

PEMBROKE

Olive Downs Coking Coal Project

Additional Information to the
Environmental Impact Statement

Appendix I

**Preliminary Workforce Housing
and Accommodation Plan**

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Preliminary Workforce Housing and
Accommodation Plan***

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1 INTRODUCTION

Pembroke proposes to develop the Olive Downs Coking Coal Project (the Project), which would be located approximately 40 km south east of Moranbah and approximately 25 kms north-east of Dysart, within the Isaac Regional Council Local Government Area (Isaac LGA) in Queensland.

The Project consists of two mining domains. If approved, construction of the Olive Downs South domain would commence in late 2019, with first coal production planned in late 2020. Development of the Willunga mining domain would likely commence around Year 9 (2027).

This preliminary Workforce Housing and Accommodation (WH&A) Plan has been prepared by Elliott Whiteing for Pembroke. Its purpose is to address how Pembroke will manage the Project's impacts on housing and accommodation in the Isaac LGA. This preliminary plan will provide the foundation for development of a full WH&A Plan, to be prepared in consultation with stakeholders during March to June 2019.

The preliminary plan responds to the requirements of the OCG's Social impact assessment (SIA) Guideline 2018. It includes:

- analysis of housing and accommodation availability in potentially impacted communities;
- consideration of a range of scenarios for housing and accommodation demands which could be generated by the Project;
- the results of preliminary consultation with social and affordable housing providers; and
- Pembroke's strategies for workforce housing and accommodation.

1.1 SIA Guideline

The SIA Guideline is a statutory instrument under the Strong and Sustainable Resource Communities Act 2018 (SSRC Act). The SSRC Act requires the SIA to ensure that housing and accommodation arrangements for the project workforce:

- do not contribute to significant affordability and availability impacts on housing and accommodation in local and regional communities; and
- are well planned, enhance worker wellbeing, and do not place an excessive burden on existing infrastructure, facilities and services used by local and regional communities.

Key matters identified in the SIA Guideline which were addressed in the Project's SIA included:

- proposed workforce accommodation arrangements during the construction and operational phases of the project;
- details of any proposed project workforce accommodation facilities or purpose built housing developments, (noting that the Project does not include a new workforce accommodation facility);
- projected population changes attributable to the project, including an estimate of workers and their households who may live in, or move to, local or regional communities;
- an analysis of the local and regional housing and accommodation market, and an assessment of potential social impacts, including:
 - potential impacts to the availability and affordability of housing (both open market and rental) and other forms of accommodation;

- consequences of project induced housing market changes for local residents;
- potential opportunities for local accommodation providers;
- a workforce housing and accommodation plan for the construction and operational phases of the project which includes:
 - objectives and key performance indicators;
 - measures to enhance potential benefits of project workers and the community, and to mitigate potential negative social impacts; and
 - policies regarding housing and accommodations support to be provided to project workers and their families who wish to live locally.

This plan builds from the analysis and strategies provided in the SIA, and provides further information as outlined below.

1.2 Pembroke’s commitments

Pembroke’s objective is to minimise impacts on local housing affordability and access, whilst supporting employees from outside the Isaac LGA to settle locally if they choose to.

Actions which address identified impacts as provided in the SIA are shown in Table 1-2 and have been further detailed in Sections 3 and 4.

Pembroke has committed to the development of the Olive Downs Housing Strategy (which will be re-named to Olive Downs WH&A Plan) as described in Section 5.2.

Table 1-1: SIMP Housing Strategy

Impact Area	Strategy	Pre-construction	Construction	Operations (Years 1-3)
Workforce demand for rental accommodation during construction	Planning for workforce housing needs	Contract WAV providers and agree management protocols for workforce health, fatigue management and conduct codes	Require construction contractor to identify and monitor any workforce housing needs Consult IRC and EDQ about local housing market capacity	Identify which existing local and new local personnel will require housing arrangements
Requirement for permanent housing (rental and purchased) for Project personnel	Use existing workforce accommodation village	Consult with IRC regarding WAV use Seek and evaluate tenders for construction workforce accommodation	Seek and evaluate tenders for operational workforce accommodation	Monitor personnel numbers in WAVs Monitor personnel satisfaction with WAVs and take corrective action if required
	Increasing housing availability	Monitor housing availability Require construction contractors to monitor employees’ local housing arrangements.	Promote Project schedule and anticipated housing needs Consult with IRC, DHPW and EDQ about housing availability and the need to stimulate supply	Identify personnel housing needs and match to supply Monitor housing indicators (cost and vacancy rate)

Impact Area	Strategy	Pre-construction	Construction	Operations (Years 1-3)
Encourage settlement and address increased demand for neighbourhood and settlement services associated with operations	Supporting settlement	Consult with MDSS and DCSG about capability and interest in provision of settlement support.	Develop a housing register for operations. Develop local community profiles for promotion to applicants. Develop housing policies and settlement incentives.	Partner with MDSS and DCSG to provide settlement, integration and support services. Promote and support personnel involvement in volunteering. Implement housing policies and settlement incentives.

1.3 Methodology

This preliminary WH&A plan has been prepared based on:

- the Project’s SIA and social impact management strategies;
- consultation with the OCG on the scope of the preliminary plan;
- updated analysis of housing supply and cost in the SIA study area communities;
- updated analysis of potential construction workforce accommodation requirements, to include additional workforce origin scenarios;
- confirmation of the actions Pembroke intends to undertake in avoid impacts on housing affordability during the construction stage;
- consultation with the Isaac Affordable Housing Trust (IAHT) and Emergency and Long Term Accommodation Moranbah Inc. (ELAM) to update social housing and homelessness data; and
- continuing engagement with the Isaac Regional Council (IRC) on housing needs and solutions.

The study area for the Plan reflects the SIA study area, with a focus on the potentially impacted communities of Moranbah, Dysart, Middlemount and Nebo.

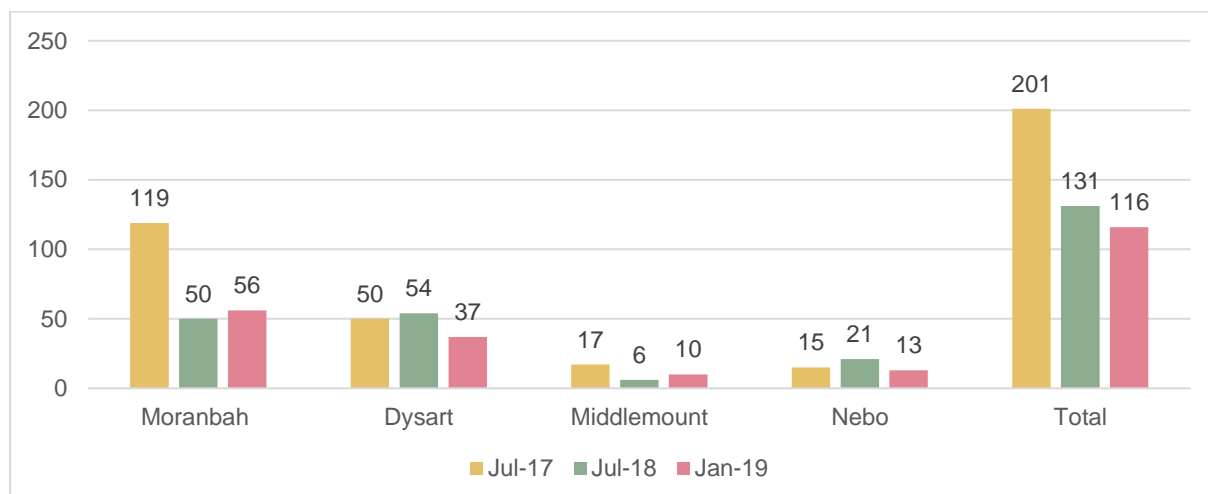
2 HOUSING AVAILABILITY

2.1 Rental housing

The availability of rental housing in the four towns over the past eighteen months is shown in Figure 2-1. Rental availability has declined in each town over the past eighteen months, but Moranbah and Middlemount have experienced small increases in rental stock over the past six months.

Overall, the availability of rental stock in the four towns decreased by 42.2 per cent from 201 dwellings to 116 dwellings over the 18 month period. This was substantially led by Moranbah, where the availability of rental stock decreased by 52.9 per cent.

Figure 2-1: Rental Housing availability, Local towns, July 2017 – January 2019



Source: Realstate.com.au, February 2019

At the time the SIA was finalised (July 2018), rental housing in the SIA study area was affordable, with median weekly rents for houses of \$170 in Dysart, \$290 in Moranbah, \$250 in Middlesmunt, and \$260 in Nebo. By comparison, the median weekly rent for houses in the Mackay postcode at that time was \$280, which was comparable to the Isaac LGA's rental housing costs¹.

Between July 2018 and January 2019, median weekly rents had remained stable in Middlesmunt at \$250, but had increased to:

- \$340 in Moranbah, an increase of 17.2 per cent;
- \$180 in Dysart, an increase of 5.8 per cent; and
- \$270 in Nebo, an increase of 3.8 per cent.

Comparing again to the Mackay City postcode (with a median weekly rent of \$320 in January 2019, an increase of 14.3 per cent in six months), the percentage rental increase was slightly higher in Moranbah, and lower in the other towns. Of note, the private rental market in Middlesmunt is very small so trend analysis may be unreliable for this town.

Whilst rental housing remains affordable, rents have increased in three of the local towns in response to decreased rental vacancy rates (which translates to increased demand).

Changes in rental vacancy rates² between July 2018 and January 2019 include:

- Moranbah's vacancy rate had increased from 0.8 per cent to 1.2 per cent indicating a tight rental market with limited supply;
- Dysart's rental vacancy rate decreased from 5.7 per cent to 4.4 per cent indicating a weak rental market with surplus supply;
- Nebo's rental vacancy rates decreased from 8.2 per cent to 4.7 per cent indicating a weak rental market with surplus supply;

¹ RealEstate.com.au. 2017.

² SQM Research data viewed at <https://sqmresearch.com.au/> in July 2018 and January 2019

- Middlemount's rental vacancy rates decreased from 1.8 per cent to 1.2 per cent indicating a tight rental market with limited supply.³

Rising rental costs and decreased vacancy rates indicate a strong increase in demand for housing in Moranbah over the past six months and a moderate increase in demand in Dysart and Nebo. This has been considered as context for developing Pembroke's housing actions.

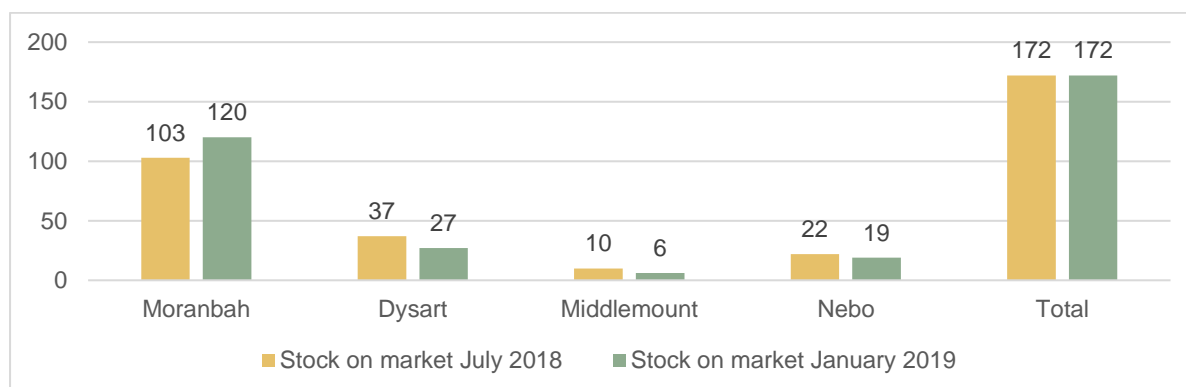
2.2 Housing for purchase

The availability of housing stock for purchase in local towns in July 2018 and January 2019 is shown in Figure 2-2. Moranbah saw an increase in the availability of stock over the six months. The other towns saw small decreases in stock available for purchase, and the total pool of housing remained the same over the six month period.

SQM Research's weekly median asking prices index over the twelve months to January 2019 show a 24 per cent increase in the asking price for houses in Moranbah and a 63 per cent increase in the asking price for houses in Dysart, noting that housing prices in Dysart were very low during 2018.

Median housing prices decreased by 3.7 per cent in Nebo and by 47.1 per cent in Middlemount, noting that the private housing market in Middlemount is very small, so price fluctuations are not a reliable guide to market conditions.

Figure 2-2: Purchase stock, local towns, June 2018-January 2019



Source: SQM Research, 2019

2.3 Affordable and social housing

Table 2-1 provides 2016 Census data on public and community housing in the project area, and indicate a total of 90 houses owned by DPHW. DPHW's current register⁴ identifies 85 department owned dwellings in the LGA.

³ The Real Estate Institute of Queensland defines rental market conditions as follows: tight <2.5%, healthy 2.5 - 3.5%, weak >3.5% (REIQ. 2018)

⁴ DPHW (2019). 2018 Tenancies in government managed social rental housing accessed on 19 February 2019 at <https://data.qld.gov.au/dataset/tenancies-in-government-managed-social-housing/resource/1b434618-0822-4e1e-94c0-4c6309b49bac>

Of note, DPHW properties are available to all Queenslanders on the basis of need, and consultation indicates that majority of recent tenancies have been to people from outside the LGA. Public housing availability will be confirmed with DPHW in consultation for the WH&A Plan. There was no public or social housing in Nebo.

Table 2-1: Public and Social Housing, Isaac LGA, 2016

Tenure	Moranbah	Dysart	Middlemount
State authority rental	65	17	8
Community church rental	3	3	5
Total social housing	68	20	13

Source: ABS Census 2016

Consultation with Isaac Regional Council’s Property Services Manager in February 2019 identified the following pool of affordable housing in local communities:

- 19 dwellings in the LGA (12 in Moranbah, four in Dysart and three in Clermont) managed by IAHT; and
- 21 dwellings managed as part of Council’s National Rental Assistance Scheme (NRAS) rental pool.

IAHT properties have generally had an occupancy rate of approximately 70 per cent in preceding years, however demand began to increase around 18 months ago, and for the past twelve months the occupancy rate has been closer to 100 per cent. At February 2019, all properties (with the exception of one which was offline for maintenance) were tenanted.

Social housing is managed by ELAM and currently includes:

- nine crisis accommodation dwellings, including seven family dwellings, one for single women and one for single men; and
- 11 long term dwellings, including four units for single people and seven family dwellings.

Management of the 11 long term dwellings is being transitioned to DPHW, with ELAM continuing to concentrate on crisis housing.

ELAM’s Manager advised that at January 2019, ELAM properties had been running at an occupancy rate of approximately 85 per cent over the past twelve months, which was a substantial increase from the previous year’s average occupancy of approximately 65 per cent.

On advice from ELAM’s manager, an average of one or two people per year would be identified as homeless and on the street in Moranbah, however homelessness is also represented in young people living in insecure or temporary housing, usually as the result of family conflict, and occasional transient jobseekers who have moved to the area looking for work without investigating accommodation options.

Existing housing price trends and social housing demand trends indicate the likelihood of an increased need for affordable and social housing over the next 6-12 months, particularly in Moranbah. This will be further assessed in the WH&A Plan, along with the drivers of this increased demand.

2.4 Likelihood of vacant housing being returned to rental pool

The SIA noted that the Australian Bureau of Statistics (ABS) Census of Population and Housing 2016 recorded 1,069 unoccupied private dwellings in Moranbah and 574 unoccupied private dwellings in Dysart in 2016, and that it was likely that some of this unoccupied houses would come back to the market. Large percentages of mine-owned dwellings were also noted in Moranbah, Dysart and Middlemount, which accounted for some of the vacant housing.

The announcement of a new major mining project in the Isaac LGA typically stimulates development of new housing. Following the severe losses made on housing investments in the Isaac LGA since 2013, investment in new housing in the Isaac LGA has been low. A tightening of lending requirements for financial institutions in the past year is likely to have also affected investor activity.

Increased rental prices along with a small increase in the number of rental properties available and a small decrease in the vacancy rate, indicate that increased landlord confidence is bringing more stock to the market in Moranbah. There is no evidence of this in the other local towns.

There were only five building approvals for residential dwellings approved in the Isaac LGA as a whole in the 12 months ending 31 December 2018, and less than five residential dwellings approved in the preceding two years. Some of the additional housing stock seen in Moranbah's rental and purchase pool may be attributable to new homes, but the return of a small number of vacant dwellings to the market is also likely.

The number of vacant dwellings is likely to be much smaller in 2019 given increased housing demand over the past two years, however with Pembroke's early advice to real estate stakeholders and public promotion of the construction program, it is likely that some houses which remain vacant will be returned to the rental market.

Identification of the likelihood of currently vacant housing being released to the market will require consultation with IRC and property owners. This will be undertaken after Pembroke has consulted with the IRC on the scope of the plan and reviewed any information that Council can share. Assessment of the likelihood of mining companies releasing some of their housing stocks to the market will also require consultation as part of the WH&A Plan.

3 CONSTRUCTION WORKFORCE DEMAND

3.1 SIA findings

Potential impacts on housing and accommodation during the construction phase were identified in the SIA as follows.

During construction of the Olive Downs South domain, non-resident workers would be accommodated in a workforce accommodation facility in Moranbah or Coppabella.

On the assumptions that 5 per cent of the construction workforce average (30 people) may move to local towns, with some bringing families and some as single workers share dwellings, this would see potential demand for 20 to 30 rental dwellings during 2019-2020 and up to a further ten dwellings in 2020-21. Construction workers are most likely to settle in Moranbah given its greater range of housing choices, larger rental housing market and proximity to the Olive Downs South domain.

This demand would have been equivalent to 25 - 30 per cent of the 93 rental dwellings available in Moranbah in July 2018. As Moranbah's rental vacancy rate was less than 2.5 per cent at that time, and if there had been no increase in the availability of rental housing, this level of demand would potentially cause a small increase in rental prices.

By 2027 during the second construction period, up to 20 dwellings may be required. The SIA concluded that previous stimulation from the Olive Downs and other projects is likely to have increased rental housing supply in the LGA by 2027, so that any demands for local housing would be easily met, however cumulative demands on housing would need to be monitored.

3.2 Workforce requirements and origin

Pembroke currently estimates that Project construction will require an average of 500 personnel in the first year (2019-2020) and up to 700 personnel in the second year (2020-21), with 100 personnel remaining in late 2021/early 2022. These are currently expected to be the maximum workforce requirements. Pembroke and its construction contractor are reviewing the Project's staging and workforce requirements, potentially altering the figures relied on for this preliminary plan. The results will be considered in the full WH&A Plan.

Up to 500 personnel are currently estimated to be required in 2027 for expansion of the Olive Downs South mining infrastructure and construction of the Willunga domain, which has also been considered in planning for workforce accommodation.

Local and regional labour availability will need to be tested as part of the recruitment process. The SIA assumed that approximately 20 per cent of the construction workforce could be drawn from towns in the Isaac LGA within a safe daily driving distance (Moranbah, Nebo, Dysart, Middlemount and Coppabella), with the remainder drawn from other towns in the Isaac, Mackay and Rockhampton LGAs or further afield.

The SIA also assumed that 5 per cent of the total (up to 35 personnel during the first construction phase and approximately 20 personnel during the second construction phase) may choose to move to the Isaac LGA with their families, for the period of construction or beyond. This assumption has been maintained, as construction personnel are typically mobile, basing themselves in coastal or regional centres to travel to other locations throughout Queensland for work, but a small number (typically supervisory or management staff with longer contracts) may choose to base themselves and their families locally.

Table 2-2 provides additional scenarios for workforce origin and the number of local and commuting personnel that could be expected for each, including:

- 100 per cent non-local personnel;
- 95 per cent non-local personnel (assuming 5 per cent would be existing or new locals);
- 80 per cent non-local personnel (equating to 75 per cent DIDO/FIFO) and 20 per cent local personnel (as assessed in the SIA); and
- 50 per cent non-local personnel (equating to 45 per cent DIDO/FIFO) and 50 per cent local personnel.

The Project is targeting local construction businesses and employees as part of its supply chain, so a 100 per cent commuting workforce is unlikely, but has been included in the scenarios to demonstrate the maximum potential requirement for workforce accommodation beds.

Table 2-2: Construction Labour Origin Scenarios – Personnel Numbers

Construction workforce	2019-20	2020-21	2021-22	2027
<i>Estimated maximum workforce</i>	500	700	100	500
DIDO/FIFO at 100%	500	700	100	500
DIDO/FIFO at 95%	475	665	95	475
DIDO/FIFO at 75%	375	525	75	375
DIDO/FIFO at 45%	225	315	45	225

3.3 Workforce accommodation beds requirement

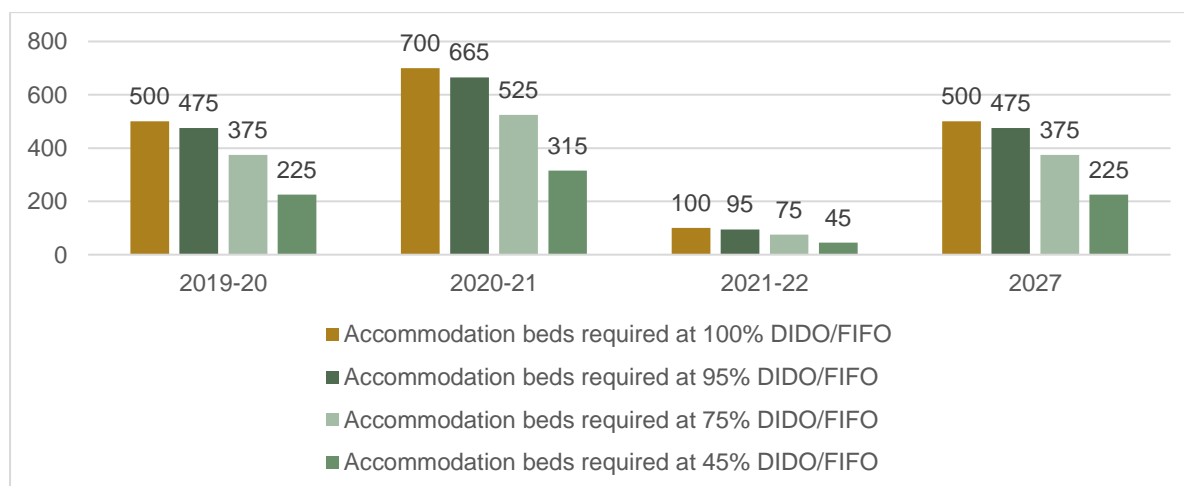
In accordance with fatigue management requirements, all personnel who do not have homes within a one hour's drive of the Project site would be required to stay in the accommodation village.

Figure 2-3 shows the number of accommodation beds which would be required for each scenario identified in Table 2-2. The requirement would range from:

- 225 beds to 500 beds in 2019-20;
- 315 to 700 beds in 2020-2021;
- up to 100 beds in 2021-22.

As currently scheduled, the construction workforce for the Willunga domain and Olive Downs infrastructure upgrades around 2027 would see a minimum requirement of 225 beds and a maximum requirement for 500 beds.

Figure 2-3: Workforce accommodation beds required 2019-2022 and 2027



3.4 Housing requirement

The SIA estimated the number of construction personnel who would move to the Isaac LGA at 5 per cent of the total workforce, or 25 people in the first year of construction and 35 people in the second year. Construction workers are most likely to settle in Moranbah given the greater range of housing choices and proximity to the Olive Downs South domain, which will be constructed first.

Most of these ‘new local’ personnel would rent homes if available, but some may choose to buy homes and settle locally. The small number of personnel that would purchase dwellings in Moranbah would be a positive stimulus to the market but is unlikely to result in price increases, in the context of the 120 dwellings that are currently available for purchase in the town.⁵

Assuming 100 per cent of ‘new local’ construction personnel rented dwellings, this would require approximately 25 dwellings during 2020 and 35 dwellings in 2020-2021. Housing demand is expected to be incremental as construction ramps up during 2020 and 2021.

Compared to the 38 rental dwellings available in Moranbah in January 2019 (which was equivalent to a rental vacancy rate of 1.2 per cent⁶), this level of demand would lead to rental shortages and potentially an increase in rental prices.

Pembroke will take action to ensure that impacts on rental housing availability are minimised (see Section 5.1).

By 2027 during the second construction period, up to 20 dwellings may be required. Previous stimulation from the Olive Downs and other projects is likely to have increased rental housing capacity, so that any demands for local housing will be easily met, however cumulative demands can’t be predicted. The Project will discourage non-local construction workers from using local rental housing as rental vacancy rates are very low in Moranbah and low in Dysart.

4 OPERATIONS WORKFORCE DEMAND

4.1 SIA findings

The SIA provided estimates of potential housing demands which could result from the Project’s operational personnel moving to the Isaac LGA, using a range of workforce origin scenarios and assumptions about new residents’ preferences for settling in local towns, based on towns’ proximity to the Project and the size of their housing markets.

The results indicated that if 25 per cent of the Project’s personnel (approximately 120 people) were to settle locally from outside the LGA in 2020, and in comparison, to the housing stock available at October 2017:

- housing purchase requirements could be equivalent to approximately 35 per cent of Moranbah listed dwellings for sale, 45 per cent of Dysart’s stock, 74 per cent of Middlemount’s stock and 23.5 per cent of Nebo’s stock; and
- rental housing requirements could be equivalent to approximately 29 per cent of Moranbah’s currently listed rental dwellings, 35 per cent of Dysart’s rental dwellings, and 58 per cent of Middlemount’s and 49 per cent of Nebo’s stock.

This level of demand was expected to increase rental prices, which could reduce low income households’ housing choices and security.

⁵ SQM Research – Stock on market Postcode 4744 Accessed at <https://sqmresearch.com.au/total-property-listings.php?postcode=4744&t=1> on 18 February 2018

⁶ SQM Research – Residential Vacancy Rates Postcode 4744 Accessed at https://sqmresearch.com.au/graph_vacancy.php?postcode=4744&t=1 on 18 February 2018

As Project personnel numbers increase in the second year of operations, housing requirements (shared between the purchase and rental market) would increase, which could lead to substantial impacts on rental housing affordability, with the potential for displacement of low income households. The assessment found it unlikely that 50 per cent of personnel would migrate to local towns by 2021, but if this occurred, significant rental price inflation was expected.

4.2 Workforce requirements and origin

Olive Downs South operations are proposed to commence in 2020-21 with a workforce of approximately 480 people, building to 960 people in 2021-22.

Pembroke’s first priority for recruitment will include personnel from within the Isaac LGA, initially focussing on Moranbah, Dysart, Middlemount and Nebo. This will not preclude people in other Isaac towns applying for jobs, however fatigue management requirements will constrain the ability of people from other towns to commute daily.

The Project is likely to attract both currently employed workers as well as unemployed workers. The unemployment rate in the LGA at September quarter 2018 was 1.4 per cent⁷ (down from 2.1 per cent per cent in June 2017) which effectively represents full employment, however, SIA consultation indicated that there is potential for latent capacity due to contracting and under-employment. The number of local workers who may be available to the Project will be unknown until recruitment has progressed. The implications of this for housing demand will be confirmed in the full WH&A Plan.

Employees from outside the local towns would be encouraged to move to local towns, however some non-local employees will choose to commute to work via car, bus or plane, staying locally during their shifts.

With further development from 2033, the workforce could increase to approximately 1,300 personnel, which would be maintained until around 2050 before decreasing in line with decreasing production rates. Assessment of housing demands from 2030 has not been attempted at this stage. Pembroke would develop a new WH&A Plan at least one year previous to the planned increase in production.

4.3 Workforce accommodation village beds requirement

The SIA estimated demand for workforce accommodation facility beds, based on 25 per cent and 50 percent of personnel being either DIDO or FIFO workers. The results are shown in Table 4-1 and indicate that, with 25 per cent commuting personnel, 240 accommodation beds would be required by 2021, and with 50 per cent commuting personnel, 480 accommodation beds would be required for operational personnel.

Table 4-1: Potential requirements for accommodation needs of operational personnel

Operations	2020-21	2021-22
Commuting workforce at 25%	120	240
Commuting workforce at 50%	240	480

Source: Olive Downs SIA, 2018

⁷ QGSO. 2019. Regional Profile – Isaac LGA, accessed at <https://statistics.qgso.qld.gov.au/profiles/qrp/resident/pdf/> on 19 February 2019

4.4 Housing requirement

The SIA considered the Project's potential need for housing, using the scenarios of 25 per cent and 50 per cent of personnel becoming new residents in the Isaac LGA.

People intending to relocate to the area live in local towns for the long term (rather than fly-in-fly-out) are more likely to purchase dwellings, whilst others who are moving in for a set term or want to 'try before they buy' will rent houses or units. The SIA assumed that:

- 50 per cent of new local personnel would buy houses and 50 per cent would rent houses; and
- family households would represent 80 per cent of new households and single people (sharing at 2 people to one dwelling) would represent 20 per cent.

Personnel's choice of town will be influenced by housing availability and cost, the availability of social infrastructure, town amenity, and distance to work, but as noted in Section 4.1, assumptions about new residents' preferences for settling in local towns were made in the SIA, based on towns' proximity to the Project and the size of their housing markets.

As noted in SIA Section 5.3.3, population increases (and therefore housing demands) are likely to be highest during the first two years with further gradual increases in subsequent years. The discussion below assumes all new local personnel will be living in the LGA.

Figure 4-1 summarises the SIA results and indicates that, if 25 per cent of personnel settled locally from elsewhere during 2020-2021, demand for housing by the end of 2021 could be in the order of 54 dwellings in Moranbah, 27 dwellings in Dysart, 16 dwellings in Middlemount and 11 dwellings in Nebo.

On this basis, and assuming 50 per cent would rent, the requirement for rental housing by 2021 was estimated at approximately 55 dwellings including:

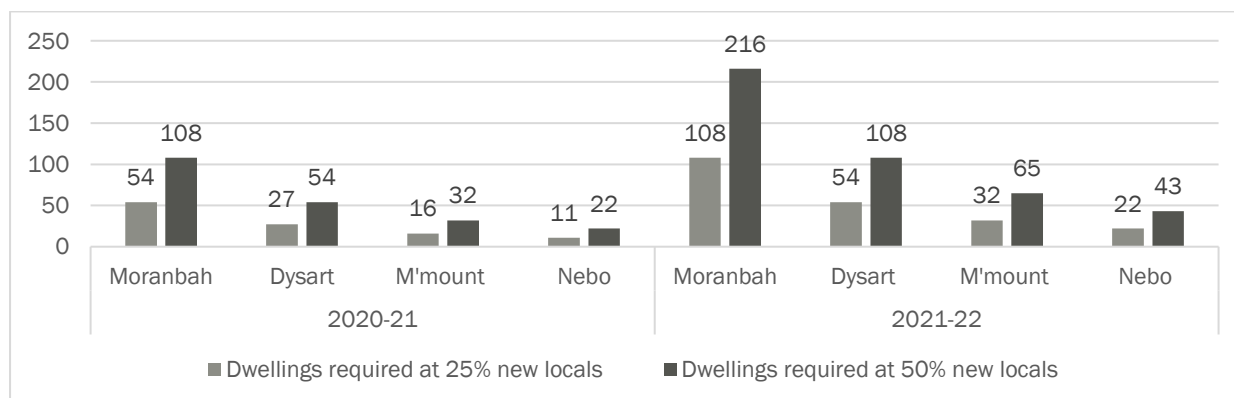
- 27 dwellings in Moranbah;
- 14 dwellings in Dysart;
- 8 dwellings in Middlemount; and
- 6 dwellings in Nebo.

During 2021-22, as the workforce ramps up, the demand for housing would also increase. If 25 per cent of up to the peak workforce of 960 personnel moved to the LGA by the end of 2022, these requirements would double.

Attraction of 50 per cent of the workforce to live in the LGA is considered unlikely, but estimates of demands for this scenario would equate to a doubling of the housing requirement.

With respect to housing purchase, approximately 172 dwellings (including 120 dwellings in Moranbah) were available for purchase at the end of January 2019. Further information is required from IRC to estimate the likely development pipeline for housing, however it currently appears, given a limited understanding of the residential development pipeline in the LGA, and as demand for housing would build over a few years, it would be welcomed and the market would respond to demand with additional housing supplies.

Figure 4-1: Estimates of housing operational requirements – 25% and 50% new locals



Source: Olive Downs SIA, 2018

5 HOUSING AND ACCOMMODATION STRATEGIES

This section describes the Project's strategies to address impacts on housing and accommodation, to be confirmed in the WH&A Plan when the following information is available:

- Confirmed workforce figures;
- Labour force availability, including the extent of local labour availability; and
- Findings from consultation with the Isaac Regional Council and other key housing stakeholders (including IRC, ELAM, IAHT and BHP).

5.1 Securing accommodation for non-resident workers

Pembroke's accommodation policy for the construction phase is to require all single status personnel who live outside a safe daily driving distance (one hour either way) to stay in an accommodation village whilst rostered on.

Pembroke's construction contractor, Sedgman Limited, has selected the Civeo Coppabella Village, located at Lot 10 Peak Downs Hwy, Coppabella, as its accommodation provider for the construction phase and the first five years of the operations phase. The Project's accommodation requirement would be re-evaluated in 2024 in order to plan for either renewal of the contract or establishment of arrangements with another provider in Moranbah or Dysart.

The Civeo Coppabella Village was chosen because it offers:

- a purpose built, modern facility which meets industry standards, as evidenced by its use by a variety of mining and construction companies;
- the shortest travel time to site, minimising the length of the working day;
- more than 3,000 rooms, with inclusions including:
 - king single bed
 - en-suite bathroom
 - air conditioning
 - desk and chair
 - kettle/tea-making facilities
 - refrigerator

- wireless internet
- flat-screen TV
- facilities including:
 - Zest Eatery (catered dining room) quality offering extensive choices, and nutritional guidance for village residents
 - The HUB bar and tavern
 - The Store convenience shop
 - Kinetic gymnasium
 - outdoor swimming pool
 - outdoor recreation areas
- free on-site car parking for drive-in drive out workers;
- onsite laundry and storage provision; and
- willingness to host personnel in the camp while they wait for airport transfers by bus.

Personnel preferences with regard to room allocation will be considered by Civeo, and facility guests are also welcome to book additional accommodation for family members, subject to availability.

Civeo has confirmed that it will have adequate capacity to provide accommodation for the Project's personnel at Coppabella Village, from the commencement of construction (anticipated late 2019) until at least 2025. To ensure adequate capacity is maintained and to avoid the need for additional rental housing, accommodation for up to 100 per cent of the construction workforce and 65 per cent of the operational workforce has been confirmed. This includes provision of:

- Up to 500 beds in 2019-2020, which would accommodate 500 construction personnel at up to 100 per cent DIDO/FIFO;
- Up to 1,012 beds in 2020-2021 which would accommodate the construction workforce of up to 700 people at up to 100 per cent DIDO/FIFO and 65 per cent of the 480 operational personnel;
- Up to 724 beds from 2021-2022 to 2024-25, which would accommodate 100 construction personnel at up to 100 per cent DIDO/FIFO and 960 operational personnel at 65 per cent DIDO/FIFO.

Pembroke's construction contractor will enter into a contract with Civeo for accommodation provision at the Coppabella Village when the workforce ramp-up and peak are confirmed, which is anticipated to occur by July 2019. Of note, there are no other proposed mining projects in the Isaac LGA whose approval is likely to precede approval of the Project, so there is no risk that this capacity will not be available to the Project.

The Project will monitor personnel satisfaction with WAVs and may adjust its contractual relationships with WAVs accordingly. The choice of accommodation providers for the second construction period will be made prior to construction based on WAV availability, but is likely to include providers in Dysart and Coppabella.

5.2 Planning for workforce housing needs

5.2.1 Construction

The majority of construction personnel would be either local (with their own accommodation) or commuting (accommodated in the Project's chosen workforce accommodation village). A small number of construction personnel may choose to move to the Isaac LGA, and most likely Moranbah, for all or part of the construction period.

The SIA estimated the likely proportion at 5 per cent of the construction workforce, which would require approximately 25 dwellings during 2019-2020 and 35 dwellings in 2020-2021.

Pembroke will require its construction contractor to:

- identify whether non-local personnel will be single status or family status as part of their recruitment processes;
- identify and report to Pembroke the number of construction personnel intending to relocate to live in the Isaac LGA every three months;
- where required, rent or lease housing which is not currently in the rental market at July 2019, by arrangement with private owners of vacant properties (including other mining companies who potentially have surplus dwellings); and maintain a housing register and make it available to personnel wishing to move to the LGA; and

The Project will monitor the availability of housing in all local towns during the construction phase, and either discourage construction workers from renting housing in towns with a rental vacancy rate below 3 per cent or encourage family status personnel to live in towns with higher rental vacancy rates.

5.2.2 Operations

As part of recruitment of Project personnel, Pembroke will require its contractor to:

- identify which local recruits would lose their current housing arrangements and need housing assistance;
- identify which non-local personnel will require rental housing, and the desired dwelling type and number of bedrooms;
- review the Project's housing register (see SIA section 6.5.4) and its suitability to incoming personnel's needs; and
- match personnel to housing.

The Project's SIA includes Pembroke's commitment to the development of the Olive Downs Housing Strategy (Workforce Housing and Accommodation Plan) during the pre-construction phase. The purpose of the Plan is to:

- confirm the workforce profile and ramp-up as the basis for refining estimates of housing needs;
- determine the availability of current and planned housing stocks to support the project's needs;
- compare the Project's housing needs to the available housing options;
- recommend the housing options which will meet the Project's needs and provide the rationale for selection of housing options;
- detail the specific steps that Pembroke will take in partnership with other stakeholders to ensure housing is available to new residents whilst avoiding impacts on housing availability.

Development of the full WH&A Plan will include the following steps:

- confirmation of workforce size and origin;
- engagement with IRC to discuss the scope of the plan;
- engagement with other stakeholders to obtain information to support the plan, including:
 - IRC;

- Department of Housing and Public Works (DHPW);
- Economic Development Queensland (EDQ);
- ELAM and IAHT
- Real estate agents
- Other mining companies
- Housing developers in Moranbah
- IRC Land and Housing Advisory Committee
- housing demand analysis, including review of workforce profile and program and estimation of rental and purchasing requirements Years 1-10;
- housing and accommodation supply analysis, with respect to
 - workforce accommodation facilities
 - housing trends and resulting impacts
 - analysis of social housing availability, existing needs and predicted needs, and the prevalence of homelessness
 - current housing stocks for purchase and rental
 - approved residential development
 - residential development pipeline
 - mining company housing and land stocks
- revision of assumptions made in this preliminary plan;
- engagement with key stakeholders to develop housing strategies;
- finalising the Plan.

The final WH&A plan will be provided to the OCG in June 2019.

5.3 Enabling personnel's access to housing

The construction contractor will enable construction personnel's access to accommodation and housing as noted in Section 5.1 and 5.2.1.

Operations personnel will include existing local residents, new local personnel relocating to the area, and commuting workers. Local towns are likely to have some capacity to meet Project personnel housing needs. Each local town has high rates of unoccupied dwellings, and market demand is likely to see the release of some of these to the rental and/or purchase market.

However, increases in mining activity and associated increases in local business and services staff saw a rapid decline in housing availability during 2017-2019. If these conditions persist, Project investment may be required to ensure housing is available for its personnel whilst mitigating the potential for housing cost inflation.

Stakeholder engagement as part of the WH&A Plan development will identify the likelihood that:

- vacant housing will return to the rental market;
- housing developers (including IRC) will have sufficient product available for purchase and rental in time to meet Project housing requirements; and

- housing owned by other mining companies can be purchased or leased by Pembroke.

Housing mitigation measures will include a combination of the some or all of the following strategies:

- contractual arrangements to support private housing development to meet Project needs;
- purchase of properties for leasing and/or on-sale to personnel;
- long term leases on dwellings to be sub-let to personnel; and
- lease or purchase and refurbishment of houses owned by other mining companies.

Pembroke's housing mitigations will avoid:

- allowing the Project's housing demands to displace other residents, and particularly lower income households;
- concentration of the Project's personnel in one estate;
- purchasing 'job lots' of housing which may inflate purchase prices for others;
- contributing to the development of an excess of housing which will negatively affect the housing market; and
- block bookings of rental housing, whether needed or not, thereby removing housing from the local rental pool.

Pembroke acknowledges there is a potential need to invest in the purchase or lease of up to 20 dwellings in Moranbah and/or Dysart area during the first five years of operation to ensure the Project's housing demands are offset. This requirement will be reviewed and maybe revised up or down in response to the WH&A Plan's outcomes.

Once secured, housing which is available on the private market or through any housing pool developed by the Project will be listed on a Project Housing Register and made available to personnel.

Policies governing housing allocation, head leasing and rental costs and conditions will be developed and implemented during the construction period.

Housing needs and policies will be reviewed in 2030/31 ahead of the planned workforce expansion in 2033, and updated in consultation with IRC.

5.4 Encouraging and supporting personnel to settle locally

Project personnel will have the choice to live locally or commute.

The Project will promote its 'live local' policy and encourage operational personnel from outside the Isaac LGA to relocate to local towns. Actions to support this will include:

- maintaining a register of accommodation which is available to personnel;
- promoting incentives for local settlement to non-local recruits, and explaining the range of housing options (availability, type and cost of dwellings for purchase and rental) in local towns;
- facilitation of access to housing at or below market rent for a period of 12-24 months;
- providing a one-off incentive payment to assist employees to pay rental bonds, relocate their families and/or purchase housing; and/or
- rental subsidies to encourage personnel to rent in the private market (subject to a commitment to stay at least three years).

Other actions which will support new local employees and families to integrate with local communities include:

- provision of information about livability, services, housing and recreation in the local towns as part of the employment offer;
- partnering with MDSS and DCSG to provide settlement, integration and support services;
- welcome events for employees and families;
- promotion of volunteering opportunities (e.g. Fire and Emergency Services, sporting groups, and community management groups) to personnel and their family members; and
- support for settlement programs offered by local organisations, community events which promote new residents' participation and contributions to local liveability (see Section 6.6.6).

5.5 Social and affordable housing

The Project will maintain a register of personnel taking up housing in local towns, and housing availability and demand for social housing will be monitored in consultation with IAHT, IRC and ELAM. The monitoring framework will also be provided as part of the WH& A Plan.

5.6 Summary of actions

Table 5-1 summarises the actions Pembroke will take or require its construction contractor to take in order to mitigate the Project's impacts on housing.

Table 5-1: Mitigation measures

Impact	Actions
<p>Requirement for accommodation for construction personnel, leading to a shortage of rental housing and/or increase in rental costs in Moranbah and/or Dysart</p>	<ul style="list-style-type: none"> • Require contractor to contract and maintain availability of accommodation in the Civeo Coppabella Village for all non-local construction and operational personnel • Require construction contractor to identify and monitor any workforce housing needs • Monitor personnel numbers in WAVs • Monitor personnel satisfaction with WAVs and take corrective action if required • Monitor housing availability in the four local towns and adjust advice to personnel wishing to settle accordingly • If rental vacancy rates are low and IRC advises that housing stocks are under pressure, the contractor will require all personnel to stay in the accommodation village with no further rental tenancies supported
<p>Requirement for permanent housing (rental and purchase) for Project personnel, with potential to affect the availability of housing to low income households</p>	<ul style="list-style-type: none"> • Promote Project schedule and anticipated housing needs to local housing developers • As part of the WH&A Plan, consult with IRC, DHPW and EDQ about housing availability • Investigate further the need to invest in the purchase or lease of up to 20 dwellings in Moranbah and/or Dysart during the first 5 years of operation to ensure the Project's housing demands are offset. This indicative requirement will be reviewed and maybe revised up or down in response to the WH&A Plan's outcomes • Identify personnel housing needs and match to supply • Monitor housing indicators (cost and vacancy rate) • Develop a housing register for operations • Partner with MDSS and DCSG to provide settlement, integration and support services • Develop and implement housing policies and settlement incentives

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