

Southern Extension of Sandpit, Lot 2
Calinup Road, Gelorup, Shire of Capel
– inquiry under section 46 of the
Environmental Protection Act 1986
to amend Ministerial Statements 767 and 969

McDougall Quarries Pty Ltd

Report 1708 September 2021

Inquiry under section 46 of the Environmental Protection Act 1986

The Minister for Environment has requested that the Environmental Protection Authority (EPA) inquire into and report on the matter of changing the implementation conditions 9-2 and 9-3 (Rehabilitation) of Ministerial Statement 767 and condition 9-3 (Rehabilitation) of Ministerial Statement 969 relating to the Southern Extension of Sandpit, Lot 2 Calinup Road, Gelorup, Shire of Capel proposal, to remove references to the northern portion of the proposal.

Section 46(6) of the *Environmental Protection Act 1986* requires the EPA to prepare a report that includes:

- (a) a recommendation on whether or not the implementation conditions to which the inquiry relates, or any of them, should be changed
- (b) any other recommendations that it thinks appropriate.

The following is the EPA's report to the Minister pursuant to s. 46(6) of the *Environmental Protection Act 1986*.

The proponent, McDougall Quarries Pty Ltd, has also submitted a request to the EPA to change the proposal described in Ministerial Statement 767. This report includes the EPA's advice to the Minister following consideration of the requested change to the proposal to remove the northern portion of the proposal and amend the development envelope in the southern portion of the proposal.

The EPA considered the two requests in a combined report because the changes to the conditions and proposal concerning the northern portion of Lot 2 are interlinked.

Prof. Matthew Tonts

Chair

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1 Proposal

The Southern Extension of Sandpit, Lot 2 Calinup Road, Gelorup, Shire of Capel proposal (the proposal) is to clear native vegetation and excavate sand at the southern portion of Lot 2, Calinup Road, Gelorup. The total area of native vegetation to be cleared would not exceed 19 hectares (ha). The area to be cleared would be progressively rehabilitated with native vegetation.

The proposal includes remedial earthworks and rehabilitation on the northern portion of Lot 2. A total area of approximately 16 ha at the northern end of Lot 2 would be rehabilitated. The proposal also includes the placing of perpetual conservation covenants on portions of Lot 2 Calinup Road and Lot 268 Kilpatrick Road Gelorup (Certificate of Title volume 1319 folio 4) as described in Figures 1 and 2 of Ministerial Statement 767.

The proponent for the proposal is McDougall Quarries Pty Ltd.

The Environmental Protection Authority (EPA) assessed the proposal at the level of Public Environmental Review and published its report in August 2005 (Bulletin 1194). In this report, the EPA decided that the following environmental factors relevant to the proposal required detailed evaluation in the report:

- Vegetation and flora
- Fauna
- Rehabilitation.

In applying the *Statement of Environmental Principles, Factors and Objectives* (EPA 2020b) these factors are now represented by:

- Flora and vegetation
- Terrestrial fauna
- Terrestrial environmental quality.

The EPA concluded in Bulletin 1194 that the proposal to extend the existing sandpit on Lot 2 Calinup Road, Gelorup as proposed was environmental unacceptable as it could not be managed to meet the EPA's objectives in relation to vegetation and flora, fauna and rehabilitation.

Following the consideration of appeals on the EPA's recommendations, the then Minister for Environment approved the proposal for implementation, subject to the implementation conditions of Ministerial Statement (MS) 767 on 15 April 2008.

Previously approved changes to the conditions

In December 2012, the former proponent Cotton Holdings Pty Ltd requested changes to conditions 3 and 9 of MS 767. The request was firstly to extend the authorised timeframe for substantial commencement of the proposal by three years. Secondly, to extend the time limit for commencement of rehabilitation of the northern

portion of the lot to be prior to commencement of clearing of vegetation or excavation of sand (whichever is sooner) in the southern portion of Lot 2. In response to the request, the then Minister for Environment requested the EPA inquire into and report on changes to the implementation conditions of MS 767 to extend the timeframes on substantial commencement and rehabilitation. Report 1507 details the findings of the EPA's inquiry and was published in April 2014.

In June 2014, the then Minister issued MS 969, which amended conditions 3 and 9 of MS 767 under s. 46 of the *Environmental Protection Act 1986* (EP Act). Condition 3 of MS 767 was replaced to extend the time limit of authorisation for an additional three years. Condition 9-3(2)(a) was replaced to extend the time limit for commencement of rehabilitation of the northern portion of Lot 2 to prior to the commencement of clearing of vegetation or excavation of sand (whichever is sooner) in the southern portion of Lot 2.

2 Requested changes to the proposal

The proponent requested the following changes to the proposal:

- remove the northern portion of Lot 2 Calinup Road from the proposal
- amend the development envelope in the southern portion of the proposal.

The proponent is pursuing a subdivision and re-zoning of the northern area of Lot 2 and the first change is requested to simplify those applications.

The original proposal included requirements for remedial earthworks and rehabilitation on the northern portion of Lot 2, which have since been completed. Therefore the proponent has requested that this component be removed from the proposal.

The second change to amend the development envelope is requested in order to amend discrepancies between the development envelope boundary and the cadastral boundaries. There are small discrepancies between the development envelope identified in MS 767, the subsequently approved conservation covenant and the cadastral boundaries of Lot 2 Calinup Road.

Section 45C of the EP Act provides that the Minister may consent to changes to a proposal after a statement has been issued under s. 45(5) of the Act, provided the Minister does not consider that the change might have a significant detrimental effect on the environment in addition to, or different from, the effect of the original proposal.

Section 5.3 of the *Environmental Impact Assessment (Part IV Divisions 1 and 2) Procedures Manual* (EPA 2020a) identifies the EPA's process for undertaking an assessment under of a change to a proposal; in particular, the 'six aspects' to be considered when determining whether a change to a proposal can be approved.

2.1 The six aspects to be considered

1) Identification of the content of the original proposal.

In January 1999, the original proponent, Giacci Holdings Pty Ltd, referred the proposal to the EPA. The proposal was for a 24-year sand pit, mining a total of 4.7 million bank cubic metres (BCM) at a rate of 190,000 BCM per annum. The site was divided into 24 blocks, each less than 3 ha, with extraction moving from north to south. There was already an existing sand mining operation in the north of the lot and the proposal would expand from there. The final end land concept was residential.

The referral noted that while the site was zoned rural, the planned future use for the site is a Special Development Area. There would be progressive rehabilitation, with areas zoned for residential to be planted with Tasmanian Blue Gums while native trees and shrubs would be established on areas zoned as reserve. There would be 30 ha of native vegetation cleared, which was reduced to 20 ha during the assessment.

In Bulletin 1194, the EPA concluded that the referred proposal should not be implemented. The report and recommendation of the EPA were appealed by the proponent on numerous grounds. The Minister allowed the appeal and approved implementation of the proposal in MS 767 on 11 April 2008. This statement approved the clearing of native vegetation and excavation of sand at the southern portion of Lot 2 Calinup Road Gelorup. The total area of native vegetation to be cleared would not exceed 19 ha and the area to be cleared would be progressively rehabilitated with native vegetation. In addition, remedial earthworks and rehabilitation would be on the northern portion of Lot 2, Calinup Road. The proposal also includes the placing of perpetual conservation covenants on portions of Lot 2 Calinup Road and Lot 268 Kilpatrick Road Gelorup as described in Figures 1 and 2 of MS 767.

2) Identification of the content of the relevant change(s) and determine whether the change(s) involves a revision of the original proposal.

The first change would result in the following changes to MS 767:

- the removal of the northern portion of Lot 2 Calinup Road from the development envelope and Figure 1 of MS 767
- a change in the description to the proposal in schedule 1 to remove the rehabilitation of the northern portion of Lot 2 Calinup Road
- the removal of the element rehabilitation of northern portion (previously cleared and quarried) of Calinup Road from Table 1 Key Proposal Characteristics of schedule 1.

The northern portion of Lot 2 was always intended by the proponent to become rural residential. The original referral described the future land use as designed to provide a substantial number of residential lots, despite the zoning being rural at the time (Martinick McNulty Pty Ltd 1999). This future land use of rural residential was reflected in Figure 1 of MS 767.

The second proposed change is to align the southern portion of the development envelope to the Landgate cadastral boundaries for the conservation covenant easement and the lot boundaries of Lot 2 Calinup Road. There are small gaps and overlaps with the largest being up to 3 metres on the eastern side. The cause of the small discrepancies is unknown but may be the result of the different ages and accuracies of the GPS coordinates, with the surveying of the conservation covenant occurring seven years after the MS 767 was issued.

The changes are sufficiently connected or related to the original proposal and as such are a revision of the original proposal and are capable of being approved under s. 45C of the EP Act.

3) Determination as to whether the original proposal has had or will have any detrimental effect on the environment and, if so, what.

In Bulletin 1194, the EPA considered the proposal was environmentally unacceptable as it could not be managed to meet the EPA's objectives in

relation to vegetation and flora, fauna and rehabilitation. The EPA concluded that the proposal should not be implemented.

The report and recommendations of the EPA were appealed by the proponent. Additional information was provided by the proponent during the appeals process. The EPA reviewed the additional information and restated its view that the proposal was environmentally unacceptable.

The Minister for the Environment allowed the appeal. The Minister noted that during the appeals process, the appellant identified areas of native vegetation on a nearby property it owns that could be protected as an offset under a conservation covenant. While the native vegetation was of a different vegetation complex than the vegetation proposed to be cleared, the Minister found it had merit because that vegetation complex has a lower extent and low representation in the conservation estate. The offset was also part of the ecological linkage that was to be cleared. The proponent also proposed the balance of the vegetation on Lot 2 be protected as an offset under a conservation covenant. The Minister noted that the proponent would progressively revegetate the sandpit following extraction of an area (Minister for the Environment 2006).

The Minister formed the view that the proposal is unlikely to have a significant impact on the environment provided appropriate conditions are put in place relating to rehabilitation of the sandpit during and after mining, and provided appropriate offsets are put in place (Minister for the Environment 2006).

Perpetual conservation covenants were placed on 16.55 ha of native vegetation on Lot 2 Calinup Road and 22.51 ha of native vegetation on Lot 268 Kilpatrick Road under section 30B of the *Soil and Land Conservation Act 1945*.

The proposal commenced in July 2015. The Compliance Branch of the Department of Water and Environmental Regulation advised there are no active non-compliances relating to MS 767 and MS 969.

4) Determination as to whether the change(s) to the original proposal might (in the Minister's opinion) have any detrimental effect on the environment and, if so, what.

Flora and vegetation

The first change to the proposal would remove the northern portion of Lot 2 from the proposal and with it the requirements of the MS conditions. Condition 9 (Rehabilitation) requires the preparation of a rehabilitation plan with separate criteria for the northern and southern portions of Lot 2, acknowledging that the historically cleared northern portion would not be able to meet the same standard as the southern portion. The rehabilitation criteria focus on flora and vegetation.

Separate objectives for the northern and southern sections were agreed to in the Sandpit Lot 2 Calinup Road Gelorup, Shire of Capel Rehabilitation Plan Revision 3. The objectives for the northern section are for vegetation species composition, vegetation density, vegetation condition, vegetation extent, and weed management. All the objectives have been met for the northern portion (MBS Environmental 2020). Five years of annual monitoring supports the achievement of the objectives.

Given the requirements of the rehabilitation condition for the northern portion have been completed, there would not be a detrimental effect on the environment by removing the obligation of the condition.

The removal of the northern portion from the proposal would remove the protection of the completed rehabilitation offered by MS 767 and MS 969. However, protection of the rehabilitation would remain through other mechanisms. The rehabilitation in the northern portion was sown, planted or propagated as required under the EP Act. Therefore, it is native vegetation as defined in s. 51A of the EP Act and has the same protections as other native vegetation in Western Australia.

Following the requested removal of the northern portion of Lot 2 from the proposal, a small amount of clearing of rehabilitated land in this area may occur for the future land use of rural residential. In 2019, the vegetation density in the northern rehabilitation was an average of 3,748 plants per hectare, compared to the objective of 500 plants per hectare (MBS Environmental 2020). Even with the clearing of some rehabilitated land in the northern portion, the vegetation density is likely to remain above the objective.

The EPA considers there would be no detrimental effects from the change on the retention of the rehabilitation.

The amendment to the development envelope in the southern portion is required to align the development envelope boundaries with the cadastral boundaries and is predominantly administrative in nature. It will result in minor changes to the area. The net increase to the development envelope is 0.028 ha or 0.12 per cent.

The vegetation type within the amended development envelope is the same as the original, as all the vegetation is the Karrakatta vegetation complex (MBS Environmental 2021). There will be no change in the amount of clearing authorised.

The EPA considers there is no reasonable possibility there will be a detrimental effect as a result of the amendment to the southern portion of the development envelopment due to there being no change to the amount or type of native vegetation cleared.

Terrestrial fauna

The northern portion is located within the Dalyellup/Gelorup/Crooked Brook ecological linkage. There was no requirement for the rehabilitation in this area to provide fauna habitat.

The EPA considers that there is no reasonable possibility there will be a detrimental effect as a result of the removal of the northern portion from the proposal due to its lack of value as fauna habitat.

The second change will remove 0.021 ha and add 0.049 ha, a net increase of 0.028 ha, to the development envelope. The amended development envelope is expected to provide the same fauna habitat value as the existing extraction area due to the changes being the same vegetation type (MBS Environmental 2021) and the same landscape units (MBS Environmental 2014). There will be no increase in the amount of fauna habitat to be cleared.

The EPA considers there is no reasonable possibility there will be a detrimental effect as a result of the amendment to the southern portion of the development envelopment due to there being no increase in the impact to fauna habitat.

Terrestrial environmental quality

Similarly to the flora and vegetation factor above, the terrestrial environmental quality for the first change relates to the rehabilitation of the northern portion. MS 767 condition 9-3(2)(b) states 'the rehabilitation shall include reearthworking and planting vegetation to achieve a stable land surface'. The reearthworking and planting has occurred (MBS Environmental 2020). The annual monitoring of the rehabilitation noted that no signs of erosion or landform instability were observed. The successful establishment of vegetation also provides evidence that the northern section is stable.

Given the requirements of the rehabilitation condition for the northern portion have been completed, there would not be a detrimental effect on the environment by removing the obligation of the condition.

The second change to the proposal would increase the development envelope by 0.028 ha. The activities that may pose a risk to terrestrial environmental quality will not change and the amount of disturbance will not change. The amended southern portion of the development envelope would still be subject to condition 9 of MS 767 for rehabilitation and impacts to terrestrial environmental quality would continue to be managed the same.

The EPA considers there is no reasonable possibility there will be a detrimental effect as a result of the amendment to the southern portion of the development envelopment due to there being no changes to the activities authorised or rehabilitation requirements.

5) Determination as to whether the detrimental effect (if any) which the change(s) might have on the environment is additional to, or different from, the detrimental effect (if any) which the original proposal has had or will have.

The detrimental effects that may occur to flora and vegetation, and terrestrial environmental quality are not additional to, or different from, the original proposal because the future rural residence was part of the original proposal.

There was no reasonable possibility there will be a detrimental effect on terrestrial fauna, as described in aspect 4 above.

6) Determination as to whether any detrimental effect which the change(s) to the original proposal might have on the environment, which is additional to, or different from, any detrimental effect which the original proposal has had or will have is, in the circumstances, significant.

Flora and vegetation

There is no reasonable possibility that any detrimental effect on flora and vegetation from the change will be significant as:

- The rehabilitation of the northern portion has been completed with five years of monitoring demonstrating the vegetation species composition, vegetation density, vegetation condition, vegetation extent, and weed management objectives have been met.
- The rehabilitation will be protected as native vegetation under the EP Act.
- The detrimental impact is not additional to, or different from, the original proposal because the end land use was always proposed to be rural residential.

Terrestrial environmental quality

There is no reasonable possibility that the detrimental effect on terrestrial environmental quality from the change will be significant as:

- Erosion has not been detected in the northern portion and the establishment of vegetation provides evidence of soil stability.
- The detrimental impact is not additional to, or different from, the original proposal because the end land use was always proposed to be rural residential.

Conclusion

The EPA considers that there is no reasonable possibility that the proposed changes to the proposal will have a significant detrimental effect on the environment in addition to, or different from, the effect of the original proposal.

The EPA considers the proposed changes may be approved under s. 45C of the EP Act.

2.2 Recommendations

Having assessed the proposed change to the proposal, the EPA submits the following recommendations to the Minister for Environment:

- 1. the EPA considers there is no reasonable possibility that the proposed changes will have a significant detrimental effect on the environment that is additional to, or different from, the effect of the original proposal.
- 2. the Minister may approve the changes to the proposal under s. 45C of the EP Act by signing Attachment 1 to MS 767 in Appendix A.

3 Requested changes to the conditions

In August 2020, the proponent requested the following changes to the implementation conditions of MS 767 and 969:

- to amend condition 9 to remove the requirement to rehabilitate the northern area on the basis the rehabilitation has been completed.
- to amend the terminology in condition 9 from the 'southern' and 'northern' areas
 to 'new clearing' and 'previously excavated' areas to remove references to the
 removed northern area. This will also differentiate the rehabilitation requirements
 of southern areas that were historically cleared and excavated compared to the
 areas cleared and excavated for implementation of the proposal.

In October 2020, the Minister for Environment requested that the EPA inquire into and report on the matter of changing the implementation conditions of MS 767 and 969 for the proposal.

This report satisfies the requirements of the EPA's inquiry.

3.1 Inquiry into changing the conditions

The EPA has discretion as to how it conducts this inquiry. In determining the extent and nature of this inquiry, the EPA had regard to information such as:

- the currency of its original assessment (Bulletin 1194, August 2005)
- the subsequent s. 46 inquiry (Report 1507, April 2014)
- MS 767 and MS 969
- appeal number 179 (Office of the Appeals Convenor 2006; Minister for the Environment 2006)
- information provided by the proponent including:
 - Lot 2 Calinup Road Gelorup Sand Extraction Ministerial Statement 767 and 969 Section 45C and 46 Applications (MBS Environmental 2020)
- advice from relevant decision-making authorities
- any new information regarding the potential impacts of the proposal on the environment.

EPA procedures

The EPA followed the procedures in the *Environmental Impact Assessment (Part IV Divisions 1 and 2) Administrative Procedures 2016* (State of Western Australia 2016) and the *Environmental Impact Assessment (Part IV Divisions 1 and 2) Procedures Manual* (EPA 2020a).

3.2 Inquiry findings

The EPA considered that the following are the key environmental factors relevant to the change to the conditions:

- Flora and vegetation
- Terrestrial environmental quality.

Flora and vegetation

The EPA's environmental objective for flora and vegetation is to protect flora and vegetation so that biological diversity and ecological integrity are maintained.

Conclusions from EPA Bulletin 1194

The EPA considered that the proposal had the potential to directly and indirectly impact flora and vegetation through the clearing of a regionally restricted vegetation complex, a major regional landscape feature and a regional ecological linkage.

The proposal would clear 18.87 ha of the Karrakatta Central and South Vegetation Complex. The area of this vegetation complex remaining on the Swan Coastal Plain is 28.7 per cent, which is below the target of protecting 30 per cent extent of ecological communities.

Gelorup Hill is a regional landscape feature and the proposal would clear the eastern slopes of Gelorup Hill.

The proposal area is part of the Dalyellup/Gelorup/Crooked Brook ecological linkage. This ecological linkage was identified in the EPA's report on the Greater Bunbury Regional Scheme as a priority for retention and protection (EPA 2003).

The proponent committed to preparing a rehabilitation plan. The EPA considered the re-establishment of the existing vegetation complex on the site after sand excavation would be extremely difficult. The EPA noted that previous rehabilitation on the site was inadequate and the proponent has not been able to provide evidence that the proposed rehabilitation will be successful.

The EPA concluded that the proposal does not meet the EPA's objectives for Vegetation and Flora or Rehabilitation.

Conclusions from Appeal Number 179 of 2005

The EPA's recommendation in Bulletin 1194 were appealed by the proponent on several grounds. During the appeals process, the proponent provided further information on rehabilitation of other projects on similar soil types in Perth and identified potential offsets to address any impacts from the proposal.

The then Minister for the Environment allowed the appeal.

The then Minister agreed with the EPA that the vegetation proposed to be cleared had a number of environmental values, including that the vegetation complex has

less than 30 per cent remaining. However, the Minister noted that the proposed offset of property east of the proposal contained a vegetation community that also has less than 30 per cent extent remaining and very little (1 per cent) in secure reserve. The offset site is also likely to provide value as part of the Dalyellup/Gelorup/Crooked Brook ecological linkage.

The then Minister also noted that the proponent proposes to covenant the remaining vegetation on Lot 2, as well as rehabilitate the sandpit progressively over the life of the extraction. The rehabilitation would use local species and include the former unrehabilitated site north of Calinup Road.

The then Minister requested draft conditions be prepared for all relevant aspects of the proposal, and consultation with decision-making authorities and the proponent be undertaken on these conditions.

Condition 9 (Rehabilitation) of MS 767 was imposed to ensure rehabilitation of the southern and northern portions of Lot 2, while acknowledging the differences between them through separate rehabilitation criteria.

Assessment of the requested change to conditions

The EPA considered that the *Environmental Factor Guideline – Flora and Vegetation* (EPA 2016a) is the current environmental policy and guidance relevant to its assessment of the proposal for this factor.

The first requested change to conditions was to remove the requirement to rehabilitate the northern area on the basis the rehabilitation has been completed and the northern area is requested to be removed from the proposal as described in section 3.1 of this report.

Rehabilitation on the northern portion of Lot 2 Calinup Road was undertaken between 1999 and 2002, during the EPA assessment of the proposal. This involved re-establishing landforms, planting and seeding. In 2013, areas adjacent to Calinup Road were rehabilitated following earthworks to lower and upgrade Calinup Road. This involved recontouring and planting.

A rehabilitation plan was required by condition 9-1 with the principal objective of ensuring progressive rehabilitation of the northern and southern portions of Lot 2. Sandpit on Lot 2 Calinup Road Gelorup Rehabilitation Plan Rev 3 (the plan) was approved on 14 September 2017 and is the current version of the plan.

The plan has completion criteria and interim targets for vegetation. Five years of monitoring demonstrates these completion criteria and interim targets have been met for the northern portion.

The average stem density across the northern portion is over 3,000 native plants per ha. This exceeds the objective of an average density of 500 plants per ha. The vegetation density varies across the northern portion with low vegetation density in the central flats. The EPA considers this is acceptable, noting the northern portion allows for building envelopes and access roads.

The species composition in the northern portion meets the species composition objective of 80 per cent of key species being present (with 92 per cent of key species being present). The vegetation condition, vegetation extent and weed management objectives were also demonstrated to be achieved through five years of monitoring reports.

The EPA considers the objectives for rehabilitation of the northern portion, as required by condition 9, have been met.

The second requested change to conditions was a change to the wording of conditions 9-2 and 9-3 of MS 767 and condition 9-3 of MS 969 in how the areas to be rehabilitated are referred to. References to the 'northern portion' of the proposal would be removed from conditions because the northern portion is proposed to be removed from the development envelope through a change to proposal discussed in section 3.1 of this report. The southern portion will continue to be rehabilitated.

There were areas within the southern portion that were excavated prior to the proposal. The terms 'new clearing' and 'previously excavated' areas are proposed to be used to differentiate the rehabilitation requirements of areas that were historically cleared and excavated compared to the areas cleared and excavated for implementation of the proposal.

The plan already uses the term 'previously excavated areas' to account for the northern portion and the areas in the southern portion that were cleared and excavated prior to the proposal.

The parts of the southern portion of Lot 2 near Calinup Road that were cleared and excavated prior to the proposal are shown in Figure 1. The aerial imagery shows those areas are the same condition as the northern portion. Those areas will face the same challenges of starting with a degraded condition that the northern portion did, compared to the rest of the southern portion which will have access to fresh topsoil. The EPA therefore considers it reasonable that previously excavated areas in the southern portion have the same rehabilitation requirements as the northern portion.

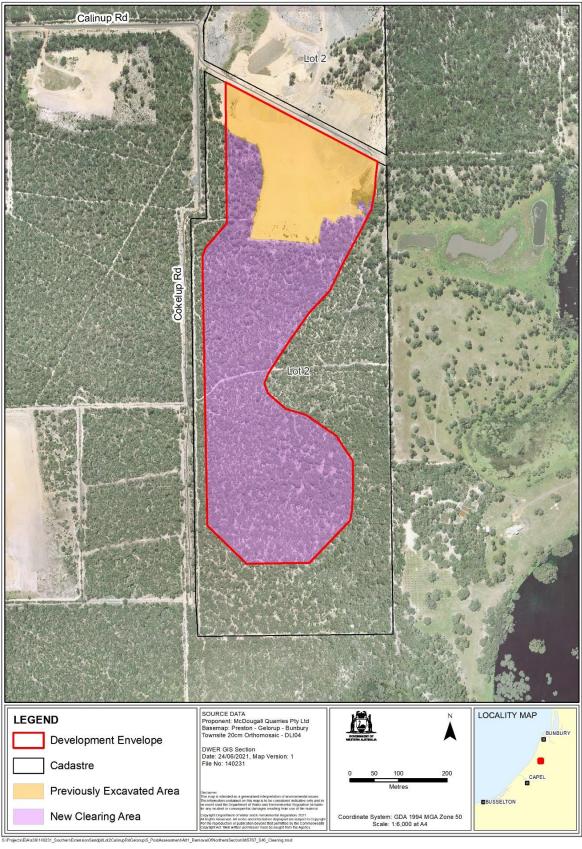


Figure 1: The parts of the southern portion of Lot 2 near Calinup Road that were cleared and excavated prior to the proposal. The imagery is from 2004, when the proposal was under assessment by the EPA.

Terrestrial environmental quality

The EPA's environmental objective for terrestrial environmental quality is to maintain the quality of land and soils so that environmental values are protected.

Conclusions from EPA Bulletin 1194

The EPA considered that the rehabilitation of the proposal would not be able to achieve a stable and functioning landform which is consistent with the surrounding landscape and other environmental values. The proponent was not able to provide evidence that rehabilitation proposed would be successful. Submissions to the EPA expressed concern about the risks of erosion of Gelorup Hill from the proposal. The EPA concluded that the proposal did not meet the EPA's objective for rehabilitation.

Conclusions from Appeal Number 179 of 2005

The EPA's recommendations in Bulletin 1194 were appealed by the proponent on several grounds. During the appeals process, the proponent provided further information on rehabilitation of other projects on similar soil types in Perth and committed to rehabilitating the former sand pit north of Calinup Road, which was not part of the proposal, as well has using best practice techniques to rehabilitate the sand pit site. The then Minister for the Environment allowed the appeal.

To manage erosion and ensure stability of the rehabilitation of the former sand pit north of Calinup Road, condition 9-3(2)(b) of MS 767 states 'the rehabilitation shall include re-earthworking and planting vegetation to achieve a stable land surface'.

Assessment of the requested change to conditions

The EPA considered that *Environmental Factor Guideline – Terrestrial Environmental Quality* (EPA 2016b) is the current environmental policy and guidance relevant to its assessment of the proposal for this factor.

The request to change the conditions to remove the requirement to rehabilitate the northern area will remove the requirement of condition 9-3(2)(b) of MS 767 that 'the rehabilitation shall include re-earthworking and planting vegetation to achieve a stable land surface'. As part of the inquiry, the proponent provided information on the stability of the northern portion.

In 2013, the section of Calinup Road between the northern and southern portions of Lot 2 was lowered. The landform adjacent to the lowered road was re-shaped to a maximum of 1:4 slopes, as described in the referral to the EPA and to the requirements of the Shire of Capel.

The proponent determined no other earthworks were necessary in the northern portion as the final slopes were no steeper than a 1:4 ratio. The establishment and persistence of native vegetation, as demonstrated by five years of monitoring, supports the stability of the landform. No signs of erosion or landform instability were observed during the annual rehabilitation monitoring.

The EPA considers the objective for rehabilitation of the northern portion that relates to terrestrial environmental quality has been met and the condition can be removed.

3.3 Conclusions and recommendations

Change to condition 9 - removal of northern portion

The proponent has requested a change condition 9 to remove the requirement to rehabilitate the northern portion of Lot 2 on the basis the rehabilitation has been completed. The northern area is subject to a request to remove it from the proposal, also on the basis that the rehabilitation has been completed. The EPA considers the rehabilitation requirements in the northern portion have been met and it is appropriate to change condition 9.

Change to condition 9 – change of terminology

The proponent has requested a change to the terminology in condition 9 from the 'southern' and 'northern' areas/portions to 'new clearing' and 'previously excavated' areas. This will delete references to the northern area that will become obsolete following the recommendation that the northern portion be removed from the proposal. The change will also differentiate the rehabilitation requirements of southern areas that were historically cleared and excavated compared to the areas cleared and excavated for implementation of the proposal. The EPA considers it is appropriate to amend the condition.

Conclusions

In relation to environmental factors affected by the proposed change, and considering the information provided by the proponent and relevant EPA policies and guidelines, the EPA concludes that:

- The proponent has met the objective to rehabilitate the northern portion of Lot 2, as required by condition 9 of MS 767 and MS 969. The proponent provided evidence of this, with five years of monitoring that demonstrated the agreed criteria for vegetation have been met.
- The southern portion of Lot 2 will continue to be rehabilitated. The EPA accepts that some areas of the southern portion were disturbed prior this proposal. It is therefore appropriate to differentiate the objectives and criteria for rehabilitation into areas that were 'previously excavated' for previous disturbance and 'new clearing' for clearing the proponent carried out in the implementation of this proposal.
- There is no significant new or additional information that changes the conclusions reached by the EPA under any of the relevant environmental factors since the proposal was assessed by the EPA in Bulletin 1194 (August 2005).
- No new significant environmental factors have arisen since the EPA's original assessment of the proposal.

Recommendations

Having inquired into this matter, the EPA submits the following recommendations to the Minister for Environment under s. 46 of the EP Act:

1. While retaining the environmental requirements of the original conditions of MS 767 and 969, it is appropriate to change implementation conditions 9-2 and 9-3

- of MS 767 and condition 9-3 of MS 969, and replace them with new implementation conditions.
- 2. After complying with s. 46(8) of the EP Act, the Minister may issue a statement of decision to change conditions 9-2 and 9-3 of MS 767 and condition 9-3 of MS 969 in the manner provided for in the attached recommended statement (Appendix B).

Appendix A: Recommended Attachment 1 to Ministerial Statement 767

Attachment 1 to Ministerial Statement 767

Change to proposal approved under section 45C of the Environmental Protection Act 1986

This Attachment replaces Schedule 1 of Ministerial Statement 767

Proposal: Southern Extension of Sandpit, Lot 2 Calinup Road, Gelorup, Shire

of Capel

Proponent: McDougall Quarries Pty Ltd

Changes:

Remove the northern portion of Lot 2 Calinup Road from the proposal

 Amend the development envelope in the southern portion of Lot 2 Calinup Road to correctly align with cadastre

Table 1: Summary of the Proposal

Proposal Title	Southern Extension of Sandpit, Lot 2 Calinup Road, Gelorup, Shire of Capel
Short Description	The clearing of native vegetation and excavation of sand at the southern portion of Lot 2, Calinup Road, Gelorup (Certificate of Title volume 1356 folio 756). The total area of native vegetation being cleared will not exceed 19 hectares. The area to be cleared will be progressively rehabilitated with local native vegetation.
	The location of the native vegetation to be cleared is indicated in Figure 1 attached. The area to be quarried will be progressively rehabilitated using local native plant species.
	In addition, remedial earthworks and rehabilitation will be carried out on the previously excavated areas as indicated in Figure 1. —northern portion of Lot 2, Calinup Road. A total area of approximately 16 hectares will be rehabilitated at the northern end of Lot 2, Calinup Road. The area to be rehabilitated in the northern portion of Lot 2 Calinup Road is indicated in pink in Figure 1.
	The proposal also includes the placing of perpetual conservation covenants on the above land and Lot 268 Kilpatrick Road Gelorup (Certificate of Title volume 1319 folio 4) as described in Figures 1 and 2.

Table 2: Location and authorised extent of physical and operational elements

Element	Previously Authorised Extent	Authorised Extent
Project life (active sand extraction and quarrying)	Approximately 20 years (Note: rehabilitation works may extend beyond the period of active sand extraction)	Approximately 20 years (Note: rehabilitation works may extend beyond the period of active sand extraction)
Land tenure	Privately owned land	Privately owned land
Maximum area of clearing of native vegetation	19 hectares	19 hectares
Rate of Extraction	200,000 bank cubic metres per year (upper limit)	200,000 bank cubic metres per year (upper limit)
Infrastructure / ancillary equipment / facilities	 Dry screen and conveyor Front-end loader(s) for excavation and loading of haulage trucks Crib room / chemical toilet Dieback wash-down facilities 	 Dry screen and conveyor Front-end loader(s) for excavation and loading of haulage trucks Crib room / chemical toilet Dieback wash-down facilities
Sand-pit depth	Not less than 2 metres above the historical maximum watertable level or less than 20 metres AHD, which ever is the greater.	Not less than 2 metres above the historical maximum watertable level or less than 20 metres AHD, which ever is the greater.
Clearing and Excavation staging	4 hectare clearing and excavation blocks (maximum)	4 hectare clearing and excavation blocks (maximum)
Rehabilitation – southern portion	The 19 hectare area to be cleared and quarried will be progressively rehabilitated with local native plant species.	The 19 hectare area to be cleared and quarried will be progressively rehabilitated with local native plant species.
Sandpit access	Via existing Calinup Road	Via existing Calinup Road
Rehabilitation of northern (previously cleared and quarried) portion of Lot 2 Calinup Road Rehabilitation of previously cleared and quarried areas of Lot 2 Calinup Road	Remedial earthworks to be carried out and the area to be rehabilitated with local native plant species. The total area to be rehabilitated is approximately 16 hectares.	Remedial earthworks to be carried out and the area to be rehabilitated with local native plant species.
Conservation covenants	Perpetual conservation covenants will be placed on the following land before	Perpetual conservation covenants will be placed on the following land before

Element	Previously Authorised Extent	Authorised Extent
	clearing or excavation	clearing or excavation
	commences on Lot 2:	commences on Lot 2:
	 Lot 2 Calinup Road 	 Lot 2 Calinup Road
	 Lot 268 Kilpatrick Road 	 Lot 268 Kilpatrick Road

Note: Text in **bold** and strikethrough in Table 2 indicates a change to the proposal.

Table 3: Abbreviations

Abbreviation	Term
AHD	Australian Height Datum

Figures (attached)

- Figure 1 Location of Lot 2 Calinup Road showing areas to be rehabilitated (previously excavated northern and new clearing areas southern portions of Lot 2) and the adjacent native bushland which is to be protected in perpetuity by a conservation covenant (exact boundaries of the covenant area to be specified in the Conservation Covenant Agreement).
- Figure 2 Location of additional area of native bushland to be protected in perpetuity through a conservation covenant (exact boundaries of the covenant area to be specified in the Conservation Covenant Agreement).

Hon. Amber-Jade Sanderson MLA	١
MINISTER FOR ENVIRONMENT	

Approval date:

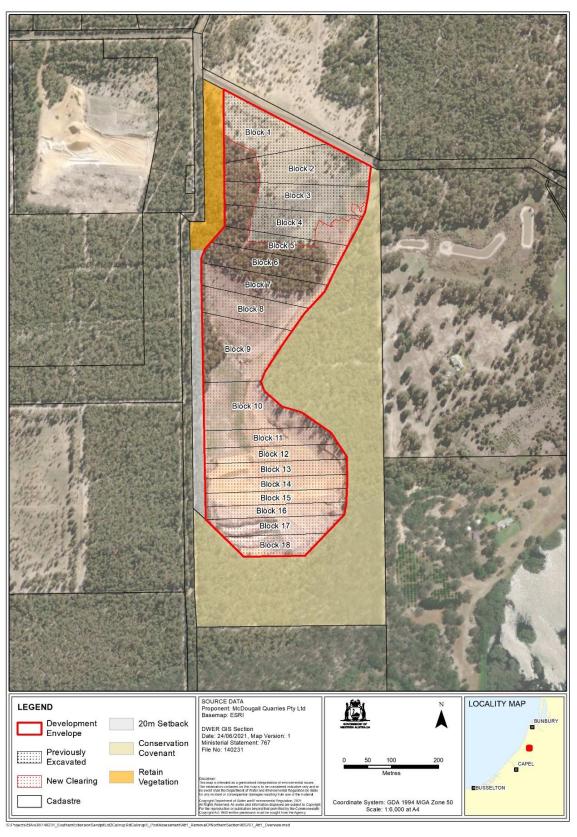


Figure 1: Location of Lot 2 Calinup Road showing development **envelope** area, areas to be rehabilitated (**previously excavated and new clearing areas** northern and southern portions of Lot 2) and the adjacent native bushland which is to be protected in perpetuity by a conservation covenant (exact boundaries of the covenant area to be specified in the Conservation Covenant Agreement).

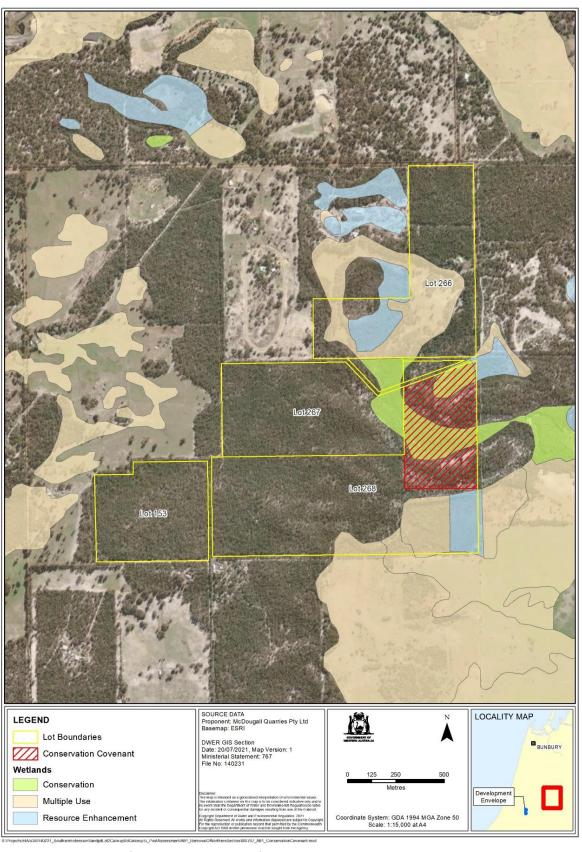


Figure 2: Location of additional area of native bushland to be protected in perpetuity through a conservation covenant (exact boundaries of the covenant area to be specified in the conservation covenant instrument).

All coordinates are in metres, listed in Map Grid of Australia Zone 50 (MGA Zone 50), datum of Geocentric Datum of Australia 1994 (GDA94).

Coordinates defining the development envelope are held by the Department of Water and Environmental Regulation, Document Reference Number DWERDT470200.

Appendix B: Recommended conditions

STATEMENT TO CHANGE THE IMPLEMENTATION CONDITIONS APPLYING TO A PROPOSAL

(Section 46 of the Environmental Protection Act 1986)

SOUTHERN EXTENSION OF SANDPIT, LOT 2 CALINUP ROAD, GELORUP, SHIRE OF CAPEL

Proposal:

The clearing of native vegetation and excavation of sand at the southern portion of Lot 2, Calinup Road, Gelorup (Certificate of Title volume 1356 folio 756). The total area of native vegetation being cleared will not exceed 19 hectares. The area to be cleared will be progressively rehabilitated with local native vegetation.

The location of the native vegetation to be cleared is indicated in Figure 1 attached. The area to be quarried will be progressively rehabilitated using local native plant species.

In addition, remedial earthworks and rehabilitation will be carried out on the previously excavated areas as indicated in Figure 1.

The proposal also includes the placing of perpetual conservation covenants on the above land and Lot 268 Kilpatrick Road Gelorup (Certificate of Title volume 1319 folio 4) as described in Figures 1 and 2.

Proponent: McDougall Quarries Pty Ltd

Australian Company Number 635 264 603

Proponent address: 87 Keel Retreat

PORT GEOGRAPHE WA 6280

Report of the Environmental Protection Authority: 1708

Preceding Statements relating to this proposal: 767, 969

Pursuant to section 45 of the *Environmental Protection Act 1986*, as applied by section 46(8), it has been agreed that the implementation conditions set out in Ministerial Statement No. 767 and 969, be changed as specified in this Statement.

Conditions 9-2 and 9-3 of Ministerial Statement 767 are deleted and replaced with:

9 Rehabilitation

- 9-2 The principal objective of the Rehabilitation Plan is to ensure there is progressive rehabilitation of:
 - (1) the southern portion of Lot 2 which is to be cleared for excavation; and
 - (2) the previously excavated portion of Lot 2 (see Attachment 1, Figure 1 of Ministerial Statement 767).
- 9-3 The Rehabilitation Plan shall address short and long term activities, and shall meet the following criteria:
 - (1) In relation to the new clearing area:
 - (a) the area of rehabilitation following decommissioning shall be not less than the area cleared for the implementation of the proposal;
 - (b) the vegetation shall have comparable plant species composition to that which occurred prior to clearing and excavation;
 - (c) the vegetation shall be self-sustaining and composed of plant species native to the local area; and
 - (d) the vegetation shall have comparable densities and abundances of plant species to those which occurred prior to clearing and excavation.
 - (2) In relation to the previously excavated portion of Lot 2:
 - (a) the rehabilitation shall include re-earthworking and planting vegetation to achieve a stable land surface;
 - (b) the vegetation shall be self-sustaining and composed of plant species native to the local area; and
 - (c) in recognition of the degraded state of the previously excavated areas, the objective is not to reinstate native vegetation as it was prior to clearing, but to establish upper storey vegetation and understorey vegetation where possible.

Condition 9-3(2)(a) of Ministerial Statement 969 is deleted.

Appendix C: Identified decision-making authorities

The decision-making authorities (DMAs) in the table below have been identified for the purposes of s. 45 as applied by s. 46(8) of the *Environmental Protection Act* 1986.

Decision-Making Authority	Legislation (and Approval)
Minister for Aboriginal Affairs	Aboriginal Heritage Act 1972 (s. 18 clearances)
Commissioner of Soil and Land Conservation	Soil and Land Conservation Act 1945
Chief Executive Officer, Shire of Capel	Planning and Development Act 2005

Note: In this instance, agreement is only required with DMA 1, since this DMA is a Minister.

References

EPA 2003, Greater Bunbury Region Scheme – Report and Recommendations of the Environmental Protection Authority (Bulletin 1108). Environmental Protection Authority, Perth, WA.

EPA 2016a, *Environmental Factor Guideline – Flora and Vegetation*, Environmental Protection Authority, Perth, WA.

EPA 2016b, Environmental Factor Guideline – Terrestrial Environmental Quality, Environmental Protection Authority, Perth, WA.

EPA 2020a, Environmental Impact Assessment (Part IV Division 1 and 2) Procedures Manual, Environmental Protection Authority, Perth, WA.

EPA 2020b, Statement of Environmental Principles, Factors and Objectives, Environmental Protection Authority, Perth, WA.

Martinick McNulty Pty Ltd 1999, Lot 166, Calinup Road Shire of Capel Application for Extractive Industries Licence.

MBS Environmental 2020, Lot 2 Calinup Road Gelorup Sand Extraction Ministerial Statement 767 and 969 Section 45c and 46 Applications, West Perth, WA. Minister for the Environment 2006, Appeal Decision Summary Appeal Number 179 of 2005, Office of the Appeals Convenor, Perth, WA.

MBS Environmental 2021, RE: Southern Extension of Sandpit, Lot 2 Calinup Road, Gelorup, Shire of Capel Proposal, email dated 22 June 2021.

Minister for the Environment 2006, *Appeal Decision Summary Appeal Number 179 of 2005*, Office of the Appeals Convenor, Perth, WA.

Office of the Appeals Convenor 2006, Report to the Minister for the Environment Appeal Against Report and Recommendation of the Environmental Protection Authority in Relation to Extension of Sand Pit Lot 2 Calinup Road, Gelorup, Shire of Capel, Perth, WA.

State of Western Australia 2016, Western Australian Government Gazette, No. 223, 13 December 2016.