in the former Maryborough LGA;
- 164 workers in Divisions 1 and 2 of the former Tiaro LGA;
- 88 workers in the former Woocoo LGA.

By 2031, total industrial employment in Fraser Coast Regional Council is projected to increase to 13,028 workers, comprising:

- 6,520 workers in the former Hervey Bay LGA;
- 5,913 workers in the former Maryborough LGA;
- 373 workers in Divisions 1 and 2 of the former Tiaro LGA; and
- 223 workers in the former Woocoo LGA.

Large footprint and general industry is projected to be the largest industrial sub-sector in all former LGAs, with the exception of the former Hervey Bay LGA, where service industry is the largest industrial sub-sector.

Table 10.1 below summarises the projected industrial employment by former local government area within Fraser Coast Regional Council between 2011 and 2031.

Table 10.1: Projected Industrial Employment by former Local Government Area, Fraser Coast Regional Council, 2011-2031

	2011	2016	2021	2026	2031
Hervey Bay					
Large footprint & general industry	637	782	958	1,181	1,456
Service industry	1,315	1,579	1,890	2,274	2,735
Warehousing & storage	373	442	522	620	736
Transport uses	561	689	842	1,033	1,267
Non industrial land uses	152	184	222	269	326
Total	3,038	3,675	4,434	5,377	6,520
Maryborough					
Large footprint & general industry	1,681	1,839	2,039	2,308	2,601
Service industry	728	797	882	996	1,120
Warehousing & storage	282	308	341	385	433
Transport uses	897	996	1,119	1,283	1,463
Non industrial land uses	189	207	231	262	296
Total	3,777	4,148	4,613	5,233	5,913
Tiaro					
Large footprint & general industry	60	73	88	107	130
Service industry	35	43	50	59	70
Warehousing & storage	28	35	42	50	60
Transport uses	32	43	56	73	94
Non industrial land uses	8	10	12	15	19
Total	164	204	248	304	373

	2011	2016	2021	2026	2031
Woocoo					
Large footprint & general industry	34	43	53	65	79
Service industry	19	23	28	35	42
Warehousing & storage	10	14	19	24	30
Transport uses	20	28	37	48	62
Non industrial land uses	4	6	7	9	11
Total	88	114	144	181	223
Fraser Coast RC					
Large footprint & general industry	2,411	2,737	3,138	3,661	4,266
Service industry	2,098	2,441	2,851	3,364	3,967
Warehousing & storage	694	799	923	1,079	1,258
Transport uses	1,511	1,756	2,054	2,437	2,885
Non industrial land uses	353	407	472	555	651
Total	7,067	8,140	9,439	11,096	13,028

Source: Economic Associates estimates

Projected Industrial Employment by Catchment

Based on assumptions in section 4 of the report, employment in industrial sectors in Fraser Coast Regional Council is an estimated 7,067 workers in 2011, with employment concentrated in:

- Maryborough Urban – 3,192 industrial workers; and
- Hervey Bay Urban – 1,991 industrial workers.

By 2031, industrial employment within Fraser Coast Regional Council is projected to increase to 13,028 workers, with employment concentrated in:

- Maryborough Urban – 4,706 workers; and
- Hervey Bay Urban – 4,008 workers.

Table 10.2 provides the employment projections within industrial sectors for each catchment within Fraser Coast Regional Council between 2011 and 2031.

Table 10.2: Employment Projections, Industrial Land Sectors, Fraser Coast Regional Council, 2011 to 2031

Catchment	2011	2016	2021	2026	2031
Hervey Bay Urban	1,991	2,376	2,845	3,387	4,008
Maryborough Urban	3,192	3,505	3,881	4,296	4,706
Coastal Hervey Bay	522	645	772	896	1,033
Hinterland Hervey Bay	248	321	401	496	616
Maryborough Urban Surrounds	445	490	567	758	1,013
Rural South Catchment	164	204	248	304	373
Hervey Bay Urban Surrounds	277	332	416	598	863
Rural South West	88	114	144	181	223
Coastal Maryborough	79	86	92	99	107
Fraser Island	61	67	73	79	86
Fraser Coast Regional Council	**7,067**	**8,140**	**9,439**	**11,096**	**13,028**

Source: Economic Associates estimates

10.1.3 Industrial Land Demand Projections

Industrial land demand projections are derived by applying employment density ratios (employees per hectare) to employment projections for those industry sectors that utilise industrial land. The application of employment density ratios to employment projections generates net (or allotment) industrial land demand. Net industrial land demand projections are converted to gross land demand projections by making allowances for roads, infrastructure services and open space areas.

The incremental land demand, demand post 2009, represents future demand or demand over and above land already taken up for industrial uses. Incremental land demand can also be described as the land take-up rate.

Figure 6.1 below illustrates the process of converting employment projections to land demand projections as described above.

Figure 10.1: Process of converting employment projections to land demand projections

Employment Density Ratios

Industrial land demand projections have been derived from employment projections and employment density ratios for industry sectors which utilise industrial land. Employment density ratios were determined through consultation with State government departments and agencies, local governments, industry (or industrial land users) and property developers and agencies.

For the purposes of this analysis, the assumed employment densities have been kept constant throughout the projection period. Table 6.5 below summarises the assumed employment density ratios for Fraser Coast Regional Council.

Table 10.3: Assumed Employment Density Ratios, 2011 to 2031

Industry Type	Employment Density (persons / ha)
Large Footprint and General Industry	
Beverage and Tobacco Product Manufacturing	35
Food Product Manufacturing	35
Wood Product Manufacturing	30
Pulp, Paper and Converted Paper Product Manufacturing	35
Petroleum and Coal Product Manufacturing	30
Basic Chemical and Chemical Product Manufacturing	30
Polymer Product and Rubber Product Manufacturing	25
Non-Metallic Mineral Product Manufacturing	20
Primary Metal and Metal Product Manufacturing	25
Machinery and Equipment Manufacturing	40
Fabricated Metal Product Manufacturing	30
Transport Equipment Manufacturing	40
Furniture and Other Manufacturing	30
Service Industry	
Textile, Leather, Clothing and Footwear Manufacturing	40
Printing (including Reproduction of Recorded Media)	40
Publishing (except Internet and Music Publishing)	40
Construction Services	30
Repair and Maintenance	35
Warehousing & Storage	20
Basic Material Wholesaling	15
Machinery and Equipment Wholesaling	15
Motor Vehicle and Motor Vehicle Parts Wholesaling	20
Grocery, Liquor and Tobacco Product Wholesaling	20
Other Goods Wholesaling	15
Warehousing and Storage Services	
Transport Uses	
Motor Vehicle and Motor Vehicle Parts Retailing	25
Road Transport	25
Rail Transport	20
Transport Support Services	25
Postal and Courier Pick-up and Delivery Services	30

Source: Informed by consultation with businesses in the Wide Bay – Burnett region

Gross Industrial Land Demand

As stated above, to determine gross industrial land demand, the following calculations are made:

- Prepare employment projections for industrial sectors.
- Divide employment projections by employment density ratios to obtain net industrial land demand projections.
- Multiply net industrial land demand projections by allowances for services and open space buffers to obtain gross industrial land demand projections.

As stated above gross land demand equals net industrial land demand (i.e. industrial allotment demand) plus allowances made for roads, services and open space.

The requirement for roads and service reserves varies between regions and type of land use. The Department of Business, Industry and Regional Development's (DBIRD)[10] information paper on *Establishing Future Business and Industry Land Requirements and Identifying Strategically Important Sites* indicates that industrial areas require the equivalent of between 5% and 10% of total allotment area for the provision of road and service corridors, and the equivalent of between 30% and 40% of total allotment area for open space and buffers[11].

Large footprint and general industry uses, and those reliant on heavy vehicle access, are anticipated to require greater provision for roads, reserves and buffers than lower impact areas, such as service industry precincts.

Table 6.6 below summarises the assumptions used in estimating the industrial land requirement over and above allotment areas.

Table 10.4: Allowances for services and open space buffers by industry type

Industry Type	Services	Open Space
Large Footprint / General Industry	12.5%	40.0%
Service industry	5.0%	25.0%
Warehousing & storage	10.0%	35.0%
Transport uses	10.0%	35.0%

Gross Industrial Land Demand by former Local Government Area

In Fraser Coast Regional Council, gross industrial land demand is estimated at 392 hectares in 2011, comprising:

- 155 hectares in the former Hervey Bay LGA;
- 207 hectares in the former Maryborough LGA;
- 9 hectares in Divisions 1 and 2 of the former Tiaro LGA; and
- 5 hectares in the former Woocoo LGA.

[10] The Department of Business, Industry and Regional Development was a predecessor to the Department of State Development, Trade and Innovation.

[11] Consultations with the Coordinator General's Land (Infrastructure) group

By 2031, gross industrial demand in Fraser Coast Regional Council is projected to increase to 682 hectares, comprising:

- 333 hectares in the former Hervey Bay LGA;
- 324 hectares in the former Maryborough LGA;
- 21 hectares in Divisions 1 and 2 of the former Tiaro LGA; and
- 14 hectares in the former Woocoo LGA.

Large footprint and general industry is projected to be the key sub-sector of demand in Fraser Coast Regional Council, particularly in the former Maryborough LGA. Service industry is projected to be the key sub-sector of demand in the former Hervey Bay LGA. Both large footprint & general industry and transport uses are projected to be key sectors of demand in the former Tiaro and Woocoo LGAs.

Table 10.5: Gross Industrial Land Demand by former Local Government Area, Fraser Coast Regional Council, 2011 to 2031

	2011	2016	2021	2026	2031
Hervey Bay					
Large footprint & general industry	32	40	49	60	75
Service industry	53	64	76	92	110
Warehousing & storage	29	35	41	49	59
Transport uses	32	39	48	59	73
Non industrial land uses	8	9	11	14	17
Total	155	187	226	274	333
Maryborough					
Large footprint & general industry	79	87	96	109	123
Service industry	29	31	35	39	44
Warehousing & storage	22	25	27	31	35
Transport uses	66	73	81	93	105
Non industrial land uses	10	11	13	14	16
Total	207	227	252	287	324
Tiaro					
Large footprint & general industry	3	4	4	5	7
Service industry	1	2	2	2	3
Warehousing & storage	2	3	3	4	5
Transport uses	2	3	3	5	6
Non industrial land uses	0	1	1	1	1
Total	9	11	14	17	21
Woocoo					
Large footprint & general industry	2	2	3	3	4
Service industry	1	1	1	1	2
Warehousing & storage	1	1	2	2	3
Transport uses	1	2	3	4	5
Non industrial land uses	0	0	0	1	1
Total	5	7	9	11	14

	2011	2016	2021	2026	2031
Fraser Coast RC					
Large footprint & general industry	116	133	152	178	208
Service industry	84	98	114	134	158
Warehousing & storage	55	63	74	86	101
Transport uses	101	117	136	160	189
Non industrial land uses	19	22	25	29	35
Total	375	432	501	589	692

Source: Economic Associates estimates

Gross Industrial Land Demand by Catchment

Gross industrial land demand in Fraser Coast Regional Council is projected to increase from 375 hectares in 2011 to 692 hectares in 2031. By 2031, the key areas of industrial land demand within Fraser Coast Regional Council are projected to be:

- Maryborough Urban – 258 hectares; and
- Hervey Bay Urban – 204 hectares.

Table 10.6: Gross Industrial Land Demand by Catchment, Fraser Coast Regional Council, 2011 to 2031

Catchment	2011	2016	2021	2026	2031
Hervey Bay Urban	101	121	145	173	204
Maryborough Urban	175	192	212	235	258
Coastal Hervey Bay	27	33	39	46	53
Hinterland Hervey Bay	13	16	20	25	31
Maryborough Urban Surrounds	24	27	31	42	55
Rural South Catchment	9	11	14	17	21
Hervey Bay Urban Surrounds	14	17	21	30	44
Rural South West	5	7	9	11	14
Coastal Maryborough	4	5	5	5	6
Fraser Island	3	4	4	4	5
Fraser Coast Regional Council	375	432	501	589	692

Source: Economic Associates estimates

Incremental Gross Industrial Land Demand Projections

By 2031, incremental gross industrial land demand is projected to be 290 hectares, with the key areas of incremental demand being:

- Hervey Bay Urban – an additional 103 hectares by 2031; and
- Maryborough Urban – an additional 83 hectares by 2031.

Table 10.7: Incremental Gross Industrial Land Demand by Catchment, Fraser Coast Regional Council, 2016 to 2031

Catchment	2016	2021	2026	2031
Hervey Bay Urban	20	44	71	103
Maryborough Urban	17	38	61	83
Coastal Hervey Bay	6	13	19	26
Hinterland Hervey Bay	4	8	13	19
Maryborough Urban Surrounds	3	7	17	31

Catchment	2016	2021	2026	2031
Rural South Catchment	2	5	8	12
Hervey Bay Urban Surrounds	3	7	16	30
Rural South West	2	4	6	9
Coastal Maryborough	0	1	1	2
Fraser Island	0	1	1	1
Fraser Coast Regional Council	**57**	**126**	**214**	**316**

Note: Incremental demand is on 2011 levels
Source: Economic Associates estimates

10.2 Industrial Land Need Assessment

10.2.1 Remaining Supply

Within Fraser Coast Regional Council, there is approximately 395.46 hectares of zoned industrial land that is vacant. Of the vacant land in Fraser Coast Regional Council approximately 75.9% or 294.15 hectares are developable. The composition of remaining supply by former local government area is as follows:

- Maryborough: 165.32 hectares;
- Hervey Bay: 107.22 hectares;
- Tiaro: 16.06 hectares; and
- Woocoo: 5.56 hectares.

The key areas of remaining developable land within Fraser Coast Regional Council are:

- Maryborough - 75.63 hectares;
- Dundowran – 70.94 hectares;
- Maryborough West – 70.35 hectares; and
- Urangan – 36.27 hectares.

Table 6.10 below summarises the vacant and developable industrial land within Fraser Coast Regional Council.

Table 10.8: Remaining supply of industrial land within Fraser Coast Regional Council

	Total (ha)	Constrained (ha)	Developable (ha)	Key Areas of Remaining Developable Land
Maryborough	256.20	90.88	165.32	• Maryborough (75.63ha) • Maryborough West (70.35ha)
Hervey Bay	110.40	3.18	107.22	• Dundowran (70.94ha) • Urangan (36.27ha)
Tiaro	16.06	0.00	16.06	• Tiaro (16.06ha)
Woocoo	6.84	1.29	5.56	• Brooweena (4.07ha)
Total	**389.49**	**95.34**	**294.15**	

Source: GHD estimates

10.2.2 Industrial Land Demand

The incremental gross industrial land demand in Fraser Coast Regional Council by 2031 is projected to be 316 hectares, including:

- 92 hectares of large footprint & general industry;
- 74 hectares of service industry;
- 47 hectares of warehousing & storage;
- 88 hectares of transport uses; and
- 16 hectares of non-industrial uses.

Table 6.11 below summarises the composition of future incremental gross industrial land demand in Fraser Coast Regional Council between 2011 and 2031.

Table 10.9: Incremental Gross Industrial Land Demand, Fraser Coast Regional Council, 2011 to 2031

	2016	2021	2026	2031
Hervey Bay				
Large footprint & general industry	7	17	28	42
Service industry	11	23	38	57
Warehousing & storage	6	12	20	30
Transport uses	7	16	27	40
Non industrial land uses	2	4	6	9
Total	33	71	119	178
Maryborough				
Large footprint & general industry	8	17	30	44
Service industry	3	6	10	15
Warehousing & storage	2	5	9	13
Transport uses	7	15	27	39
Non industrial land uses	1	2	4	6
Total	20	46	80	117

	2016	2021	2026	2031
Tiaro				
Large footprint & general industry	1	1	2	4
Service industry	0	1	1	1
Warehousing & storage	1	1	2	3
Transport uses	1	2	3	4
Non industrial land uses	0	0	0	1
Total	2	5	8	12
Woocoo				
Large footprint & general industry	0	1	2	2
Service industry	0	0	1	1
Warehousing & storage	0	1	1	2
Transport uses	1	1	2	4
Non industrial land uses	0	0	0	0
Total	2	4	6	9
Fraser Coast RC				
Large footprint & general industry	16	36	62	92
Service industry	14	30	50	74
Warehousing & storage	9	19	32	47
Transport uses	16	35	59	88
Non industrial land uses	3	6	11	16
Total	57	126	214	316

Note: Incremental demand is on 2011 demand levels. Totals may not add due to rounding.
Source: Economic Associates estimates

10.2.3 Need for Additional Industrial Land

Planning need is determined after a consideration of the remaining supply of industrial land in the context of projected demand. A negative supply-demand balance indicates a projected shortage of industrial land within a planning area. However, since planning schemes are instruments that have typically evolved over time in response to historical planning objectives or the prospect of various major projects coming online, frequently while there may be a significant quantum of land zoned, such land is located that it is unlikely to satisfy the locational requirements of prospective users.

Given the economic structure of the region's component local economies, it is likely that the focal point of future industrial land demand will be centred on major population centres.

While industrial land demand estimates have been provided at the catchment level, industrial land is typically provided to meet regional, rather than local needs. There are a number of factors which determine the location chosen to satisfy additional industrial land demand, including:

- Availability of unconstrained land;
- Capacity to buffer adjacent uses;
- Accessibility to existing infrastructure, such as roads, energy and water;
- Accessibility to input and customer markets; and
- Accessibility to a viable workforce (e.g. acceptability of journey to work travel times).

These factors highlight that while an individual catchment may require additional industrial land, the provision of industrial land in an adjacent catchment may ultimately be more suitable.

Also, in areas where incremental demand is low (e.g. Tiaro and Woocoo), it is typically more appropriate to add to an existing industrial area, rather than create an additional estate.

As such, the analysis for supply demand balance and industrial land needs is presented for the former local government areas, rather than at the catchment level.

Supply Demand Balance

As stated above the first step to establishing need for additional industrial land is consideration of the projected supply-demand balance for industrial land at a regional council level. A prima facie need for additional industrial land is established where there is a supply shortage within the life of the subject planning instrument. This study provides input to a range of planning processes including internal Department of Infrastructure & Planning processes, the Wide Bay Burnett Regional Plan and potentially local government planning processes.

As supply shortages approach there can be a number of impacts on the host economy, including:

- Rising land prices;
- Over-utilisation of existing land;
- Congestion on local roads within industrial areas, as operators commence loading and unloading on streets as opposed to sites;
- Slowing regional economic growth;
- Leakage of economic activity out of the region into more competitive or cost effective regions; and
- Unlawful use of other land (typically rural land) for lower value industrial uses, such as transport & logistics.

On face value it would appear that the overall supply of industrial land within Fraser Coast Regional Council is sufficient until 2031. However, the estimates highlight that there is projected to be a significant shortfall in the provision of industrial land in Hervey Bay, but sufficient industrial land supply in Maryborough.

Table 6.12 below summarises the supply-demand balance for industrial land within Fraser Coast Regional Council.

Table 10.10: Supply Demand Balance, Fraser Coast Regional Council, 2016-31

	2016	2021	2026	2031
Remaining Supply				
Maryborough	165.32	165.32	165.32	165.32
Hervey Bay	107.22	107.22	107.22	107.22
Tiaro	16.06	16.06	16.06	16.06
Woocoo	5.56	5.56	5.56	5.56
Fraser Coast Regional Council	294.15	294.15	294.15	294.15
Incremental Demand				
Maryborough	20.36	45.86	79.89	117.14
Hervey Bay	32.51	71.30	119.49	177.89
Tiaro	2.33	4.96	8.28	12.35
Woocoo	1.70	3.64	6.08	8.84
Fraser Coast Regional Council	56.89	125.76	213.74	316.21

	2016	2021	2026	2031
Supply-Demand Balance				
Maryborough	144.96	119.46	85.43	48.18
Hervey Bay	74.71	35.92	-12.27	-70.67
Tiaro	13.73	11.10	7.78	3.71
Woocoo	3.86	1.92	-0.52	-3.28
Fraser Coast Regional Council	237.26	168.39	80.41	-22.06

Source: GHD, Economic Associates estimates

11 RECOMMENDED STRATEGY

The purpose of this section of the Report is to review the current retail strategy for the Fraser Coast and to recommend any changes that appear to be necessary given the analysis contained in the Report.

In particular, recommendations have been made with respect to planning policy issues related to the identification and maintenance of a retail hierarchy in the Fraser Coast area and the definition of retail activity in the Hervey Bay Planning Scheme. Recommendations also have been made in relation to the location, quantum and timing of additional retail floorspace which could be provided in existing or proposed centres in Hervey Bay and other centres during the forecast period.

11.1 Current Retail Strategy

11.1.1 Hervey Bay

The current retail strategy for Hervey Bay is set out in Hervey Bay City Planning Scheme Policy No 7 – Retailing and Commercial Centres (the Policy).

In Section 3 of the Policy, the four key retail areas of the City are defined as follows:

- Main Business District:
  - Pialba Precinct;
  - Boat Harbour Drive Precinct;
- Business/tourist nodes of Scarness, Torquay and Urangan as well as the Boat Harbour;
- Urangan Central; and
- Eli Waters.

The Policy goes on to state that the Pialba Precinct is intended to serve as the City's town centre within a multi-nodal system of centres and to meet both convenience and higher order shopping needs. In relation to the Boat Harbour Drive Precinct, the Policy acknowledges that it comprises a wide mix of uses and functions but due to its sprawling nature and size does not create "a sense of place". According to the Policy, the Boat Harbour Drive Precinct is intended to accommodate "big box retailers, larger retail showrooms, fast food outlets and other car dependent commercial facilities". These policy directions are also set out in Section 2.1.1 (Overall Outcomes for the Urban Locality) in Part 4 of the Hervey Bay Planning Scheme.

The business/tourist nodes of Scarness, Torquay and Urangan as well as the Boat Harbour are recognised as being major centres but ones which have a specialist role in meeting the needs of tourists. The Policy does not envisage the expansion of these centres to compete with either the Pialba or Boat Harbour Drive Precincts.

The Urangan Central and Eli Waters centres are described in the Policy as providing a combination of district/neighbourhood convenience needs for residents living in the eastern and western residential catchments of the City. The further expansion of these centres beyond this role is not supported within the Policy.

Based on the analysis contained in this Report, the major policy issue facing Council with respect to future retail development in Hervey Bay is how the need for additional retail floorspace should be accommodated as far as the Main Business District is concerned, specifically the appropriate long-term relationship between the Pialba Precinct and the Boat Harbour Drive Precinct.

In relation to other centres in Hervey Bay, no change in the roles of Scarness, Torquay, Urangan, Urangan Central or Eli Waters is considered appropriate or necessary in the foreseeable future. As a consequence, this section of the Report focuses specifically on the Pialba/Boat Harbour Drive "issue".

11.1.2 Maryborough

Compared with the former Hervey Bay LGA the provisions relating to shopping and commercial activity in the Maryborough City Plan (the Plan) are relatively straight forward.

Section 2.2 of the Plan – Commercial Strategy has a desired Environmental Outcome stated as follows:

"The city centre is the dominant location in the Maryborough region for shopping and commercial activity".

The City Plan notes that as far as shopping is concerned the city centre includes the so-called Maryborough Rail Yards land which has been developed for the purposes of a major shopping complex.

The Plan goes on to identify that to promote and strengthen the retail and commercial functions of the city centre, new shopping facilities outside of the city will not be favoured except to meet local needs.

The major issue confronting Council with respect to Maryborough is the proposed expansion of the shopping centre on the former Rail Yards land. As previously discussed with Council, the development of the Rail Yards was subject to a Precinct Code (Rail Yards Redevelopment Area Precinct Code).

The Code breaks the Rail Yards land up into a series of sub-precincts. Sub-precinct 7 provides for the development of a major shopping complex containing a DDS. The Station Square centre contains a DDS and is now proposed for expansion to incorporate a second DDS.

Leyshon Consulting previously has expressed doubt as to whether a second DDS (proposed to be Target) is warranted in Maryborough having regard to the fact that the primary catchment population is only in the order of 29,000 persons with a further 5,500 persons located in the rural south and rural south-west catchments which effectively form an STA. In our view this population is marginal as far as two DDSs are concerned particularly given "escape expenditure" from Maryborough to Hervey Bay..

Further, the significant expansion of the Station Square centre as proposed is likely to draw vitality way from the balance of the Maryborough City Centre and mean the Station Square development becomes the major focus of retailing within the city.

11.2 Retail Hierarchy

It has long been standard practice for local government authorities to identify a retail hierarchy. The definition of a retail hierarchy usually involves identifying and describing the role of each centre both generally and in relation to other centres within the hierarchy. Traditionally, a retail hierarchy has a single dominant shopping centre at its apex supported by lower order centres below.

The benefits of having a clearly stated retail hierarchy include the important fact that shopping centres are a fundamental element of strategic planning; providing the private sector with a predictable investment environment; and ensuring that investment by both the public and private sectors in existing centres is not undermined by the "unplanned" growth of a particular centre in the hierarchy.

In reality, Fraser Coast in general does not have a traditional retail hierarchy which is characterised by a single dominant centre providing higher order retail services and a series of subservient centres fulfilling different roles within the local retail system. In this regard, the conclusions of consultants Economic Associates in their 2002 draft report that Hervey Bay has a "multi-nodal" retail system is considered appropriate. Simply put, Hervey Bay does not have one single dominant centre. This is particularly so since the merger with Maryborough LGA as Maryborough itself is clearly a third "major" centre in the Fraser Coast Regional Council area.

As previously discussed in this Report, in terms of traditional retailing it is noteworthy that the Pialba Precinct and the Boat Harbour Drive Precinct (dominated by the Stockland Hervey Bay shopping centre) have a degree of parity within the retail system. It could even be argued that the Pialba Precinct today has a slight competitive advantage given that it now contains a DDS (Big W) and two full-line supermarkets (Woolworths and Coles).

By contrast, the Boat Harbour Drive Precinct–while currently containing a DDS (Target)–does not contain a major full-line supermarket but relies on small-to-mid range supermarkets (IGA and Aldi). It is likely, however, that additional DDS (Kmart) plus a full-line supermarket will be added to Stockland Hervey Bay in the near future. This would certainly place both precincts on an even footing in terms of their representation of traditional retail facilities–say by 2011.

Despite the reality of no one centre being truly dominant in Hervey Bay, the current Planning Scheme in fact gives precedence to the Pialba Precinct as a retail destination. This precedence is in the form of provisions within the Planning Scheme that the Pialba Precinct is to be the dominant location of retail activity in Hervey Bay through the "consolidation of higher order retail activity" (Section 2.1.1 Overall Outcomes for the Urban Locality – (s) refers).

In addition, other provisions of the Planning Scheme (Section 2.1.1 (t)) specifically state that expansion of the Boat Harbour Drive Precinct for "traditional retail shops is not generally supported". On face value, these provisions appear to be an attempt to create a de facto traditional retail hierarchy in Hervey Bay with a single dominant centre.

In our opinion, the key questions facing Council at present in relation to the future planning of the Main Business District are:

- Is it feasible to use provisions in the Planning Scheme to confer higher order status on the Pialba Precinct?; and
- What are the implications of removing the "protection" conferred on Pialba Place by the Planning Scheme in terms of its intended dominant position in the retail hierarchy?

11.3 Future of Pialba Precinct

It is questionable whether it is feasible or appropriate to use the Planning Scheme to ensure the Pialba Precinct becomes the dominant retail centre in Hervey Bay over the longer term by consolidating within it "higher order" retail activities and services.

The concept of a particular centre having "higher order status" in retail terms is linked to the nature of the retail facilities and services it contains. Lower order centres usually are defined as those providing convenience products purchased frequently by shoppers who are not prepared to travel a great distance to undertake such shopping. Hence, neighbourhood centres containing a supermarket are a classic example of a lower order centre.

In the past, "higher order" centres usually have been defined as those containing specialist retail facilities such as a department store, a DDS and retail specialty shops which require a relatively large market (or catchment) to trade successfully. Retail analysts generally agree that such centres are less frequently shopped by residents because of the specialist nature of the retail facilities they contain.

While it is usually the case that higher order centres are also the largest centres in a particular region, higher order status is not conferred merely by size but more by the nature of tenancies in a given centre.

This approach to classifying centres was particularly relevant before the advent of specific bulky goods retailing precincts: Historically town centres and central business districts provided not only department store retailing but also opportunities to purchase furniture and electrical goods and the like from independent retailers. Such centres also usually contained specialist retailers in sectors such as clothing, footwear and accessories which were not found in suburban centres.

The development of specialist bulky goods precincts (such as Boat Harbour Drive), and the advent of ubiquitous national chain specialty stores has weakened the concept of certain centres having unchallenged higher order status. Today, in terms of traditional shopping centres (which do not contain bulky goods), the only distinguishing feature of a higher order centre is the presence of a department store such as Myer or David Jones. The reason for this is that DDSs (Kmart, Big W and Target) along with supermarkets and national chain specialty stores are commonly found in town centres/CBDs, sub-regional centres and, in some cases, district-scale centres.

Given the above, the only way in which the Pialba Precinct could truly achieve higher order status would be if, in the future, it was to contain a department store and/or a more comprehensive range of specialty retailers than is provided in the Boat Harbour Drive Precinct.

As noted in Section 5.2.3 of this Report, there has been a resurgence of interest by the Myer department store chain in establishing new stores in regional locations in Australia. Over the last two decades Australia has witnessed a withdrawal of department store services from regional centres throughout Australia. The new owners of Myer, however, appear keen to re-establish "small-footprint" department stores outside of the major centres in Australia. An example of this is Myer is also soon to open a store in Townsville and has committed to a store in Mackay.

If Myer was to consider introducing such a store to Hervey Bay the obvious locations are either Pialba or the Boat Harbour Drive Precincts.

At present, it would appear the Planning Scheme requires that such a store be located in the Pialba Precinct irrespective of whether or not a suitable site is available. In our opinion, it would be uneconomic to develop a Myer department store in Hervey Bay as a freestanding store. Rather, such a development would need to be accompanied by a substantial component of supporting retail floorspace including at least one supermarket to ensure its economic viability. This suggests the store would need to be "attached" to an existing shopping centre in Hervey Bay. There is no certainty that such an outcome would eventuate in the Pialba Precinct, however particularly given that such an outcome may not be possible given the difficulties of amalgamating a large enough site in this area.

At Boat Harbour Drive, by contrast, an expansion of Stockland Hervey Bay to accommodate additional retail development (including, possibly, a department store) appears to be reasonably straight forward from a technical perspective.

It is unlikely the Pialba Precinct will achieve "higher order" status notwithstanding the apparent intentions of the current Planning Scheme. It is relatively certain that by 2016 Centro Hervey Bay will be expanded. In separate advice previously provided to Council Leyshon Consulting has expressed the view that Stockland Hervey Bay requires expansion and upgrading to enable it to compete effectively with other centres in Hervey Bay over the longer term and to maintain its status as a sub-regional shopping centre. That said, any further expansion of Stockland Hervey Bay will mean that the Pialba Precinct will not emerge as the dominant "higher order" shopping centre in Hervey Bay without further policy intervention.

Such an outcome would be achieved only by restraining retail activity in the Boat Harbour Drive Precinct in general–Stockland Hervey Bay in particular–to a much greater extent than is currently implied in the Planning Scheme. It would require some form of floorspace control to be placed on the extent and nature of retail development in the Boat Harbour Drive Precinct. Specifically, the current Planning Scheme would need to be amended to expressly prohibit the development of a second DDS or, more particularly, a department store in the Boat Harbour Drive Precinct.

In reality, a long-term policy of restraining the retail development of the Boat Harbour Drive Precinct would be effective only if the Pialba Precinct had the capacity to accommodate the introduction of a Myer department store to Hervey Bay, another DDS in the future, and the provision of a much wider range of specialty retailers than is the case at present. However, based on knowledge of the Pialba Place Precinct it is considered unlikely this outcome will eventuate.

Rather than adopt such a draconian provision with respect to the Boat Harbour Drive Precinct, it is recommended that the Planning Scheme be amended as follows:

- To state a clear intention for the Pialba Precinct to maintain its current importance as a retail destination and further develop as a commercial and administrative centre
- To permit sufficient traditional retailing to be added to Stockland Hervey Bay so as to ensure it remains effective as a sub-regional shopping centre; and
- To permit the addition of a department store to Stockland Hervey Bay if it can be demonstrated that such a store cannot be accommodated in the Pialba Precinct.
- Encourage master planning of both Pialba and Boat Harbour Drive precincts to improve connectivity between both precincts and the quality of urban design outcomes particularly in the Boat Harbour Drive precinct.

11.4 Recommended Retail Strategy

11.4.1 Floorspace Increase

Having regard to the estimates of demand discussed in Section 5 of this Report, the following recommendations are made with respect to the quantum, location and timing of additional retail floorspace development in the FCRC area up to 2016.

In making these recommendations regard has been given to the projections of floorspace demand set out in Section 5.1.2 of this Report.

Specifically, our recommendations for the FCRC area for the period up to 2031 are as follows:

Hervey Bay

- addition of some 30,000 to 35,000 m^2 including two full-line supermarkets and a medium-scale supermarket (1,500m^2). A significant component of this floorspace growth (say 10,000-12,000 m^2) will be accommodated by an expansion of Stockland Hervey Bay to incorporate two full-line supermarkets, one or two mini-majors and additional specialty retailing.
- By 2016, sufficient demand may exist for a 3,000 to 5,000m^2 neighbourhood centre to service new residential development in the area to the south of Doolong Road. In this regard, much will depend on the rate of settlement in the area. It is understood that a site for such a centre has been identified in the Doolang Flats/Ghost Hill and Kawungan North East Structure Plan.
- The addition of supermarket-anchored centres of 5,000-7,000m^2 (each) at Urangan South and Nikenbah (after 2021).
- Investigation of the potential for a supermarket anchored centre on Boat Harbour Drive (between Denmans Camp Rd and Bideford Street based on a commencement of trading before 2016
- The addition of 35,000 to 40,000m^2 of bulky goods floorspace.
- Over the longer term (after 2021) a DDS-based centre (of up to 20,000m^2) may be viable in the Nikenbah area particularly if the identified Nikenbah Urban Expansion area is adopted. Ideally such a centre could be developed as an expansion of the supermarket centre in this area as discussed above.

Maryborough

- The addition of 8,000-10,000m^2 of retail space including another full-line supermarket would be appropriate in Maryborough during the period up to 2016.
- Between 2016 and 2031 an additional 5,000-10,000m^2 of retail floorspace could be permitted in the Maryborough CBD.
- If there is market demand/pressure for a second DDS in Maryborough, Council should encourage such a store to be located in the traditional CBD rather than Station Square so as to preserve a reasonable balance between retail activities in both areas.

- If a second DDS is supported at Station Square a review of the structure of the Maryborough CBD should be undertaken in relation to the sustainable spatial extent of the CBD and the best strategies to better integrate Station Square and the existing CBD.

Other Centres

No major change in centre role or function is envisaged for Eli Waters, Urangan, Torquay, Scarness, Howard, Tiaro or other existing small rural or coastal centres.

The above recommendations exclude the provision of retail floorspace which is primarily oriented towards tourist/visitor spending. In this regard, it is understood that major redevelopment of land in the vicinity of Fishermen's Park and the existing marine precinct near the Boat Harbour at Urangan is proposed. Provided that any retail space which forms part of this development is oriented towards tourists and visitors, it will not conflict with the recommendations for additional floorspace to service the residential population of Hervey Bay and the wider the Fraser Coast up to 2031 as discussed above.

In this regard, it is recommended that with a medium-scale supermarket (of up to 1,500m^2) may be appropriate in this area. Any development should exclude a full-line supermarket or a DDS as the inclusion of such stores would give the mooted centre/precinct a role beyond its primary purpose of providing for tourist and visitor retail services.

11.5 Recommended Commercial Office Strategy

Demand for commercial office floor space is projected to increase significantly within Hervey Bay to 2031, consistent with relatively high population growth. It is anticipated that a significant proportion of additional floor space demanded will be tenanted by health related services to service the ageing population, and tourism related businesses.

The challenge for Hervey Bay is the existing network of centres, with Pialba and the Boat Harbour Drive precinct both offering a wide range of commercial office tenancies.

It is suggested that a significant proportion of additional commercial office floor space demand is best provided within Pialba, to reinforce its position as the dominant commercial office market within Hervey Bay. Commercial office tenancies within Pialba are likely to include a range of professional services and training providers. The Boat Harbour Drive precinct is also anticipated to capture a significant share of additional commercial office floor space supply within Hervey Bay, particularly for commercial office tenancies engaging with the general public (e.g. income tax accountants, medical centres).

Within Fraser Coast Regional Council, Maryborough currently has the majority of government agency tenants. However, with demand growth significantly higher within Hervey Bay than Maryborough, it is expected that pressure may build for these tenancies to relocate to Hervey Bay. It is suggested that the majority of government agencies are preserved in Maryborough where possible to avoid fragmentation of these services. Any relocation of services to Hervey Bay is best placed within Pialba, rather than the Boat Harbour Drive precinct in order to preserve the existing hierarchy of commercial office markets in Hervey Bay.

Additional commercial office demand related to the tourism industry is likely to be provided within the specialist centres of Torquay and Scarness.

Consistent with the proposed retail strategy, no major change in centre role or function is envisaged for Eli Waters, Urangan, Howard, Tiaro or other existing small rural or coastal centres. Commercial offices will be provided incrementally as required to service their corresponding catchment.

In the longer term, commercial office development should also be provided within Nikenbah, particularly if a DDS based centre is developed. However, it is envisaged that commercial office provision within this centre would be limited to local based commercial office services, as currently provided within the Eli Waters and Urangan centres.

11.5.1 Centres Hierarchy

As previously noted, it considered there is merit in planning schemes defining an "Activity Centres Hierarchy". A hierarchy of activity centres in the Fraser Coast area essentially has already been identified in the draft Wide Bay Burnett Regional Plan (draft Regional Plan).

The terminology of activity centres described in Section 6.2 of the draft Regional Plan generally can be used to describe the appropriate hierarchy of activity centres in the Fraser Coast area in more detail. There is, however, a need to define a specific role for Torquay and Scarness as the current role fulfilled by these centres does not fit 'neatly' within the terminology set out in the draft Regional Plan.

Table 11.1 provides recommendations regarding an appropriate hierarchy of activity centres in the Fraser Coast Regional Council area during the life of the next planning scheme.

Table 11.1: Fraser Coast Regional Council – Proposed Activity Centres Network Description

Activity Centre	Description
Principal – Hervey Bay (Pialba Place / Boat Harbour Drive), Maryborough	These centres contain the largest and most diverse concentration of urban activities. They are the key regional focus of employment, government administration, retail, commercial and specialised personal and professional services. They accommodate significant cultural, entertainment, health, education and public and active transport facilities. They also have the highest population densities, greatest concentration of mixed use development and the most diverse housing mix in the region.
Specialist – Torquay, Scarness, Urangan	These centres provide a wide range of retail, commercial and entertainment facilities for tourists and visitors and convenience services for residents of the immediate surrounding area. These centres will contain tourist accommodation, mixed use development, medium/high density housing, cafes and restaurants.
District – Eli Waters, Urangan, Nikenbah	These centres serve as catchments of district or subregional significance, accommodating concentrations of employment, business, services, commercial and retail uses. These centres may also contain a hospital and secondary school, and provide a range of cultural and entertainment facilities such as a museum, sports parks, cafes and a community hall.

Local – Torquay, Howard / Torbanlea, Tiaro, Burrum Heads, River Heads, Point Vernon, Tinana, Dundrowan	Local activity centres are distinct communities in rural or coastal areas that have strong character and links with the rural production and regional landscape values. They contain a concentration of business and employment that primarily serves local residents, tourism or primary production industries. These centres may contain some retail, government services, entertainment and community facilities.

Source: Draft Wide Bay Burnett Regional Plan, Leyshon Consulting 2011

11.6 Industrial Future of Fraser Coast Regional Council

11.6.1 Existing Industrial Estates

Inventories undertaken by GHD identified eleven areas of industrial land with 759 businesses in Fraser Coast Regional Council. Activity was concentrated in:

- Maryborough – 251 businesses;
- Urangan – 137 businesses;
- Dundowran – 110 businesses; and
- Maryborough West – 105 businesses.

These four industrial areas also accounted for the majority of remaining vacant and developable industrial land with Fraser Coast Regional Council.

11.6.2 Current Policies on Industrial Development

Hervey Bay Planning Scheme

The Hervey Bay Planning Scheme has a number of desired environmental outcomes and strategies (DEOs), with DEO 1 relating to economic development. Key planning measures relating to industrial development to achieve DEO 1 include the following:

- Existing commercial / retail and industrial centres are consolidated to optimise infrastructure and services efficiencies;
- Unplanned, new centres and industrial estates outside of the commercial and industrial zoned areas are discouraged;
- Business and industrial zones enable compatible businesses to be established with minimal regulation; and
- Business and industrial areas are able to develop and expand without intrusion from incompatible land uses.

These planning measures suggest that the preference is to consolidate existing industrial areas rather than create additional zoned areas, unless necessary to satisfy demand.

Maryborough Town Plan

The Maryborough Town Plan has outlined four DEOs in relation to industrial development within its Industry Strategy:

- DEO 7 – A sufficient supply of well-serviced industrial land with a satisfactory level of flood immunity is provided to meet the requirements of new and expanding industries;
- DEO 8 – Industrial areas are provided with necessary infrastructure being reticulated sewerage, water supply and stormwater drainage, sealed roads and access to existing railways where feasible;
- DEO 9 – Interference with industrial activities as a result of non-industrial traffic or the proximity of incompatible non-industrial land uses is precluded as far as possible; and
- DEO 10 – A sufficient supply of appropriately located land is provided for land-extensive commercial activities which may be better located outside the City Centre.

The Industry Strategy has highlighted a number of sites within the Moonaboola Industrial Estate which are potentially suitable for high impact industrial activity. Approval of such development would be impact assessable, and would require assessment of the potential impact on the existing "Timber Top Estate" rural residential sub division and adjacent existing and potential clay mining operations.

The City Strategy Map also identifies a significant land holding suitable for future general industry development between the railway and the rifle range.

The Industry Strategy is also supportive of additional industrial activity in the vicinity of the Bruce Highway interchange at Baddow and within the Pocket Local Area (subject to consideration and resolution of flooding issues).

Detail is also provided in regards to the intent of the Fraser Coast Marine Industrial Precinct, an area located between Beaver Rock Road and the Mary River at Granville. The Fraser Coast Marine Industrial Precinct is intended to consolidate and expand the boat building and associated industries and services within the Fraser Coast region.

11.6.3 Need for Industrial Land

Fraser Coast Regional Council is projected to experience significant growth, with the population anticipated to increase by 56,000 persons over the next twenty years to 2031. The two major urban communities of Maryborough and Hervey Bay are anticipated to account for the majority of population growth and future demand for industrial demand.

Section 10.2.3 highlighted that Fraser Coast Regional Council is anticipated to have a sufficient supply of industrial land to 2031. While Maryborough has the largest supply of remaining industrial land, it is anticipated that Hervey Bay will be the largest generator of industrial land demand. Hervey Bay is projected to have a shortfall of industrial land by between 2021 and 2026. Projections indicate that there is sufficient industrial land supply within Maryborough and Tiaro to 2031. Woocoo is anticipated to have a 3.28 hectare shortage of industrial land supply by 2031, but it is anticipated that this shortfall can be met by existing industrial land estates (i.e. Brooweena).

The sections below provide detail regarding the anticipated future mix of industrial land activity within the major centres of Hervey Bay and Maryborough, including advice on appropriate sites for future industrial provision.

Hervey Bay

The future industrial base of Hervey Bay is anticipated to remain focussed on low impact and service industry activity. It may be appropriate for Council to consider the inclusion of low impact service trade and transport servicing uses within activity centre frames to provide the future working populations of these activity centres with access to service trades and transport servicing. It is envisaged that additional activity within the general industry sector is provided for through expansion of existing estates, rather than the creation of additional industrial areas.

Marine services activity is also likely to continue to develop within Hervey Bay, but it is imperative to ensure that activity within this sector does not compromise the development of the Fraser Coast Marine Industrial Precinct. Marine services activity within Hervey Bay should complement, rather than compete with activity within the Fraser Coast Marine Industrial Precinct. Hence, the scale of facilities should be limited to a level commensurate to servicing recreational boats and cluster around Urangan Boat Harbour in small scale and high quality tenancies.

Between 2011 and 2031, there is anticipated to be demand for an additional 42 hectares for large footprint & general industry activity in Hervey Bay (refer to Section 10.2.2). A significant proportion of additional demand within this category is for food processing activities, specifically seafood product manufacturing activity. It is suggested that this activity is located within close proximity to the Urangan Boat Harbour, buffered by lower impact uses such as recreational boat servicing activities.

It is anticipated that gross industrial land demand for large footprint and general industry activity outside of marine industry activity would be accommodated within Maryborough, rather than Hervey Bay.

Analysis of gross incremental demand estimates by former local government area highlight that approximately a quarter of gross incremental industrial land demand within Hervey Bay is projected to be for large footprint and general industry. However, it is anticipated that the majority of this demand would be accommodated within Maryborough, given its relative access to major transport networks (road and rail). Hervey Bay is considered unlikely to develop major industry or transport & logistics activities because of its separation from the Bruce Highway corridor.

Maryborough

The supply demand balance estimates suggest that Maryborough has sufficient remaining zoned industrial land to cater for demand to 2031.

However, as evidenced by the property market overview and the industrial land inventory, a significant proportion of remaining land within Maryborough is encumbered by remnant housing, with 106 houses identified in the Maryborough industrial zone and 21 houses identified in the Maryborough West industrial zone.

The development and bringing to market of the developable land within Maryborough and Maryborough West should be a strategic priority. Should existing areas within Maryborough not progress, additional land with similar strategic attributes will need to be identified elsewhere.

Planning documents have identified Moonaboola Industrial Estate as the preferred location for additional high impact industrial activity within Maryborough. There is potential for this estate to also accommodate the 'overflow' high impact industrial activity from Hervey Bay (i.e. high impact industry activity other than seafood products manufacturing to be located at Urangan).

The Fraser Coast Marine Industrial Precinct will provide the regional scale marine industry activity within Fraser Coast Regional Council.

Rural Communities

Rural communities require land for small scale industrial services, many aligned with rural industry (e.g. pump servicing, agricultural mechanical repairs etc). However, the scale of these communities is frequently insufficient to justify the establishment of a dedicated industrial estate. This is similarly the case for stand-alone shopping centres in such areas.

Therefore it is recommended that mixed centre zones, which allow for a mix of retail, commercial and light industry, be identified within these communities to provide a range of services commensurate with their village scale. Such a precinct would represent the "town centre" for the rural community. Potential industrial uses that would be suitable within rural communities might include:

- Landscape & building material supplies and hardware;
- Automotive repairs and maintenance;
- Agricultural equipment wholesaling (e.g. cultivation equipment, pumps & irrigation equipment);
- Printing and copying facilities;
- Construction trade services (e.g. plumbers, builders, electrician workshops); and
- Small scale manufacturing workshops / space for start up enterprises.

Note: Estimated Need Assessment Summary

Industrial land analysis of Hervey Bay has identified projected shortages of industrial land of approximately 12.78 hectares in 2026, increasing to 69.78 hectares by 2031.

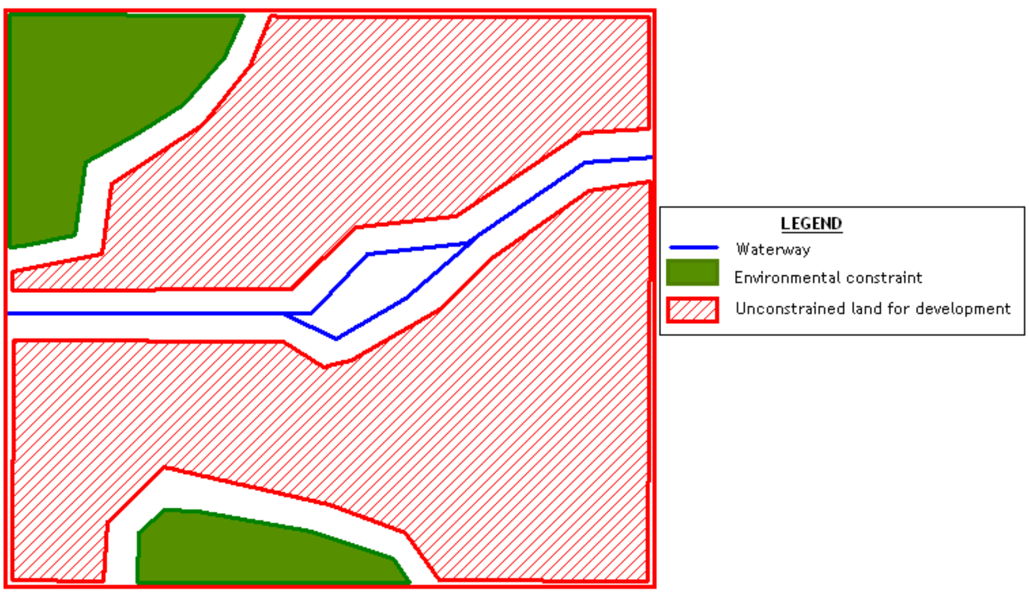
These shortages refer to gross industrial land, which includes allotments, roads, open space and infrastructure service corridors. The need for an additional 70 hectares of unconstrained industrial land in Hervey Bay will require the identification of approximately twice that amount of raw land depending on the specific site constraints. For example in previous instances where the Queensland Government has developed estates, it has achieved a yield of approximately 50% in terms of developable land, for example:

- Sunshine Coast Industrial Park: yielded 111 hectares of developable land out of a total site area of 205 hectares;

- Coolum Industrial Estate: yielded 88 hectares of developable land out of a total site area of 424 hectares[12];
- Lytton Industrial Estate: yielded 47 hectares of developable land out of a total site area of 91 hectares; and
- Crestmead Industrial Estate: yielded 6 hectares of developable land out of a total site area of 9 hectares;

Figure 12.1 below demonstrates that any future industrial areas identified within planning instruments need to be larger than the 70 hectares of land identified as being needed within Hervey Bay. The presence of environmental constraints and water courses, and the need to buffer them, significantly reduces the developable area of any particular site. As such it is anticipated that sites with a cumulative area of approximately 140 hectares would need to be identified to deliver 70 hectares of developable land for industrial uses.

Figure 11.1: Indicative example of the need for raw land over and above gross industrial land need



Estimates of remaining supply include both vacant land and remnant housing. Hence supply estimates are the combined supply estimates from Table 9.1.

[12] A significant area was handed over as an environmental reserve.

APPENDIX A

DETAILED AGRICULTURAL PRODUCTION TABLES

Table A.1: Livestock Production, Fraser Coast Regional Council, 2000-01 and 2005-06 (number)

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland	
	2000-01	2005-06	2000-01	2005-06	2000-01	2005-06
Number						
Meat cattle	70,076	70,658	753,941	826,420	11,087,566	11,353,920
Milk cattle	4,025	2,405	66,919	41,385	288,276	193,601
Pigs n.e.c.[1]	12,240	15,017	163,746	188,773	524,674	609,064
Pigs - Breeding sows and gilts	1,517	2,071	20,072	21,056	68,694	79,381
Chickens – Layers	34,124	86,976	60,643	101,449	3,225,788	3,463,913
Eggs (doz.)	350,077	1,051,989	751,735	1,300,459	38,526,301	57,712,574
Chickens - Meat	-	648	20,475	21,171	10,378,351	9,982,009
Sheep (excluding lambs)	111	577	1,967	5,356	7,192,356	3,566,294
Sheep – Lambs	67	156	1,669	1,150	1,467,714	899,419
Sales of goats (domesticated)	-	276	-	2,603	-	97,192
Sales of horses	-	39	-	789	-	37,803
% of QLD						
Meat cattle	0.6%	0.6%	6.8%	7.3%	100.0%	100.0%
Milk cattle	1.4%	1.2%	23.2%	21.4%	100.0%	100.0%
Pigs n.e.c.[1]	2.3%	2.5%	31.2%	31.0%	100.0%	100.0%
Pigs - Breeding sows and gilts	2.2%	2.6%	29.2%	26.5%	100.0%	100.0%
Chickens – Layers	1.1%	2.5%	1.9%	2.9%	100.0%	100.0%
Eggs (doz.)	0.9%	1.8%	2.0%	2.3%	100.0%	100.0%
Chickens - Meat	-	0.0%	0.2%	0.2%	100.0%	100.0%
Sheep (excluding lambs)	0.0%	0.0%	0.0%	0.2%	100.0%	100.0%
Sheep – Lambs	0.0%	0.0%	0.1%	0.1%	100.0%	100.0%
Sales of goats (domesticated)	-	0.3%	-	2.7%	100.0%	100.0%
Sales of horses	-	0.1%	-	2.1%	100.0%	100.0%

Note 1: Suckers, weaners, growers etc.
Note 2: Produced for human consumption
Source: ABS Cat. No. 7125.0 – Agricultural Commodities: Small Area Data, Australia, 2000-01 and 2005-06

Table A.2: Livestock Slaughtered, Fraser Coast Regional Council, 2005-06 ($m)

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland
	$m	% of QLD	$m	% of QLD	$m
Cattle and calves slaughtered	19.47	0.5%	335.31	9.3%	3,606.68
Pigs slaughtered	5.01	2.2%	65.48	28.4%	230.37
Total value	**24.66**	**0.6%**	401.91	9.7%	**4,125.16**

Source: ABS Cat. No. 7125.0 – Agricultural Commodities: Small Area Data, Australia, 2005-06

Table A.3: Livestock Products, Fraser Coast Regional Council, 2005-06 ($m)

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland
	$m	% of QLD	$m	% of QLD	$m
Milk	2.86	1.3%	48.15	22.0%	218.44
Eggs[1]	1.66	1.8%	2.05	2.3%	91.07
Total value	**4.54**	**1.1%**	**50.36**	**12.1%**	**415.80**

Note 1: Produced for human consumption
Source: ABS Cat. No. 7125.0 – Agricultural Commodities: Small Area Data, Australia, 2005-06

Table A.4: Nurseries, Cut Flowers, Cultivated Turf and Vegetables for Seed, Fraser Coast Regional Council, 2000-01 and 2005-06 (hectares)

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland	
	2000-01	2005-06	2000-01	2005-06	2000-01	2005-06
Hectares						
Cultivated turf	71	98	106	175	2,038	2,804
Nurseries	18	28	86	100	1,289	1,175
Cut flowers	9	20	75	134	1,020	652
Vegetables for seed	-	-	-	39	-	360
% of QLD						
Cultivated turf	3.5%	3.5%	5.2%	6.2%	100.0%	100.0%
Nurseries	1.4%	2.4%	6.7%	8.5%	100.0%	100.0%
Cut flowers	0.9%	3.1%	7.4%	20.6%	100.0%	100.0%
Vegetables for seed	-	-	-	10.8%	100.0%	100.0%

Source: ABS Cat. No. 7125.0 – Agricultural Commodities: Small Area Data, Australia, 2000-01 and 2005-06

Table A.5: Nurseries, Cut Flowers, Cultivated Turf and Vegetables for Seed, Fraser Coast Regional Council, 2005-06 ($m)

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland
	$m	% of QLD	$m	% of QLD	$m
Cultivated turf	2.74	3.5%	4.91	6.3%	78.38
Nurseries	4.99	2.8%	16.42	9.0%	181.57
Cut flowers	1.54	4.2%	6.28	16.9%	37.09
Vegetables for seed	0.16	1.0%	3.73	23.1%	16.19

Source: ABS Cat. No. 7125.0 – Agricultural Commodities: Small Area Data, Australia, 2005-06

Table A.6: Fruit Cultivation Area, Fraser Coast Regional Council, 2000-01 and 2005-06 (hectares, number of trees)

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland	
	2000-01	2005-06	2000-01	2005-06	2000-01	2005-06
Hectares						
Nuts (n)	90,562	118,457	972,694	1,387,512	1,501,762	2,151,680
Citrus (n)	10,726	5,051	1,358,848	1,280,538	1,841,354	1,844,534
Other orchard fruit (n)	16,601	51,693	319,965	598,809	1,682,669	2,614,878
Stone fruit (n)	1,465	20,567	195,965	169,988	986,794	1,530,829
Plantation fruit (ha)	589	530	1,554	1,811	15,061	17,727
Grapes (ha)	1	2	669	525	2,335	2,613
Berry fruit (ha)	-	17	42	39	449	648
Fruit total area (ha)	**-**	**1,419**	**-**	**12,641**	**-**	**56,403**
% of QLD						
Nuts (n)	6.0%	5.5%	64.8%	64.5%	100.0%	100.0%
Citrus (n)	0.6%	0.3%	73.8%	69.4%	100.0%	100.0%
Other orchard fruit (n)	1.0%	2.0%	19.0%	22.9%	100.0%	100.0%
Stone fruit (n)	0.1%	1.3%	19.9%	11.1%	100.0%	100.0%
Plantation fruit (ha)	3.9%	3.0%	10.3%	10.2%	100.0%	100.0%
Grapes (ha)	0.0%	0.1%	28.7%	20.1%	100.0%	100.0%
Berry fruit (ha)	-	2.6%	9.4%	6.0%	100.0%	100.0%
Fruit total area (ha)	**-**	**2.5%**	**-**	**22.4%**	**100.0%**	**100.0%**

Source: ABS Cat. No. 7125.0 – Agricultural Commodities: Small Area Data, Australia, 2000-01 and 2005-06

Table A.7: Fruit Production, Fraser Coast Regional Council, 2000-01 and 2005-06 (tonnes)

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland	
	2000-01	2005-06	2000-01	2005-06	2000-01	2005-06
Tonnes						
Citrus	221	31	60,258	77,048	75,526	86,061
Plantation fruit	10,278	11,342	28,316	30,407	431,185	323,931
Other orchard fruit	456	541	12,957	12,666	48,923	47,290
Nuts	802	974	4,896	8,217	8,511	11,961
Grapes	2	1	2,294	3,125	7,504	15,064
Stone fruit	-	25	390	1,640	7,642	8,606
Berry fruit	-	7	119	225	5,275	12,948
Total production	**11,758**	**12,921**	**109,230**	**133,330**	**584,566**	**505,861**
% of QLD						
Citrus	0.3%	0.0%	79.8%	89.5%	100.0%	100.0%
Plantation fruit	2.4%	3.5%	6.6%	9.4%	100.0%	100.0%
Other orchard fruit	0.9%	1.1%	26.5%	26.8%	100.0%	100.0%
Nuts	9.4%	8.1%	57.5%	68.7%	100.0%	100.0%
Grapes	0.0%	0.0%	30.6%	20.7%	100.0%	100.0%
Stone fruit	-	0.3%	5.1%	19.1%	100.0%	100.0%
Berry fruit	-	0.1%	2.2%	1.7%	100.0%	100.0%
Total production	**2.0%**	**2.6%**	**18.7%**	**26.4%**	**100.0%**	**100.0%**

Source: ABS Cat. No. 7125.0 – Agricultural Commodities: Small Area Data, Australia, 2000-01 and 2005-06

Table A.8: Fruit Value, Fraser Coast Regional Council, 2005-06 ($m)

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland
	$m	% of QLD	$m	% of QLD	$m

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland
	$m	% of QLD	$m	% of QLD	$m
Citrus fruit	0.17	0.2%	81.27	87.2%	93.22
Other orchard fruit	2.75	1.9%	33.60	23.1%	145.55
Nuts	3.20	7.9%	27.03	66.5%	40.65
Plantation fruit	5.57	1.2%	24.75	5.1%	483.00
Grapes	-	-	5.41	16.6%	32.62
Stone fruit	0.05	0.2%	2.75	13.4%	20.51
Berry fruit	0.04	0.1%	1.28	1.7%	73.58
Total value	**11.79**	**1.3%**	176.25	19.4%	**910.77**

Source: ABS Cat. No. 7125.0 – Agricultural Commodities: Small Area Data, Australia, 2005-06

Table A.9: Vegetables for Human Consumption Area, Fraser Coast Regional Council, 2000-01 and 2005-06 (hectares)

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland	
	2000-01	2005-06	2000-01	2005-06	2000-01	2005-06
Hectares						
Pumpkins	24	41	358	504	4,576	3,401
Zucchini and button squash	18	40	1,048	1,206	1,852	1,909
French and runner beans	57	20	559	552	3,538	4,158
Watermelons	17	16	471	567	3,065	2,691
Potatoes	6	7	449	688	4,761	3,638
Other	16	33	1,915	3,983	15,851	21,325
Total	**138**	**157**	**4,800**	**7,500**	**33,643**	**37,122**
% of QLD						
Pumpkins	0.5%	1.2%	7.8%	14.8%	100.0%	100.0%
Zucchini and button squash	1.0%	2.1%	56.6%	63.2%	100.0%	100.0%
French and runner beans	1.6%	0.5%	15.8%	13.3%	100.0%	100.0%
Watermelons	0.6%	0.6%	15.4%	21.1%	100.0%	100.0%
Potatoes	0.1%	0.2%	9.4%	18.9%	100.0%	100.0%
Other	0.1%	0.2%	12.1%	18.7%	100.0%	100.0%
Total	**0.4%**	**0.4%**	**14.3%**	**20.2%**	**100.0%**	**100.0%**

Source: ABS Cat. No. 7125.0 – Agricultural Commodities: Small Area Data, Australia, 2000-01 and 2005-06

Table A.10: Vegetables for Human Consumption Production, Fraser Coast Regional Council, 2000-01 and 2005-06 (tonnes)

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland	
	2000-01	2005-06	2000-01	2005-06	2000-01	2005-06
Tonnes						
Pumpkins	155	602	2,641	6,421	50,166	47,161
Zucchini and button squash	64	287	7,682	12,698	13,140	16,827
Potatoes	51	163	12,190	18,520	115,817	93,589
Eggplant	-	148	-	1,354	-	6,332
French and runner beans	210	131	2,773	2,582	16,284	19,712
Watermelons	145	110	10,916	14,656	61,834	73,446
Other	116	170	55,840	110,949	350,498	489,127
Total	**740**	**1,611**	**92,042**	**167,179**	**607,740**	**746,194**
% of QLD						
Pumpkins	0.3%	1.3%	5.3%	13.6%	100.0%	100.0%
Zucchini and button squash	0.5%	1.7%	58.5%	75.5%	100.0%	100.0%
Potatoes	0.0%	0.2%	10.5%	19.8%	100.0%	100.0%
Eggplant	-	2.3%	-	21.4%	100.0%	100.0%
French and runner beans	1.3%	0.7%	17.0%	13.1%	100.0%	100.0%
Watermelons	0.2%	0.1%	17.7%	20.0%	100.0%	100.0%
Other	0.0%	0.0%	15.9%	22.7%	100.0%	100.0%
Total	**0.1%**	**0.2%**	**15.1%**	**22.4%**	**100.0%**	**100.0%**

Source: ABS Cat. No. 7125.0 – Agricultural Commodities: Small Area Data, Australia, 2000-01 and 2005-06

Table A.11: Vegetables for Human Consumption Value, Fraser Coast Regional Council, 2005-06 ($m)

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland
	$m	% of QLD	$m	% of QLD	$m

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland
	$m	% of QLD	$m	% of QLD	$m
Zucchini and button squash	0.98	1.7%	43.43	75.5%	57.55
Pumpkins	0.43	1.3%	4.55	13.6%	33.42
French and Runner beans	0.42	0.7%	8.24	13.3%	61.89
Mushrooms	0.33	0.6%	8.93	15.6%	57.20
Eggplant	0.23	2.3%	2.14	21.4%	10.00
Other	0.52	0.1%	178.81	24.7%	724.96
Total	**2.92**	**0.3%**	**246.10**	**26.0%**	**945.03**

Source: ABS Cat. No. 7125.0 – Agricultural Commodities: Small Area Data, Australia, 2005-06

Table A.12: Crops Area, Fraser Coast Regional Council, 2000-01 and 2005-06 (hectares)

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland	
	2000-01	2005-06	2000-01	2005-06	2000-01	2005-06
Hectares						
Sugar cane	16,889	10,923	74,919	59,936	494,540	452,485
Hay	-	239	4,415	15,835	68,988	122,031
Oilseeds	70	134	4,138	2,140	79,194	17,222
Cereals for grain	82	67	38,146	27,189	1,591,444	1,416,623
Legumes for grain	7	2	2,593	1,217	141,071	58,598
% of QLD						
Sugar cane	3.4%	2.4%	15.1%	13.2%	100.0%	100.0%
Hay	-	0.2%	6.4%	13.0%	100.0%	100.0%
Oilseeds	0.1%	0.8%	5.2%	12.4%	100.0%	100.0%
Cereals for grain	0.0%	0.0%	2.4%	1.9%	100.0%	100.0%
Legumes for grain	0.0%	0.0%	1.8%	2.1%	100.0%	100.0%

Source: ABS Cat. No. 7125.0 – Agricultural Commodities: Small Area Data, Australia, 2000-01 and 2005-06

Table A.13: Crops Production, Fraser Coast Regional Council, 2000-01 and 2005-06 (hectares)

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland	
	2000-01	2005-06	2000-01	2005-06	2000-01	2005-06
Tonnes						
Sugar cane	599,499	587,796	4,380,564	4,113,744	26,561,933	34,955,101
Hay	0	1,124	13,474	85,847	166,287	559,641
Oilseeds	141	218	5,051	3,426	73,182	22,553
Cereals for grain	261	198	92,467	50,067	2,618,260	2,559,786
Legumes for grain	12	2	1,781	981	96,728	54,375
% of QLD						
Sugar cane	2.3%	1.7%	16.5%	11.8%	100.0%	100.0%
Hay	0.0%	0.2%	8.1%	15.3%	100.0%	100.0%
Oilseeds	0.2%	1.0%	6.9%	15.2%	100.0%	100.0%
Cereals for grain	0.0%	0.0%	3.5%	2.0%	100.0%	100.0%
Legumes for grain	0.0%	0.0%	1.8%	1.8%	100.0%	100.0%

Source: ABS Cat. No. 7125.0 – Agricultural Commodities: Small Area Data, Australia, 2000-01 and 2005-06

Table A.14: Crops Value, Fraser Coast Regional Council, 2005-06 ($m)

Commodity	Fraser Coast RC		Wide Bay - Burnett SD		Queensland
	$m	% of QLD	$m	% of QLD	$m
Sugar cane	16.46	1.7%	115.18	11.8%	978.74
Hay	0.23	0.2%	17.60	15.3%	114.73
Oilseeds	0.08	1.0%	1.30	15.5%	8.39
Cereals for grain	0.03	0.0%	8.64	1.9%	454.73
Legumes for grain	0.00	0.0%	0.29	1.5%	20.11

Source: ABS Cat. No. 7125.0 – Agricultural Commodities: Small Area Data, Australia, 2005-06

APPENDIX B

LOCATION QUOTIENT BY TWO DIGIT ANZSIC CLASSIFICATION

Table B.1: Location Quotient Analysis, Fraser Coast Regional Council and QLD, 2006 Census, 2 Digit ANZSIC Classification

	Fraser Coast RC
Agriculture, forestry & fishing	
Agriculture, Forestry & Fishing, nfd	0.85
Agriculture	0.91
Aquaculture	1.90
Forestry & Logging	4.75
Fishing, Hunting & Trapping	1.92
Agriculture, Forestry & Fishing Support Services	0.63
Total	0.99
Mining	
Mining, nfd	0.14
Coal Mining	0.00
Oil & Gas Extraction	0.20
Metal Ore Mining	0.10
Non-Metallic Mineral Mining & Quarrying	0.86
Exploration & Other Mining Support Services	1.09
Total	0.25
Manufacturing	
Manufacturing, nfd	1.01
Food Product Mfg	0.50
Beverage & Tobacco Product Mfg	0.07
Textile, Leather, Clothing & Footwear Mfg	0.78
Wood Product Mfg	4.23
Pulp, Paper & Converted Paper Product Mfg	0.10
Printing (including Reproduction of Recorded Media)	0.53
Petroleum & Coal Product Mfg	0.15
Basic Chemical & Chemical Product Mfg	0.23
Polymer Product & Rubber Product Mfg	0.27
Non-Metallic Mineral Product Mfg	0.76
Primary Metal & Metal Product Mfg	0.67
Fabricated Metal Product Mfg	0.69
Transport Equipment Mfg	2.04
Machinery & Equipment Mfg	0.42
Furniture & Other Mfg	0.67
Total	0.93
Electricity, gas, water & waste services	
Electricity, Gas, Water & Waste Services, nfd	2.32
Electricity Supply	1.88
Gas Supply	0.56
Water Supply, Sewerage & Drainage Services	2.96
Waste Collection, Treatment & Disposal Services	0.88
Total	1.85
Construction	
Construction, nfd	0.75
Building Construction	0.94
Heavy & Civil Engineering Construction	0.84
Construction Services	0.89
Total	0.89
Wholesale trade	
Wholesale Trade, nfd	0.39
Basic Material Wholesaling	1.10

	Fraser Coast RC
Machinery & Equipment Wholesaling	0.29
Motor Vehicle & Motor Vehicle Parts Wholesaling	1.00
Grocery, Liquor & Tobacco Product Wholesaling	0.74
Other Goods Wholesaling	0.32
Commission-Based Wholesaling	0.18
Total	0.64
Retail trade	
Retail Trade, nfd	1.15
Motor Vehicle & Motor Vehicle Parts Retailing	1.19
Fuel Retailing	1.22
Food Retailing	1.27
Other Store-Based Retailing	1.21
Non-Store Retailing & Retail Commission Based Buying and/or Selling	0.37
Total	1.22
Accommodation & food services	
Accommodation & Food Services, nfd	0.00
Accommodation	1.73
Food & Beverage Services	1.24
Total	1.37
Transport, postal & warehousing	
Transport, Postal & Warehousing, nfd	1.13
Road Transport	1.03
Rail Transport	0.98
Water Transport	0.57
Air & Space Transport	0.31
Other Transport	1.53
Postal & Courier Pick-up & Delivery Services	1.17
Transport Support Services	0.20
Warehousing & Storage Services	0.18
Total	0.85
Information media & telecommunications	
Information Media & Telecommunications, nfd	0.00
Publishing (except Internet & Music Publishing)	1.20
Motion Picture & Sound Recording Activities	0.80
Broadcasting (except Internet)	0.74
Internet Publishing & Broadcasting	0.00
Telecommunications Services	0.97
Internet Service Providers, Web Search Portals & Data Processing Services	0.23
Library & Other Information Services	0.52
Total	0.92
Financial & insurance services	
Financial & Insurance Services, nfd	0.32
Finance	0.68
Insurance & Superannuation Funds	0.57
Auxiliary Finance & Insurance Services	0.49
Total	0.60
Rental, hiring & real estate services	
Rental, Hiring & Real Estate Services, nfd	0.00
Rental & Hiring Services (except Real Estate)	1.21
Property Operators & Real Estate Services	1.09

	Fraser Coast RC
Total	1.12
Professional, scientific & technical services	
Professional, Scientific & Technical Services, nfd	1.78
Professional, Scientific & Technical Services (except Computer Systems Design & Related Services)	0.60
Computer System Design & Related Services	0.20
Total	0.55
Administrative & support services	
Administrative & Support Services, nfd	0.00
Administrative Services	0.98
Building Cleaning, Pest Control & Other Support Services	0.86
Total	0.92
Public administration & safety	
Public Administration & Safety, nfd	0.87
Public Administration	0.98
Defence	0.02
Public Order, Safety & Regulatory Services	1.32
Total	0.96
Education & training	
Education & Training, nfd	1.43
Preschool & School Education	1.37
Tertiary Education	0.73
Adult, Community & Other Education	0.83
Total	1.17
Health care & social assistance	
Health Care & Social Assistance, nfd	1.26
Hospitals	1.15
Medical & Other Health Care Services	1.12
Residential Care Services	1.84
Social Assistance Services	1.53
Total	1.34
Arts & recreation services	
Arts & Recreation Services, nfd	0.48
Heritage Activities	1.10
Creative & Performing Arts Activities	0.40
Sport & Recreation Activities	0.51
Gambling Activities	0.24
Total	0.51
Other services	
Other Services, nfd	0.00
Repair & Maintenance	1.08
Personal Care & Other Services	1.06
Private Households Employing Staff & Undifferentiated Goods & Service-Producing Activities of Households for Own Use	0.00
Total	1.06

APPENDIX C

SUPPLY CHAIN & CUSTOMER MARKET SECTORS ANALYSIS-DETAILED SECTORAL TABLES

Retail Trade

Retail Trade

The retail sector purchased goods broadly through the economy, with the most significant supply sectors in terms of inputs being legal, accounting, marketing and business management services (8%), other business services (5%) and other property services (5%). The most significant customer sectors were final consumption by households, government and the private sector (88%), exports (3%) and accommodation, cafes & restaurants (2%) (Refer to Table C.1).

Table C.1: Inter-Industry Transactions – Retail Trade Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	1,211	1%	Primary Industry		
Commercial fishing	225	0%	Secondary Industry	11,327	14%	Other agriculture	42	0%
Sheep	212	0%	Tertiary Industry	6,993	8%	Grains	33	0%
Other agriculture	203	0%	Quaternary Industry	20,200	24%	Coal	25	0%
Beef cattle	192	0%	Quinary Industry	1,152	1%	Other	128	0%
Other	379	0%	Wages	26,295	32%	Total	228	0%
Total	1,211	1%	Total	67,178	81%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Other construction	100	0%
Meat and meat products	2,438	3%	Gross operating surplus	13,111	16%	Motor vehicles and parts; other transport equipment	73	0%
Printing and services to printing	1,939	2%	Net taxes	2,317	3%	Meat and meat products	69	0%
Publishing; recorded media and publishing	985	1%	Total	15,428	19%		65	0%
						Other food products		
Petroleum and coal products	607	1%				Electricity supply	63	0%
Motor vehicles and parts; other transport equipment	439	1%					63	0%
						Confectionery		
Bakery products	434	1%				Other	736	1%
Dairy products	394	0%				Total	1,169	2%
Electricity supply	391	0%						
Other food products	315	0%				Tertiary Industry		
Other	3,383	4%				Accommodation, cafes and restaurants	1,794	2%
Total	11,327	14%				Retail trade	998	1%
						Wholesale trade	795	1%
Tertiary Industry						Other	631	1%
Wholesale trade	1,096	1%				Total	4,219	5%
Retail trade	998	1%						
Retail mechanical repairs	958	1%				Quaternary Industry		
Wholesale mechanical repairs	792	1%				Communication services	201	0%
Other	3,150	4%				Education	140	0%
Total	6,993	8%				Other	465	1%
						Total	806	1%
Quaternary Industry								
Legal, accounting, marketing and business management services	6,300	8%				Quinary Industry		
Other business services	4,398	5%				Sport, gambling and recreational services	168	0%
Other property services	3,832	5%				Motion picture, radio and television services	163	0%
Communication services	3,083	4%				Other	330	0%
Other	2,587	3%				Total	660	1%
Total	20,200	24%				Total inter-industry uses	7,081	9%
Quinary Industry						Total Consumption		
Motion picture, radio and television services	885	1%				Inter-industry Uses	7,081	9%
Personal services	112	0%	Total Supply			Exports	2,388	3%
Libraries, museums and the arts	61	0%	Inputs	67,178	81%	Final consumption expenditure	67,952	88%
Sport, gambling and recreational services	52	0%	Industry Gross VA	15,428	19%	Capital formation	134	0%
Other	43	0%	Imports	499	1%	Change in inventories	0	0%
Total	1,152	1%	Total	83,105	100%	Total	77,554	100%

Source: ABS (2008) Input Output Tables, 2004-05

Retail Mechanical Repairs

The most significant inter-industry transactions pertaining to the retail mechanical repairs sector on the supply side were motor vehicles and parts, other transport equipment manufacturing (18%) and wholesale trade (7%). The most significant customer sectors were final consumption expenditure by households, government and the private sector (42%), road transport (15%) and retail trade (5%) (Refer to Table C.2).

Table C.2: Inter-Industry Transactions – Retail Mechanical Repairs Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	8	0%	Primary Industry		
Oil and gas	6	0%	Secondary Industry	4,797	25%	Forestry and logging	49	0%
Other agriculture	2	0%	Tertiary Industry	1,519	8%	Beef cattle	39	0%
			Quaternary Industry	2,418	13%	Commercial fishing	37	0%
			Quinary Industry	48	0%	Other	288	2%
Other	0	0%	Wages	8,229	43%	Total	413	2%
Total	8	0%	Total	17,018	90%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Construction trade services	598	3%
Motor vehicles and parts; other transport equipment	3,509	18%	Gross operating surplus	1,266	7%	Other construction	271	1%
Petroleum and coal products	225	1%	Net taxes	707	4%	Electricity supply	182	1%
Electricity supply	212	1%	Total	1,973	10%	Printing and services to printing	153	1%
Agricultural, mining and construction machinery, lifting and material handling equipment	148	1%				Residential building construction	124	1%
Glass and glass products	107	1%				Paper containers and products	84	0%
Other machinery and equipment	85	0%				Other	878	5%
Paints	76	0%				Total	2,291	12%
Water supply; sewerage and drainage services	64	0%						
Construction trade services	54	0%				Tertiary Industry		
Other	318	2%				Road transport	2,930	15%
Total	4,797	25%				Retail trade	958	5%
						Wholesale trade	829	4%
Tertiary Industry						Other	870	5%
Wholesale trade	1,297	7%				Total	5,586	29%
Services to transport; storage	85	0%						
Road transport	56	0%				Quaternary Industry		
Retail trade	44	0%				Communication services	759	4%
Other	36	0%				Other business services	466	2%
Total	1,519	8%				Other	1,060	6%
						Total	2,286	12%
Quaternary Industry								
Legal, accounting, marketing and business management services	820	4%				Quinary Industry		
Other property services	445	2%				Health services	113	1%
Communication services	316	2%				Sport, gambling and recreational services	83	0%
Other business services	250	1%				Other	201	1%
Other	587	3%				Total	398	2%
Total	2,418	13%				Total inter-industry uses	10,973	58%
Quinary Industry						Total Consumption		
Health services	14	0%				Inter-industry Uses	10,973	58%
Motion picture, radio and television services	11	0%	Total Supply			Exports	19	0%
Personal services	9	0%	Inputs	17,018	90%	Final consumption expenditure	8,002	42%
Libraries, museums and the arts	9	0%	Industry Gross VA	1,973	10%	Capital formation	0	0%
Other	6	0%	Imports	3	0%	Change in inventories	0	0%
Total	48	0%	Total	18,994	100%	Total	18,994	100%

Source: ABS (2008) Input Output Tables, 2004-05

Other Retail Repairs

The most significant inter-industry transactions pertaining to the other retail repairs sector on the supply side were household appliances manufacturing (9%), wholesale trade (4%) and electronic equipment manufacturing (4%). Final consumption expenditure by households, government and the private sector (28%), ownership of dwellings (21%) and retail trade (10%) accounted for over half of the sector's output (refer to Table C.3).

Table C.3: Inter-Industry Transactions – Other Retail Repairs Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	2	0%	Primary Industry		
Oil and gas	2	0%	Secondary Industry	514	23%	Beef cattle	11	0%
Other agriculture	1	0%	Tertiary Industry	139	6%	Sheep	8	0%
			Quaternary Industry	105	5%	Poultry	7	0%
			Quinary Industry	1	0%	Other	22	0%
Other	0	0%	Wages	976	43%	Total	47	1%
Total	2	0%	Total	1,738	77%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Other construction	37	1%
Household appliances	214	9%	Gross operating surplus	449	20%	Residential building construction	31	1%
Electronic equipment	81	4%	Net taxes	80	4%	Construction trade services	27	1%
Other machinery and equipment	39	2%	Total	529	23%			
Other electrical equipment	29	1%						
Fabricated metal products	24	1%						
Petroleum and coal products	24	1%				Other	0	0%
Electricity supply	22	1%				Total	95	2%
Motor vehicles and parts; other transport equipment	10	0%						
Photographic and scientific equipment	9	0%				Tertiary Industry		
Other	63	3%				Retail trade	494	10%
Total	514	23%				Accommodation, cafes and restaurants	305	6%
						Wholesale trade	247	5%
Tertiary Industry						Other	384	8%
Wholesale trade	93	4%				Total	1,430	30%
Road transport	26	1%						
Retail mechanical repairs	6	0%				Quaternary Industry		
Accommodation, cafes and restaurants	5	0%				Ownership of dwellings	1,012	21%
Other	10	0%				Government administration	143	3%
Total	139	6%				Other	530	11%
						Total	1,685	35%
Quaternary Industry								
Legal, accounting, marketing and business management services	44	2%				Quinary Industry		
Communication services	17	1%				Community services	58	1%
Insurance	14	1%				Personal services	43	1%
Other business services	14	1%				Other	109	2%
Other	17	1%				Total	210	4%
Total	105	5%				Total inter-industry uses	3,467	72%
Quinary Industry						Total Consumption		
Health services	1	0%				Inter-industry Uses	3,467	72%
			Total Supply			Exports	0	0%
			Inputs	1,738	77%	Final consumption expenditure	1,340	28%
			Industry Gross VA	529	23%	Capital formation	0	0%
Other	0	0%	Imports	0	0%	Change in inventories	0	0%
Total	1	0%	Total	2,267	100%	Total	4,807	100%

Source: ABS (2008) Input Output Tables, 2004-05

Health Care & Social Assistance

Health Services

The health services sector purchased goods broadly through the economy, with the most significant supply sectors in terms of inputs being photographic and scientific equipment manufacturing (3%), wholesale trade (2%) and other business services (2%). Final consumption by households, government and the private sector accounted for the majority of the sector's output (97%) (Refer to Table C.4).

Table C.4: Inter-Industry Transactions – Health Services Sector

Inputs

Industry Name	$M	%
Primary Industry		
Oil and gas	34	0%
Other agriculture	2	0%
Other mining	2	0%
Coal	2	0%
Other	0	0%
Total	40	0%
Secondary Industry		
Photographic and scientific equipment	1,623	3%
Medicinal and pharmaceutical products, pesticides	408	1%
Basic chemicals	297	1%
Electricity supply	146	0%
Petroleum and coal products	131	0%
Textile products	120	0%
Paper containers and products	108	0%
Printing and services to printing	106	0%
Knitting mill products	83	0%
Other	719	1%
Total	3,741	7%
Tertiary Industry		
Wholesale trade	1,127	2%
Road transport	189	0%
Retail mechanical repairs	113	0%
Retail trade	80	0%
Other	233	0%
Total	1,742	3%
Quaternary Industry		
Other business services	1,054	2%
Legal, accounting, marketing and business management services	980	2%
Communication services	566	1%
Banking	562	1%
Other	1,014	2%
Total	4,175	7%
Quinary Industry		
Personal services	612	1%
Health services	381	1%
Sport, gambling and recreational services	39	0%
Libraries, museums and the arts	27	0%
Other	28	0%
Total	1,087	2%

Total Inputs	$M	%
Primary Industry	40	0%
Secondary Industry	3,741	7%
Tertiary Industry	1,742	3%
Quaternary Industry	4,175	7%
Quinary Industry	1,087	2%
Wages	37,716	66%
Total	48,501	85%
Industry Gross VA		
Gross operating surplus	6,791	12%
Net taxes	1,275	2%
Total	8,066	14%
Total Supply		
Inputs	48,501	85%
Industry Gross VA	8,066	14%
Imports	560	1%
Total	57,127	100%

Outputs

Inter industry uses	$M	%
Primary Industry		
Beef cattle	33	0%
Dairy cattle	14	0%
Services to agriculture; hunting and trapping	7	0%
Other	15	0%
Total	69	0%
Secondary Industry		
Medicinal and pharmaceutical products, pesticides	115	0%
Meat and meat products	44	0%
Motor vehicles and parts; other transport equipment	27	0%
Wine, spirits and tobacco	27	0%
Publishing; recorded media and publishing	22	0%
Clothing	14	0%
Other	76	0%
Total	324	1%
Tertiary Industry		
Services to transport; storage	91	0%
Retail trade	27	0%
Wholesale trade	20	0%
Other	33	0%
Total	170	0%
Quaternary Industry		
Communication services	86	0%
Defence	63	0%
Other	185	0%
Total	334	1%
Quinary Industry		
Health services	381	1%
Sport, gambling and recreational services	63	0%
Other	108	0%
Total	553	1%
Total inter-industry uses	1,450	3%
Total Consumption		
Inter-industry Uses	1,450	3%
Exports	516	1%
Final consumption expenditure	55,086	97%
Capital formation	0	0%
Change in inventories	0	0%
Total	57,052	100%

Source: ABS (2008) Input Output Tables, 2004-05

Community Services

The community services sector purchased goods broadly throughout the economy, particularly within the secondary (14%) and quaternary (16%) industry sectors. Final consumption by households, government and the private sector accounted for the entire sector's output (refer to Table C.5).

Table C.5: Inter-Industry Transactions – Community Services Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	73	1%	Primary Industry		
Oil and gas	36	0%	Secondary Industry	1,483	14%			
Other agriculture	12	0%	Tertiary Industry	764	7%			
Services to agriculture; hunting and trapping	11	0%	Quaternary Industry	1,802	16%			
Other mining	6	0%	Quinary Industry	187	2%			
Other	8	0%	Wages	4,977	45%	Total	0	0%
Total	73	1%	Total	9,286	85%			
						Secondary Industry		
Secondary Industry			Industry Gross VA					
Medicinal and pharmaceutical products, pesticides	155	1%	Gross operating surplus	1,403	13%			
Electricity supply	115	1%	Net taxes	252	2%			
Bakery products	86	1%	Total	1,655	15%			
Printing and services to printing	63	1%						
Petroleum and coal products	58	1%						
Electronic equipment	57	1%						
Paper containers and products	56	1%				Total	0	0%
Basic chemicals	49	0%						
Other machinery and equipment	46	0%				Tertiary Industry		
Other	798	7%						
Total	1,483	14%						
Tertiary Industry								
Wholesale trade	203	2%				Total	0	0%
Accommodation, cafes and restaurants	143	1%						
Other wholesale repairs	88	1%				Quaternary Industry		
Road transport	73	1%						
Other	257	2%						
Total	764	7%						
						Total	0	0%
Quaternary Industry								
Other business services	568	5%				Quinary Industry		
Communication services	338	3%						
Legal, accounting, marketing and business management services	253	2%						
Other property services	242	2%						
Other	401	4%				Total	0	0%
Total	1,802	16%				Total inter-industry uses	0	0%
Quinary Industry						Total Consumption		
Sport, gambling and recreational services	63	1%				Inter-industry Uses	0	0%
Libraries, museums and the arts	54	0%	Total Supply			Exports	4	0%
Motion picture, radio and television services	27	0%	Inputs	9,286	85%	Final consumption expenditure	10,937	100%
Health services	19	0%	Industry Gross VA	1,655	15%	Capital formation	0	0%
Other	24	0%	Imports	1	0%	Change in inventories	0	0%
Total	187	2%	Total	10,941	100%	Total	10,941	100%

Source: ABS (2008) Input Output Tables, 2004-05

Wood Product Manufacturing

Sawmill Products Manufacturing

The most significant inter-industry transactions pertaining to the sawmill products manufacturing sector on the supply side were forestry and logging (14%), intra-industry purchases (7%) and road transport (5%). The most significant customer sectors were furniture manufacturing (21%), exports (19%), residential building construction (15%), construction trade services (15%) and other wood products manufacturing (14%) (refer to Table C.6).

Table C.6: Inter-Industry Transactions – Sawmill Products Manufacturing Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	609	15%	Primary Industry		
Forestry and logging	594	14%	Secondary Industry	610	15%	Coal	4	0%
Non-ferrous metal ores	12	0%	Tertiary Industry	508	12%	Sheep	4	0%
Oil and gas	3	0%	Quaternary Industry	264	6%	Oil and gas	3	0%
			Quinary Industry	6	0%	Other	15	0%
Other	0	0%	Wages	657	16%	Total	26	1%
Total	609	15%	Total	2,653	64%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Furniture	861	21%
Sawmill products	309	7%	Gross operating surplus	634	15%	Residential building construction	613	15%
Other machinery and equipment	43	1%	Net taxes	44	1%	Construction trade services	611	15%
Pulp, paper and paperboard	42	1%	Total	678	16%	Other wood products	570	14%
Other chemical products	34	1%				Sawmill products	309	7%
Electricity supply	32	1%				Structural metal products	71	2%
Other wood products	24	1%				Other	243	6%
Petroleum and coal products	21	1%				Total	3,277	78%
Basic chemicals	19	0%						
Electronic equipment	14	0%				Tertiary Industry		
Other	73	2%				Rail, pipeline and other transport	5	0%
Total	610	15%				Retail trade	5	0%
						Wholesale trade	3	0%
Tertiary Industry						Other	9	0%
Road transport	200	5%				Total	22	1%
Services to transport; storage	124	3%						
Wholesale trade	100	2%				Quaternary Industry		
Other wholesale repairs	34	1%				Education	8	0%
Other	49	1%				Defence	7	0%
Total	508	12%				Other	14	0%
						Total	28	1%
Quaternary Industry								
Other property services	73	2%				Quinary Industry		
Other business services	64	2%				Motion picture, radio and television services	5	0%
Legal, accounting, marketing and business management services	57	1%				Community services	2	0%
Scientific research, technical and computer services	17	0%				Other	7	0%
Other	53	1%				Total	14	0%
Total	264	6%				Total inter-industry uses	3,367	80%
Quinary Industry						Total Consumption		
Health services	4	0%				Inter-industry Uses	3,367	80%
Other services	1	0%	Total Supply			Exports	792	19%
Motion picture, radio and television services	1	0%	Inputs	2,653	64%	Final consumption expenditure	1	0%
Personal services	1	0%	Industry Gross VA	678	16%	Capital formation	0	0%
Other	0	0%	Imports	842	20%	Change in inventories	23	1%
Total	6	0%	Total	4,174	100%	Total	4,183	100%

Source: ABS (2008) Input Output Tables, 2004-05

Other Wood Products Manufacturing

The most significant inter-industry transactions pertaining to the other wood products manufacturing sector on the supply side were sawmill products (9%) and intra-industry purchases (6%). The most significant customer sectors were residential building construction (25%), construction trade services (19%) and furniture manufacturing (9%) (refer to Table C.7).

Table C.7: Inter-Industry Transactions – Other Wood Products Manufacturing Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	182	3%	Primary Industry		
Forestry and logging	175	3%	Secondary Industry	1,848	29%	Commercial fishing	21	0%
Oil and gas	7	0%	Tertiary Industry	659	10%	Coal	14	0%
Coal	1	0%	Quaternary Industry	477	7%	Oil and gas	13	0%
			Quinary Industry	26	0%	Other	58	1%
Other	0	0%	Wages	1,406	22%	Total	105	2%
Total	182	3%	Total	4,599	72%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Residential building construction	1,704	25%
Sawmill products	570	9%	Gross operating surplus	908	14%	Construction trade services	1,334	19%
Other wood products	414	6%	Net taxes	68	1%	Furniture	568	8%
Fabricated metal products	117	2%	Total	976	15%	Other wood products	414	6%
Other chemical products	97	2%				Other construction	273	4%
Structural metal products	91	1%				Ships and boats	166	2%
Basic chemicals	82	1%				Other	533	8%
Electricity supply	63	1%				Total	4,991	72%
Other machinery and equipment	62	1%						
Pulp, paper and paperboard	51	1%				Tertiary Industry		
Other	303	5%				Retail trade	265	4%
Total	1,848	29%				Wholesale trade	222	3%
						Services to transport; storage	136	2%
Tertiary Industry						Other	76	1%
Wholesale trade	216	3%				Total	699	10%
Road transport	179	3%						
Services to transport; storage	151	2%				Quaternary Industry		
Other wholesale repairs	53	1%				Ownership of dwellings	228	3%
Other	61	1%				Education	174	3%
Total	659	10%				Other	217	3%
						Total	620	9%
Quaternary Industry								
Legal, accounting, marketing and business management services	123	2%				Quinary Industry		
Other business services	122	2%				Motion picture, radio and television services	66	1%
Other property services	77	1%				Libraries, museums and the arts	39	1%
Communication services	57	1%				Other	63	1%
Other	99	2%				Total	168	2%
Total	477	7%				Total inter-industry uses	6,583	95%
Quinary Industry						Total Consumption		
Motion picture, radio and television services	16	0%				Inter-industry Uses	6,583	95%
Health services	8	0%	Total Supply			Exports	229	3%
Other services	1	0%	Inputs	4,599	72%	Final consumption expenditure	96	1%
Personal services	1	0%	Industry Gross VA	976	15%	Capital formation	9	0%
Other	0	0%	Imports	797	13%	Change in inventories	27	0%
Total	26	0%	Total	6,372	100%	Total	6,944	100%

Source: ABS (2008) Input Output Tables, 2004-05

Pulp, Paper & Paperboard Manufacturing

Imports (55%) accounted for over half of all inputs in the pulp, paper & paperboard manufacturing sector. The most significant inter-industry transactions pertaining to the pulp, paper & paperboard manufacturing sector on the supply side were forestry and logging (4%) and intra-industry transactions (3%) . Printing and services to printing (42%) and paper containers and products manufacturing (11%) accounted for approximately half of the sector's output (refer to Table C.8).

Table C.8: Inter-Industry Transactions – Pulp, Paper & Paperboard Manufacturing Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	199	5%	Primary Industry		
Forestry and logging	160	4%	Secondary Industry	584	13%	Services to mining	25	1%
Oil and gas	37	1%	Tertiary Industry	235	5%	Coal	13	0%
Coal	1	0%	Quaternary Industry	118	3%	Non-ferrous metal ores	11	0%
			Quinary Industry	4	0%	Other	11	0%
Other	0	0%	Wages	444	10%	Total	61	1%
Total	199	5%	Total	1,584	36%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Printing and services to printing	1,835	42%
Pulp, paper and paperboard	115	3%	Gross operating surplus	328	8%	Paper containers and products	485	11%
Basic chemicals	106	2%	Net taxes	39	1%	Publishing; recorded media and publishing	325	7%
Electricity supply	60	1%	Total	367	8%	Pulp, paper and paperboard	115	3%
Other chemical products	35	1%				Wine, spirits and tobacco	58	1%
Paper containers and products	33	1%				Other wood products	51	1%
Medicinal and pharmaceutical products, pesticides	30	1%				Other	276	6%
Gas supply	27	1%				Total	3,145	72%
Sawmill products	25	1%						
Petroleum and coal products	21	0%				Tertiary Industry		
Other	134	3%				Wholesale trade	105	2%
Total	584	13%				Accommodation, cafes and restaurants	66	1%
						Retail trade	31	1%
Tertiary Industry						Other	58	1%
Road transport	64	1%				Total	260	6%
Wholesale trade	53	1%						
Services to transport; storage	43	1%				Quaternary Industry		
Other wholesale repairs	14	0%				Government administration	233	5%
Other	60	1%				Communication services	158	4%
Total	235	5%				Other	166	4%
						Total	557	13%
Quaternary Industry								
Other business services	32	1%				Quinary Industry		
Legal, accounting, marketing and business management services	28	1%				Libraries, museums and the arts	27	1%
Banking	13	0%				Other services	26	1%
Communication services	8	0%				Other	29	1%
Other	36	1%				Total	81	2%
Total	118	3%				Total inter-industry uses	4,103	94%
Quinary Industry						Total Consumption		
Other services	3	0%				Inter-industry Uses	4,103	94%
Health services	1	0%	Total Supply			Exports	482	11%
			Inputs	1,584	36%	Final consumption expenditure	62	1%
			Industry Gross VA	367	8%	Capital formation	0	0%
Other	0	0%	Imports	2,417	55%	Change in inventories	-269	-6%
Total	4	0%	Total	4,368	100%	Total	4,378	100%

Source: ABS (2008) Input Output Tables, 2004-05

Paper Containers & Products Manufacturing

The most significant inter-industry transactions pertaining to the paper containers & products manufacturing sector on the supply side were pulp, paper & paperboard manufacturing (8%), services to transport, storage (7%) and legal, accounting, marketing and business management services (7%). The most significant customer sectors were wholesale trade (7%), retail trade (6%), wine, spirits and tobacco manufacturing (5%) and dairy products manufacturing (5%) (refer to Table C.9).

Table C.9: Inter-Industry Transactions – Paper Containers & Products Manufacturing Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	53	1%	Primary Industry		
Oil and gas	39	1%	Secondary Industry	1,600	27%	Poultry	22	0%
Forestry and logging	14	0%	Tertiary Industry	936	16%	Other agriculture	15	0%
Coal	1	0%	Quaternary Industry	978	16%	Iron ores	2	0%
			Quinary Industry	25	0%	Other	4	0%
Other	0	0%	Wages	954	16%	Total	43	1%
Total	53	1%	Total	4,546	76%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Wine, spirits and tobacco	256	5%
Pulp, paper and paperboard	485	8%	Gross operating surplus	881	15%	Dairy products	249	5%
Basic chemicals	234	4%	Net taxes	87	1%	Other food products	222	4%
Paper containers and products	188	3%	Total	968	16%	Medicinal and pharmaceutical products, pesticides	217	4%
Plastic products	149	3%				Meat and meat products	199	4%
Other chemical products	115	2%				Paper containers and products	188	4%
Printing and services to printing	91	2%				Other	1,403	27%
Electricity supply	74	1%				Total	2,734	52%
Gas supply	30	0%						
Publishing; recorded media and publishing	29	0%				Tertiary Industry		
Other	205	3%				Wholesale trade	384	7%
Total	1,600	27%				Retail trade	308	6%
						Accommodation, cafes and restaurants	193	4%
Tertiary Industry						Other	83	2%
Services to transport; storage	394	7%				Total	968	18%
Wholesale trade	192	3%						
Retail mechanical repairs	84	1%				Quaternary Industry		
Road transport	82	1%				Government administration	136	3%
Other	184	3%				Education	58	1%
Total	936	16%				Other	171	3%
						Total	365	7%
Quaternary Industry								
Legal, accounting, marketing and business management services	429	7%				Quinary Industry		
Other business services	265	4%				Health services	108	2%
Scientific research, technical and computer services	78	1%				Community services	56	1%
Other property services	60	1%				Other	46	1%
Other	147	2%				Total	210	4%
Total	978	16%				Total inter-industry uses	4,321	82%
Quinary Industry						Total Consumption		
Other services	11	0%				Inter-industry Uses	4,321	82%
Libraries, museums and the arts	6	0%	Total Supply			Exports	200	4%
Health services	4	0%	Inputs	4,546	76%	Final consumption expenditure	758	14%
Motion picture, radio and television services	2	0%	Industry Gross VA	968	16%	Capital formation	0	0%
Other	1	0%	Imports	444	7%	Change in inventories	-15	0%
Total	25	0%	Total	5,959	100%	Total	5,264	100%

Source: ABS (2008) Input Output Tables, 2004-05

Transport Equipment Manufacturing

Motor Vehicles & Parts and Other Transport Equipment Manufacturing

The most significant inter-industry transactions pertaining to the motor vehicles & parts and other transport manufacturing sector on the supply side were intra-industry transactions (12%) and wholesale trade (9%). Final consumption expenditure by households, government and the private sector accounted for just over half of all outputs (refer to Table C.10).

Table C.10: Inter-Industry Transactions – Motor Vehicles & Parts and Other Transport Equipment Manufacturing Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	19	0%	Primary Industry		
Oil and gas	17	0%	Secondary Industry	8,862	20%	Commercial fishing	30	0%
Other mining	2	0%	Tertiary Industry	4,786	11%	Non-ferrous metal ores	24	0%
			Quaternary Industry	3,032	7%	Coal	16	0%
			Quinary Industry	169	0%	Other	81	0%
Other	0	0%	Wages	3,442	8%	Total	151	0%
Total	19	0%	Total	20,309	45%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Motor vehicles and parts; other transport equipment	5,387	12%
Motor vehicles and parts; other transport equipment	5,387	12%	Gross operating surplus	2,353	5%	Other construction	379	1%
Iron and steel	1,100	2%	Net taxes	299	1%	Construction trade services	339	1%
Furniture	376	1%	Total	2,652	6%	Residential building construction	311	1%
Basic non-ferrous metal and products	240	1%				Other manufacturing	308	1%
Rubber products	211	0%				Household appliances	87	0%
Fabricated metal products	186	0%				Other	366	1%
Other machinery and equipment	166	0%				Total	7,176	16%
Basic chemicals	164	0%						
Paints	146	0%				Tertiary Industry		
Other	887	2%				Retail mechanical repairs	3,509	8%
Total	8,862	20%				Road transport	1,350	3%
						Retail trade	439	1%
Tertiary Industry						Other	667	2%
Wholesale trade	3,855	9%				Total	5,965	13%
Wholesale mechanical repairs	279	1%						
Services to transport; storage	176	0%				Quaternary Industry		
Road transport	169	0%				Communication services	356	1%
Other	307	1%				Defence	64	0%
Total	4,786	11%				Other	178	0%
						Total	597	1%
Quaternary Industry								
Other property services	1,054	2%				Quinary Industry		
Other business services	868	2%				Motion picture, radio and television services	26	0%
Scientific research, technical and computer services	652	1%				Other services	26	0%
Legal, accounting, marketing and business management services	165	0%				Other	58	0%
Other	292	1%				Total	110	0%
Total	3,032	7%				Total inter-industry uses	13,999	32%
Quinary Industry						Total Consumption		
Motion picture, radio and television services	123	0%				Inter-industry Uses	13,999	32%
Health services	27	0%	Total Supply			Exports	3,187	7%
Other services	10	0%	Inputs	20,309	45%	Final consumption expenditure	25,403	57%
Personal services	5	0%	Industry Gross VA	2,652	6%	Capital formation	1,253	3%
Other	4	0%	Imports	21,853	49%	Change in inventories	550	1%
Total	169	0%	Total	44,814	100%	Total	44,392	100%

Source: ABS (2008) Input Output Tables, 2004-05

Ships & Boat Manufacturing

The most significant inter-industry transactions pertaining to the ships & boat manufacturing sector on the supply side occurred within the secondary industry sector, accounting for almost half of all inputs. Defence (42%) and water transport (8%) accounted for approximately half of all outputs (refer to Table C.11).

Table C.11: Inter-Industry Transactions – Ships & Boat Manufacturing

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	6	0%	Primary Industry		
Oil and gas	3	0%	Secondary Industry	2,101	49%	Commercial fishing	0	0%
Other mining	3	0%	Tertiary Industry	490	11%			
			Quaternary Industry	185	4%			
			Quinary Industry	5	0%	Other		
Other	0	0%	Wages	697	16%	Total	0	0%
Total	6	0%	Total	3,483	81%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Other construction	49	1%
Iron and steel	362	8%	Gross operating surplus	336	8%	Residential building construction	42	1%
Photographic and scientific equipment	338	8%	Net taxes	58	1%	Construction trade services	18	0%
Agricultural, mining and construction machinery, lifting and material handling equipment	308	7%	Total	394	9%	Basic chemicals	3	0%
Other electrical equipment	241	6%				Publishing; recorded media and publishing	3	0%
Other wood products	166	4%				Other food products	3	0%
Other machinery and equipment	144	3%				Other	31	1%
Basic non-ferrous metal and products	118	3%				Total	149	4%
Household appliances	71	2%						
Structural metal products	70	2%				Tertiary Industry		
Other	282	7%				Water transport	310	8%
Total	2,101	49%				Wholesale trade	20	0%
						Services to transport; storage	6	0%
Tertiary Industry						Other	4	0%
Wholesale trade	353	8%				Total	339	8%
Road transport	45	1%						
Services to transport; storage	44	1%				Quaternary Industry		
Accommodation, cafes and restaurants	13	0%				Defence	1,720	42%
Other	34	1%				Government administration	1	0%
Total	490	11%				Other	3	0%
						Total	1,724	43%
Quaternary Industry								
Other business services	51	1%				Quinary Industry		
Other property services	31	1%				Motion picture, radio and television services	2	0%
Legal, accounting, marketing and business management services	30	1%				Sport, gambling and recreational services	1	0%
Communication services	24	1%				Other	1	0%
Other	49	1%				Total	4	0%
Total	185	4%				Total inter-industry uses	2,216	55%
Quinary Industry						Total Consumption		
Personal services	2	0%				Inter-industry Uses	2,216	55%
Libraries, museums and the arts	1	0%	Total Supply			Exports	485	12%
Other services	1	0%	Inputs	3,483	81%	Final consumption expenditure	1,147	28%
Health services	1	0%	Industry Gross VA	394	9%	Capital formation	49	1%
Other	0	0%	Imports	425	10%	Change in inventories	155	4%
Total	5	0%	Total	4,302	100%	Total	4,053	100%

Source: ABS (2008) Input Output Tables, 2004-05

Railway Equipment Manufacturing

The most significant inter-industry transactions pertaining to the railway equipment manufacturing sector on the supply side were within the secondary industry sector (49%), with key sub-sectors including intra-industry transactions (17%), structural metal products manufacturing (9%) and other electrical equipment manufacturing (8%). The most significant customer sectors were rail, pipeline and other transport (54%) and railway equipment manufacturing (18%) (see Table C.12).

Table C.12: Inter-Industry Transactions – Railway Equipment Manufacturing

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	9	0%	Primary Industry		
Non-ferrous metal ores	6	0%	Secondary Industry	986	49%	Coal	5	0%
Other mining	2	0%	Tertiary Industry	113	6%	Oil and gas	2	0%
Oil and gas	1	0%	Quaternary Industry	46	2%			0%
			Quinary Industry	0	0%	Other	0	0%
Other	0	0%	Wages	480	24%	Total	7	0%
Total	9	0%	Total	1,634	82%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Railway equipment	348	18%
Railway equipment	348	17%	Gross operating surplus	143	7%	Motor vehicles and parts; other transport equipment	11	1%
Structural metal products	184	9%	Net taxes	25	1%	Iron and steel	4	0%
Other electrical equipment	155	8%	Total	168	8%			0%
Iron and steel	88	4%						0%
Other machinery and equipment	63	3%						0%
Electronic equipment	41	2%				Other	0	0%
Construction trade services	12	1%				Total	363	19%
Other non-metallic mineral products	12	1%						
Electricity supply	8	0%				Tertiary Industry		
Other	76	4%				Rail, pipeline and other transport	1,035	54%
Total	986	49%				Road transport	5	0%
								0%
Tertiary Industry						Other	0	0%
Wholesale trade	83	4%				Total	1,040	54%
Road transport	14	1%						
Services to transport; storage	7	0%				Quaternary Industry		
Accommodation, cafes and restaurants	4	0%						0%
Other	4	0%						0%
Total	113	6%				Other	0	0%
						Total	0	0%
Quaternary Industry								
Scientific research, technical and computer services	15	1%				Quinary Industry		
Legal, accounting, marketing and business management services	9	0%						0%
Communication services	7	0%						0%
Insurance	4	0%				Other	0	0%
Other	12	1%				Total	0	0%
Total	46	2%				Total inter-industry uses	1,410	73%
Quinary Industry						Total Consumption		
		0%				Inter-industry Uses	1,410	73%
		0%	Total Supply			Exports	33	2%
		0%	Inputs	1,634	82%	Final consumption expenditure	417	22%
		0%	Industry Gross VA	168	8%	Capital formation	3	0%
Other	0	0%	Imports	199	10%	Change in inventories	57	3%
Total	0	0%	Total	2,001	100%	Total	1,919	100%

Source: ABS (2008) Input Output Tables, 2004-05

Aircraft Manufacturing

Imports (58%) accounted for over half of all inputs in the aircraft manufacturing sector. The most significant inter-industry transactions pertaining to the aircraft manufacturing sector on the supply side were intra-industry transactions (8%), wholesale trade (3%) and electronic equipment manufacturing (2%). The most significant customer sectors were air and space transport (18%) and services to transport and storage (10%) (see Table C.13).

Table C.13: Inter-Industry Transactions – Aircraft Manufacturing

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	16	0%	Primary Industry		
Oil and gas	11	0%	Secondary Industry	891	15%	Coal	355	6%
Other mining	5	0%	Tertiary Industry	206	4%	Oil and gas	114	2%
			Quaternary Industry	17	0%	Services to mining	69	1%
			Quinary Industry	0	0%	Other	85	1%
Other	0	0%	Wages	1,170	20%	Total	623	11%
Total	16	0%	Total	2,300	39%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Aircraft	450	8%
Aircraft	450	8%	Gross operating surplus	77	1%	Other construction	24	0%
Electronic equipment	111	2%	Net taxes	68	1%	Residential building construction	20	0%
Fabricated metal products	61	1%	Total	145	2%	Construction trade services	9	0%
Photographic and scientific equipment	56	1%						
Other machinery and equipment	45	1%						
Sheet metal products	30	1%				Other	0	0%
Other electrical equipment	27	0%				Total	503	9%
Basic non-ferrous metal and products	26	0%						
Motor vehicles and parts; other transport equipment	23	0%				Tertiary Industry		
Other	62	1%				Air and space transport	1,031	18%
Total	891	15%				Services to transport; storage	588	10%
						Wholesale trade	71	1%
Tertiary Industry						Other	18	0%
Wholesale trade	178	3%				Total	1,707	29%
Road transport	16	0%						
Retail trade	4	0%				Quaternary Industry		
Services to transport; storage	4	0%				Defence	427	7%
Other	4	0%				Other business services	33	1%
Total	206	4%				Other	52	1%
						Total	513	9%
Quaternary Industry								
Other property services	10	0%				Quinary Industry		
Banking	5	0%				Other services	34	1%
Non-bank finance	2	0%				Community services	24	0%
Insurance	1	0%				Other	23	0%
Other	0	0%				Total	81	1%
Total	17	0%				Total inter-industry uses	3,426	59%
Quinary Industry						Total Consumption		
						Inter-industry Uses	3,426	59%
			Total Supply			Exports	333	6%
			Inputs	2,300	39%	Final consumption expenditure	1,875	32%
			Industry Gross VA	145	2%	Capital formation	198	3%
Other	0	0%	Imports	3,389	58%	Change in inventories	-42	-1%
Total	0	0%	Total	5,834	100%	Total	5,789	100%

Source: ABS (2008) Input Output Tables, 2004-05

Construction

Residential Building

The most significant inter-industry transactions pertaining to the residential building sector on the supply side were within the secondary industry sector (53%), particularly construction trade services (27%) and structural metal products manufacturing (5%). Final consumption by households, government and the private sector accounted for the majority of the sector's output (97%) (refer to Table C.14).

Table C.14: Inter-Industry Transactions – Residential Building Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	96	0%	Primary Industry		
Other mining	59	0%	Secondary Industry	26,227	53%			
Other agriculture	29	0%	Tertiary Industry	2,619	5%			
Commercial fishing	8	0%	Quaternary Industry	6,833	14%			
			Quinary Industry	181	0%			
Other	0	0%	Wages	6,072	12%	Total	0	0%
Total	96	0%	Total	42,028	85%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Residential building construction	456	1%
Construction trade services	13,558	27%	Gross operating surplus	7,133	14%			
Structural metal products	2,520	5%	Net taxes	481	1%			
Other wood products	1,704	3%	Total	7,614	15%			
Cement, lime and concrete slurry	943	2%						
Ceramic products	810	2%						
Plaster and other concrete products	807	2%						
Plastic products	724	1%				Total	456	1%
Sawmill products	613	1%						
Fabricated metal products	531	1%				Tertiary Industry		
Other	4,019	8%						
Total	26,227	53%						
Tertiary Industry								
Wholesale trade	1,312	3%				Total	0	0%
Road transport	675	1%						
Services to transport; storage	147	0%				Quaternary Industry		
Retail mechanical repairs	124	0%				Ownership of dwellings	187	0%
Other	361	1%				Defence	3	0%
Total	2,619	5%				Other	0	0%
						Total	190	0%
Quaternary Industry								
Other property services	1,869	4%				Quinary Industry		
Legal, accounting, marketing and business management services	1,312	3%						
Services to finance, investment and insurance	1,210	2%						
Other business services	740	1%						
Other	1,702	3%				Total	0	0%
Total	6,833	14%				Total inter-industry uses	646	1%
Quinary Industry						Total Consumption		
Sport, gambling and recreational services	77	0%				Inter-industry Uses	646	1%
Other services	40	0%	Total Supply			Exports	27	0%
Personal services	23	0%	Inputs	42,028	85%	Final consumption expenditure	53,584	97%
Motion picture, radio and television services	21	0%	Industry Gross VA	7,614	15%	Capital formation	1,020	2%
Other	21	0%	Imports	0	0%	Change in inventories	0	0%
Total	181	0%	Total	49,642	100%	Total	55,277	100%

Source: ABS (2008) Input Output Tables, 2004-05

Other Construction

The most significant inter-industry transactions pertaining to the other construction sector on the supply side were within the secondary industry sector (47%), particularly construction trade services (26%) and structural metal products manufacturing (4%). Final consumption by households, government and the private sector (62%) and capital formation (33%) accounted for the majority of the sector's output (refer to Table C.15).

Table C.15: Inter-Industry Transactions – Other Construction Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	226	0%	Primary Industry		
Other mining	144	0%	Secondary Industry	29,420	47%	Beef cattle	51	0%
Other agriculture	48	0%	Tertiary Industry	4,365	7%	Other agriculture	25	0%
Forestry and logging	24	0%	Quaternary Industry	14,246	23%	Sheep	19	0%
Commercial fishing	9	0%	Quinary Industry	270	0%	Other	45	0%
Other	0	0%	Wages	4,337	7%	Total	141	0%
Total	226	0%	Total	52,863	85%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Electricity supply	75	0%
Construction trade services	16,044	26%	Gross operating surplus	8,951	14%	Petroleum and coal products	60	0%
Structural metal products	2,188	4%	Net taxes	364	1%	Water supply; sewerage and drainage services	17	0%
Iron and steel	1,334	2%	Total	9,315	15%	Other construction	6	0%
Cement, lime and concrete slurry	1,095	2%				Paper containers and products	1	0%
Other electrical equipment	977	2%				Publishing; recorded media and publishing	1	0%
Fabricated metal products	914	1%				Other	3	0%
Plaster and other concrete products	562	1%				Total	162	0%
Plastic products	546	1%						
Other machinery and equipment	515	1%				Tertiary Industry		
Other	5,246	8%				Accommodation, cafes and restaurants	146	0%
Total	29,420	47%				Wholesale trade	75	0%
						Services to transport; storage	49	0%
Tertiary Industry						Other	45	0%
Wholesale trade	1,671	3%				Total	315	0%
Services to transport; storage	1,372	2%						
Road transport	580	1%				Quaternary Industry		
Retail mechanical repairs	271	0%				Defence	1,377	2%
Other	471	1%				Government administration	1,008	1%
Total	4,365	7%				Other	317	0%
						Total	2,702	4%
Quaternary Industry								
Other property services	3,472	6%				Quinary Industry		
Scientific research, technical and computer services	3,469	6%				Health services	13	0%
Legal, accounting, marketing and business management services	2,831	5%				Community services	12	0%
Other business services	1,758	3%				Other	7	0%
Other	2,715	4%				Total	32	0%
Total	14,246	23%				Total inter-industry uses	3,352	5%
Quinary Industry						Total Consumption		
Other services	93	0%				Inter-industry Uses	3,352	5%
Sport, gambling and recreational services	91	0%	Total Supply			Exports	86	0%
Personal services	68	0%	Inputs	52,863	85%	Final consumption expenditure	43,911	62%
Motion picture, radio and television services	10	0%	Industry Gross VA	9,315	15%	Capital formation	23,011	33%
Other	8	0%	Imports	16	0%	Change in inventories	0	0%
Total	270	0%	Total	62,194	100%	Total	70,360	100%

Source: ABS (2008) Input Output Tables, 2004-05

Construction Trade Services

The most significant inter-industry transactions pertaining to the construction trade services sector on the supply side were intra-industry purchases (30%). The majority of the sector's output can be contributed to intra-industry output (36%), other construction (26%) and residential building construction (22%) (refer to Table C.16).

Table C.16: Inter-Industry Transactions – Construction Trade Services Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	133	0%	Primary Industry		
Other mining	125	0%	Secondary Industry	34,113	45%	Coal	199	0%
Other agriculture	5	0%	Tertiary Industry	3,037	4%	Iron ores	116	0%
Forestry and logging	3	0%	Quaternary Industry	7,118	9%	Oil and gas	88	0%
			Quinary Industry	56	0%	Other	199	0%
Other	0	0%	Wages	15,351	20%	Total	603	1%
Total	133	0%	Total	59,806	80%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Construction trade services	22,586	36%
Construction trade services	22,586	30%	Gross operating surplus	14,741	20%	Other construction	16,044	26%
Other wood products	1,334	2%	Net taxes	647	1%	Residential building construction	13,558	22%
Cement, lime and concrete slurry	1,318	2%	Total	15,388	20%	Electricity supply	1,161	2%
Structural metal products	935	1%				Water supply; sewerage and drainage services	313	1%
Plaster and other concrete products	900	1%				Gas supply	200	0%
Iron and steel	868	1%				Other	683	1%
Sawmill products	611	1%				Total	54,545	88%
Plastic products	590	1%						
Fabricated metal products	573	1%				Tertiary Industry		
Other	4,397	6%				Wholesale trade	758	1%
Total	34,113	45%				Rail, pipeline and other transport	627	1%
						Accommodation, cafes and restaurants	543	1%
Tertiary Industry						Other	672	1%
Wholesale trade	1,342	2%				Total	2,600	4%
Road transport	724	1%						
Retail mechanical repairs	598	1%				Quaternary Industry		
Services to transport; storage	169	0%				Communication services	1,367	2%
Other	204	0%				Ownership of dwellings	985	2%
Total	3,037	4%				Other	1,715	3%
						Total	4,067	7%
Quaternary Industry								
Services to finance, investment and insurance	2,073	3%				Quinary Industry		
Legal, accounting, marketing and business management services	1,796	2%				Community services	33	0%
Other property services	1,215	2%				Health services	19	0%
Other business services	809	1%				Other	17	0%
Other	1,225	2%				Total	69	0%
Total	7,118	9%				Total inter-industry uses	61,883	100%
Quinary Industry						Total Consumption		
Sport, gambling and recreational services	25	0%				Inter-industry Uses	61,883	100%
Other services	15	0%	Total Supply			Exports	0	0%
Personal services	8	0%	Inputs	59,806	80%	Final consumption expenditure	0	0%
Motion picture, radio and television services	6	0%	Industry Gross VA	15,388	20%	Capital formation	0	0%
Other	1	0%	Imports	0	0%	Change in inventories	0	0%
Total	56	0%	Total	75,194	100%	Total	61,883	100%

Source: ABS (2008) Input Output Tables, 2004-05

Public Administration & Safety

Government Administration

The most significant inter-industry transactions pertaining to the government administration sector on the supply side were scientific research, technical and computer services (6%), communication services (4%) and legal, accounting, marketing and business management services (4%). Final consumption expenditure by households, government and the private sector accounted for approximately 86% of total outputs (refer to Table C.17).

Table C.17: Inter-Industry Transactions – Government Administration Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	125	0%	Primary Industry		
Other agriculture	45	0%	Secondary Industry	5,470	11%	Non-ferrous metal ores	30	0%
Services to agriculture; hunting and trapping	44	0%	Tertiary Industry	4,095	8%	Coal	29	0%
Oil and gas	26	0%	Quaternary Industry	13,326	26%	Iron ores	25	0%
Other mining	9	0%	Quinary Industry	362	1%	Other	49	0%
Other	2	0%	Wages	24,826	48%	Total	133	0%
Total	125	0%	Total	48,204	93%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Other construction	351	1%
Other construction	1,008	2%	Gross operating surplus	2,867	6%	Residential building construction	249	0%
Printing and services to printing	933	2%	Net taxes	799	2%	Basic chemicals	133	0%
Construction trade services	576	1%	Total	3,666	7%	Construction trade services	76	0%
Rubber products	318	1%				Publishing; recorded media and publishing	71	0%
Electricity supply	317	1%				Motor vehicles and parts; other transport equipment	57	0%
Publishing; recorded media and publishing	300	1%				Other	517	1%
Pulp, paper and paperboard	233	0%				Total	1,453	3%
Furniture	199	0%						
Electronic equipment	170	0%				Tertiary Industry		
Other	1,416	3%				Road transport	515	1%
Total	5,470	11%				Services to transport; storage	433	1%
						Retail trade	225	0%
Tertiary Industry						Other	273	1%
Services to transport; storage	1,108	2%				Total	1,447	3%
Accommodation, cafes and restaurants	855	2%						
Road transport	554	1%				Quaternary Industry		
Air and space transport	547	1%				Government administration	1,632	3%
Other	1,031	2%				Legal, accounting, marketing and business management services	543	1%
Total	4,095	8%				Other	1,527	3%
						Total	3,702	7%
Quaternary Industry								
Scientific research, technical and computer services	3,223	6%				Quinary Industry		
Communication services	2,245	4%				Personal services	210	0%
Legal, accounting, marketing and business management services	2,072	4%				Health services	86	0%
Government administration	1,632	3%				Other	118	0%
Other	4,154	8%				Total	413	1%
Total	13,326	26%				Total inter-industry uses	7,148	14%
Quinary Industry						Total Consumption		
Motion picture, radio and television services	101	0%				Inter-industry Uses	7,148	14%
Other services	79	0%	Total Supply			Exports	26	0%
Libraries, museums and the arts	76	0%	Inputs	48,204	93%	Final consumption expenditure	44,020	86%
Health services	60	0%	Industry Gross VA	3,666	7%	Capital formation	0	0%
Other	46	0%	Imports	0	0%	Change in inventories	0	0%
Total	362	1%	Total	51,870	100%	Total	51,195	100%

Source: ABS (2008) Input Output Tables, 2004-05

Electricity, Gas, Water & Waste Services

Electricity Supply

The most significant inter-industry transactions pertaining to the electricity supply sector were intra-industry transactions (14%), coal (6%) and construction trade services (4%). Inter-industry uses accounted for approximately two thirds of outputs with the secondary industry sectors accounting for a third of total outputs (refer to Table C.18).

Table C.18: Inter-Industry Transactions – Electricity Supply Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	2,627	10%	Primary Industry		
Coal	1,700	6%	Secondary Industry	7,172	26%	Non-ferrous metal ores	394	2%
Oil and gas	923	3%	Tertiary Industry	1,830	7%	Coal	242	1%
Forestry and logging	3	0%	Quaternary Industry	2,378	9%	Iron ores	84	0%
Other agriculture	1	0%	Quinary Industry	43	0%	Other	182	1%
Other	0	0%	Wages	3,521	13%	Total	902	4%
Total	2,627	10%	Total	17,570	64%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Electricity supply	3,745	17%
Electricity supply	3,745	14%	Gross operating surplus	9,142	33%	Iron and steel	437	2%
Construction trade services	1,161	4%	Net taxes	637	2%	Basic chemicals	383	2%
Other electrical equipment	558	2%	Total	9,779	36%	Other construction	355	2%
Petroleum and coal products	372	1%				Basic non-ferrous metal and products	288	1%
Gas supply	244	1%				Water supply; sewerage and drainage services	231	1%
Plaster and other concrete products	154	1%				Other	2,374	11%
Rubber products	144	1%				Total	7,812	35%
Other machinery and equipment	122	0%						
Fabricated metal products	86	0%				Tertiary Industry		
Other	587	2%				Accommodation, cafes and restaurants	705	3%
Total	7,172	26%				Services to transport; storage	665	3%
						Retail trade	391	2%
Tertiary Industry						Other	923	4%
Rail, pipeline and other transport	651	2%				Total	2,685	12%
Wholesale trade	329	1%						
Retail mechanical repairs	182	1%				Quaternary Industry		
Accommodation, cafes and restaurants	174	1%				Education	686	3%
Other	495	2%				Other business services	460	2%
Total	1,830	7%				Other	1,544	7%
						Total	2,690	12%
Quaternary Industry								
Banking	591	2%				Quinary Industry		
Other property services	455	2%				Health services	146	1%
Communication services	317	1%				Sport, gambling and recreational services	116	1%
Non-bank finance	225	1%				Other	410	2%
Other	791	3%				Total	671	3%
Total	2,378	9%				Total inter-industry uses	14,759	67%
Quinary Industry						Total Consumption		
Libraries, museums and the arts	26	0%				Inter-industry Uses	14,759	67%
Other services	9	0%	Total Supply			Exports	54	0%
Motion picture, radio and television services	4	0%	Inputs	17,570	64%	Final consumption expenditure	7,220	33%
Personal services	2	0%	Industry Gross VA	9,779	36%	Capital formation	0	0%
Other	2	0%	Imports	10	0%	Change in inventories	0	0%
Total	43	0%	Total	27,359	100%	Total	22,034	100%

Source: ABS (2008) Input Output Tables, 2004-05

Gas Supply

The most significant industry sector pertaining to gas supply was the quaternary industry sector including legal, accounting, marketing and business management services (17%), other property services (7%) and other business services (7%). The secondary inter-industry uses accounted for almost half of the total output while final consumption expenditure by households, government and the private sector accounted for 30% of total output (refer to Table C.19).

Table C.19: Inter-Industry Transactions – Gas Supply Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	1	0%	Primary Industry		
Coal	1	0%	Secondary Industry	373	13%	Non-ferrous metal ores	12	0%
		0%	Tertiary Industry	143	5%	Iron ores	9	0%
		0%	Quaternary Industry	1,027	35%	Coal	2	0%
		0%	Quinary Industry	16	1%	Other	11	0%
Other	0	0%	Wages	82	3%	Total	33	1%
Total	1	0%	Total	1,642	57%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Electricity supply	244	9%
Construction trade services	200	7%	Gross operating surplus	1,198	41%	Cement, lime and concrete slurry	232	9%
Plastic products	25	1%	Net taxes	65	2%	Basic non-ferrous metal and products	122	5%
Basic chemicals	23	1%	Total	1,263	43%	Iron and steel	87	3%
Sheet metal products	18	1%				Basic chemicals	57	2%
Electronic equipment	16	1%				Glass and glass products	47	2%
Fabricated metal products	14	0%				Other	395	15%
Petroleum and coal products	8	0%				Total	1,184	45%
Electricity supply	8	0%						
Iron and steel	8	0%				Tertiary Industry		
Other	54	2%				Wholesale trade	167	6%
Total	373	13%				Accommodation, cafes and restaurants	124	5%
						Retail trade	57	2%
Tertiary Industry						Other	27	1%
Other wholesale repairs	58	2%				Total	375	14%
Wholesale trade	25	1%						
Retail mechanical repairs	23	1%				Quaternary Industry		
Air and space transport	9	0%				Communication services	49	2%
Other	28	1%				Legal, accounting, marketing and business management services	21	1%
Total	143	5%				Other	93	4%
						Total	163	6%
Quaternary Industry								
Legal, accounting, marketing and business management services	485	17%				Quinary Industry		
Other property services	203	7%				Community services	26	1%
Other business services	195	7%				Health services	24	1%
Banking	46	2%				Other	13	1%
Other	98	3%				Total	64	2%
Total	1,027	35%				Total inter-industry uses	1,819	70%
Quinary Industry						Total Consumption		
Libraries, museums and the arts	13	0%				Inter-industry Uses	1,819	70%
Motion picture, radio and television services	3	0%	Total Supply			Exports	0	0%
		0%	Inputs	1,642	57%	Final consumption expenditure	792	30%
		0%	Industry Gross VA	1,263	43%	Capital formation	0	0%
Other	0	0%	Imports	0	0%	Change in inventories	0	0%
Total	16	1%	Total	2,905	100%	Total	2,611	100%

Source: ABS (2008) Input Output Tables, 2004-05

Water Supply, Sewerage & Drainage Services

The most significant inter-industry transactions pertaining to the water supply, sewerage and drainage services sector on the supply side were legal, accounting, marketing and business management services (5%), banking (3%) and intra-industry transactions (3%). Inter-industry uses accounted for over half of the final output including quaternary sectors (23%) (refer to Table C.20).

Table C.20: Inter-Industry Transactions – Water Supply, Sewerage & Drainage Services Sector

Inputs						Outputs		
Industry Name	**$M**	**%**	**Total Inputs**	**$M**	**%**	**Inter industry uses**	**$M**	**%**
Primary Industry			Primary Industry	14	0%	Primary Industry		
Other mining	11	0%	Secondary Industry	2,284	22%	Grains	79	1%
Other agriculture	2	0%	Tertiary Industry	480	5%	Other agriculture	56	1%
Coal	1	0%	Quaternary Industry	1,308	12%	Non-ferrous metal ores	48	1%
		0%	Quinary Industry	52	0%	Other	144	2%
Other	0	0%	Wages	2,256	22%	Total	327	4%
Total	14	0%	Total	6,394	61%			
						Secondary Industry		
Secondary Industry			Industry Gross VA			Water supply; sewerage and drainage services	327	4%
Water supply; sewerage and drainage services	327	3%	Gross operating surplus	4,085	39%	Residential building construction	156	2%
Construction trade services	313	3%	Net taxes	-7	0%	Electricity supply	59	1%
Basic chemicals	301	3%	Total	4,078	39%	Other construction	59	1%
Fabricated metal products	265	3%				Iron and steel	58	1%
Electricity supply	231	2%				Beer and malt	47	1%
Petroleum and coal products	116	1%				Other	493	5%
Medicinal and pharmaceutical products, pesticides	115	1%				Total	1,199	13%
Cement, lime and concrete slurry	100	1%						
Other machinery and equipment	67	1%				Tertiary Industry		
Other	451	4%				Accommodation, cafes and restaurants	277	3%
Total	2,284	22%				Road transport	183	2%
						Services to transport; storage	180	2%
Tertiary Industry						Other	205	2%
Wholesale trade	213	2%				Total	845	9%
Road transport	48	0%						
Retail mechanical repairs	44	0%				Quaternary Industry		
Accommodation, cafes and restaurants	42	0%				Other business services	504	6%
Other	133	1%				Other property services	473	5%
Total	480	5%				Other	1,083	12%
						Total	2,060	23%
Quaternary Industry								
Legal, accounting, marketing and business management services	528	5%				Quinary Industry		
Banking	352	3%				Other services	64	1%
Communication services	106	1%				Health services	53	1%
Non-bank finance	95	1%				Other	127	1%
Other	227	2%				Total	244	3%
Total	1,308	12%				Total inter-industry uses	4,674	51%
Quinary Industry						Total Consumption		
Libraries, museums and the arts	32	0%				Inter-industry Uses	4,674	51%
Motion picture, radio and television services	11	0%	Total Supply			Exports	11	0%
Personal services	4	0%	Inputs	6,394	61%	Final consumption expenditure	4,394	48%
Health services	4	0%	Industry Gross VA	4,078	39%	Capital formation	0	0%
Other	2	0%	Imports	17	0%	Change in inventories	0	0%
Total	52	0%	Total	10,489	100%	Total	9,080	100%

Source: ABS (2008) Input Output Tables, 2004-05

APPENDIX D

PROJECTED RETAIL EXPENDITURE BY TRADE AREA, 2011-2031

Table D.1: Projected Retail Expenditure by Trade Area, Fraser Coast Regional Council, 2011

	Fraser Island	Hervey Bay Hinterland	Coastal Hervey Bay	Hervey Bay Urban	Hervey Bay Urban Surrounds	Coastal Maryborough	Maryborough Urban Surrounds	Maryborough Urban	Rural South	Rural South West	Fraser Coast Regional Council
Population	385	3,981	6,693	46,697	4,085	958	3,111	24,725	3,496	2,111	96,242
Average Spending ($2010)	7,547	8,437	9,064	9,340	8,479	9,360	8,708	9,252	7,935	8,586	9,130
Total Retail Spend ($m) ($2010)	2.9	33.6	60.7	436.2	34.6	9.0	27.1	228.8	27.7	18.1	878.6
Spending by Category ($m)											
Food / Groceries	1.0	10.6	18.0	135.9	10.6	2.8	8.0	71.3	8.8	5.4	272.5
Food Out	0.2	3.3	6.7	44.2	3.6	0.9	3.0	23.2	2.7	2.0	89.9
Alcohol (Off Licence)	0.1	1.2	2.3	16.4	1.3	0.3	1.0	8.6	1.0	0.7	33.1
Tobacco	0.1	1.3	2.2	17.1	1.3	0.4	1.0	9.0	1.1	0.7	34.3
Clothing & Accessories	0.2	3.0	5.8	39.4	3.2	0.8	2.6	20.7	2.5	1.7	79.9
Household Furnishings & Equipment	0.4	4.7	8.7	61.3	4.9	1.3	3.9	32.1	3.9	2.6	123.6
Household Non Durables	0.1	1.3	2.1	16.1	1.2	0.3	0.9	8.4	1.0	0.6	32.2
Medical / Pharmacy	0.1	1.0	1.8	13.2	1.0	0.3	0.8	6.9	0.8	0.5	26.5
Vehicle Accessories	0.0	0.6	1.3	8.6	0.7	0.2	0.6	4.5	0.5	0.4	17.5
Recreation	0.4	4.2	7.5	54.5	4.3	1.1	3.3	28.6	3.5	2.2	109.7
Personal Care	0.1	1.4	2.6	18.2	1.5	0.4	1.2	9.5	1.1	0.8	36.6
Miscellaneous Goods & Services	0.1	0.9	1.6	11.3	0.9	0.2	0.7	5.9	0.7	0.5	22.8
Total Retail Spend	2.9	33.6	60.7	436.2	34.6	9.0	27.1	228.8	27.7	18.1	878.6
Supermarket ($m)	0.9	10.7	19.4	139.6	11.1	2.9	8.7	73.2	8.9	5.8	281.2

Source: Leyshon Consulting estimates

Table D.2: Projected Retail Expenditure by Trade Area, Fraser Coast Regional Council, 2016

	Fraser Island	Hervey Bay Hinterland	Coastal Hervey Bay	Hervey Bay Urban	Hervey Bay Urban Surrounds	Coastal Maryborough	Maryborough Urban Surrounds	Maryborough Urban	Rural South	Rural South West	Fraser Coast Regional Council
Population	401	4,590	7,390	53,872	4.251	998	3,270	25.986	3,964	2,388	107,110
Average Spending ($2010)	7.737	8,650	9,293	9,576	8,693	9,596	8,928	9,486	8,135	8,803	9,363
Total Retail Spend ($m) ($2010)	3.1	39.7	68.7	515.9	37.0	9.6	29.2	246.5	32.2	21.0	1,002.9
Spending by Category ($m)											
Food / Groceries	1.0	12.6	20.4	160.8	11.3	3.0	8.7	76.8	10.2	6.2	311.0
Food Out	0.3	3.9	7.6	52.2	3.9	0.9	3.2	25.0	3.2	2.3	102.5
Alcohol (Off Licence)	0.1	1.5	2.7	19.4	1.4	0.4	1.1	9.3	1.2	0.8	37.8
Tobacco	0.1	1.6	2.5	20.2	1.4	0.4	1.1	9.7	1.3	0.8	39.1
Clothing & Accessories	0.3	3.5	6.6	46.7	3.4	0.8	2.8	22.3	2.9	2.0	91.2
Household Furnishings & Equipment	0.4	5.5	9.8	72.5	5.2	1.3	4.2	34.6	4.5	3.0	141.1
Household Non Durables	0.1	1.5	2.4	19.0	1.3	0.4	1.0	9.1	1.2	0.7	36.7
Medical / Pharmacy	0.1	1.2	2.1	15.6	1.1	0.3	0.9	7.5	1.0	0.6	30.3
Vehicle Accessories	0.1	0.8	1.5	10.2	0.8	0.2	0.6	4.9	0.6	0.5	20.0
Recreation	0.4	5.0	8.5	64.5	4.6	1.2	3.6	30.8	4.0	2.6	125.2
Personal Care	0.1	1.6	2.9	21.5	1.5	0.4	1.2	10.3	1.3	0.9	41.8
Miscellaneous Goods & Services	0.1	1.0	1.8	13.4	1.0	0.2	0.8	6.4	0.8	0.5	26.1
Total Retail Spend	3.1	39.7	68.7	515.9	37.0	9.6	29.2	246.5	32.2	21.0	1,002.9
Supermarket ($m)	1.0	12.7	22.0	165.1	11.8	3.1	9.3	78.9	10.3	6.7	320.9

Source: Leyshon Consulting estimates

Table D.3: Projected Retail Expenditure by Trade Area, Fraser Coast Regional Council, 2021

	Fraser Island	Hervey Bay Hinterland	Coastal Hervey Bay	Hervey Bay Urban	Hervey Bay Urban Surrounds	Coastal Maryborough	Maryborough Urban Surrounds	Maryborough Urban	Rural South	Rural South West	Fraser Coast Regional Council
Population	414	5,143	7,961	62,452	4,358	1,031	3,610	27,583	4,406	2,650	119,608
Average Spending ($2010)	7,932	8,869	9,527	9,818	8,912	9,839	9,153	9,725	8,340	9,025	9,605
Total Retail Spend ($m) ($2010)	3.3	45.6	75.8	613.2	38.8	10.1	33.0	268.3	36.7	23.9	1,148.8
Spending by Category ($m)											
Food / Groceries	1.1	14.4	22.5	191.1	11.9	3.2	9.8	83.6	11.6	7.1	356.4
Food Out	0.3	4.5	8.4	62.1	4.1	1.0	3.7	27.2	3.6	2.7	117.4
Alcohol (Off Licence)	0.1	1.7	2.9	23.0	1.5	0.4	1.3	10.1	1.4	0.9	43.3
Tobacco	0.1	1.8	2.8	24.1	1.5	0.4	1.2	10.5	1.5	0.9	44.9
Clothing & Accessories	0.3	4.0	7.3	55.5	3.6	0.9	3.2	24.3	3.3	2.3	104.5
Household Furnishings & Equipment	0.4	6.4	10.8	86.1	5.5	1.4	4.7	37.7	5.1	3.4	161.7
Household Non Durables	0.1	1.7	2.6	22.6	1.4	0.4	1.1	9.9	1.4	0.8	42.1
Medical / Pharmacy	0.1	1.4	2.3	18.5	1.2	0.3	1.0	8.1	1.1	0.7	34.7
Vehicle Accessories	0.1	0.9	1.6	12.1	0.8	0.2	0.7	5.3	0.7	0.5	22.9
Recreation	0.4	5.7	9.4	76.6	4.8	1.3	4.1	33.5	4.6	3.0	143.4
Personal Care	0.1	1.9	3.2	25.5	1.6	0.4	1.4	11.2	1.5	1.0	47.9
Miscellaneous Goods & Services	0.1	1.2	2.0	15.9	1.0	0.3	0.9	7.0	1.0	0.6	29.9
Total Retail Spend	3.3	45.6	75.8	613.2	38.8	10.1	33.0	268.3	36.7	23.9	1,148.8
Supermarket ($m)	1.1	14.6	24.3	196.2	12.4	3.2	10.6	85.8	11.8	7.7	367.6

Source: Leyshon Consulting estimates

Table D.4: Projected Retail Expenditure by Trade Area, Fraser Coast Regional Council, 2026

	Fraser Island	Hervey Bay Hinterland	Coastal Hervey Bay	Hervey Bay Urban	Hervey Bay Urban Surrounds	Coastal Maryborough	Maryborough Urban Surrounds	Maryborough Urban	Rural South	Rural South West	Fraser Coast Regional Council
Population	431	5,734	8,367	73,105	4,468	1,073	4,607	29,278	4,937	2,969	134,969
Average Spending ($2010)	8,133	9,093	9,768	10,066	9,137	10,087	9,384	9.971	8,551	9,253	9,852
Total Retail Spend ($m) ($2010)	3.5	52.1	81.7	735.9	40.8	10.8	43.2	291.9	42.2	27.5	1,329.7
Spending by Category ($m)											
Food / Groceries	1.2	16.5	24.2	229.3	12.5	3.4	12.8	91.0	13.4	8.1	412.5
Food Out	0.3	5.1	9.1	74.5	4.3	1.1	4.8	29.6	4.1	3.0	135.9
Alcohol (Off Licence)	0.1	1.9	3.2	27.6	1.5	0.4	1.7	11.0	1.6	1.1	50.1
Tobacco	0.2	2.1	3.0	28.9	1.6	0.4	1.6	11.5	1.7	1.0	51.9
Clothing & Accessories	0.3	4.6	7.8	66.6	3.8	1.0	4.1	26.4	3.7	2.6	120.9
Household Furnishings & Equipment	0.5	7.3	11.7	103.4	5.8	1.5	6.2	41.0	5.9	3.9	187.1
Household Non Durables	0.1	2.0	2.8	27.1	1.5	0.4	1.5	10.8	1.6	0.9	48.7
Medical / Pharmacy	0.1	1.6	2.4	22.3	1.2	0.3	1.3	8.8	1.3	0.8	40.2
Vehicle Accessories	0.1	1.0	1.8	14.5	0.8	0.2	0.9	5.8	0.8	0.6	26.5
Recreation	0.4	6.5	10.1	92.0	5.1	1.4	5.3	36.5	5.3	3.4	166.0
Personal Care	0.1	2.2	3.5	30.6	1.7	0.4	1.8	12.1	1.7	1.2	55.4
Miscellaneous Goods & Services	0.1	1.4	2.1	19.1	1.1	0.3	1.1	7.6	1.1	0.7	34.6
Total Retail Spend	3.5	52.1	81.7	735.9	40.8	10.8	43.2	291.9	42.2	27.5	1,329.7
Supermarket ($m)	1.1	16.7	26.2	235.5	13.1	3.5	13.8	93.4	13.5	8.8	425.5

Source: Leyshon Consulting estimates

Table D.5: Projected Retail Expenditure by Trade Area, Fraser Coast Regional Council, 2031

	Fraser Island	Hervey Bay Hinterland	Coastal Hervey Bay	Hervey Bay Urban	Hervey Bay Urban Surrounds	Coastal Maryborough	Maryborough Urban Surrounds	Maryborough Urban	Rural South	Rural South West	Fraser Coast Regional Council
Population	449	6,394	8,707	85,575	4,581	1,116	5,880	30,772	5,531	3,278	152,283
Average Spending ($2010)	8,338	9,322	10,015	10,320	9,368	10,342	9,621	10,223	8,767	9,487	10,105
Total Retail Spend ($m) ($2010)	3.7	59.6	87.2	883.2	42.9	11.5	56.6	314.6	48.5	31.1	1,538.9
Spending by Category ($m)											
Food / Groceries	1.3	18.9	25.8	275.2	13.2	3.7	16.8	98.0	15.4	9.2	477.4
Food Out	0.3	5.8	9.7	89.4	4.5	1.1	6.3	31.9	4.8	3.5	157.2
Alcohol (Off Licence)	0.1	2.2	3.4	33.2	1.6	0.4	2.2	11.8	1.8	1.2	57.9
Tobacco	0.2	2.4	3.2	34.7	1.7	0.5	2.1	12.3	1.9	1.2	60.1
Clothing & Accessories	0.3	5.3	8.4	79.9	4.0	1.0	5.4	28.4	4.3	3.0	139.9
Household Furnishings & Equipment	0.5	8.3	12.5	124.1	6.1	1.6	8.1	44.2	6.8	4.4	216.5
Household Non Durables	0.2	2.2	3.0	32.5	1.5	0.4	1.9	11.6	1.8	1.1	56.4
Medical / Pharmacy	0.1	1.8	2.6	26.7	1.3	0.4	1.7	9.5	1.5	0.9	46.5
Vehicle Accessories	0.1	1.1	1.9	17.4	0.9	0.2	1.2	6.2	0.9	0.7	30.6
Recreation	0.5	7.5	10.8	110.4	5.3	1.4	7.0	39.3	6.1	3.8	192.1
Personal Care	0.2	2.5	3.7	36.8	1.8	0.5	2.4	13.1	2.0	1.3	64.2
Miscellaneous Goods & Services	0.1	2.5	2.3	23.0	1.1	0.3	1.5	8.2	1.3	0.8	40.0
Total Retail Spend	3.7	59.6	87.2	883.2	42.9	11.5	56.6	314.6	48.5	31.1	1,538.9
Supermarket ($m)	1.2	19.1	27.9	282.6	13.7	3.7	18.1	100.7	15.5	10.0	492.4

Source: Leyshon Consulting estimates