

Queensland Horticulture Labour Demand:

Results of Growcom labour demand survey

April 2020



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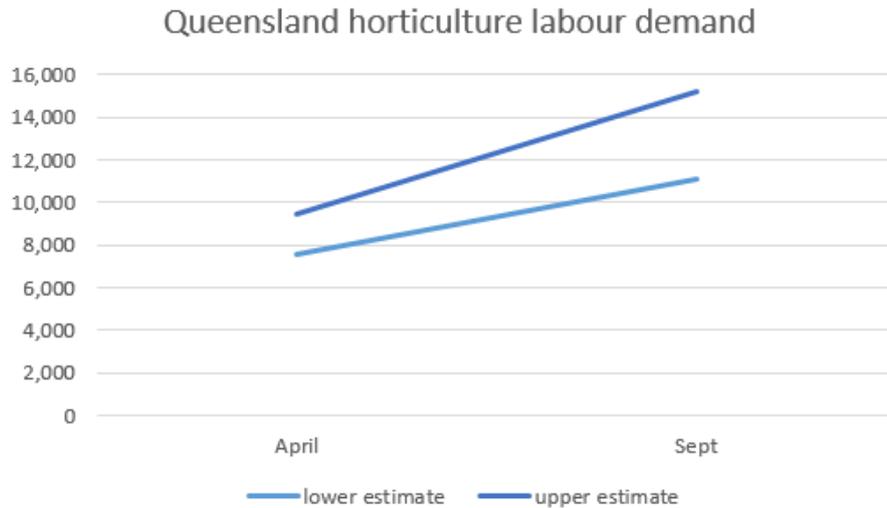


Figure 1: Queensland horticulture labour demand – April to September 2020

Background and scope

Labour is a critical input to the successful operation of Australia’s horticulture sector. The sector faces significant but predictable seasonal peaks in demand for labour. During harvest the numbers of workers required typically increases more than ten-fold.

The direct labour employed across the Australian agricultural sector represents around 3% of the Australian workforce and its activities contributed \$59 billion to the nation’s economy in 2018¹². In addition, over 1.5 million Australians are employed in industries related to the sector.³ According to the 2016 census, 20 per cent of all people working in agriculture were employed in horticulture.

The Australian horticulture industry is a labour intensive sector heavily reliant on manual labour, and in particular on a seasonal workforce sourced from overseas temporary visa holders, the largest source of which is the WHM visa program. Australian horticultural farms sourced around 70 per cent of their labour from visa holders, with up to 60% of workers being seasonal⁴.

The COVID-19 pandemic and measures designed to control its spread have impacted the Queensland horticulture sector with respect to labour availability. The peak in labour demand is often regionally concentrated, as the crops of a number of enterprises across a region will mature and require harvesting at similar times. Due to the seasonality of work the horticulture workforce is highly mobile, moving across Australia in line with harvest seasons. Workers must be readily available, in the numbers required, and at the time and location where they are needed. This requirement for regular movement makes it challenging for industry to attract local labour (and or displaced workers), despite attempts to source both local job seekers and other Australian labour.

¹ ABS. 2019. Value of agricultural commodities produced, Australia, 2017-18 (catalogue no. 7503.0). Australian Bureau of Statistics: Canberra, Australia.

² ABS. 2020. Labour Force, Australia, Detailed, Quarterly, Feb 2020 (catalogue no. 6291.0) Australian Bureau of Statistics: Canberra, Australia.

³ Wu W, Dawson D, Fleming-Muñoz D, Schleiger E and Horton J. 2019. The future of Australia’s agricultural workforce. CSIRO Data61: Canberra, Australia.

⁴ Dufty, N, Martin, P & Zhao, S 2019, Demand for farm workers: ABARES farm survey results 2018, ABARES research report, Canberra.

This report and analysis is intended to provide a rapid understanding of likely horticulture labour demand in Queensland during the COVID-19 pandemic. In particular it seeks to identify hotspots for demand through time, to assist in managing labour to provide the essential service of food production. This information will help enterprises, industry, communities and government work together to ensure the provision of fresh food for Queenslanders, Australians and for export markets now and into the future.

As an initial rapid analysis the scope of this analysis was limited to the six month period from April to September 2020. Moving forward there will need to be continued work to understand labour requirements in agriculture and ensure workforce availability.

Method

In estimating Queensland horticulture labour requirements a three step process was used; initial broad survey, secondary source analysis, and targeted survey.

1. Initial survey:

In March 2020 Growcom undertook an online survey of Queensland horticulture enterprises to understand their labour demand on a month by month basis to September 2020. One hundred and ninety-one usable responses were received from sixty postcodes across Queensland horticulture regions. To rapidly assess the representativeness of the data, workforce demand was mapped against regional Gross Value of Agricultural Production (GVAP). Outliers in the demand to GVAP ratio provided insights into areas where data required improvement.

2. Secondary analysis:

To understand labour demand comprehensively across Queensland, DAF estimated labour demand based on area of production⁵ and labour intensity, using figures for labour intensity per ha from individual commodity gross margins collected by the department.

3. Targeted survey:

To improve the initial survey representativeness, the survey was re-run for a week targeted to the postcodes with limited response rates. Following this round a total of 241 responses were received with a greater proportion of large growers than in the initial survey.

Results

Note: the results contained herein are numbers as derived from the survey and modelling. These should be used with caution as they are indicative only. The importance of this work is to provide an estimation of the magnitude of labour demand and the trends over time and region.

From the three step process we have estimated a range of demand, with minimum estimates from the revised survey data alone, and maximum estimates from the survey data and DAF modelling in regions deemed to still be underrepresented, in respect to their level of horticulture production.

⁵ Australian Bureau of Statistics, 2019. Agricultural Commodities, Australia- 2017-18, Catalogue number 7121.0, ABS, Canberra.

Results identified an average monthly workforce demand of 10,000 to 13,000 skilled and unskilled workers for the six-month period to September 2020. Labour demand is expected to increase month-on-month from 8,000 – 9,000 workers in April 2020 to 11,000 to 15,000 workers in September 2020 (Figure 1).

Wide Bay Burnett, Moreton Bay North and Cairns regions have the highest demand for workers with estimated monthly job averages of 2,864, 1,829 and 1,421 respectively. Other areas of high average monthly demand include Mackay-Isaac-Whitsunday, Toowoomba and Darling Downs-Maranoa. Table 1 shows the results of the Growcom survey after targeted follow up to garner additional responses. Table 2 shows higher values which were estimated based on production, for regions where the survey was under representative. Figures 2 and 3 plot the same data, allowing for visualisation of demand peaks through time. Figure 4 shows maximum estimated labour demand stacked.

A major demand hot spot identified in the analysis is in Wide Bay, which includes the Bundaberg area, and grows tomatoes, capsicums, sweet potatoes and avocados. Labour demand will be approximately 3,000 persons per month remaining fairly steady from across the study period and into December. Another significant part of the estimated labour demand growth (average of 2,000 workers per month) will come from strawberries demand for pickers and packers (in Moreton Bay North - Caboolture, Wamuran, Beerwah, Glasshouse Mountains) starting in May/June building to a peak in August/September. Other key areas of peak demand will be in Mackay-Isaac-Whitsunday, specifically the Bowen region (tomatoes, capsicums) through the winter months from June to October, peaking at 1,727 workers in September.

The citrus harvests also have strong labour demand increasing from April to September in the Wide Bay and Central Queensland regions, specifically the Gayndah/Mundubbera area as well as Emerald. Avocados are also a significant commodity requiring labour in Queensland with the harvest from February through to June in Cairns (Atherton Tablelands) and April to September in Wide Bay (Bundaberg/Childers area). The mango harvests, commencing in November in Townsville (the Burdekin) and continuing through to February in Cairns (Atherton Tablelands), will also have strong labour demand.

Table 1: Labour demand results from Growcom labour demand survey

Minimum Queensland horticulture labour demand

SA4 Name	April	May	June	July	August	September	Average
Brisbane Inner City	0	3	2	2	2	2	2
Cairns	505	566	628	880	855	749	697
Darling Downs - Maranoa	971	621	745	424	440	542	624
Central Queensland	121	90	108	82	82	90	96
Gold Coast	2	29	44	54	66	66	44
Ipswich	390	271	370	370	379	360	357
Logan - Beaudesert	40	40	40	50	60	80	52
Mackay - Isaac - Whitsunday	320	932	1,505	1,472	1,700	1,727	1,276
Moreton Bay - North	1,444	1,382	1,507	1,914	2,490	2,239	1,829
Moreton Bay - South	49	50	56	56	83	103	66
Queensland - Outback	321	308	304	292	297	382	317
Sunshine Coast	553	643	872	982	1,172	1,235	910
Toowoomba	1,052	1,234	1,229	1,249	1,234	1,425	1,237
Townsville	632	675	683	641	678	711	670
Wide Bay	1,168	1,950	1,434	1,432	1,457	1,412	1,476
All SA4	7,568	8,794	9,527	9,900	10,995	11,123	9,651

Table 2: Labour demand results from survey and secondary analysis

Maximum Queensland horticulture labour demand

SA4 Name	April	May	June	July	August	September	Average all
Brisbane Inner City	3	3	4	4	4	4	4
Cairns	1,091	1,336	1,411	1,458	1,578	1,651	1,421
Darling Downs - Maranoa	971	928	980	1,013	1,096	1,147	1,023
Central Queensland	276	338	357	369	400	418	360
Gold Coast	13	29	44	54	66	66	45
Ipswich	468	573	605	625	677	708	609
Logan - Beaudesert	40	40	40	50	60	80	52
Mackay - Isaac - Whitsunday	320	932	1,505	1,472	1,700	1,727	1,276
Moreton Bay - North	1,444	1,412	1,507	1,914	2,490	2,239	1,834
Moreton Bay - South	49	50	56	56	83	103	66
Queensland - Outback	321	308	315	325	352	382	334
Sunshine Coast	553	643	872	982	1,172	1,235	910
Toowoomba	1,052	1,234	1,229	1,249	1,234	1,425	1,237
Townsville	632	675	683	641	678	711	670
Wide Bay	2,200	2,692	2,843	2,938	3,180	3,328	2,864
All SA4	9,433	11,194	12,451	13,150	14,770	15,225	12,704

Figure 2: Labour demand results from Growcom labour demand survey

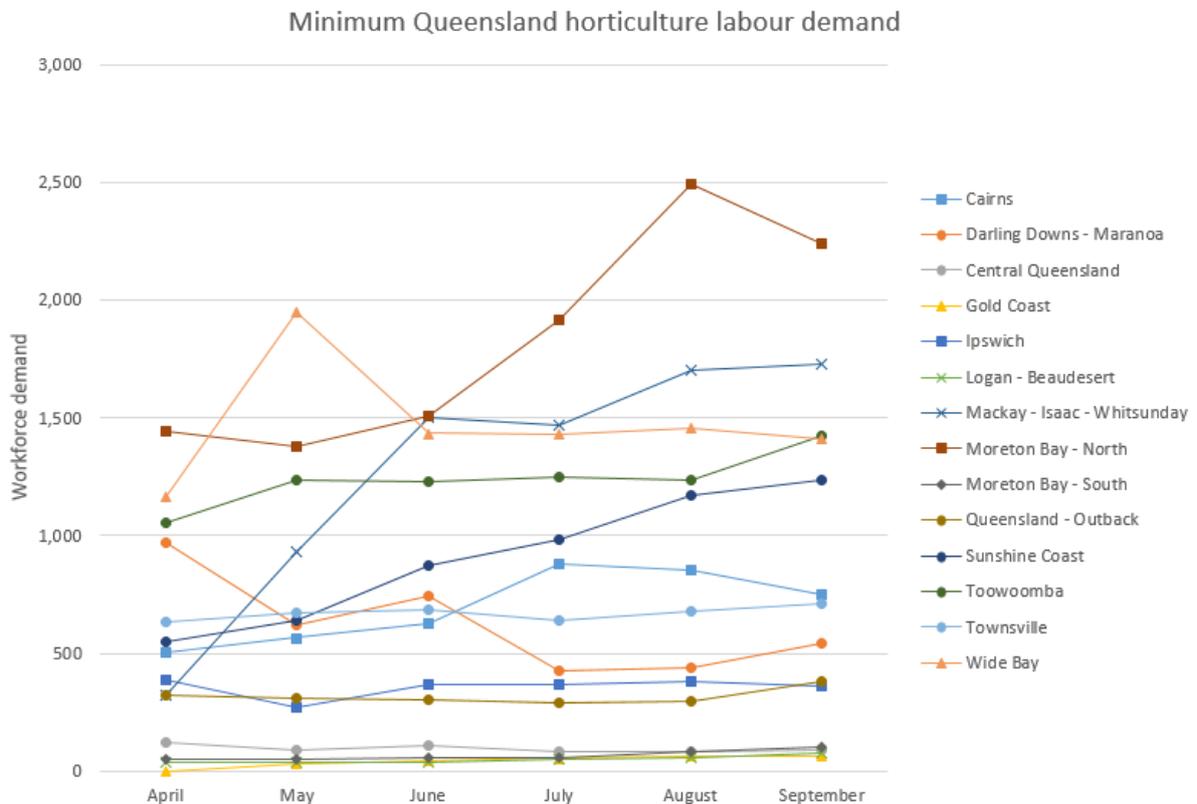


Figure 3: Labour demand results from survey and secondary analysis

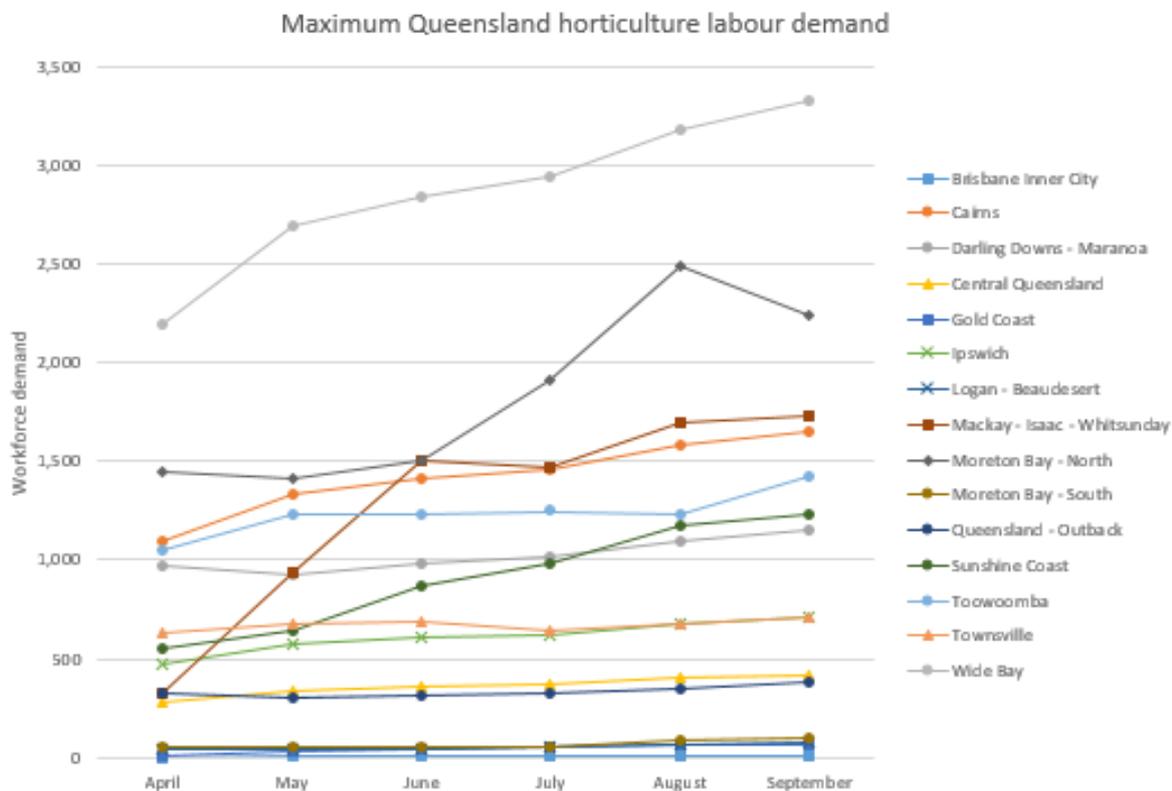


Figure 4: Stacked Queensland horticulture labour demand from survey and secondary analysis

