



**Environmental
Protection
Authority**

Limestone and Sand Quarry Lot 1002 Preston Beach

Carlo Doyle's Haulage Pty Ltd

Report 1808

April 2026

This assessment report has been prepared by the Environmental Protection Authority (EPA) under s. 44 of the *Environmental Protection Act 1986* (Western Australia). It describes the outcomes of the EPA's assessment of the Limestone and Sand Quarry Lot 1002 Preston Beach proposal by Carlo Doyle's Haulage Pty Ltd.

This assessment report is for the Western Australian Minister for Environment and sets out:

- what the EPA considers to be the key environmental factors identified in the course of the assessment.
- the EPA's recommendations as to whether or not the proposal may be implemented.
- other information, advice and recommendations as the EPA considers appropriate.



Darren Walsh
Chair
Environmental Protection Authority

22 April 2026

Contents

Summary	2
1 Proposal.....	8
2 Assessment of key environmental factors	13
2.1 Social Surroundings.....	13
2.2 Flora and Vegetation	21
2.3 Terrestrial Fauna.....	23
2.4 Inland Waters	26
3 Recommendations	29
4 Other advice	30

Figures

Figure 1: Proposal location	11
Figure 2: Development envelope and disturbance footprint	12

Tables

Table 1: Proposal content document	8
Table 2: Assigned noise levels to protect sensitive recreational areas.....	17
Table 3: Summary of assessment for social surroundings.....	19
Table 4: Summary of assessment for flora and vegetation	21
Table 5: Summary of assessment for terrestrial fauna	23
Table 6: Summary of assessment for inland waters	26

Appendices

Appendix A: Recommended conditions.....	31
Appendix B: Decision-making authorities.....	32
Appendix C: Regulation under other statutory processes	33
Appendix D: Environmental Protection Act principles.....	34
Appendix E: Other environmental factors	36
Appendix F: List of submitters	38
Appendix G: Assessment timeline	39
Appendix H: Relevant policy, guidance, procedures and references.....	40

Summary

Background

Proposal

The Limestone and Sand Quarry Lot 1002 Preston Beach Proposal (the proposal) is a proposal to extract sand and limestone at a site approximately 4.5 km north of the Preston Beach townsite and 30 km south of Mandurah, in the Shire of Waroona (see Figure 1).

The proposal will involve the proposed quarry, and the grading and maintenance of Preston Beach North Road for haul truck access (see Figure 2).

Context and Key Environmental Values

The proposal is located within the study area for the EPA's Strategic Environmental Advice on the Dawesville to Binningup Area (Report 1359, 17 May 2010). In this report, the EPA stated that the study area which includes Yalgorup National Park, has important international, national and regional environmental values.

The proposal is bordered by Yalgorup National Park (YNP) on three sides and implicates the use of Preston Beach Road North (PBRN) for haulage, which is also used by visitors to access YNP and tourist facilities within the park (see Figure 1). Tourist attractions near the proposal includes Martins Tank campground and the Lake Pollard walk trail and bird hide.

The natural features of the YNP are of high social significance and the associated 'wilderness experience' has made the area a popular destination for nature-based tourism, with daytime visitation to YNP ranging from around 22,000 visitors in July to upwards of 70,000 visitors in January (DBCA 2025).

Consultation

The proponent referred the proposal under Section 38 of the *Environmental Protection Act 1986* (EP Act) to the Environmental Protection Authority (EPA) on 5 August 2016. The referral information was published on the EPA website for seven days public comment. On 3 October 2016, the EPA decided to assess the proposal at the level of Public Environmental Review. The EPA published the Environmental Scoping Document (ESD) on 17 May 2019 and then published the Environmental Review Document (ERD) on its website for public review for four weeks from 8 March 2022 to 5 April 2022.

The proponent was provided with several opportunities to provide information required to progress the assessment. The information received remained inadequate and failed to address the items in two s40(2)(a) notices. The EPA formed a preliminary view that the environmental outcome of the proposal is unlikely to be consistent with the EPA's objective for Social Surroundings and issued a notice in October 2025 outlining its preliminary view that it is likely to recommend against the proposal unless the identified matters are addressed adequately.

The proponent submitted final information including a Response to Comments table (November 2025) and a Traffic Management Plan (2026). These documents, in combination with previous proponent information and public comments received were considered in this assessment.

Assessment of key environmental factors

The EPA has identified the key environmental factors (listed below) in the course of the assessment. For each factor, the EPA has assessed the residual impacts of the proposal on the environmental values and considered whether the environmental outcomes are likely to be consistent with the EPA environmental factor objectives.

Environmental Factor: Social Surroundings	
Residual impact on key value	Assessment finding/environmental outcome
Impacts to the amenity for recreational visitors to YNP and Martins Tank campground.	<p>Noise, nuisance dust and visual impacts from up to 44 haulage truck movements per day (22 loaded, 22 unloaded) on PBRN (unsealed) will impact the recreational and wilderness experience of visitors to the YNP and Martins Tank campground.</p> <p>Avoidance of interactions is a primary measure to mitigate amenity impacts on the recreation and wilderness experience of visitors. The proponent has proposed ceasing operations on Saturdays and during the Easter school holidays (Comments table November 2025), however has not proposed avoiding operations at peak visitation periods during the December and January school holidays. For the intersection of Preston Beach Road with PBRN, it is expected that proposed stop-slow hold measures (Traffic Management Plan 2026) will be substantial for visitors during December and January with potentially 880 haul truck interactions per month with vehicles of around 244 campers and more than 3,400 daytime visitors to Martins Tank campground per month.</p> <p>While the proponent’s proposed road speed of 40 km/hr on PBRN is likely to reduce noise for visitors within Martins Tank campground, there remain concerns in respect to the proponent’s ability to implement speed restrictions measures, noting that haulage will be undertaken by third parties. Proposed traffic safety control measures (Traffic Management Plan, 2026) will alter the visual and wilderness character of PBNR, one of the primary entry points to YNP.</p> <p>The grading and maintenance of PBRN road has been included in the proposal to address corrugation and potholes that would increase noise and dust impacts. However, no further information on the implementation of an adequate grading and maintenance regime has been provided. In the absence of an appropriate maintenance regime and dust suppression program for the road, the impacts of noise, nuisance dust, visual amenity and</p>

Environmental Factor: Social Surroundings	
Residual impact on key value	Assessment finding/environmental outcome
	<p>potential interference with access for visitors to YNP and Martins Tank campground cannot be fully assessed.</p> <p>While the proponent has attempted to address dust and noise from haulage activities (Traffic Management Plan, 2026), by undertaking operations during peak visitation periods, the impacts from haul truck interactions to the amenity and wilderness experience of recreational visitors remain high. In further considering the lack of authority to manage third party operated haul truck activities outside of its quarry area (particularly without agreement from the Shire), the EPA considers that the proposal is likely to be inconsistent with the EPA environmental factor objective for Social Surroundings.</p>
<p>Impacts to the amenity for recreational users of Lake Pollard walk trail and bird hide.</p>	<p>Noise and nuisance dust from combined quarry operations and truck haulage, will impact the aesthetic values, recreational and wilderness experiences of users of the Lake Pollard walk trail and associated bird hide. Haul trucks will share 1 km of the walk trail with trail users, with the boundary of the quarry directly next to a further 1 km of the 6 km trail (see Figure 2). For the 1 km section of Lake Pollard walk trail that runs along PBRN, pedestrian-truck interactions, particularly in the months of December and January, are expected to be substantial, with up to 76 potential interactions per day.</p> <p>The proponent proposed the installation of signage on the section of the Lake Pollard walk trail to alert recreational users of two-way traffic (Traffic Management Plan, 2026), but in the absence of mitigation for visual, noise and dust impacts, amenity impacts remain high.</p> <p>Maximum noise levels predicted from quarry operations alone is 36 db(A) at the bird hide and large parts of the walk trail, exceeding the recommended assigned level of 30 db(A) to protect recreational amenity and wilderness experience of users. Cumulative noise impacts from the quarry and truck movements have not been calculated.</p> <p>The proponent has not proposed adequate measures to mitigate noise, dust, or visual amenity impacts on trail and bird-hide users. In the absence of such mitigation, the proposal is likely to be inconsistent with the EPA's Social Surroundings objective.</p>
<p>Impacts to amenity and economic surroundings.</p>	<p>Noise, nuisance dust and visual impacts from combined quarry operations and truck haulage, as well as traffic interactions with haul trucks, as discussed above will impact significantly on local physical and biological surroundings of the Lake Pollard walk trail, bird hide and YNP, resulting in impacts on the wilderness experience of tourists and potential economic impacts on commercial tourist operators and accommodation businesses.</p>

Environmental Factor: Social Surroundings	
Residual impact on key value	Assessment finding/environmental outcome
	The proponent has not provided sufficient mitigation measures for the above impacts (Comments table November 2025). Noting the advice from DBCA and concerns raised by commercial tourist operators and providers of visitor accommodation, the proposal is likely to be inconsistent with the EPA environmental factor objective for Social Surroundings.

Environmental Factor: Flora and Vegetation	
Residual impact on key value	Assessment finding/environmental outcome
<p><i>Direct impacts</i></p> <ul style="list-style-type: none"> Clearing of approximately 14.5 ha of native vegetation Pruning of approximately 0.7 ha of native vegetation and trees along PBRN. <p><i>Indirect impacts</i></p> <ul style="list-style-type: none"> Potential reduction in health of adjoining vegetation in YNP from an increase in number and cover of weeds and potential impact from the spread of dieback 	<p>While the proponent has proposed further avoidance of mature tuart trees, vegetation in YNP may be impacted by dust deposition and the introduction or spread of weeds and/or dieback.</p> <p>The native vegetation within the quarry area is mostly degraded, however there may be threatened flora species that were not identified during the vegetation survey.</p> <p>It is expected that the proponent would undertake progressive rehabilitation during operations using native species.</p> <p>The EPA advises that the impacts of the proposal could be managed to provide for an environmental outcome that is likely consistent with the EPA’s objective for flora and vegetation.</p>

Environmental Factor: Terrestrial Fauna	
Residual impact on key value	Assessment finding/environmental outcome
<p>Loss of habitat for threatened and priority fauna species and increased risk of vehicle strike for:</p> <ul style="list-style-type: none"> Carnaby’s cockatoo Western ringtail possum Quenda South-western brush-tailed phascogale Western pipistrelle 	<p>The quarry area is mostly degraded and surrounded by a large area of intact vegetation in YNP, and unlikely to be significant in sustaining any threatened fauna species.</p> <p>Black cockatoo habitat in the proposal area is limited, noting that no active breeding trees were identified and foraging habitat is of low value. The western false pipistrelle would likely roost in larger trees and within YNP and not the proposal site.</p> <p>Western ringtail possum individuals and habitat was recorded within Preston Beach Road North, 0.7 ha of which will be pruned to enable access for truck movements. No suitable habitat or evidence of presence, such as dreys and scats, were recorded in the quarry area.</p> <p>While haul truck movements along the road would increase the risk of fauna strikes, the proposed speed</p>

	<p>limit of 40 km/hr on PBRN will contribute to mitigation of the impact. While it is unlikely that western ringtail possums and south-western brush-tailed phascogales would be significantly affected as they are mostly nocturnal, quenda may use the site during the day.</p> <p>The EPA advises that the impacts of the proposal could be managed to provide for an environmental outcome that is likely consistent with the EPA's objective for terrestrial fauna.</p>
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Environmental Factor: Inland Waters	
Residual impact on key value	Assessment finding/environmental outcome
<ul style="list-style-type: none"> • Changes in groundwater levels and quality. • Changes to the hydrology of the Yalgorup lakes and surface water quality. 	<p><u>Groundwater levels and quality</u></p> <p>The proponent's information indicates that:</p> <ul style="list-style-type: none"> • groundwater flow from the site is almost exclusively towards Lake Pollard, • recharge to Lake Pollard from the quarry makes up approximately 2% of the total groundwater discharged, and • geochemical modelling indicates that impacts to groundwater quality are low due to estimated groundwater travel time of 26 years to Lake Pollard or other wetlands. <p><u>Hydrology of the Yalgorup lakes and surface water quality</u></p> <p>Topographical mapping indicates that surface flow will be predominantly directed to a low-lying swale located to the west of the proposed quarry pit, with some minor flow directed to the east towards the lake systems. It is not expected that the proposal will impact on existing surface water flows toward the Yalgorup lakes, or other wetlands. In respect to surface water, changes in surface water runoff flow and quality are unlikely to occur outside the proposal area.</p> <p>In consideration of the proposed avoidance (including no groundwater abstraction or quarry intersection with the water table) and minimisation measures, the overall risk to the lake's hydrology is low and any measurable changes in groundwater level or quality are expected to remain confined to the property boundary.</p> <p>The EPA advises that the impacts of the proposal could be managed to provide for an environmental outcome that is likely consistent with the EPA's objective for inland waters.</p>

Conclusion and recommendations

The EPA has taken the following into account in its assessment of the proposal:

- environmental values likely to be significantly affected by the proposal
- assessment of key environmental factors, (this has included considering cumulative impacts of the proposal where relevant)
- EPA's confidence in the proponent's proposed mitigation measures
- consistency of environmental outcomes with the EPA's objective for the key environmental factor
- whether other statutory decision-making processes can mitigate the potential impacts of the proposal on the environment
- principles of the EP Act.

The EPA concludes that the proposal, given its significant residual impacts on amenity values and public enjoyment and recreation within YNP, is unlikely to be consistent with the EPA factor objectives for Social Surroundings. The EPA further advises that reasonable conditions to manage the impacts cannot be imposed to reduce inconsistency with the EPA factor objectives for Social Surroundings. A draft Ministerial Statement has therefore not been prepared.

The EPA recommends that the proposal should not be implemented.

1 Proposal

The Limestone and Sand Quarry Lot 1002 Preston Beach Proposal (the proposal) is a proposal to extract sand and limestone at a site approximately 4.5 km north of the Preston Beach townsite in the Shire of Waroona located 30 kms south of Mandurah, in the Peel region of Western Australia. The quarry location is bordered by Yalgorup National Park (YNP) on three sides (see Figure 1). Quarry access for haulage is proposed via the existing unsealed Preston Beach Road North and the sealed Preston Beach Road that exits onto National Route 1, Forrest Highway.

The proposal will involve the proposed limestone and sand quarry including extraction, screening and crushing of limestone, and the grading and maintenance of Preston Beach North Road for access (see Figures 1 and 2).

The proponent for the proposal is Carlo Doyle's Haulage Pty Ltd. The elements of the proposal which have been subject to the EPA's assessment are included in Table 1.

Table 1: Proposal content document

Proposal element	Location	Maximum extent or range
<i>Physical elements</i>		
Development envelope	Figure 1	29.3 hectares
Quarry area	Figure 1	Clearing of approximately 13.9 ha of native vegetation.
Access road	Figure 1	Clearing of approximately 0.6 ha of native vegetation
Preston Beach Road North	Figure 1	Pruning of approximately 0.7 ha of native vegetation
<i>Operational elements</i>		
Limestone extraction		Up to 50,000 tonnes per year
Sand extraction		Up to 10,000 tonnes per year
Dewatering		No dewatering proposed
<i>Timing elements</i>		
Proposal timing	Maximum project life	Up to 20 years
	Operations phase	Operational days and hours: <ul style="list-style-type: none"> • 1 December to 30 April annually • Monday to Friday 07:00 – 17:00 • Saturday 07:00 to 13:00 • No Sundays and public holidays

Units and abbreviations

ha – hectares

Consultation

The proponent referred the proposal under section 38 of the EP Act to the EPA on

5 August 2016. The referral information was published on the EPA website for seven days public comment. On 3 October 2016, the EPA decided to assess the proposal at the level Public Environmental Review. The EPA published the ESD on 17 May 2019 and then published the ERD on its website for public review for four weeks from 8 March 2022 to 5 April 2022.

The proponent was provided with several opportunities to provide information required to progress the assessment; however, the information received remained inadequate and failed to address the items in two s40(2)(a) notices. The EPA formed a preliminary view that the environmental outcome of the proposal is unlikely to be consistent with the EPA's objective for Social Surroundings and issued a notice in October 2025 outlining its preliminary view that it is likely to recommend against the proposal unless the identified matters are addressed adequately. At the proponent's request, the EPA Chair met with them to discuss required additional information and options for avoidance and mitigation.

The proponent submitted final information including a Response to Comments table (November 2025) and a Traffic Management Plan (2026). These documents, in combination with previous proponent information and public comments received were considered in this assessment.

Previous proposal

The proponent previously referred a proposal for the construction and operation of a limestone and sand quarry at Lots 1001 and 1002 Preston Beach Road North, Preston Beach to the EPA. The limestone development at Lot 1001 was proposed to be approximately 200 metres from Lake Pollard, which is a Conservation Category and Ramsar wetland. The EPA decided not to assess the proposal and provided public advice on 16 March 2016. The Minister for Environment remitted the proposal back to the EPA for assessment due to uncertainties regarding the hydrological predictions. On 15 February 2016 the proponent requested to formally withdraw the proposal on Lots 1001 and 1002 Preston Beach Road North, Preston Beach. On 10 May 2015, the EPA formally terminated the environmental impact assessment of that proposal.

Proposal context

The proposal under assessment is located within the study area for the EPA's Strategic Environmental Advice on the Dawesville to Binningup Area (Report 1359, 17 May 2010) prepared under Section 16(e) of the EP Act. In this report, the EPA stated that the study area which includes YNP, has important international, national and regional environmental values of international importance. The area has also been identified as having geoheritage features of international significance, ecological communities, flora and fauna species of national significance listed under the *Environment Protection and Biodiversity Conservation Act 1999* (EPBC Act) and regionally significant vegetation, flora and fauna, significant stands of *Eucalyptus gomphocephala* (tuart) and significant coastal and landscape values (EPA 2010).

Relevant recommendations in the Section 16(e) advice include the following:

- There is a presumption against further subdivision and residential development between the western side of the Yalgorup lakes system and the coast (recommendation 2)

- The YNP should be extended and consolidated, by incorporating private vegetated enclaves west of the Yalgorup lakes and other adjacent reserved lands, and amended to significantly extend the vegetation buffer, particularly around the wetland areas of Lake Clifton and Lake Preston – noting that rehabilitation should be undertaken where the vegetation is degraded or inadequate (recommendation 4)
- Current land management practices adjacent to Lake Clifton which are causing reductions in either groundwater quality or quantity should be rectified to prevent any further decline of the internationally significant Lake Clifton thrombolites (recommendation 5)
- Any essential infrastructure, including roads within the study area, should utilise existing cleared areas and be sited to avoid any further habitat fragmentation (recommendation 8)

The advice also states that for any proposals that may have a significant impact on the environmental values of the study area that environmental information of a high standard and level based on the environmental values of the site and surrounding area is expected for an assessment and that all potential impacts would be considered and addressed.

The natural features of the YNP are of high social significance and the associated 'wilderness experience' has made the area a popular destination for nature-based tourism, with daytime visitation to YNP ranging from around 22,000 visitors in July to upwards of 70,000 visitors in January (DBCA 2025).

Tourist attractions near the proposal includes Martins Tank campground and the Lake Pollard walk trail and bird hide. Based on visitation numbers to Martins Tank campground in 2020-21, it is estimated that an estimated \$1.3 million is spent in the local area from campground users, with a substantial benefit to local businesses and employment (DBCA 2025). In addition, YNP has several commercial tourist operators that are licensed to operate nature-based walks within the park, which rely on the experience of remoteness, isolation and the natural environment (DBCA 2025).

Proposal alternatives

No alternatives have been proposed for the quarry as this is where the limestone and sand are located, and no alternative for the access roads have been proposed as most of the surrounding area is within YNP.



Figure 1: Proposal location



Figure 2: Development envelope and Yalgorup National Park attractions

2 Assessment of key environmental factors

This section details the outcome of the EPA's assessment of the key environmental factors against its environmental objectives.

The EPA has also considered the principles of the EP Act in assessing whether the residual impacts will be consistent with its environmental factor objective (Appendix D).

The EPA evaluated the impacts of the proposal on other environmental factors and concluded these were not key factors for the assessment (Appendix E).

2.1 Social Surroundings

2.1.1 Environmental objective

The EPA environmental objective for social surroundings is *to protect social surroundings from significant harm* (EPA 2016a).

2.1.2 Investigations and surveys

The EPA advises the following investigations, surveys and reviews were used to inform the assessment of the potential impacts to Social Surroundings:

- Acoustic Assessment Lot 1002 Preston Beach Road - Limestone Quarry (Herring Storer Acoustics 2020)
- Preston Quarry Baseline Dust Survey (Emission Assessments 2020)
- Preston Beach Limestone Quarry Air Quality Impact Assessment (SLR 2021)
- Preston Beach Road North assessment (Greenfield Technical Services 2014)
- Lot 1002 Preston Beach North Road, Preston Beach, Traffic Impact Assessment Report 2023 (Brad Brooksby 2023)
- Proposed Sand Extraction at Lot 1002 Preston Beach North Rd, Preston Beach, Independent Review of Transport Impact Assessment (i3 consultants WA 2024)
- Lot 1002 Preston Beach Quarry, Traffic and Acoustic Study (WSP 2025).
- Traffic Management Plan - Limestone and Sand Quarry Lot 1002 Preston Beach Road North (Safe Roads Consultants, 2026)

2.1.3 Assessment context: existing environment

The proposed quarry is bordered on three sides by the YNP, an internationally recognised Class A Conservation Reserve and the second largest National Park on the Swan Coastal Plain. The natural features of the YNP are of high social significance and the associated 'wilderness experience' has made the area a popular destination for nature-based tourism.

Tourist attractions within the park near the proposed quarry and associated access road (Preston Beach Road North), include (Figure 2):

- Martins Tank campground – located 2 km south-east of the quarry and 350 m east of the quarry access road (PBRN)

- Lake Pollard walk trail – partly located adjacent to the quarry site with a 1 km portion of trail sharing PBRN; and
- Lake Pollard bird hide – located 1 km east of the quarry.

Daytime visitation to the YNP ranges from around 22,000 visitors in the month of July to upwards of 70,000 visitors in January. Daytime visitation to Martins Tank campground is around 1,200 visitors in July to upwards of 3,400 visitors in December/January (DBCA 2025). The Lake Pollard bird hide is popular for bird watchers for observing a number of bird species, including migratory species that visit the lake.

The above nature-based attractions all share the same access point via PBRN with the proposal which is an unsealed primarily crushed limestone road.

Camping is available at Martins Tank campground which includes 34 camp sites. According to Department of Biodiversity, Conservation and Attraction (DBCA) records, over 6,000 visitors used the campground in 2024-25. Funding has been obtained to upgrade Martins Tank Campground between 2024 and 2026, including camping facilities, additional campsites for tents, campervans and caravans and additional toilets. The YNP and the Martins Tank Campground are currently two-wheeled drive (2WD) accessible via PBRN.

2.1.4 Consultation

Public and Agency submissions during the assessment of the proposal expressed concern about the proposals' disturbance of the unique natural values and serenity of YNP. DBCA stated 'significant concern' about impacts of the proposal on YNP visitor and recreational users, including campers at Martins Tank campground and impacts associated with haul trucks using PBRN. DBCA also submitted that the nature-based experiences of tourists on walks offered by licensed commercial tour operators will be impacted by the quarry and haulage operations.

The Shire of Waroona expressed concern about the impacts of the proposal on PBRN which allows local residents, domestic and international visitors to experience significant amenity attributes. The Shire also submitted that the proposed maintenance of the road to facilitate truck haulage places a considerable onus on the Shire to upgrade and maintain the road, imposing a significant burden on the local government.

Public concerns included that visitors to YNP will no longer be able to enjoy the Park as they previously did, due to dust, noise, traffic and visual amenity impacts, and that this will affect the visitation numbers (i.e. potential tourism impacts) and the nature-based experience for users.

Submissions also identified concern regarding increased corrugation and deterioration of PBRN by haulage trucks that would increase noise, dust and visual amenity impacts on pedestrians/hikers/cyclists and visitors using the road to access the YNP and areas within the park such as the Martins Tank Campground, and the Lake Pollard walk trail and bird hide.

2.1.5 Potential impacts from the proposal

The proposal has the potential to significantly impact on social surroundings from:

- a decline in amenity for recreational visitors to YNP and Martins Tank campground
- a decline in amenity for recreational users of Lake Pollard walk trail and bird hide
- dust, noise and visual amenity impacts that affect biological and physical surroundings and the wilderness experience of tourists, resulting in economic impacts on nature-based tourist operators and accommodation providers
- haul truck interactions and recreational amenity impacts to visitors of Martin Tank campground and users of the Lake Pollard walk trail and bird hide.

2.1.6 Avoidance measures

The proponent proposed to limit excavation works or truck movements on weekends, public holidays and Easter school holidays, with truck haulage to only occur between the months of December to April.

2.1.7 Minimisation measures (including regulation by other DMAs)

The proponent outlined the following minimisation measures to reduce both direct and indirect impacts to social surroundings:

- stockpile screening on the eastern side of the quarry operations area
- undertake haul road maintenance and grading
- undertake plant and equipment maintenance
- implement a complaints procedure
- undertake watering of access roads, stockpiles and extraction areas if required
- limits on earthworks during high winds
- all truck loads will be covered
- daily visual dust monitoring will be undertaken
- site inductions to ensure staff are properly informed of site controls.

The proposal will require a Works Approval under Part V of the EP Act to support the mitigation of dust and noise emissions from the quarry operations through design requirement, however the proposal may not require licensing.

For this smaller quarry, an Extractive Industries Licence under the Shire of Waroona's Town Planning Scheme No.7 is the most effective instrument to regulate dust and noise emissions; however the Shire is currently not supportive of the proposal. The Shire also has responsibility for PBRN and can require road upgrades and implement speed restrictions.

2.1.8 Assessment of impacts to environmental values

The EPA considers that the key social surroundings values likely to be impacted by the proposal are the amenity of recreational visitors and the economic surroundings of nature-based tourism businesses from noise, dust and visual impacts.

Impacts to the amenity for recreational visitors to YNP and Martins Tank campground:

The proponent has proposed to utilise PBRN for access and truck haulage to the quarry. The operational window for the quarry and associated haulage coincides with peak visitation to YNP and the Martins Tank campground.

Noise, nuisance dust and visual impacts from up to 44 haulage truck movements per day (22 loaded, 22 unloaded) on the unsealed PBRN will impact recreational visitors of the YNP and the recreation and wilderness experience of visitors to Martin Tank campground. Within the context of DBCA's advice to avoid periods of high visitation including December and January, it is noted that haul truck movements would amount to about 880 per month, assuming 20 operational days.

Avoidance of interactions between haul trucks and visitors is a primary measure to mitigate amenity impacts on the recreation and wilderness experience of visitors. In its response to the EPA's preliminary view, the proponent has proposed ceasing operations on weekends, public holidays and during the Easter school holidays (Comments table November 2025). In consideration of the additional measures submitted, it is noted that the proponent has not responded to DBCA's request to avoid operations at peak visitation periods during the December and January school holidays.

In response to the EPA's preliminary view, the proponent proposed the following further minimisation measures (Traffic Management Plan, 2026):

- Installing traffic control measures for vehicle and pedestrian safety
- Maintaining road speeds to 40km/hr
- Deploying on-site traffic spotters and controllers to manage traffic at the intersection between Preston Beach Road and PBRN and
- Improving road signage and installing temporary signage during haulage periods.

For the intersection of Preston Beach Road with PBRN, it is expected that proposed stop-slow hold measures (Traffic Management Plan 2026) will be substantial for visitors during December and January with potentially 880 haul truck interactions per month with vehicles of around 244 campers and more than 3,400 daytime visitors to Martins Tank campground for each of these months.

While lower road speeds proposed in the proponents Traffic Management Plan (2026) is likely to reduce noise for visitors within Martins Tank campground, there remain concerns in respect to the proponent's ability to implement speed restrictions on PBRN, noting that haulage will be undertaken by third parties. No information has been provided regarding the Shire's consideration or willingness to accept the proponent's TMP to enable implementation, including intersection traffic control, road speeds and signage. In addition, the traffic management measures proposed, if implemented, are also likely to increase impacts on visual amenity, altering the visual and experiential character of one of the primary entry points to YNP.

The grading and maintenance of PBRN has been included in the proposal to address corrugation and potholes that would increase noise and dust impacts. However, the proponent has not provided any further information on the implementation of a grading and maintenance regime. In the absence of an appropriate maintenance regime and dust suppression program for the road, the impacts of noise, nuisance dust, visual

amenity and potential interference with access for visitors to YNP and Martins Tank campground cannot be fully assessed.

While the proponent has made an effort to address dust and noise from haulage activities (Traffic Management Plan, 2026), by undertaking operations during peak visitation periods, the impacts from haul truck interactions to the amenity and wilderness experience of recreational visitors remain high. It is beyond the proponent's authority to manage third party operated haul truck activities outside of its development area, and such management is necessary to ensure that the values of the YNP and the wilderness experience of visitors are protected. In the absence of complete proposal implementation information and limited management authority of haulage, it is unlikely that practical and technically feasible conditions could be imposed to reduce inconsistency with the EPA environmental factor objective for Social Surroundings.

Impacts to the amenity for recreational users of Lake Pollard walk trail and bird hide

Noise and nuisance dust from combined quarry operations and truck haulage, will impact the aesthetic values, recreational and wilderness experiences of users of the Lake Pollard walk trail and associated bird hide. Haul trucks will share 1 km of the Lake Pollard walk trail with trail users, with the boundary of the quarry directly next to a further 1 km of the 6 km trail (see Figure 2).

The *Environmental Protection (Noise) Regulations 1997* do not consider noise levels in sensitive recreational areas. Previous EPA assessments where alternative criteria were applied to proposals adjacent to high value natural recreation areas, include the Bibbulmun Walking Trail and Karijini National Park where retention of a wilderness experience is a key focus (WSP 2025). On this basis, independent advice (WSP 2025) suggested the following noise criteria for the key sensitive receptors identified:

Table 2: Assigned noise levels to protect sensitive recreational areas

Receptor	Proposed Criteria	Reasoning
<i>Bird Hide</i>	25-30 dBA	Based on background +5 dB as considered highly sensitive area
<i>Martins Tank Campground</i>	L _{A10} 40 dB Daytime Sunday and PH L _{Amax} 65 dB	Noise sensitive receiver criteria from Noise Regulations
<i>Lake Pollard Walking Trail</i>	L _{A10} 45 dB L _{Aeq(8hour)} 85dB	Based on similar studies OHS criterion to assess potential harm

Maximum noise levels predicted from quarry operations alone are 36 db(A) at the bird hide and 45 db(A) on part of the Lake Pollard walk trail, exceeding the recommended assigned levels. Cumulative noise impacts from the combined quarry and truck movements have not been calculated.

Pedestrian–vehicle interactions for the 1 km section of trail along Preston Beach Road North are predicted to be substantial, with up to 76 potential interactions per quarry operational day during late afternoons in December and January (WSP 2025). While the proponent proposed the installation of signage on the section of the Lake Pollard walk trail to alert recreational users of two-way haul truck traffic (Traffic Management Plan, 2026), adequate mitigation for visual impacts, dust and noise have not been provided. It follows that amenity impacts relating to the ability of trail users to recreate and enjoy a wilderness experience will be high.

While DBCA suggested the potential relocation of sections of the Lake Pollard walk trail that will be most significantly impacted by the proposal is possible, it is not its preference. No additional measures have been proposed by the proponent in respect to the management or minimisation of the noise, dust and visual amenity impacts to users of the Lake Pollard walk trail and bird hide (Comments table November 2025). In the absence of adequate mitigation measures the proposal is likely to be inconsistent with the EPA environmental factor objective for Social Surroundings.

Amenity and economic surroundings:

Noise, dust and visual impacts from combined quarry operations and truck haulage are likely to impact significantly on local physical and biological surroundings of the Lake Pollard walk trail and YNP. Course dust (total suspended particulates less than 50 – 100 micrometer) from truck haulage and quarry operations will cause nuisance dust issues such as reducing visual amenity and dust deposition on vegetation in proximity to these activities.

DBCA have advised that YNP has numerous private commercial tourist operators that are licensed to operate and conduct nature-based walks within the park, relying on the experience of remoteness, isolation, and the natural environment without the disturbance from commercial or industrial type activity. DBCA further advised that a commercial quarry operating adjacent to the YNP, walk trails and campground will have a detrimental impact on this experience and may impact these businesses through the environmental impacts of the proposal. The substantial number of pedestrian-truck interactions on the PBRN section of the Lake Pollard walk trail, as well as haul truck interactions with vehicles of campers and daytime visitors to Martins Tank campground during peak tourist periods will impact the amenity of recreational users.

Submissions from commercial licensed eco-tourist operators stated concern about impacts of noise, dust and quarry operations on vegetation, wildlife and the recreational experience of their clients and the associated impacts on international recognition and eco-tourism business opportunities. Local accommodation providers submitted similar concerns.

The proponent has not provided any additional mitigation measures for the above impacts (Comments table November 2025). Noting the advice from DBCA and key matters raised by commercial tourist operators and providers of visitor accommodation, the proposal is likely to be inconsistent with the EPA environmental factor objective for Social Surroundings.

2.1.9 Summary of key factor assessment and recommended regulation

Table 3: Summary of assessment for social surroundings

Residual impact	Assessment finding
<p>1. Impacts to the amenity for recreational visitors to YNP and Martins Tank campground</p>	<p>Noise, nuisance dust and visual impacts from up to 44 haulage truck movements per day (22 loaded, 22 unloaded) on PBRN (unsealed) will impact the recreational and wilderness experience of visitors to the YNP and Martins Tank campground.</p> <p>The proponent has proposed ceasing operations on weekends, public holidays and during the Easter school holidays (Comments table November 2025) however has not responded to DBCA's request to avoid operations at peak visitation periods during the December and January school holidays. For the intersection of Preston Beach Road with PBRN, it is expected that proposed stop-slow hold measures (Traffic Management Plan 2026) will be substantial for visitors during December and January with potentially 880 haul truck interactions per month with vehicles of around 244 campers and more than 3,000 daytime visitors in these months to Martins Tank campground.</p> <p>While the proponent's proposed road speed of 40 km/hr on PBRN is likely to reduce noise for visitors to Martins Tank campground (Traffic Management Plan, 2026), there remain concerns in respect to the proponent's ability to implement speed restrictions measures, noting that haulage will be undertaken by third parties.</p> <p>In the absence of an appropriate maintenance regime and dust suppression program for the road, the impacts of noise, nuisance dust, visual amenity and potential interference with access for visitors to YNP and Martins Tank campground cannot be fully assessed.</p> <p>It is recognised that the proponent has attempted to address issues of haul truck management and proposed to reduce noise through a road speed limit of 40 km/hr on PBRN. However, in undertaking operations during peak visitation periods, the impacts of haul truck interactions to the amenity and wilderness experience of recreational visitors remain high. In further considering the lack of authority to manage third party operated haul truck activities outside of the quarry area (particularly without agreement from the Shire), the EPA considers that the proposal is likely to be inconsistent with its environmental factor objective for Social Surroundings. Furthermore, it is unlikely that practical and technically feasible conditions could be imposed to reduce inconsistency with the EPA environmental factor objective for Social Surroundings.</p>
<p>2. Impacts to the amenity for recreational users of Lake Pollard walk trail and bird hide</p>	<p>Noise and nuisance dust from combined quarry operations and truck haulage, will impact the aesthetic values, recreational and wilderness experiences of users of the Lake Pollard walk trail and associated bird hide. Haul trucks will share 1 km of the walk trail with trail users, with the boundary of the quarry directly next to a further 1 km of the 6 km trail (see Figure 2). For the 1 km section of Lake Pollard walk trail that runs along Preston Beach Road North, pedestrian-truck interactions, particularly in the months of December</p>

		<p>and January, are expected to be substantial, with up to 76 potential interactions per day.</p> <p>While the proponent proposed the installation of signage on a section of the Lake Pollard walk trail to alert recreational users of two-way traffic (Traffic Management Plan, 2026), mitigation for visual, dust and noise impacts on recreational users remains inadequate.</p> <p>Maximum noise levels predicted from quarry operations alone is 36 db(A) at the bird hide and large parts of the walk trail, exceeding the recommended assigned level of 30 db(A) to protect the recreational amenity and wilderness experience of users. Cumulative noise impacts from the quarry and truck movements have not been calculated.</p> <p>DBCA identified relocation of sections of the Lake Pollard walk trail to mitigate project impacts; however, the proponent has not proposed measures to adequately mitigate noise, dust, or visual amenity impacts on trail and bird-hide users. In the absence of such mitigation, the proposal is likely to be inconsistent with the EPA's Social Surroundings objective.</p>
<p>3.</p>	<p>Impacts to amenity and economic surroundings</p>	<p>Noise, dust and visual impacts from combined quarry operations and truck haulage, as well as traffic interactions with haul trucks, will impact significantly on local physical and biological surroundings of YNP and the wilderness experience of tourists, with potential economic impacts on commercial tourist operators and accommodation businesses.</p> <p>The proponent has not provided sufficient mitigation measures for the above impacts in the final information submitted (Comments table November 2025). Noting the advice from DBCA and concerns raised by commercial tourist operators and providers of visitor accommodation about the environmental effects of the proposal, the EPA considers that the proposal is likely to be inconsistent with the EPA environmental factor objective for Social Surroundings.</p>

2.2 Flora and Vegetation

The EPA environmental objective for flora and vegetation is *to protect flora and vegetation so that biological diversity and ecological integrity are maintained* (EPA 2016b).

The EPA advises the following survey was used to inform the assessment of the potential impacts to flora and vegetation:

- Level 2 Flora and Level 1 Fauna Survey, Lot 1002 and a Portion of Preston Beach Road North and addendum (Natural Area 2021).

DBCA advised that the vegetation and flora survey does not meet the requirements of the Technical Guidance – Flora and vegetation surveys for environmental impact assessment (EPA 2016b). DBCA considered that the single-phase investigations with suboptimal survey timings increased the risk for an underrepresentation of threatened flora in the development envelope.

Table 4: Summary of assessment for flora and vegetation

Key environmental values and context

The proposal is located on the Swan Coastal Plain bioregion. This region has been heavily cleared for agriculture, housing and associated infrastructure (DoEE 2016). Clearing of vegetation will be within the Yonngarillup Vegetation Complex which is in excess of 30% of its pre-European extent within the Swan Coastal Plain IBRA bioregion and within the Shire of Waroona (Accendo 2025).

As noted in section 2.1, the proposal is surrounded by the YNP on three sides (Figure 1). YNP covers 13,140 hectares and features intact native vegetation in excellent condition. This area is of high conservation value because of its good condition, vegetative communities having limited distribution outside of the YNP and because these vegetation types are poorly represented in the conservation reserves. In particular YNP contains tuart and peppermint stands which are in good condition and also limited outside YNP (CALM 1995). The majority of the quarry area is classified as Degraded or Completely Degraded (79%) noting the previous disturbance within Lot 1002. Some areas along Preston Beach Road North are classified as Very Good (Natural Area 2021).

The vegetation in the quarry area may meet the key diagnostic characteristics of the 'Tuart (*Eucalyptus gomphocephala*) Woodlands and Forests of the Swan Coastal Plain ecological community' which is critically endangered under the *Environment Protection and Biodiversity Conservation Act 1999* (EPBC Act) and is a Priority 3 Priority Ecological Community (PEC) under the *Biodiversity Conservation Act 2016* (BC Act) (Tuart Woodlands TEC/PEC). The proponent has proposed modifying the development footprint to retain all mature tuart trees in the development envelope.

No Threatened or Priority flora have been recorded in the development envelope (Natural Area 2021) however DBCA have identified that the flora survey potentially did not identify the threatened flora orchid species *Drakaea elastica*, *Caladenia huegelii* and *Drakaea micrantha* as the survey was not done at an optimal time of year to identify these species.

Impacts from the proposal	Assessment finding and environmental outcome
<p>Potential impacts</p> <p><i>Direct impacts</i></p> <ul style="list-style-type: none"> • Clearing of approximately 14.5 ha of native vegetation. • Pruning of approximately 0.7 ha of native vegetation and trees along PBRN. <p><i>Indirect impacts</i></p> <ul style="list-style-type: none"> • Potential reduction in health of adjoining vegetation in YNP from an increase in number and cover of weeds and potential impacts from the spread of dieback. <p>Avoidance and minimisation measures (including regulation by other DMA's)</p> <ul style="list-style-type: none"> • Proposed modification of disturbance footprint to retain mature tuart trees. • Staged clearing up to 2 ha per year. • Topsoil management. • Progressive rehabilitation following completion of each stage. • Access road will avoid direct impacts to remnant vegetation, as far as practicable. <p>Consultation</p> <p>Key matters raised during consultation included:</p> <ul style="list-style-type: none"> • The Preston Beach Road North requires significant upgrade and widening beyond that proposed, requiring further clearing. • Potential impacts to threatened flora including <i>D. elastica</i>, <i>C. huegelii</i> and <i>D. micrantha</i> cannot be confirmed. • Potential impact to YNP from dieback (<i>Phytophthora multivora</i>, a pathogen with less impact than <i>Phytophthora cinnamomi</i>; but more tolerant to alkaline soils) and weed infestation. <p>Cumulative impact</p> <p>The surrounding area is mostly comprised of the YNP and therefore no other proposal exists or are currently expected in the local area.</p>	<p>Assessment finding and environmental outcomes</p> <p>The proposed clearing of approximately 14.5 ha of native vegetation in mostly 'degraded' or 'completely degraded' condition is not expected to have an impact on vegetation existing within the Yonngarillup Vegetation Complex within the Swan Coastal Plain bioregion.</p> <p>While there may be flora species that were not identified during the vegetation survey, the quarry area is unlikely to be significant in sustaining any individual flora species.</p> <p>While the proponent has proposed modifying the disturbance footprint to avoid direct impacts to mature Tuart trees, vegetation in the YNP may be impacted by dust deposition, dieback and the introduction or spread of weeds. The proponent has proposed to develop an Environmental Management Plan for weed and dieback hygiene management and monitoring measures for potential decline in the condition of vegetation within the adjoining YNP. The EPA expects that the proponent would undertake progressive rehabilitation during operations using native species.</p> <p>The EPA advises that the impacts of the proposal can be managed to provide for an environmental outcome that is likely consistent with the EPA's objective for flora and vegetation.</p>

2.3 Terrestrial Fauna

The EPA environmental objective for terrestrial fauna is *to protect terrestrial fauna so that biological diversity and ecological integrity are maintained* (EPA 2016c).

The EPA advises the following investigations, surveys and reports were used to inform the assessment of the potential impacts to Terrestrial Fauna:

- Level 2 Flora and Level 1 Fauna Survey, Lot 1002 and a Portion of Preston Beach Road North and addendum (Natural Area, 2021)
- Targeted Fauna Survey Lot 1002 Preston Beach Road North and Preston Beach Road North (Greg Harewood, 2021).

The terrestrial fauna surveys were largely consistent with the Terrestrial vertebrate fauna surveys for environmental impact assessment guidance (EPA 2020). The EPA considered that the relevant studies are appropriate to inform the assessment of the potential impacts to the above environmental factor.

Table 5: Summary of assessment for terrestrial fauna

Key environmental values and context

The proposal is located on the Swan Coastal Plain bioregion. This region has been heavily cleared for agriculture, housing and associated infrastructure (DoEE 2016).

Potential fauna habitat in the area has been historically modified (refer to Section 2.2).

the following fauna of conservation significance have been recorded in the proposal area:

- Carnaby's cockatoo (*Zanda latirostris*) – Endangered under both EPBC Act and BC Act.
- Western ringtail possum (*Pseudocheirus occidentalis*) – Critically Endangered under both EPBC Act and BC Act.
- Quenda (*Isoodon fusciventer*) – Priority 4 under the BC Act.
- South-western brush-tailed phascogale (*Phascogale tapoatafa wambenger*) – Species of special conservation interest, conservation dependent under the BC Act (where species is dependent on conservation intervention).
- Western false pipistrelle (*Falsistrellus mackenziei*) – Priority 4 under the BC Act.

As noted in section 2.1, the proposal is surrounded by the YNP on three sides (Figure 1), which covers 13,140 ha and features intact native vegetation in excellent condition. YNP is of high conservation value because of its good quality condition, vegetative communities having limited distribution outside of the YNP and because these vegetation types are poorly represented in conservation reserves (CALM 1995). The park contains habitat suitable for the recorded species above as well as threatened species such as the chuditch and numerous migratory birds (DBCA 2017).

Low value black cockatoo foraging habitat was recorded in the quarry area and the road reserve. No active breeding trees were identified in the proposal area although thirteen trees with hollows not suitable for breeding were located in the development envelope, with one tree in the Preston Beach Road North reserve that had a suitable hollow although had no evidence of black cockatoo use (Harewood, 2021). No roosting individuals were observed during the survey undertaken at the site.

Western ringtail possum individuals were recorded within Preston Beach Road North 0.6 ha of which will be pruned to enable access for truck movements. No suitable habitat or evidence of presence, such as dreys and scats, were recorded in the quarry area (Harewood, 2021).

Brush-tailed phascogales and quenda are likely to occur in the quarry, and vegetation adjacent to the access road and road reserve.

The western false pipistrelle would likely prefer to roost in larger trees within the YNP, considering the large area of the YNP adjacent to the quarry.

Impacts from the proposal	Assessment finding and environmental outcome
<p>Potential impacts</p> <p>Loss of approximately 14.5 ha of potential habitat for threatened and priority fauna species and increased risk of vehicle strike for:</p> <ul style="list-style-type: none"> • Carnaby’s cockatoo (<i>Zanda latirostris</i>) – Endangered under both EPBC Act and BC Act • Western ringtail possum (<i>Pseudocheirus occidentalis</i>) – Critically Endangered under both EPBC Act and BC Act • Quenda (<i>Isodon fusciventer</i>) – Priority 4 under the BC Act • South-western brush-tailed phascogale (<i>Phascogale tapoatafa wambenger</i>) – Species of special conservation interest, conservation dependent under the BC Act (where species is dependent on conservation intervention) • Western false pipistrelle (<i>Falsistrellus mackenziei</i>) – Priority 4 under the BC Act. <p>Avoidance and minimisation measures (including regulation by other DMA’s)</p> <p><i>Avoidance</i></p> <ul style="list-style-type: none"> • The disturbance footprint is proposed to be modified to retain mature tuart trees which are potential habitat for Carnaby’s cockatoo. <p><i>Minimisation</i></p> <ul style="list-style-type: none"> • Staged clearing up to 2 ha per year. • A fauna spotter will be onsite to oversee vegetation clearing. • A pre-clearance survey will be undertaken with capture and relocation of fauna to an area where those species are known to be present, if required. 	<p>Assessment finding and environmental outcomes</p> <p>The quarry area is mostly degraded and surrounded by a large area of intact vegetation in YNP and is unlikely to be significant in sustaining any threatened fauna species or provide meaningful ability for fauna to safely travel through the proposal area to other areas of the YNP.</p> <p>Low value black cockatoo foraging habitat is likely in the proposal area and no active breeding trees were identified. The western false pipistrelle would likely roost in larger trees within YNP and not the proposal site.</p> <p>Western ringtail possum individuals and habitat was recorded within Preston Beach Road North, 0.7 ha of which will be pruned to enable access for truck movements. No suitable habitat or evidence of presence, such as dreys and scats, were recorded in the quarry area.</p> <p>Additional truck movements along the road would likely increase the risk of fauna strikes. While it is unlikely that western ringtail possums and south-western brush-tailed phascogales would be significantly affected as they are mostly nocturnal, quenda may use the site during the day. The proposed truck speed limit of 40 km/hr (Traffic Management Plan, 2026) would reduce the risk of vehicle strikes, especially in the Lake Pollard walk trail area which is currently a low traffic area.</p> <p>Given the short-term (daytime) impacts and localised nature of the noise and vibration, it is anticipated that the impacts of noise and vibration on fauna will also be low.</p>

<ul style="list-style-type: none"> • Vehicles/machinery onsite will be restricted to one front-end loader and a truck. • Speed limits for trucks restricted to 40 km/hr. <p>Consultation</p> <p>Key matters raised include:</p> <ul style="list-style-type: none"> • Heavy vehicles, noise and dust are not suitable so close to such an important area for biodiversity, noting the presence of conservation significant fauna. • The fauna habitat is important for supporting conservation significant species. • Concern regarding the water birds that visit the nearby lakes will be affected by noise and vibration from quarry operations and truck movements. • Potential fragmentation of habitat. <p>Cumulative impact</p> <p>The local surrounding area is the YNP and therefore no other proposal exists or is currently expected in the area.</p>	<p>Indirect impacts to fauna are likely to be limited to potential habitat degradation as a result of the introduction and/or spread of weeds and disease (See section 2.2).</p> <p>The EPA advises that the impacts of the proposal can be managed to provide for an environmental outcome that is likely consistent with the EPA's objective for terrestrial fauna.</p>
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2.4 Inland Waters

The EPA environmental objective for inland waters is *to maintain the hydrological regimes and quality of groundwater and surface water so that environmental values are protected* (EPA 2018).

The proponent submitted the following investigations and surveys for assessment:

- Preston Beach Road North – Hydrological Assessment (Revised) Report for Doyle’s Lime Service (Managed Recharge, 2021).

The inland waters studies were largely consistent with the Technical Guidance – Inland Waters (EPA 2018). The EPA considered that the relevant studies are appropriate to inform the assessment of the potential impacts to the above environmental factor.

Table 6: Summary of assessment for inland waters

Key environmental values and context	
<p>The lakes within Yalgorup National Park form part of the Peel-Yalgorup Ramsar-listed wetlands. These wetlands provide an important habitat for water birds and Lake Clifton contains rare, living thrombolites that are found predominantly on the north-east side of the lake in a stretch that extends approximately 15 km (EPA 2010).</p> <p>The quarry is approximately 800 m south-west of Lake Pollard, 2 km west of Lake Clifton and 1.5 km north-west of Martin’s Tank Lake (Figure 2).</p> <p>The Dawesville to Binningup Area Section 16(e) advice states that the Yalgorup lakes rely on seasonally variable groundwater inflows from both east and west, with fresh water overlying saline aquifer water, and this hydrology underpins their unique ecological values.</p> <p>The advice also suggests that land-use changes such as subdivision, intensified agriculture, increased groundwater extraction, fertiliser use, or mining may alter groundwater quality or quantity and threaten the lake ecosystems.</p> <p>The proposed pit is located on land 5 to 10 mAHD, on the western side of a northwest-southeast trending limestone ridge. The above-mentioned lake systems are located to the east of the ridge.</p> <p>The water quality of the area is generally brackish with a freshwater lens and the water table occurs at an elevation of between -0.09 and 0.19 m AHD.</p>	
Impacts from the proposal	Assessment finding and environmental outcome
<p>Potential impacts</p> <ul style="list-style-type: none"> • impacts to groundwater quality and quantity. • changes to the hydrology of the Yalgorup lakes and surface water quality. <p>Avoidance and minimisation measures</p>	<p>Assessment finding and environmental outcomes</p> <p><u>Groundwater:</u></p> <p>The proponent’s proposed a 4m separation distance between the quarry pit floor and groundwater levels and no groundwater extraction minimises the potential impacts to groundwater levels, the Ramsar wetlands and the lake system.</p>

<ul style="list-style-type: none"> • maintain a 4 m separation distance between pit floor and groundwater level. • no groundwater abstraction or dewatering will be undertaken. • allow clean stormwater to infiltrate into the surrounding soil by constructing diversion banks upslope of areas to be disturbed. • no chemicals or fuels stored onsite. • construct catch drains to capture runoff from disturbed areas and direct into the pit area to enable infiltration. • implement erosion/sedimentation control measures. • staged clearing of up to 2 ha per year. • progressive rehabilitation of each completed cell with native species. <p>DMA regulation</p> <p>A Works Approval and either a Licence or Registration under Part V of the EP Act would be required to assess and manage discharges to surface and groundwater associated with the quarry site.</p> <p>Consultation</p> <p>Key matters raised during consultation included:</p> <ul style="list-style-type: none"> • DBCA raised concerns that the removal of the ridge may result in alteration to the groundwater mound developed beneath a topographic high. • Public submissions raised concerns of proximity to and changes to hydrology at the Ramsar wetlands, especially if groundwater abstraction was proposed. 	<p>Proponent information indicates that groundwater flow from the site is almost exclusively towards Lake Pollard, with negligible flow to Lake Clifton and no flow to Martins Tank Lake. Recharge estimate calculations indicate that groundwater recharge that contributed to Lake Pollard from the quarry makes up approximately 2% of the total groundwater discharged to this lake.</p> <p>Geochemical modelling indicates a low risk of impacts to Lake Pollard or other wetlands from changes in groundwater chemistry associated with the proposal. This is because the rate of limestone dissolution is expected to decline over time as weathered surfaces form on the exposed material, and any fines entering the aquifer through solution channels would settle well before reaching the lake, given the estimated groundwater travel time of 26 years.</p> <p>Accordingly, recharge volumes may increase slightly due to vegetation clearing, resource extraction, and land levelling. However, the EPA considers that with implementation of the proposed avoidance and minimisation measures the overall risk to the lake's hydrology is assessed as low and any measurable changes in groundwater level or quality are expected to remain confined to the property boundary.</p> <p><u>Surface Water:</u></p> <p>Given the transmissivity of the sandy dunes overlaying the site, most rainfall is expected to infiltrate directly with minimal runoff. However more significant rainfall events may result in some surface water flow.</p> <p>Available topographical mapping indicates that surface flow will be predominantly directed to a low-lying swale located to the west of the proposed quarry pit, with some minor flow directed to the east towards the lake systems.</p> <p>It is not expected that the proposal will impact on existing surface water flows toward the Yalgorup lakes, or other wetlands.</p> <p>All stormwater generated on-site within the quarry operation area would be contained within the site and directed towards the pit to enable infiltration and clean stormwater would be diverted to infiltrate into the surrounding soil where required upslope of any areas of disturbance.</p> <p>The EPA advises that the impacts of the proposal can be managed to provide for an environmental outcome that is likely consistent with the EPA's objective for inland waters.</p>
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3 Recommendations

The EPA has taken the following into account in its assessment of the proposal:

- environmental values likely to be significantly affected by the proposal
- assessment of key environmental factors, (this has included considering cumulative impacts of the proposal where relevant)
- EPA's confidence in the proponent's proposed mitigation measures
- consistency of environmental outcomes with the EPA's objective for the key environmental factor
- whether other statutory decision-making processes can mitigate the potential impacts of the proposal on the environment
- principles of the EP Act

The EPA concludes that the proposal, given its significant residual impacts on amenity values and public enjoyment and recreation within YNP, is unlikely to be consistent with the EPA factor objectives for Social Surroundings. The EPA further advises that reasonable conditions to manage the impacts cannot be imposed to reduce inconsistency with the EPA factor objectives for Social Surroundings. A draft Ministerial Statement has therefore not been prepared.

The EPA recommends that the proposal should not be implemented.

4 Other advice

Planning processes

In providing its recommendation to the Minister, the EPA has only considered environmental matters as per the EP Act. Specifically, the EPA is not able to consider impacts to land use planning, public safety, society and economic benefit where they are inconsistent with the EPA's remit under this legislation.

Comparative assessments

The EPA assess quarries on a case-by-case basis, with consideration of the environmental values, impacts and environmental outcomes for each proposal.

The outcomes of recent EPA assessment of several quarry proposals in the area include:

- Limestone Quarry, Lot 4 Binningup Road, Binningup – Ministerial Statement 1232 approved on 20 November 2024. The proposal was for the extraction of limestone from a 26-hectare area of previously cleared land. The proposal is located approximately 640 metres south-east of the township of Binningup
- Sand and Limestone Extraction, Lots 1498 and 1504 Finn Road, Myalup – recommended not to be assessed on 28 September 2021. This proposal was for the extraction of sand and limestone at a site located approximately 13km south of Preston Beach, and adjacent to Lake Preston.
- Limestone Quarry Lot 1794 Finn Rd, Myalup – recommended not to be assessed on 3 February 2025.

In consideration of comparative assessments, the differentiating factor for the Preston Beach Limestone and Sand Quarry proposal are significant residual impacts on the amenity of YNP likely to be inconsistent with the EPA's objective for Social Surroundings.

Appendix A: Recommended conditions

Section 44(2)(b) of the *Environmental Protection Act 1986* specifies that the EPA's report must set out (if it recommends that implementation be allowed) the conditions and procedures, if any, to which implementation should be subject. This appendix contains the EPA's recommended conditions and procedures.

STATEMENT THAT A PROPOSAL MAY BE IMPLEMENTED (*Environmental Protection Act 1986*)

There remains insufficient confidence as to whether practical and technically feasible conditions could be imposed in a Ministerial statement issued under the EP Act, if the proposal were to proceed, to reduce inconsistency with the EPA environmental factor objective for Social Surroundings.

In addition, the proposal is not consistent with the object and principles in s. 4A of the EP Act, specifically:

- the precautionary principle as it relates to social surroundings.
- the principles relating to improved valuation, pricing and incentive mechanisms as it relates to social surroundings.

A draft Ministerial Statement has therefore not been prepared.

Appendix B: Decision-making authorities

Table B1: Identified relevant decision-making authorities for the proposal

Decision-making authority	Legislation (and approval)
1. Minister for Environment	<i>Biodiversity Conservation Act 2016</i> <ul style="list-style-type: none"> - section 40 authority to take or disturb threatened species; and, - section 45 authority to modify occurrence of a threatened ecological community.
2. Chairman, Western Australian Planning Commission	<i>Planning and Development Act 2005</i> <ul style="list-style-type: none"> - Peel Region Scheme.
3. Chief Executive Officer, Department of Water and Environmental Regulation	<i>Environmental Protection Act 1986</i> <ul style="list-style-type: none"> - Part V works approval and licence.
4. Chief Executive Officer Shire of Waroona	<i>Planning and Development Act 2005</i> <ul style="list-style-type: none"> - Extractive industries licence.

Appendix C: Regulation under other statutory processes

Table C1: Regulation under other statutory processes

Statutory decision-making process	Environmental outcome
<p><i>Environmental Protection Act 1986</i> Part V Division 3</p> <ul style="list-style-type: none"> - Part V works approval. 	<ul style="list-style-type: none"> • Contribute towards the environmental outcome for dust emissions through requirements for design and operational measures. • Contribute towards the environmental outcome for maintenance of water quality through requirements for design and operational measures.
<p><i>Biodiversity Conservation Act 2016</i></p>	<p>The taking of threatened flora, fauna and ecological communities does not result in any species or community being listed under a higher conservation status.</p>
<p><i>Planning and Development Act 2005</i></p>	<ul style="list-style-type: none"> • ensure that the extraction of basic raw materials avoids and mitigates any adverse impacts on the community, water resources and biodiversity values. • avoid and mitigate the operational impacts of extractive industry, including pollution and emissions. • achieve a high level of surface and sub-surface water protection. • implement a Rehabilitation Management and Monitoring Plan.

Appendix D: Environmental Protection Act principles

Table D1: Consideration of principles of the *Environmental Protection Act 1986*

EP Act principle	Consideration
<p>1. The precautionary principle</p> <p><i>Where there are threats of serious or irreversible damage, lack of full scientific certainty should not be used as a reason for postponing measures to prevent environmental degradation.</i></p> <p><i>In application of this precautionary principle, decisions should be guided by –</i></p> <p>(a) <i>careful evaluation to avoid, where practicable, serious or irreversible damage to the environment; and</i></p> <p>(b) <i>an assessment of the risk-weighted consequences of various options.</i></p>	<p>The EPA has considered the precautionary principle in its assessment and has had particular regard to this principle in its assessment of social surroundings.</p> <p>In the absence of practical and feasible conditions identified, the EPA considered that it is unlikely that suitable measures could be applied to avoid or minimise significant residual impacts to the recreational amenity and ‘wilderness experience’ of thousands of visitors to YNP.</p> <p>The EPA has therefore considered that the proposal is not consistent with the precautionary principle as it relates to social surroundings.</p>
<p>2. The principle of intergenerational equity</p> <p><i>The present generation should ensure that the health, diversity and productivity of the environment is maintained and enhanced for the benefit of future generations.</i></p>	<p>The EPA has considered the principle of intergenerational equity in its assessment and has had particular regard to the principle in its assessment of Terrestrial fauna. In light of the known and future pressures to this habitat, the EPA has concern regarding the limited amount of high quality black cockatoo breeding, roosting and foraging sites. From its assessment of this proposal, the EPA has concluded that the health, resilience and productivity of the environment will likely be maintained for the benefit of future generations.</p>
<p>3. The principle of the conservation of biological diversity and ecological integrity</p> <p><i>Conservation of biological diversity and ecological integrity should be a fundamental consideration.</i></p>	<p>The EPA has considered the principle of conservation of biological diversity and ecological integrity in its assessment and has had particular regard to this principle in its assessment of flora and vegetation and terrestrial fauna.</p> <p>The EPA has concluded that there would likely be no significant residual direct or indirect impact on the biodiversity diversity and ecological integrity of these values.</p>
<p>4. Principles relating to improved valuation, pricing and incentive mechanisms</p>	<p>The use of Preston Beach Road North, which is a public asset providing access to environmental assets within a national park impacts social surroundings through increased dust, noise, reduced visitor amenity and accelerated road degradation.</p>

EP Act principle	Consideration
<p>(1) <i>Environmental factors should be included in the valuation of assets and services.</i></p> <p>(2) <i>The polluter pays principle — those who generate pollution and waste should bear the cost of containment, avoidance or abatement.</i></p> <p>(3) <i>The users of goods and services should pay prices based on the full life cycle costs of providing goods and services, including the use of natural resources and assets and the ultimate disposal of any wastes.</i></p> <p>(4) <i>Environmental goals, having been established, should be pursued in the most cost-effective way, by establishing incentive structures, including market mechanisms, which enable those best placed to maximise benefits and/or minimise costs to develop their own solutions and responses to environmental problems.</i></p>	<p>The absence of a maintenance and management regime, including ensuring no impacts to recreational visitor access to attractions within YNP, indicates that environmental factors have not been adequately addressed and that the full life cycle costing of resource use has not been demonstrated. The EPA recognised that additional long-term management obligations including technical, operational and financial implications will be placed on the Shire of Waroona given they are responsible for the care, control and management of Preston Beach Road North under the <i>Land Administration Act 1997</i>.</p> <p>The proposal may also affect the number of people accessing YNP and Martins tank campground which attracts a fee payable to the Government of Western Australia. Implementation of the proposal may transfer responsibility and cost for relocation of the Lake Pollard walk trail or sections of the trail within YNP to avoid the public's interactions with haul trucks to DBCA.</p> <p>The EPA has therefore determined that the proposal is not consistent with the principles relating to improved valuation, pricing and incentive mechanisms.</p>
<p>5. The principle of waste minimisation</p> <p><i>All reasonable and practicable measures should be taken to minimise the generation of waste and its discharge into the environment.</i></p>	<p>The EPA has considered the principle of waste minimisation in its assessment and has had particular regard to this principle in its assessment of inland waters.</p> <p>The EPA recognises that the proposal by design would likely generate minimal waste streams. The proponent has considered the principle of waste minimisation in the design of the proposal, including removal of all waste from site for disposal at an approved facility and therefore not contaminating groundwater in the vicinity of the proposal area.</p> <p>The disposal of waste off-site is consistent with the principle of waste minimisation within the context of the proposal location in proximity to the Yalgorup lakes.</p>

Appendix E: Other environmental factors

Table E1: Evaluation of other environmental factors

Environmental factor	Description of the proposal's likely impacts on the environmental factor	Government agency and public comments	Evaluation of why the factor is not a key environmental factor
Land and Water			
Terrestrial environmental quality	Reduction in soil quality from leaks and spills	<p><u>Public comments</u></p> <ul style="list-style-type: none"> Concern regarding the storage of or presence onsite of fuel storage or other chemicals used in operations. <p><u>Agency comment</u></p> <ul style="list-style-type: none"> No agency comments were received. 	<p>Terrestrial environmental quality was not identified as a preliminary key environmental factor when the EPA decided to assess the proposal.</p> <p>Having regard to:</p> <ul style="list-style-type: none"> The proponent will not service machinery or store any chemicals or fuels onsite, all waste will be removed from site for disposal at an approved facility, emissions from prescribed premises can be adequately assessed, managed, and regulated under Part V of the EP Act, <p>the EPA considers that it is unlikely that the proposal would have a significant impact on terrestrial environmental quality. Accordingly, the EPA did not consider terrestrial environmental quality to be a key environmental factor at the conclusion of its assessment.</p>
Landforms	Visual amenity from alteration of the landscape, which has been discussed under the social surroundings factor	<p><u>Public comments</u></p> <ul style="list-style-type: none"> Tourism highlights will be less attractive with a quarry right alongside. <p><u>Agency comments</u></p> <ul style="list-style-type: none"> No agency comments were received. 	<p>Landforms were not identified as a preliminary key environmental factor when the EPA decided to assess the proposal.</p> <p>Having regard to:</p> <ul style="list-style-type: none"> proponent proposing to progressively rehabilitate with overarching closure objective to establish safe and stable landforms, natural screening features including a vegetated buffer on the property boundary and the presence of an elevated limestone ridge,

Environmental factor	Description of the proposal's likely impacts on the environmental factor	Government agency and public comments	Evaluation of why the factor is not a key environmental factor
			the EPA considers that it is unlikely that the proposal would have a significant impact on landforms. Accordingly, the EPA did not consider landforms to be a key environmental factor at the conclusion of its assessment.
Air			
Air quality	<p>Impacts are mainly from dust, which has been discussed under the social surroundings factor.</p> <p>Air emissions such as PM₁₀ and PM_{2.5} are not expected to be significant.</p>	<p><u>Public comments</u></p> <ul style="list-style-type: none"> The air quality of the area will be affected. Health concerns from air emissions. <p><u>Agency comments</u></p> <ul style="list-style-type: none"> No agency comments were received. 	<p>Air quality was not identified as preliminary key environmental factor when the EPA decided to assess the proposal.</p> <p>Having regard to:</p> <ul style="list-style-type: none"> dust has been considered under social surroundings factor assessment, the separation distance between the proposal and nearest sensitive receptors (nearby dwellings and the town of Preston Beach), emissions from prescribed premises can be adequately assessed, managed, and regulated under Part V of the EP Act, <p>the EPA considers that it is unlikely that the proposal would have a significant impact on air quality. Accordingly, the EPA did not consider air quality to be a key environmental factor at the conclusion of its assessment.</p>
People			
Human health	No radioactive impacts from the proposal	<p><u>Public comments</u></p> <ul style="list-style-type: none"> No public comments were received. <p><u>Agency comments</u></p> <ul style="list-style-type: none"> No agency comments were received. 	<p>Human health was not identified as preliminary key environmental factor when the EPA decided to assess the proposal. Impacts to human health from dust are considered under the social surroundings factor assessment.</p> <p>As there are no other potential impacts such as radioactivity, the EPA considers that it is unlikely that the proposal would have a significant impact on human health. Accordingly, the EPA did not consider human health to be a key environmental factor at the conclusion of its assessment.</p>

Appendix F: List of submitters

7-day comment on referral

Organisations and public

- Conservation Council of Western Australia
- Urban Bushland Council WA Inc

Government agencies

- none

Public review of proponent information

Organisations and public

- Aldemor Holiday Services at Preston Beach WA
- Bouvard Coast Care Group
- Conservation Council of Western Australia
- Friends of the Ramsar Action Group for the Yalgorup Lakes Environment
- Hidden Cabins Pty Ltd
- Mandurah Environment and Heritage Group
- Mandurah Just Joey Marsupial Care
- Peel Harvey Catchment Council
- Peel Preservation Group Inc.
- Preston Beach Progress Association
- Salt and Bush Eco Tours
- Urban Bushland Council WA Inc
- Ways to Nature
- Wildflower Society of Western Australia
- Private submitters (127)

Government agencies

- Department of Biodiversity, Conservation and Attractions
- Shire of Waroona
- Western Australian Planning Commission

Appendix G: Assessment timeline

Date	Progress stages	Time (weeks)
3 October 2016	EPA decided to assess – level of assessment set	
17 May 2019	EPA approved Environmental Scoping Document	136
28 February 2022	EPA accepted Environmental Review Document	145
8 March 2022	Environmental Review Document released for public review	4
5 April 2022	Public review period for Environmental Review Document closed	202
19 February 2026	EPA received final information for assessment	4
19 March 2026	EPA completed its assessment	6
23 April 2026	EPA provided report to the Minister for Environment	6
29 April 2026	EPA report published	3 days
21 May 2026	Appeals period closed	3

Timelines for an assessment may vary according to the complexity of the proposal and are usually agreed with the proponent soon after the EPA decides to assess the proposal and records the level of assessment.

In this case, the EPA met its timeline objective to complete its assessment and provide a report to the Minister.

Appendix H: Relevant policy, guidance, procedures and references

The EPA had particular regard to the policies, guidelines and procedures listed below in the assessment of the proposal.

- EPA 2005, *Guidance for the Assessment of Environmental Factors (in accordance with the Environmental Protection Act 1986) Environmental Protection Authority No. 3 June 2005 Separation Distances between Industrial and Sensitive Land Uses*. June 2005. Western Australia.
- EPA 2016a, *Environmental factor guideline – Social surroundings*, Environmental Protection Authority, Perth, WA.
- EPA 2016b, *Environmental factor guideline – Flora and vegetation*, Environmental Protection Authority, Perth, WA.
- EPA 2016c, *Environmental factor guideline – Terrestrial fauna*, Environmental Protection Authority, Perth, WA.
- EPA 2018, *Environmental factor guideline – Inland waters*, Environmental Protection Authority, Perth, WA.
- EPA 2020, *Technical guidance – Terrestrial vertebrate fauna surveys for environmental impact assessment*, Environmental Protection Authority, Perth, WA
- EPA 2021a, *Environmental impact assessment (Part IV Divisions 1 and 2) procedures manual*, Environmental Protection Authority, Perth, WA.
- EPA 2021b, *Statement of environmental principles, factors, objectives and aims of EIA*, Environmental Protection Authority, Perth, WA.

References:

Accendo Australia 2025, *Environmental Offset Assessment Lot 1002 Preston Beach Road North, Preston Beach June 2025* Busselton WA

Accendo Australia 2025, Response to comments table (21 November 2025)

Brad Brooksby 2023, *Lot 1002 Preston Beach North Road, Preston Beach, Traffic Impact Assessment Report 2023*, report for Doyle's Lime Service November 2023

Department of Biodiversity, Conservation and Attractions (DBCA) 2017, *Bushland news Issue 102, Winter 2017*, DBCA, Perth WA

Department of Biodiversity, Conservation and Attractions (DBCA) 2025, *Visitation figures for Yalgorup National Park and surrounds*, supplied by DBCA on 24 July 2025

Department of Conservation and Land Management (CALM) 1995, *Yalgorup National Park Management Plan 1995-2005*, CALM, Perth, WA

Department of Water and Environmental Regulation (DWER) 2019, *Guideline Air Emissions. Activities regulated under the: Environmental Protection Act 1986*.

Environmental Protection Regulations 1987. Draft for external consultation October 2019.

DoEE 2016, *Banksia Woodlands of the Swan Coastal Plain: a nationally protected ecological community* Department of the Environment and Energy, Canberra ACT

Emission Assessments Air Quality & Noise 2020, *Preston Quarry Baseline Dust Survey*, report for Accendo Australia 3 November 2020

EPA 2010, *Strategic Environmental Advice on the Dawesville to Binningup Area (Report 1359)*, report prepared by the Environmental Protection Authority, 17 May 2010

Greenfield Technical Services 2014, *Preston Beach Road North Assessment*, report for Doyle's Lime Service 25 June 2014

Greg Harewood 2021, *Targeted Fauna Survey Lot 1002 Preston Beach Road North and Preston Beach Road North*, report for Doyle's Lime Service November 2021

Herring Storer Acoustics 2020, *Acoustic Assessment Lot 1002 Preston Beach Road – Limestone Quarry*, report for Doyle's Lime Service August 2020

i3 consultants WA 2024, *Proposed Sand Extraction at Lot 1002 Preston Beach North Rd, Preston Beach, Independent Review of Transport Impact Assessment*, report for Doyle's Lime Service 26 August 2024

Managed Recharge 2021, *Preston Beach Road North – Hydrological Assessment (Revised)*, report for Doyle's Lime Service 11 August 2021

Natural Area Holdings Pty Ltd (Natural Area) 2021, *Level 2 Flora and Level 1 Fauna Survey, Lot 1002 and a Portion of Preston Beach Road North and addendum*, report for Doyle's Lime Service November 2021

Safe Roads Consultants, 2026, *Traffic Management Plan - Limestone and Sand Quarry Lot 1002 Preston Beach Road North*

SLR Consulting Australia Pty Ltd 2021, *Preston Beach Limestone Quarry Air Quality Impact Assessment*, report for Doyle's Lime Service August 2021

WSP Australia (WSP) 2025, *Lot 1002 Preston Beach Quarry, Traffic and Acoustic Study*, prepared for the Department of Water and Environmental Regulation 20 August 2025