



**THE PROPOSED MIDVAAL BRICK MANUFACTURING
FACILITY, LOCATED IN THE TOWN OF MEYERTON,
GAUTENG PROVINCE.**

**Final Basic Assessment Report and Environmental Management
Programme**

GDARD Reference Number: GAUT 002/21-22/E2872

November 2021

COMPILED BY:

Anne-Mari White
MPG Environmental Consultant Pty Ltd
P.O. Box 293
Ngodwana
1209
Cell: 060 878 1591
E-mail: enviro@mpgenviro.co.za

Basic Assessment Report in terms of the National Environmental Management Act, 1998 (Act No. 107 of 1998), as amended, and the Environmental Impact Assessment Regulations, 2014 (Version 1)

Kindly note that:

1. This **Basic Assessment Report** is the standard report required by GDARD in terms of the EIA Regulations, 2014.
2. This application form is current as of 8 December 2014. It is the responsibility of the EAP to ascertain whether subsequent versions of the form have been published or produced by the competent authority.
3. **A draft Basic Assessment Report must be submitted, for purposes of comments within a period of thirty (30) days, to all State Departments administering a law relating to a matter likely to be affected by the activity to be undertaken.**
4. **A draft Basic Assessment Report (1 hard copy and two CD's) must be submitted, for purposes of comments within a period of thirty (30) days, to a Competent Authority empowered in terms of the National Environmental Management Act, 1998 (Act No. 107 of 1998), as amended to consider and decide on the application.**
5. Five (5) copies (3 hard copies and 2 CDs-PDF) of the final report and attachments must be handed in at offices of the relevant competent authority, as detailed below.
6. The report must be typed within the spaces provided in the form. The size of the spaces provided is not necessarily indicative of the amount of information to be provided. The report is in the form of a table that can extend itself as each space is filled with typing.
7. Selected boxes must be indicated by a cross and, when the form is completed electronically, must also be highlighted.
8. An incomplete report may lead to an application for environmental authorisation being refused.
9. **Any report that does not contain a titled and dated full colour large scale layout plan of the proposed activities including a coherent legend, overlain with the sensitivities found on site may lead to an application for environmental authorisation being refused.**
10. The use of "not applicable" in the report must be done with circumspection because if it is used in respect of material information that is required by the competent authority for assessing the application, it may result in the application for environmental authorisation being refused.
11. No faxed or e-mailed reports will be accepted. Only hand delivered or posted applications will be accepted.
12. Unless protected by law, and clearly indicated as such, all information filled in on this application will become public information on receipt by the competent authority. The applicant/EAP must provide any interested and affected party with the information contained in this application on request, during any stage of the application process.
13. Although pre-application meeting with the Competent Authority is optional, applicants are advised to have these meetings prior to submission of application to seek guidance from the Competent Authority.

DEPARTMENTAL DETAILS

Gauteng Department of Agriculture and Rural Development
Attention: Administrative Unit of the of the Environmental Affairs Branch
P.O. Box 8769
Johannesburg
2000

Administrative Unit of the Sustainable Utilisation of the Environment (SUE) Branch
Ground floor, Umnotho House, 56 Eloff Street, Johannesburg
Email Address: bongani.shabangu@gauteng.gov.za

Administrative Unit telephone number: (011) 240 3377/3051
Department central telephone number: (011) 240 2500

(For official use only)

NEAS Reference Number:						
File Reference Number:						
Application Number:						
Date Received:						

If this BAR has not been submitted within 90 days of receipt of the application by the competent authority and permission was not requested to submit within 140 days, please indicate the reasons for not submitting within time frame.

Not Applicable

Is a closure plan applicable for this application and has it been included in this report?

No

if not, state reasons for not including the closure plan.

There are currently no plans to decommission

Has a draft report for this application been submitted to a competent authority and all State Departments administering a law relating to a matter likely to be affected as a result of this activity?

YES

Is a list of the State Departments referred to above attached to this report including their full contact details and contact person?

Yes

If no, state reasons for not attaching the list.

Refer to Appendix E8 – IAP Register

Have State Departments including the competent authority commented?

☐

If no, why?

No, no comments were received from any State Department, however, various comments were received from the Glen Douglas Mine Forum Committee and other Interested and Affected Parties.

Please refer to the Comments and Response Report in Appendix E6

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PUBLIC REVIEW OF THE DRAFT BASIC ASSESSMENT REPORT

The Draft Basic Assessment Report (BAR) has been prepared by Afrimat Limited and has been reviewed by MPG Environmental Consultants to comply with Regulation 13 (2) of the National Environmental Management Act 107, of 1998 (NEMA 107, of 1998), Environmental Impact Assessment (EIA) Regulations 2014, as amended in 2017, in order to assess the potential environmental impacts associated with the Proposed Midvaal Brick Manufacturing Facility, located in the town of Meyerton, Gauteng Province.

The report was made available for public review for 30-day review period from **01 June 2021 to 01 July 2021**.

Following the distribution period, Ms. Ntsanko Ndlovu resigned from Afrimat, and MPG Environmental Consultants were appointed to finalise the Environmental Assessment process. Three other specialist assessments were requested by the stakeholders and I&AP's during the initial consultation period, namely, Dust Assessment, Noise and Vibration Assessment and Traffic Assessment.

These additional studies have been received by the 20th of November 2021 and additional consultations were undertaken with the Glen Douglas Mine Community Forum, as well as the community from Daleside on 23 and 29 November 2021 respectively. During these consultations, the findings of the additional assessment undertaken was shared with the attendees.

The Final Basic Assessment Report has been revised to include the additional assessments undertaken and all stakeholders and I&AP's will be provided with a copy of the revised report. Any additional comments received will be submitted to the GDARD directly for consideration.

Environmental Assessment Practitioner (EAP)

Name: Ms. Anne-Mari White

MPG Environmental Consultants (Pty) Ltd

Cell: 060 878 1591

E-mail: enviro@mpgenviro.co.za

1. SECTION A: ACTIVITY INFORMATION

1.1. PROPOSAL OR DEVELOPMENT DESCRIPTION

Project title (must be the same name as per application form):

1.1.1 PROJECT TITLE

The proposed Midvaal Brick Manufacturing Facility, located in the town of Meyerton, Gauteng Province.

1.1.2 PROJECT BACKGROUND

From the beginning of civilization bricks have been used as an important material for the building of houses and other infrastructure; influencing economic progress. Rapid population growth and urbanization have created an increasing demand for residential, commercial, industrial, public buildings and other infrastructure in South Africa. For this increasing demand, bricks are the most productive construction materials for both urban and rural areas. The brick making sector influences the country's economic growth by contributing to the country's gross domestic product (GDP) and generating employment for local communities.

SA Block (Pty) Ltd, a subsidiary of Afrimat Limited, intends to expand its production capacity on a new premises closer to its customer base. SA Block is a brick making plant which mainly focuses on the production of clinker bricks. Clinker is a product derived from the burning of coal and the bricks made of clinker are considered to be light in weight when compared to regular cement bricks. SA Block produces SABS approved bricks that are mainly used for the building of housing (residential and commercial) developments.

SA Block has received permission from Glen Douglas mine, another subsidiary of Afrimat Limited located on the Remaining Extent of Portion 3 of the farm Witkoppie 373 IR, to erect a brick making plant on their property, outside their mining area. SA Block will erect an automated brick manufacturing plant under a 1500m² roof and have a small storage yard (+-5000m²) outside with temporary building structures (100m²) as offices, bathroom facilities and stores.

There is also a possibility to expand the operation in future to include a ready-mix concrete batching facility. It was previously noted that SA Block (Pty) Ltd could also include the operation of a basic asphalt plant within the proposed project site, however, since the distribution of the Draft Basic Assessment Report, this proposal has been removed and will no longer be investigated.

SA Block wants to grow in the business not only for the increase of production and income, but to create sustainable job opportunities to increase to the GDP of the Midvaal Local Municipality. They want to sell their bricks at market related prices to contribute to the economic upliftment of the Midvaal community.

SA Block wants to produce SABS approved stock bricks and maxi bricks used in residential construction, as well as paving bricks. The planned output will be 120,000 units per shift or an average of 2,500,000 per month.

The bricks will be made of crushed stone dust from the Glen Douglas mine and cement mixed with water. The cement bricks will be produced in two different sizes which will be called stock bricks and block bricks. They are made by mixing cement and water. Cement bricks are mainly used for the building of houses, but is not as cost effective and attractive as using the crushed stone dust. When the cement bricks are used for

building purposes they should be plastered as cement walls are prone to crack in severe weather conditions. The brick production process will be an automated process and is described in Figure 1 below.

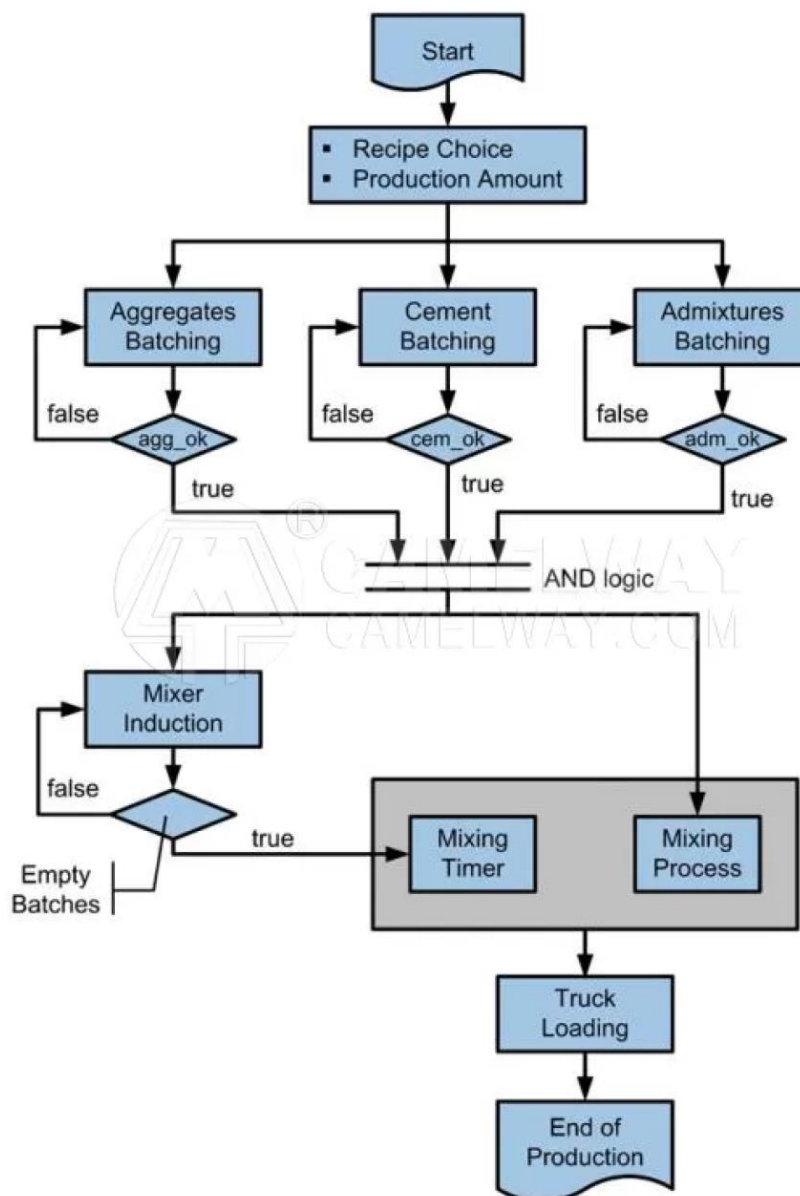


Figure 1: Process flow of the brick making plant

The figure below is a schematic representation of a fully automated brick plant that SA Block intends to erect. The production will be taking place under a roof and therefore most environmental noise will be contained inside the building.

Fully automatic block production line



- | | | |
|------------------------------------|------------------------------|--------------------------|
| 1.Cement Silo | 11.Belt Conveyor for Pigment | 21.Pallet Turnover |
| 2.Batching Machine | 12.Block Making Machine | 22.Cuber |
| 3.Wheel Loader | 13.Color Feeding System | 23.Pre-cuber Device |
| 4.Screw Conveyor | 14.Control Room | 24.Block Package Machine |
| 5.Cement Scale | 15.Green Block Conveyor | 25.Film Wrap Machine |
| 6.Pigment Mixer | 16.Elevator | 26.Pallet Return Device |
| 7.Base Material Mixer | 17.Finger Cart | 27.Industry Overpass |
| 8.PLC Controller | 18.Lowerator | 28.Pallet Storage Device |
| 9.Mixing Platform | 19.Lower Board Conveyor | 29.Forklift |
| 10.Belt Conveyor for Base Material | 20.Pallet Cleaning Machine | 30.Curing Room |

Figure 2: Example of a schematic representation of a fully automatic block production line

1.1.3 PROJECT LOCALITY

The proposed Midvaal Block Manufacturing plant will be located on the Remaining Extent of Portion 3 of the farm Witkoppie 373 IR. The study area is situated along Bokmakiere Road, approximately 0.6 km southwest of Witkopdorp (Daleside), and approximately 2.5 km northeast of Highbury. The study area is located approximately 1 km east of the R59 Provincial Route and 0.8 km southwest of the R557 Regional Route. The study area neighbours the northern section of the Glen Douglas Dolomite Mine.



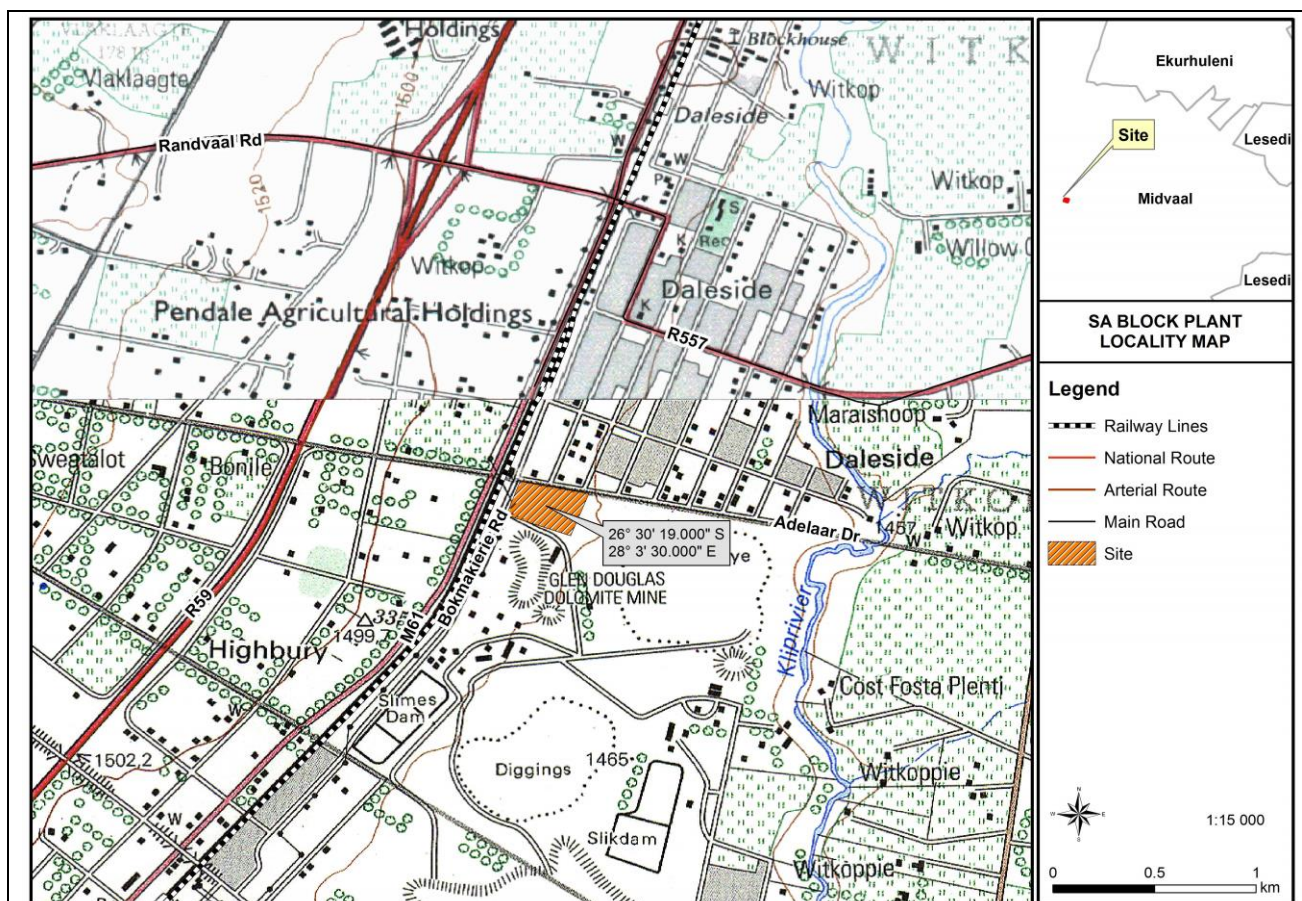


Figure 4: Locality Map of the proposed project

1.1.4 REQUIREMENT FOR A BASIC ASSESSMENT PROCESS

In terms of sections 24(2) and 24D of the National Environmental Management Act (Act No. 107 of 1998), as read with the Environmental Impact Assessment (EIA) Regulations of GNR 982 to R985 (as amended 07 April 2017 (GNR 326)), a Basic Assessment process is required for the proposed project. Table 2 contains the listed activities in terms of the EIA Regulations and includes a description of those project activities which relate to the applicable listed activities.

Listed activities	Description of project activity that triggers listed activity
Residential, retail, recreational, tourism, ±commercial or institutional developments of 1 000 square meters or more, on land previously used for mining or heavy industrial purposes; — excluding — (i) where such land has been remediated in terms of part 8 of the National Environmental Management: Waste Act, 2008 (Act No. 59 of 2008) in which case the National Environmental Management: Waste Act, 2008 applies; or (ii) where an environmental authorisation has been obtained for the decommissioning of such a mine or industry in	This is a commercial development that will be located on area that will be more than 1 000 square meters that has been under a mining area and is currently excluded by Glen Douglas mine.

terms of this Notice or any previous NEMA notice; or (iii) where a closure certificate has been issued in terms of section 43 of the Mineral and Petroleum Resources Development Act, 2002 (Act No. 28 of 2002) for such land.	
27. The clearance of an area of 1 hectare or more, but less than 20 hectares of indigenous vegetation, except where such clearance of indigenous vegetation is required for— (i) the undertaking of a linear activity; or (ii) maintenance purposes undertaken in accordance with a maintenance management plan	The proposed brick plant will require a clearance of natural vegetation of ±5ha accommodate the automated brick plant and infrastructure such as ablutions, office and brick lay down area

The above listed activities have triggered a Basic Assessment Process, these activities may not commence without an environmental authorization from the competent Authority. The aim of the Environmental Impact Assessment is to ensure that:

- The potential environmental impacts and risks associated with the proposed project are taken into consideration
- Public Participation Process is conducted i.e. to afford any Interested and or Affected parties (I&AP) sufficient opportunity: to provide comments
- Sufficient information is provided to decision makers in order to ensure an informed decision making.

The nature and extent of the proposed project are explored in more detail in this Basic Assessment Report. This report has been compiled in accordance with the requirements of the EIA Regulations and includes details of the activity description; the site, area and property description; the public participation process; the impact assessment; and the recommendations of the Environmental Assessment Practitioner.

1.1.5 DETAILS OF ENVIRONMENTAL ASSESSMENT PRACTITIONER AND EXPERTISE TO CONDUCT THE BASIC ASSESSMENT

Ms Ntsanko Ndlovu undertook the initial phases of the Basic Assessment process as she was employed by Afrimat (Pty) Ltd as the lead Environmental Practitioner to undertake the necessary environmental authorisation process, of which SA Block is a subsidiary. Ms. Ndlovu resigned from Afrimat at the end of August 2021. MPG Environmental Consultants were initially employed to only review the EIA process and documentation in order to ensure that the process complies with Regulation 13 (2) of the National Environmental Management Act 107, of 1998 (NEMA 107, of 1998). However, following the resignation of Ms. Ndlovu, MPG Environmental Consultants were appointed to conclude the process.

Ntsanko is a certified Environmental Assessment Practitioner (EAPASA – 2019/1335 and Pri.Sci.Nat (127870) holds a Master's degree in Environmental Management from North-West University with over 11 years of professional experience as an environmentalist. Ntsanko is

currently Senior Environmental Specialist based at Afrimat. She has a wealth of experience in managing Environmental Impact Assessments (EIAs) with the required Public Participation Process (PPP), carrying out environmental audits and conducting environmental awareness, which she gained through the years.

Ms. White's consulting experience includes basic environmental impact assessments (BAs), environmental impact assessments (EIAs), environmental compliance, public participation processes (PPPs), environmental management plans (EMPs), water licensing and authorisations and waste license applications for various projects, ranging from abattoirs and township establishments to power station developments.

Anne-Mari completed her Bachelor of Science in Environmental Management at the University of South Africa (UNISA) in 2007. In addition, she has done short courses in soil classifications and wetland delineations at Terrasoil; geographic information systems (GIS) at the University of KwaZulu- Natal (UKZN) and EIAs at the North-West University (NWU) in South Africa. She is also registered as a natural scientist with the South African Council for Scientific Natural Professionals (SACNASP). Anne-Mari is also registered with the Environmental Assessment Practitioners Association of South Africa (EAPASA) and is a member of the International Association for Impact Assessments (IAIA).

EAP's qualifications are attached as Appendix I of this report.

Select the appropriate box

The application is for an upgrade of an existing development

☐

The application is for a new development

☒

Other, specify

Does the activity also require any authorisation other than NEMA EIA authorisation?

☒ NO

If yes, describe the legislation and the Competent Authority administering such legislation

N/A

If yes, have you applied for the authorisation(s)?

If yes, have you received approval(s)? (attach in appropriate appendix)

☒

1.2. APPLICABLE LEGISLATION, POLICIES AND/OR GUIDELINES

Table 1: List all legislation, policies and/or guidelines of any sphere of government that are applicable to the application as contemplated in the EIA regulations

Title of legislation, policy or guideline (Promulgation Date)	Applicable Requirements	Administering Authority	Description of compliance
National Environmental Management Act (Act No. 107 of 1998)	<p>NEMA establishes a set of principles that all authorities have to consider when exercising their powers. These include the following:</p> <ul style="list-style-type: none"> • Development must be sustainable; • Pollution must be avoided or minimised and remedied; • Waste must be avoided or minimised, reused or recycled; • Negative impacts must be minimised; and • Responsibility for the environmental consequences of a policy, project, product or service applies throughout its life cycle. <p>Section 28(1) states that “every person who causes, has caused or may cause significant pollution or degradation of the environment must take reasonable measures to prevent such pollution or degradation from occurring, continuing or recurring”. If such degradation/pollution cannot be prevented, then appropriate measures must be taken to minimise or rectify such pollution. These measures may include:</p> <ul style="list-style-type: none"> • Assessing the impact on the 	<ul style="list-style-type: none"> ➤ National Department of Environmental Affairs ➤ Gauteng Department of Agriculture and Resource Development 	<p>In terms of sections 24(2) and 24D of the National Environmental Management Act (No 107 of 1998), as read with the EIA Regulations 2014 of GN R983 and R985; a Basic Assessment process is required to be undertaken for the proposed project.</p>

Title of legislation, policy or guideline (Promulgation Date)	Applicable Requirements	Administering Authority	Description of compliance
	<p>environment;</p> <ul style="list-style-type: none"> • Informing and educating employees about the environmental risks of their work and ways of minimising these risks; • Ceasing, modifying or controlling actions which cause pollution/degradation; • Containing pollutants or preventing movement of pollutants; • Eliminating the source of pollution; and • Remedying the effects of the pollution. 		
<p>National Heritage Resources Act 25 of 1999 (NHRA).</p>	<p>The protection and management of South Africa's heritage resources are controlled by the Natural Heritage Resources Act no.25 of 1998 (NHRA). The enforcing authority for this act is the South African National Heritage Resources Agency (SAHRA). In terms of the Act, historically important features such as graves, trees, archaeological artefacts/sites and fossil beds are protected. Similarly, culturally significant symbols, spaces and landscapes are also provided protection.</p> <p>S38 states that Heritage Impact Assessments (HIAs) are required for</p>	<p>➤ South African Heritage Resources Agency</p>	<ul style="list-style-type: none"> • The proposed brick plant will change the character of a site exceeding 5 000m². • A Heritage Assessment has been undertaken as part of this Basic Assessment <p>Should there be any historically important features such as graves, trees, archaeological artefacts/sites and fossil beds in the proposed site which is deemed as being of cultural significance, these features, at the discretion of SAHRA, be conserved and maintained under this Act</p>

Title of legislation, policy or guideline (Promulgation Date)	Applicable Requirements	Administering Authority	Description of compliance
	<p>certain kinds of development including:</p> <ul style="list-style-type: none"> • The construction of a road, powerline, pipeline, canal or other similar linear development or barrier exceeding 300m in length; • Any development or other activity which will change the character of a site exceeding 5 000m² in extent 		
National Environmental Management: Waste Act, 2008 (Act No. 59 of 2008)	<p>The Minister may by notice in the Gazette publish a list of waste management activities that have, or are likely to have, a detrimental effect on the environment.</p> <ul style="list-style-type: none"> • In terms of the regulations published in terms of this Act (GN 921 of December 2013), a Basic Assessment or Environmental Impact Assessment is required to be undertaken for identified listed activities. • Any person who stores waste must at least take steps, unless otherwise provided by this Act, to ensure that <p>(a) The containers in which any waste is stored, are intact and not corroded or in any other way rendered unfit for the safe storage of waste;</p> <p>(b) Adequate measures are taken to prevent accidental spillage or leaking;</p> <p>(c) The waste cannot be blown away;</p> <p>(d) Nuisances such as odour, visual</p>	<ul style="list-style-type: none"> ➤ National Department of Environmental Affairs (hazardous waste) ➤ Gauteng Department of Agriculture and Resource Development (general waste) 	<ul style="list-style-type: none"> • In terms of GNR921, no waste license is required for the project • Waste handling, storage and disposal during construction and operation is required to be undertaken in accordance with the requirements of this Act, as detailed in the applicable EMP, as well as in accordance with the relevant Norms and Standards.

Title of legislation, policy or guideline (Promulgation Date)	Applicable Requirements	Administering Authority	Description of compliance
	impacts and breeding of vectors do not arise; and (e) Pollution of the environment and harm to health are prevented.		
National Environmental Management: Air Quality Act (Act No. 39 of 2004)	The Air Quality Act aligns itself with the National Environmental Management Act (section 2) and section 24(b) of the Constitution by promoting ecologically sustainable development, whilst promoting justifiable economic and social development. This is done through the protection and enhancement of the air quality on a national scale, as well as the prevention of air pollution and ecological degradation.	<ul style="list-style-type: none"> ➤ National Department of Environmental Affairs ➤ Midvaal Local Municipality 	The proposed Brick factory should conform to this Act by taking into consideration that the proposed Brick factory development should not pose any danger to health or nuisance to the nearby residents.
National Environmental Management: Biodiversity Act 10 of 2004 (NEMBA);	The purpose of the NEMBA is to provide for the management and conservation of South Africa's biodiversity and the protection of species and ecosystems that warrant national protection. The NEMBA makes provision for the publication of bioregional plans and the listing of ecosystems and species that are threatened or in need of protection. Threatened or Protected Species Regulations (2007), Guidelines for the determination of bioregions and the preparation and publication of bioregional plans (2009) and a National List of Ecosystems that are Threatened and in Need of Protection (2011) have been promulgated in terms of NEMBA.	<ul style="list-style-type: none"> ➤ National Department of Environmental Affairs ➤ Gauteng Department of Agriculture and Resource Development 	The potential impact on Conservation Important floral species in the study area, and the management thereof is addressed in this BAR.

Title of legislation, policy or guideline (Promulgation Date)	Applicable Requirements	Administering Authority	Description of compliance
	<p>A published bioregional plan is a spatial plan indicating terrestrial and aquatic features in the landscape that are critical for conserving biodiversity and maintaining ecosystem functioning. These areas are referred to as Critical Biodiversity Areas (CBAs) in terms of NEMBA. Bioregional plans provide guidelines for avoiding the loss or degradation of natural habitat in CBAs with the aim of informing, EIAs.</p> <p>Permits to carry out a restricted activity involving listed threatened or protected species or alien species may only be issued after an assessment of risks and potential impacts on biodiversity has been undertaken, which is the purpose of any EIA.</p>		
<p>The National Water Act, 1998 (Act No. 36 of 1998)</p>	<p>The National Water Act (NWA) administered by DWS aims to manage and protect the national water resources to achieve sustainable use of water for the benefit of all water users. The purpose is to achieve sustainable use of water for the benefit of all water users. The purpose of the Act is to ensure that the nation's water resources are protected, used, developed, conserved and managed in ways that take into account</p> <ul style="list-style-type: none"> • • Under S21 of the Act, water uses must be licensed unless such water use falls into one of the 	<ul style="list-style-type: none"> ➤ National Department of Water Affairs ➤ Gauteng Department of Agriculture and Resource Development 	<p>No water use license is required for the operation of the site as stated in section 21. The proposed Brick-Making Plant development should ensure that no seepage from the plant which contaminate any nearby water resources.</p>

Title of legislation, policy or guideline (Promulgation Date)	Applicable Requirements	Administering Authority	Description of compliance
	<p>categories listed in S22 of the Act or falls under the general authorisation.</p> <ul style="list-style-type: none"> In terms of S19, the project proponent must ensure that reasonable measures are taken throughout the life cycle of this project to prevent and remedy the effects of pollution to water resources from occurring, continuing, or recurring. 		
Environment Conservation Act (Act No. 73 of 1989)	<ul style="list-style-type: none"> National Noise Control Regulations (GN R154 dated 10 January 1992) 	<ul style="list-style-type: none"> National Department of Environmental Affairs Gauteng Department of Agriculture and Resource Development Local Authorities 	There is no requirement for a noise permit in terms of the legislation.
Occupational Health and Safety Act (No 85 of 1993)	<p>The Act provides for the health and safety of persons at work and for the health and safety of persons in connection with the use of machinery; the protection of persons other than persons at work, against hazards to health and safety arising out of or in connection with the activities of persons at work.</p> <p>A number of Regulations have been promulgated under the Act that is relevant to development including the following:</p> <ul style="list-style-type: none"> General Administrative Regulations, 1994; Asbestos Regulations, 2001; 	<ul style="list-style-type: none"> Department of Labour 	The EMPr provides for measures to ensure that objectives of the Act are met on this site

Title of legislation, policy or guideline (Promulgation Date)	Applicable Requirements	Administering Authority	Description of compliance
	<ul style="list-style-type: none"> • Lead Regulations, 2003; • Regulations for Hazardous Chemical Substances, 1995; • Hazardous Biological Agents of 2001; • General Safety Regulations, 1986; • Environmental regulations for workplaces (Department of Labour, 1994); and • Construction Regulations, 2003. 		

1.3. ALTERNATIVES

Describe the proposal and alternatives that are considered in this application. Alternatives should include a consideration of all possible means by which the purpose and need of the proposed activity could be accomplished. The determination of whether the site or activity (including different processes etc.) or both is appropriate needs to be informed by the specific circumstances of the activity and its environment.

The no-go option must in all cases be included in the assessment phase as the baseline against which the impacts of the other alternatives are assessed. **Do not include the no go option into the alternative table below.**

Note: After receipt of this report the competent authority may also request the applicant to assess additional alternatives that could possibly accomplish the purpose and need of the proposed activity if it is clear that realistic alternatives have not been considered to a reasonable extent.

Please describe the process followed to reach (decide on) the list of alternatives below

--

Table 2: Description of the alternatives considered

No.	Alternative type, either alternative: site on property, properties, activity, design, technology, energy, operational or other (provide details of "other")	Description
1	Site Alternative	<p>SA Block received permission from Glen Douglas mine which is also a subsidiary of Afrimat Limited, to construct and operate the proposed activities associated with the making of bricks on their property which is located on the Remaining Extent of Portion 3 of the farm Witkoppie 373 IR. The area is currently outside the mining area and vacant. The proposed development area has been previously disturbed. The area is considered environmentally suitable due to the low impact on both the municipal infrastructure and environment seeing that SA Block intends to use raw material directly sourced from Glen Douglas Mine for the production of the bricks. These raw materials will be transported through an internal gate which will result in less heavy vehicle traffic on public roads. The proposed site further benefits SA Block because of the reduced transportation costs and high visibility to the market due to its location.</p> <p>For the above reasons, no other site alternatives are assessed within this report.</p>
2	Technology Alternative:	<p>SA Block currently operates 8 other manual brick plants. These plants will continue to operate but it must be noted that manual brick plants are uncompetitive in the current market with low profit margins. Research has shown that competitors in the present economic landscape are converting to semi-automated and fully automated plants which appear to be more profitable due to increased productivity levels and consistent higher efficiency. Automated brick manufacturing also allows for complete indoor production, curing and packaging which dramatically reduces noise and dust in the immediate area. In addition, automation will also reduce the accident/incidences that SA Block currently encounters at the manual brick plants.</p> <p>The main disadvantage of automation is that it requires less labour but, in this case, the extra income generated from this new facility will bolster the overall sustainability of SA Block and safeguard the remaining 8 plants, with 200+ employees, which have already been negatively impacted by cost-reducing restructuring.</p> <p>The automation technology techniques are therefore the preferred alternative.</p>
3	No Go Alternative	The No Go alternative for manufacturing bricks is considered in accordance with the requirements of the EIA Regulations,

		<p>2014 (as per Appendix 2. Section 2 (i) (i) of Notice R.982, 2014). The No-Go alternative entails no change in existing status quo, of the land use on on the Remaining Extent of Portion 3 of the farm Witkoppie 373 IR. If this carries a knock-on effect implicating the mine also as a No Go, it further suggests the land use will remain, as zoned, for use as agricultural land.</p> <p>If the proposed operation were not to proceed, the land may or may not be utilised for grazing of livestock in the future due its proximity to the mine and the danger that it can impose to livestock and herders/shepherds. As much as the no-go option may result in the protection of the environment in situ; the consequences of not proceeding with the proposed operation will include the forfeiture of a mining and factory development opportunity and therefore the loss of support towards the Midvaal Municipality for attaining some of the objectives as per their IDP goals.</p>
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In the event that no alternative(s) has/have been provided, a motivation must be included in the table below.

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1.4. PHYSICAL SIZE OF THE ACTIVITY

Indicate the total physical size (footprint) of the proposal as well as alternatives. Footprints are to include all new infrastructure (roads, services etc), impermeable surfaces and landscaped areas:

Proposed activity (**Total environmental (landscaping, parking, etc.) and the building footprint**)

Alternatives:

Alternative 1 (if any)

Alternative 2 (if any)

Size of the activity:

6.8 ha

Ha/ m²

or, for linear activities:

Proposed activity

Alternatives:

Alternative 1 (if any)

Alternative 2 (if any)

Length of the activity:

N/A

m/km

Indicate the size of the site(s) or servitudes (within which the above footprints will occur):

Proposed activity

Alternatives:

Alternative 1 (if any)

Alternative 2 (if any)

Size of the site/servitude:

N/A

Ha/m²

1.5. SITE ACCESS

Proposal

Does ready access to the site exist, or is access directly from an existing road?

YES

If NO, what is the distance over which a new access road will be built

m

Describe the type of access road planned:

The study area can be directly accessed from Bokmakiere Road on Witkopdorp (Daleside)

Include the position of the access road on the site plan (if the access road is to traverse a sensitive feature the impact thereof must be included in the assessment).

Alternative 1

Does ready access to the site exist, or is access directly from an existing road?

NO

If NO, what is the distance over which a new access road will be built

m

Describe the type of access road planned:

The site has an already existing access and no alternative access were considered

Include the position of the access road on the site plan. (if the access road is to traverse a sensitive feature the impact thereof must be included in the assessment).

Alternative 2

Does ready access to the site exist, or is access directly from an existing road?

YES

NO

If NO, what is the distance over which a new access road will be built

m

Describe the type of access road planned:

Include the position of the access road on the site plan. (if the access road is to traverse a sensitive feature the impact thereof must be included in the assessment).

PLEASE NOTE: Points 6 to 8 of Section A must be duplicated where relevant for alternatives

Section A 6-8 has been duplicated

0

Number of times

(only complete when applicable)

6. LAYOUT OR ROUTE PLAN

A detailed site or route (for linear activities) plan(s) must be prepared for each alternative site or alternative activity. It must be attached to this document. The site or route plans must indicate the following:

- the layout plan is printed in colour and is overlaid with a sensitivity map (if applicable);
- layout plan is of acceptable paper size and scale, e.g.
 - A4 size for activities with development footprint of 10sqm to 5 hectares;
 - A3 size for activities with development footprint of > 5 hectares to 20 hectares;
 - A2 size for activities with development footprint of >20 hectares to 50 hectares;
 - A1 size for activities with development footprint of >50 hectares;
- The following should serve as a guide for scale issues on the layout plan:
 - A0 = 1: 500
 - A1 = 1: 1000
 - A2 = 1: 2000
 - A3 = 1: 4000
 - A4 = 1: 8000 (±10 000)
- shapefiles of the activity must be included in the electronic submission on the CD's;
- the property boundaries and Surveyor General numbers of all the properties within 50m of the site;
- the exact position of each element of the activity as well as any other structures on the site;
- the position of services, including electricity supply cables (indicate above or underground), water supply pipelines, boreholes, sewage pipelines, septic tanks, storm water infrastructure;
- servitudes indicating the purpose of the servitude;
- sensitive environmental elements on and within 100m of the site or sites (including the relevant buffers as prescribed by the competent authority) including (but not limited thereto):
 - Rivers and wetlands;
 - the 1:100 and 1:50 year flood line;
 - ridges;
 - cultural and historical features;
 - areas with indigenous vegetation (even if it is degraded or infested with alien species);
- Where a watercourse is located on the site at least one cross section of the water course must be included (to allow the position of the relevant buffer from the bank to be clearly indicated)

The **layout plan** for the proposed development are enclosed within **Appendix A**

FOR LOCALITY MAP (NOTE THIS IS ALSO INCLUDED IN THE APPLICATION FORM REQUIREMENTS)

- the scale of locality map must be at least 1:50 000. For linear activities of more than 25 kilometres, a smaller scale e.g. 1:250 000 can be used. The scale must be indicated on the map;
- the locality map and all other maps must be in colour;
- locality map must show property boundaries and numbers within 100m of the site, and for poultry and/or piggery, locality map must show properties within 500m and prevailing or predominant wind direction;
- for gentle slopes the 1m contour intervals must be indicated on the map and whenever the slope of the site exceeds 1:10, the 500mm contours must be indicated on the map;
- areas with indigenous vegetation (even if it is degraded or infested with alien species);
- locality map must show exact position of development site or sites;
- locality map showing and identifying (if possible) public and access roads; and
- the current land use as well as the land use zoning of each of the properties adjoining the site or sites.

The Locality Map for the proposed development are enclosed within **Appendix A**

7. SITE PHOTOGRAPHS

Colour photographs from the center of the site must be taken in at least the eight major compass directions with a description of each photograph. Photographs must be attached under the appropriate Appendix. It should be supplemented with additional photographs of relevant features on the site, where applicable.

Reference is made to **Appendix B – Site Photographs** included as part of this application

8. FACILITY ILLUSTRATION

Final Basic Assessment Report for the proposed Midvaal Brick Manufacturing Facility, located in the town of Meyerton, Gauteng Province.

A detailed illustration of the activity must be provided at a scale of 1:200 for activities that include structures. The illustrations must be to scale and must represent a realistic image of the planned activity. The illustration must give a representative view of the activity to be attached in the appropriate Appendix.

Reference is made to **Appendix C – Facility Illustration** included as part of this application

2. SECTION B: DESCRIPTION OF RECEIVING ENVIRONMENT

Note: Complete Section B for the proposal and alternative(s) (if necessary)

Instructions for completion of Section B for linear activities

- 1) For linear activities (pipelines etc) it may be necessary to complete Section B for each section of the site that has a significantly different environment.
- 2) Indicate on a plan(s) the different environments identified
- 3) Complete Section B for each of the above areas identified
- 4) Attach to this form in a chronological order
- 5) Each copy of Section B must clearly indicate the corresponding sections of the route at the top of the next page.

Section B has been duplicated for sections of the route times

Instructions for completion of Section B for location/route alternatives

- 1) For each location/route alternative identified the entire Section B needs to be completed
- 2) Each alternative location/route needs to be clearly indicated at the top of the next page
- 3) Attach the above documents in a chronological order

Section B has been duplicated for location/route alternatives times (complete only when appropriate)

Instructions for completion of Section B when both location/route alternatives and linear activities are applicable for the application

Section B is to be completed and attachments order in the following way

- All significantly different environments identified for Alternative 1 is to be completed and attached in a chronological order; then
- All significantly different environments identified for Alternative 2 is to be completed and attached chronological order, etc.

Section B - Section of Route (complete only when appropriate for above)

Section B – Location/route Alternative No. (complete only when appropriate for above)

2.1. PROPERTY DESCRIPTION

Property description:
(Including Physical Address and Farm name, portion etc.)

Table 3: Description of the property	
Farm Name:	Remaining Extent of Portion 3 of the farm Witkoppie 373 IR
Application area (Ha)	Approximately 6.8 ha
Magisterial district:	Midvaal Local Municipality which is an administrative area within the Sedibeng District Municipality, Gauteng Province.
Distance and direction from nearest town	The study area is situated approximately 0.6 km southwest of Witkopdorp, and approximately 2.5 km northeast of Highbury. The study area is located approximately 1 km east of the R59 Provincial Route and 0.8 km southwest of the R557 Regional Route. The study area neighbours the northern section of the Glen Douglas
21 digit Surveyor General Code	T0IR00000000037300003

2.2. ACTIVITY POSITION

Indicate the position of the activity using the latitude and longitude of the centre point of the site for each alternative site. The co-ordinates should be in decimal degrees. The degrees should have at least six decimals to ensure adequate accuracy. The projection that must be used in all cases is the WGS84 spheroid in a national or local projection.

Alternative:

Latitude (S):

Longitude (E):

26° 30" 19.000"

28° 3" 30.000"

In the case of linear activities:

Alternative:

- Starting point of the activity
- Middle point of the activity
- End point of the activity

Latitude (S):

Longitude (E):

	°		°
	°		°
	°		°

For route alternatives that are longer than 500m, please provide co-ordinates taken every 250 meters along the route and attached in the appropriate Appendix

Addendum of route alternatives attached

The 21 digit Surveyor General code of each cadastral land parcel

PROPOSAL	T	0	I	R	0	0	0	0	0	0	0	0	0	3	7	3	0	0	0	0	3
ALT. 1																					
ALT. 2																					
etc.																					

2.3. GRADIENT OF THE SITE

Indicate the general gradient of the site.

Flat	1:50 – 1:20 ✓	1:20 – 1:15	1:15 – 1:10	1:10 – 1:7,5	1:7,5 – 1:5	Steeper than 1:5
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2.4. LOCATION IN LANDSCAPE

Indicate the landform(s) that best describes the site.

Ridgeline	Plateau	Side slope of hill/ridge	Valley	Plain ✓	Undulating plain/low hills	River front
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2.5. GROUNDWATER, SOIL AND GEOLOGICAL STABILITY OF THE SITE

a) Is the site located on any of the following?

Shallow water table (less than 1.5m deep)

Dolomite, sinkhole or doline areas

Seasonally wet soils (often close to water bodies)

Unstable rocky slopes or steep slopes with loose soil

Dispersive soils (soils that dissolve in water)

Soils with high clay content (clay fraction more than 40%)

Any other unstable soil or geological feature

An area sensitive to erosion

	NO ✓
YES ✓	
YES ✓	
	NO ✓
	NO ✓
	NO ✓
	NO ✓
YES ✓	

(Information in respect of the above will often be available at the planning sections of local authorities. Where it exists, the 1:50 000 scale Regional Geotechnical Maps prepared by Geological Survey may also be used).

b) are any caves located on the site(s)

	NO ✓
--	------

If yes to above provide location details in terms of latitude and longitude and indicate location on site or route map(s)

Latitude (S):	Longitude (E):

c) are any caves located within a 300m radius of the site(s)

	NO ✓
--	------

If yes to above provide location details in terms of latitude and longitude and indicate location on site or route map(s)

Latitude (S):	Longitude (E):

d) are any sinkholes located within a 300m radius of the site(s)

YES	NO ✓
-----	------

If yes to above provide location details in terms of latitude and longitude and indicate location on site or route map(s)

Latitude (S):	Longitude (E):

The study area falls within ecosystems that are currently considered to be **Vulnerable** (Soweto Highveld Grassland) and **Least concern** (Carletonville Dolomite Grassland).

The Geology and Soils of these ecosystems are detailed below

Soweto Highveld Grassland: Shale, sandstone or mudstone of the Madzaringwe Formation (Karoo Supergroup) or the intrusive Karoo Suite dolerites which feature prominently in the area. In the south, the Volksrust Formation (Karoo Supergroup) is found and in the west, the rocks of the older Transvaal, Ventersdorp and Witwatersrand

Supergroups are most significant. Soils are deep, reddish on flat plains and are typically Ea, Ba and Bb land types.

Carletonville Dolomite Grassland: Dolomite and chert of the Malmani Subgroup (Transvaal Supergroup) supporting mostly shallow Mispah and Glenrosa soil forms typical of the Fa land type, dominating the landscapes of this unit. Deeper red to yellow apedal soils (Hutton and Clovelly forms) occur sporadically, representing the Ab land type

Hydrology

Several non-perennial streams drain towards the Klip River further to the east. An artificial reservoir (Bass Lake) was created due to quarrying activities to the east.

If any of the answers to the above are "YES" or "unsure", specialist input may be requested by the Department

2. 6. AGRICULTURE

Does the site have high potential agriculture as contemplated in the Gauteng Agricultural Potential Atlas (GAPA 4)?

	NO✓
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Please note: The Department may request specialist input/studies in respect of the above.

2.7. GROUNDCOVER

To be noted that the location of all identified rare or endangered species or other elements should be accurately indicated on the site plan(s).

Indicate the types of groundcover present on the site and include the estimated percentage found on site

Natural veld - good condition % = 5	Natural veld with scattered aliens % =	Natural veld with heavy alien infestation % =85	Veld dominated by alien species % =	Landscaped (vegetation) % =
Sport field % =0	Cultivated land % =0	Paved surface (hard landscaping) % = 0	Building or other structure % =	Bare soil % = 10

Please note: The Department may request specialist input/studies depending on the nature of the groundcover and potential impact(s) of the proposed activity/ies.

Are there any rare or endangered flora or fauna species (including red list species) present on the site

YES ✓	
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If YES, specify and explain:

Vegetation

The study area falls within two vegetation units; the western part of the study area falls within the Soweto Highveld Grassland which is considered a **Vulnerable (VU)** ecosystem and is currently **Not Protected**. The eastern part of the study area falls within the

Carletonville Dolomite Grassland which is considered a **Least Concern (LC)** ecosystem and is currently **Poorly Protected**.

Soweto Highveld Grassland: **Endangered** as per Mucina and Rutherford (2006); however, according to the updated National Biodiversity Assessment (2018) the status has been changed to **Vulnerable**. Target 24%. Only a handful of patches statutorily conserved (Waldrift, Krugersdorp, Leeuwkuil, Suikerbosrand, Rolfe's Pan Nature Reserves) or privately conserved (Johanna Jacobs, Tweefontein, Gert Jacobs, Nikolaas and Avalon Nature Reserves, Heidelberg Natural Heritage Site). Almost half of the area already transformed by cultivation, urban sprawl, mining and building of road infrastructure. Some areas have been flooded by dams (Grootdraai, Leeuwkuil, Trichardtsfontein, Vaal, Willem Brummer). Erosion is generally very low (93%).

Carletonville Dolomite Grassland: **Vulnerable** according to Mucina and Rutherford (2006) but the status has been updated to Least Concern (NBA, 2018). Target 24%. Small extent conserved in statutory and in at least six private conservation areas. Almost a quarter already transformed for cultivation, by urban sprawl or by mining activity as well, see Figure 5 below

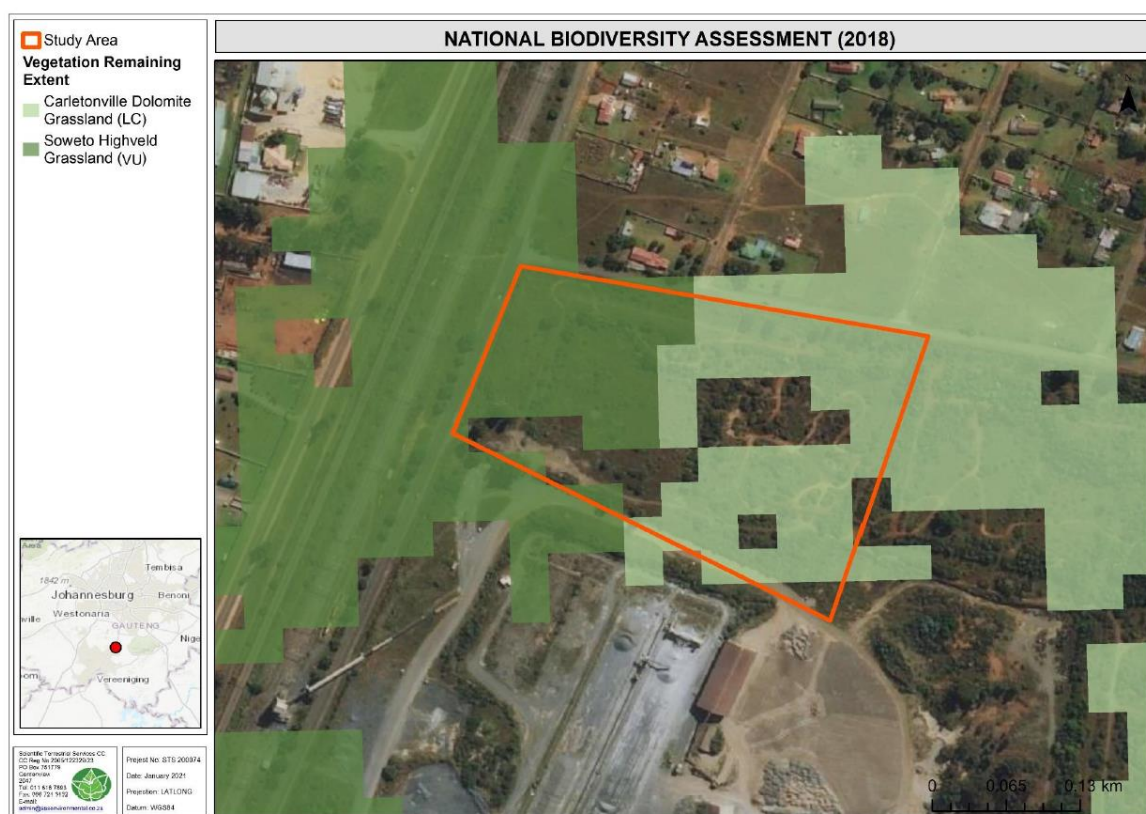


Figure 5: Extent and threat status of vegetation types according to the National Biodiversity Assessment (NBA, 2018).

According to SAPAD, the study area is situated within a 10 km radius of both the Suikerbosrand Nature Reserve and the Keyterskloof Private Nature Reserve. No protected

or conservation areas as identified by SACAD or NPAES were located within a 10 km buffer of the study area.

In terms of the Gauteng Conservation Plan V3.3 (2011), the study area was **not** situated within an **Important Critical Biodiversity Areas (CBA)**, where Red and Orange Listed Plants and Primary Vegetation is proposed to occur.

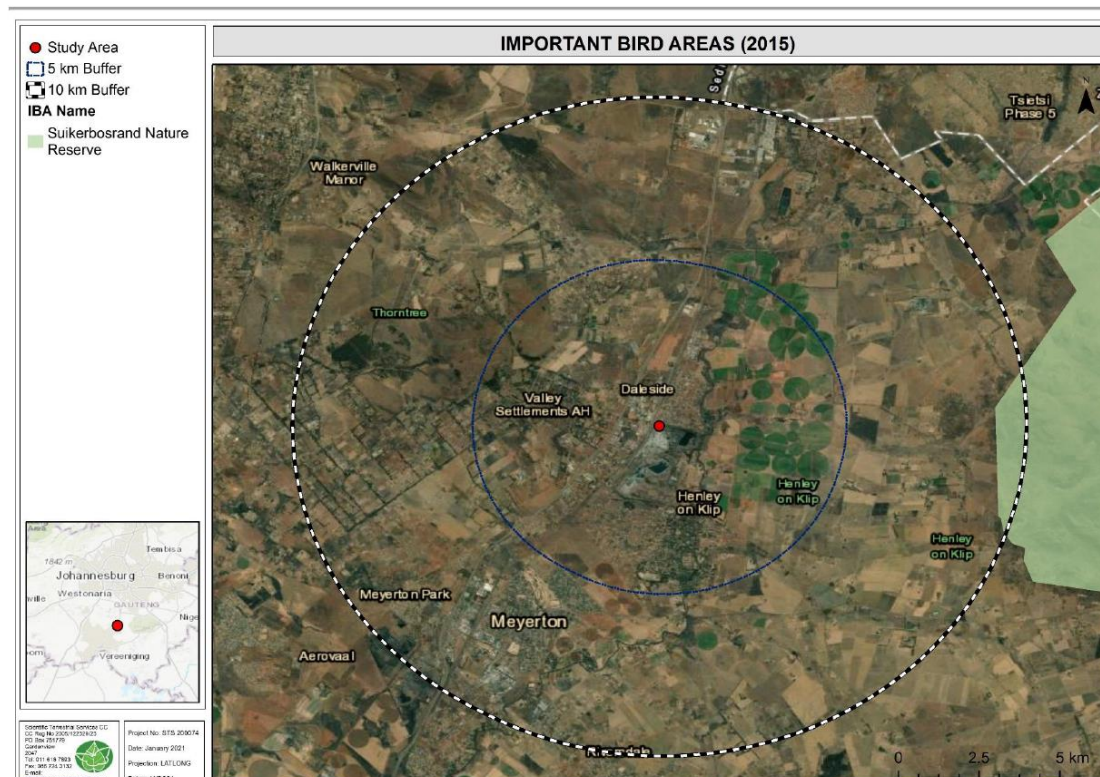


Figure 6: Important Bird Areas (IBAs) within a 10km radius of the study area.

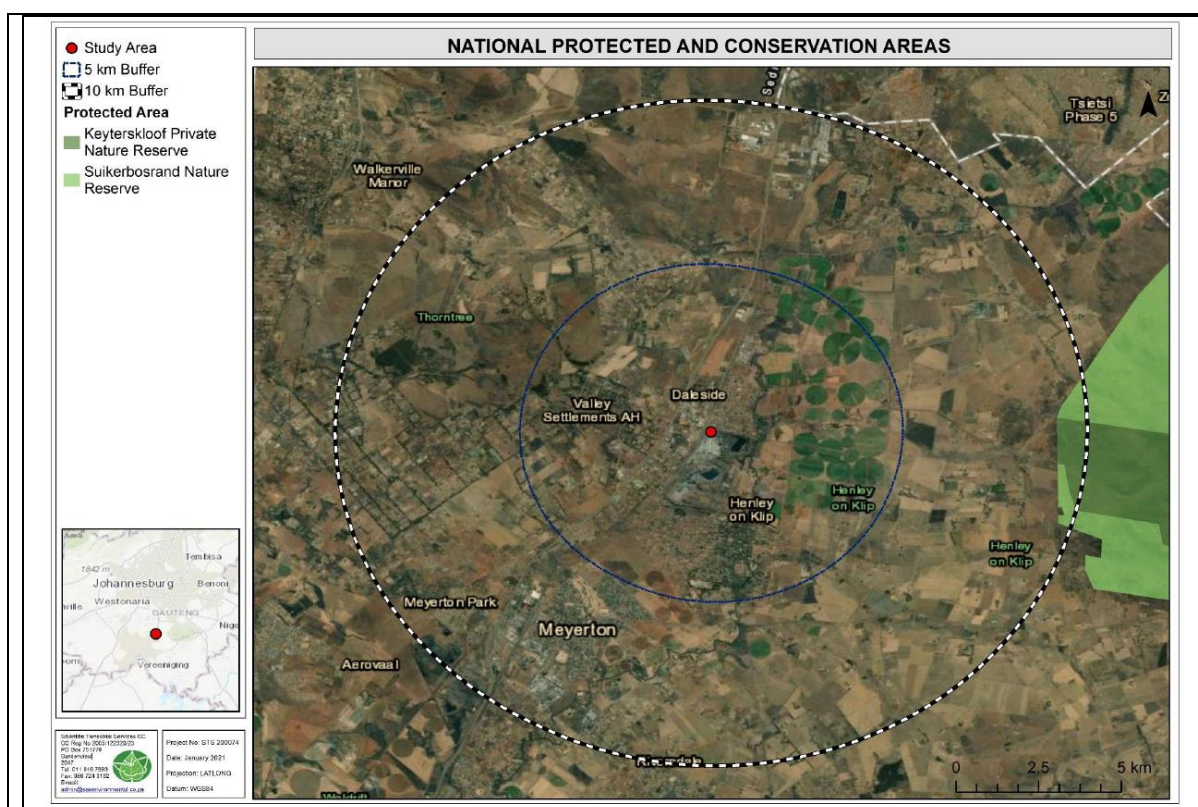


Figure 7: Protected areas within a 10 km radius of the study area, according to SAPAD (Q2, 2020).

Biodiversity Assessment conducted by Scientific Terrestrial Services CC on January 2021, overall, the habitat within the study area is typical of a peri-urban setting and includes degraded areas that support a high abundance of alien and invasive plant (AIP) species. The biodiversity of the study area can thus be defined under two broad habitat units, namely Degraded Grassland and Woody Habitat. A depiction of these habitat units within the study area is presented in Figure 8 below.

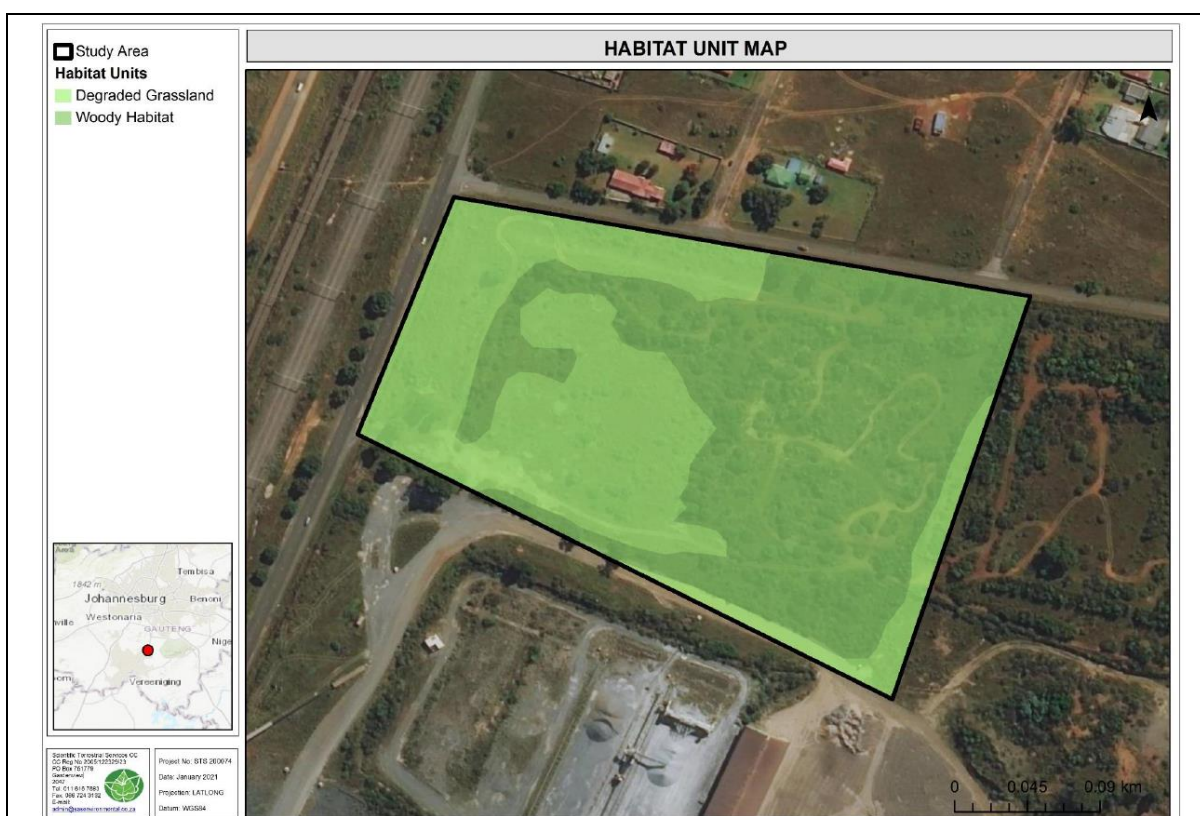


Figure 8: Habitat Units Associated with the study area

The study area is situated within both the Soweto Highveld Grassland and the Carletonville Dolomite Grassland vegetation types (listed as vulnerable and least concern respectively in Mucina and Rutherford, 2006), i.e., the reference state. Mucina and Rutherford (2006) describe the Soweto Highveld Grassland as having gently to moderately undulating landscape on the Highveld plateau supporting short to medium-high, dense, tufted grassland dominated almost entirely by *Themeda triandra* and accompanied by a variety of other grasses such as *Elionurus muticus*, *Eragrostis racemosa*, *Heteropogon contortus* and *Tristachya leucothrix*. Almost half of this vegetation unit has already been transformed by cultivation, urban sprawl, mining and building of road infrastructure. In contrast, Mucina and Rutherford (2006) describe the Carletonville Dolomite Grassland as having slightly undulating plains with frequent, prominent rocky outcrops. This vegetation unit supports species-rich grassland communities.

The Degraded Grassland Habitat is in the east of the study area. This habitat unit is situated largely within the area identified as supporting the Soweto Grassland Vegetation type (as per Mucina and Rutherford 2006). It is evident that this unit has experienced a large degree of degradation and transformation because of anthropogenic activities; a large degree of waste material has been dumped throughout the habitat unit and the study area. Much of this unit supports a wide array of AIP species such as *Verbena bonariensis*, *Zinnia peruviana*, and *Tagetes minuta*. The habitat unit is therefore considered to be in a degraded state and no longer representative of the Soweto Highveld Grassland Vegetation type. Despite the overall degraded nature of this habitat unit, a small, localised population

of suspected *Adromischus umbraticola* subsp. *umbraticola*, both a provincially important SCC under the Gauteng Department of Agriculture and Rural Development (GDARD), and NT on the Red List was recorded on within the habitat unit.

The Woody Habitat is in the west of the study area, and largely comprises of the Carletonville Dolomite Grassland. This habitat supported several woody species, including *Celtis Africa*, *Searsia pyroides* and *Gymnosporia buxifolia*, in addition to several grass species. It is evident that this habitat unit has also experienced a large degree of degradation and transformation because of anthropogenic activities. This habitat unit has several 4X4 routes throughout its distribution. This habitat unit supports several AIP species, including *Campuloclinium macrocephalum*, *Conyza bonariensis*, and *Datura stramonium*, and has historically experienced a large degree of dumping as well as woody thickening (Figure 9). As such this habitat unit can no longer be considered as representative of the reference vegetation types.

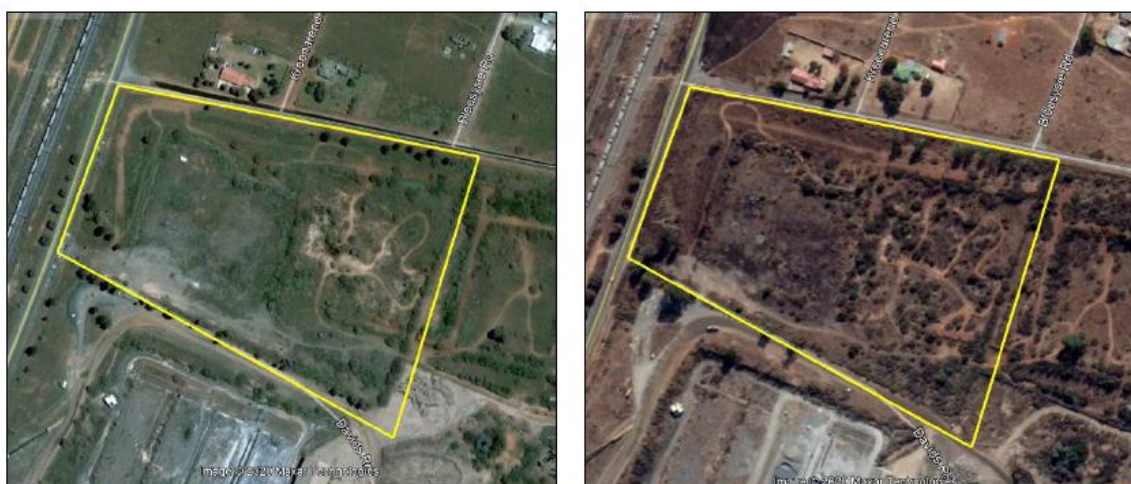


Figure 9: Woody thickening evident within the western section of the study area when comparing satellite imagery from 2016 to 2021. 4X4 routes are also evident within the images.

Existing impacts on the biodiversity associated with the study area include those listed below:

- Anthropogenic activities (e.g., neighbouring mining activities and infrastructure development) and transformation of surrounding areas to built-up infrastructure;
- Dumping of waste material throughout the study area (Figure 10);



Figure 10: Dumping of rubble evident through the study area

- Modification of the study area through the establishment of 4X4 routes throughout

the eastern parts of the study area (see Figure 9);

- Woody thickening, particularly within the western parts of the study area (see Figure 9);
- Encroaching alien plant species across the entire study area – an ongoing issue; and
- Long-term fragmentation of both the habitat units from genetic source pools for ongoing diversification of plant species, including hindering the movement of animal species. This fragmentation comprises the construction of buildings and major roads around the study area which pre-dates 2003.

Due to impacts/disturbances within the study area, the existing habitats can be categorised as:

- **Degraded Grassland Habitat**, i.e. areas historically fragmented with sections where AIPs form a prominent part of the grassland community; and
- **Woody Habitat**, i.e. areas where woody thickening and AIP proliferation are evident.

Within both the Degraded Grassland and the Woody Habitat, conditions for fauna and flora are suboptimal due to a lack of suitable habitat and habitat fragmentation. The extensive proliferation of AIPs within both habitats further reduces optimal conditions for the establishment of indigenous species throughout the study area. Ongoing anthropogenic activities within and around this habitat unit have pushed out populations of species that would normally be expected to occur in such an area.

Are there any rare or endangered flora or fauna species (including red list species) present within a 200m (if within urban area as defined in the Regulations) or within 600m (if outside the urban area as defined in the Regulations) radius of the site.

	NO ✓
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If YES, specify and explain:

According to the Biodiversity Assessment conducted by Scientific Terrestrial Services CC on January 2021, no faunal SCC were encountered during the field assessment and due to the impacts currently occurring within the study area it is highly unlikely that any SCC will utilise the study area. The National Web based Environmental Screening Tool indicated that *Aloeides dentatis* (Roodepoort Copper, VU), *Lepidochrysops procera* (Potchefstroom Blue), and *Orachrysops mijburghi* (Mijburgh's Blue, EN) have the potential to be located within the study area, however, on-site characteristics do not reflect the habitat required for these species' permanent existence within the study area. Information obtained from GDARD specialist department noted that no Red Data bird species are likely to present within the study area, especially given the study areas proximity to the Daleside settlement, the neighbouring mine and surrounding transport infrastructure. However, information obtained from the GDARD specialist department indicated that *Atelerix frontalis* (Southern African hedgehog), *Aonyx capensis* (Cape clawless otter) and *Lutra maculicollis* (Spotted necked otter) have been recorded proximate to the study area, however, on site characteristics do not provide the necessary habitat required for their persistence in the study area. The study area does not form part of any important roosting, breeding, foraging or migratory corridors for any SCC.

Faunal species diversity within the study area was moderately low throughout the study area. Very few signs of terrestrial fauna were observed. Limited food resources are available for the small contingent of fauna likely to utilise the area and is thus likely a limiting factor for faunal diversity. Graminoids and various AIP species within the study area provide the main food resource for potential frugivorous and granivorous faunal species. Only mammals (notably small common rodent species) capable of surviving in human modified environments are anticipated to occur within the study area. Avifaunal species observed were largely common species which broad habitat requirements capable of utilising anthropogenically modified landscapes. Observed Avifauna species included, *Vanellus armatus* (Blacksmith Lapwing), *Ploceus velatus* (Southern Masked weaver), *Acridotheres myna* (Common Myna), *Streptopelia semitorquata* (Red-eyed Dove) and *Bostrychia hagedash* (Hadedda). Avifauna are less restricted in terms of barriers to movement (fences, road etc), as such they will readily move between the study area and any adjacent locations. Large predatory owls may utilize the study area to forage while most other raptors are not anticipated to utilize the study area. A moderate diversity of insect species was observed during the field assessment and included *Apis mellifera* (Honeybee) and *Decapotoma lunata* (Lunate Blister Beetle).

The species and signs thereof observed were largely limited to common and widely occurring species known to survive in areas of decreased sensitivity and that have integrated well or adapted into urban settings. Historically the study area would likely have had a much higher diversity of faunal species but following the fragmentation resulting from urbanisation and development of the surrounding areas and the inherent disturbance of the habitat, this has been impacted upon. Overall, the study area is largely isolated from surrounding natural habitat via man-made barriers and development which has significantly impacted upon habitat utilisation by faunal species. The study area is unlikely to function as an important movement corridor for faunal species nor does it function as an important open space area (habitat connectivity) amongst surrounding intact habitats

Are there any special or sensitive habitats or other natural features present on the site?

	NO ✓
--	---------

If YES, specify and explain:

Vegetation

The overall sensitivity of both the floral habitat units was moderately low. Anthropogenic activities (e.g. dumping and 4X4 routes) and proliferation of alien plant species have resulted in the degradation of the available habitat and the proposed development is not deemed likely to have significant negative impacts on the species-poor floral assemblages. Although habitat modifications have occurred, it is imperative that the development footprint be restricted to the property boundary. It is recommended that edge effects are strictly managed to limit the impact on the surrounding natural area. The proposed development is unlikely to have any impact on the overall functioning of the system largely because of the small size and fragmented nature of the study area.

Important considerations:

Many AIPs occur within the study area of which NEMBA category 1b, NEMBA category 2, and NEMBA category 3 are present. The NEMBA regulations do not require that Category 3 species be removed but rather that further planting, propagation, or trade of these species is prohibited. It is still recommended that these species be monitored to ensure they do not spread to adjacent areas where they do not yet occur. Category 2 species include plants used commercially that may be grown in demarcated areas, provided that there is a permit and that steps are taken to prevent their spread; and Category 1b species require compulsory control;

The proposed development is unlikely to significantly impact SCC species as none were found in the study area, however species may disperse and establish within the study area. It is therefore recommended that if any SCC (as identified in section 4.3) are found within the footprint area they should be rescued and relocated by a suitably qualified specialist and either relocated to suitable habitat (outside the development footprint) within the study area, or moved to registered nurseries such as the ARC or SANBI;

The western part of the study area, and particularly the Degraded Grassland Habitat, is located within a vulnerable habitat, namely the Soweto Highveld Grassland. However, the Habitat unit is not considered representative of the reference vegetation type and thus does not support the outcome of the Online Screening Tool; and

According to the Gauteng C-Plan, the study area does not fall within a CBA or ESA. The habitat units have been subjected to various historical disturbances and are severely fragmented limiting their ability to maintain landscape processes and preserve functions within adjacent sensitive areas.

Fauna

The overall sensitivity of the faunal habitat units associated with the study area is moderately low. The faunal habitat has been altered because of historic and ongoing anthropogenic activities associated with an urban setting, most notably dumping of waste material, fragmentation, and edge effects. The impact that the proposed development will have on faunal habitat, diversity, and SCC, is not considered significant.

Several sections within the study area have been compromised by the proliferation of AIPs which has further decreased faunal habitat suitability. To prevent further habitat loss for fauna it is recommended that an alien and invasive control plan be implemented for the study area during construction and operational activities. It is important that cleared alien plants not be dumped within adjacent natural habitat.

Was a specialist consulted to assist with completing this section

YES

✓

If yes complete specialist details

Name of the specialist:

Samantha-Leigh Daniels

Qualification(s) of the specialist:

PhD Candidate (Plant Science) (University of Pretoria)

Postal address:

PO. Box 751779, Gardenview

Postal code:

2047

Telephone:

011 616 7893

Cell:

084 311 4878

E-mail:

Nelanie@sasenvgroup.co.za

Fax:

011 615 6240/
086 724 3132

Are any further specialist studies recommended by the specialist?

NO

✓

If YES,
specify:

If YES, is such a report(s) attached?

YES

NO

If YES list the specialist reports attached below

Signature of specialist:



Date:

January 2021

Please note; If more than one specialist was consulted to assist with the filling in of this section then this table must be appropriately duplicated

2. 8. LAND USE CHARACTER OF SURROUNDING AREA

Using the associated number of the relevant current land use or prominent feature from the table below, fill in the position of these land-uses in the vacant blocks below which represent a 500m radius around the site

1. Vacant land	2. River, stream, wetland	3. Nature conservation area	4. Public open space	5. Koppie or ridge
6. Dam or reservoir	7. Agriculture	8. Low density residential	9. Medium to high density residential	10. Informal residential
11. Old age home	12. Retail	13. Offices	14. Commercial & warehousing	15. Light industrial
16. Heavy industrial ^{AN}	17. Hospitality facility	18. Church	19. Education facilities	20. Sport facilities
21. Golf course/polo fields	22. Airport ^N	23. Train station or shunting yard ^N	24. Railway line ^N	25. Major road (4 lanes or more) ^N
26. Sewage treatment plant ^A	27. Landfill or waste treatment site ^A	28. Historical building	29. Graveyard	30. Archeological site
31. Open cast mine	32. Underground mine	33. Spoil heap or slimes dam ^A	34. Small Holdings	
Other land uses (describe):				

NOTE: Each block represents an area of 250m X 250m, if your proposed development is larger than this please use the appropriate number and orientation of hashed blocks

NORTH				
24	15	8	8	8
15	15	8	8	19
15	15		8	2
31	31	31	6	7
31	31	31	34	7
SOUTH				

WEST EAST

Note: More than one (1) Land-use may be indicated in a block

The study area is situated approximately 0.6 km southwest of Witkopdorp, and approximately 2.5 km northeast of Highbury. The study area is located approximately 1 km east of the R59 Provincial Route and 0.8 km southwest of the R557 Regional Route. The study area neighbours the northern section of the Glen Douglas Dolomite Mine.

The survey area is characterised by open flat area mostly covered in grass, trees and bushes. The survey footprint has been converted into a 4x4 track some years ago and has been landscaped with excavations and embankments and several tracks. The area has been extensively disturbed. The survey footprint is adjacent to the old Glen Douglas Dolomite mine with several excavations and mining still active in the area. A large quarry (Bass Lake) is located to the east of the survey footprint.

The survey footprint is generally very homogeneous dominated by shaped embankments and roads for use as 4x4 tracks

The landcover map for the area is show on Figure below

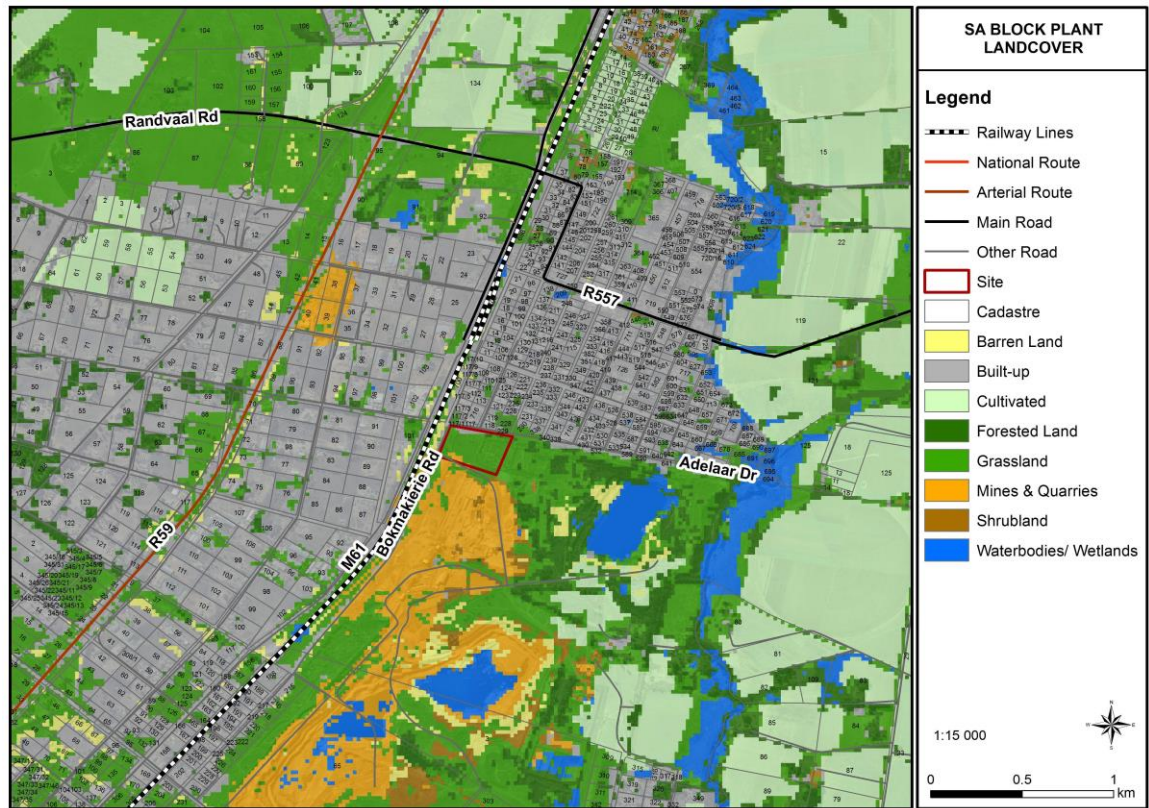


Figure 11: Land cover of the study area

Please note: The Department may request specialist input/studies depending on the nature of the land use character of the area and potential impact(s) of the proposed activity/ies. Specialist reports that look at health & air quality and noise impacts may be required for any feature above and in particular those features marked with an “A” and with an “N” respectively.

Have specialist reports been attached

YES	
✓	

If yes indicate the type of reports below

<ul style="list-style-type: none">• Biodiversity Impact Assessment• Heritage Impact Assessment• Dust Assessment• Noise and vibration Assessment• Traffic Impact Assessment
The above specialists reports are attached within Appendix D of this report

2.9. SOCIO-ECONOMIC CONTEXT

Describe the existing social and economic characteristics of the area and the community condition as baseline information to assess the potential social, economic and community impacts.

The study area is located within ward 4 of the Midvaal Local Municipality (GT422) is a Category B municipality as defined in the Municipal Structure Act (No 117 of 1998) and it falls within the jurisdiction of Sedibeng District Municipality (SDM) is regarded category C. The spatial layout of the Midvaal Local Municipal area is predominantly that of a rural area with extensive farming constituting approximately 50% of the total area of jurisdiction.

Population & Household

The population growth in Midvaal has been consistent with the current population being 111 612 people, from a base of 95 301 in 2011. The number of households has also grown significantly from a base of 29 964 to 38 046 as at 2016^{2,3,4}. The population growth in Midvaal has been localised to the areas in close proximity to the R59, as illustrated in the population density map. The remaining portions of the municipal area have relatively low density, with concentrations increasing reaching the border with the Emfuleni municipality

Basic Service Delivery

Profile Basic service delivery includes providing access to water, electricity and sanitation as well as providing waste removal. Midvaal has progressed quite steadily with regard to providing basic service delivery to all households in the community. MLM has achieved a successful reduction in the percentage of household not served to the minimum level of service quality. However, within the definition of standard of service there exists a range of products, each with differing levels of quality and customer experience which qualify as above the minimum standard. Thus, two household may be counted as served sufficiently but be receiving widely varying service experiences. With the exception of Waste Removal, all categories fall short of providing the premier services to all households

MLM Socio Economic Overview	
Population & Household Delivery	Population (2016) - 111 612 Household (2016) - 38 046 High Population Density around R59
Age Profile	70% of Population of Working Age 58% of Population is Youth
Educational	Completed Grade 12 - 48% of Population
Household Income	Majority of Households earn between R 21 350- R 42 698 per annum
Dwelling	The east and center of the municipality composed of greater number of informal settlements
Lifestyle Measures	High LSM areas in the West and around R59
Basic Service Delivery	Reduction in number of households with access to minimum level of service, since 2013. Large disparity between households with premier and non-premier services

Figure 12: Key Socio-Economic Demographics (Midvaal IDP 2020/2021, P59)

Economic Analysis

The total GDP for Sedibeng was R42.7 billion in 2013/14, of which Midvaal contributed R6.52 billion and Lesedi, R3.47 billion. Midvaal had the highest average annual economic growth, averaging 5.4% between 2003 and 2013. Lesedi averaged 4.29%, and Emfuleni, 3.12%.

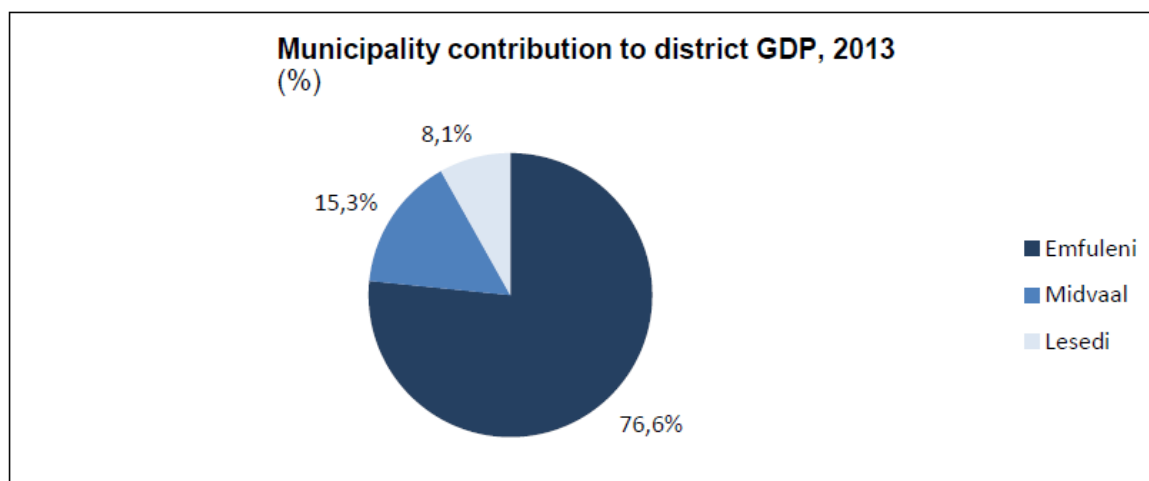


Figure 13: Municipality contribution to district GDP (Midvaal IDP 2020/2021, P61)

Economic activity by sector

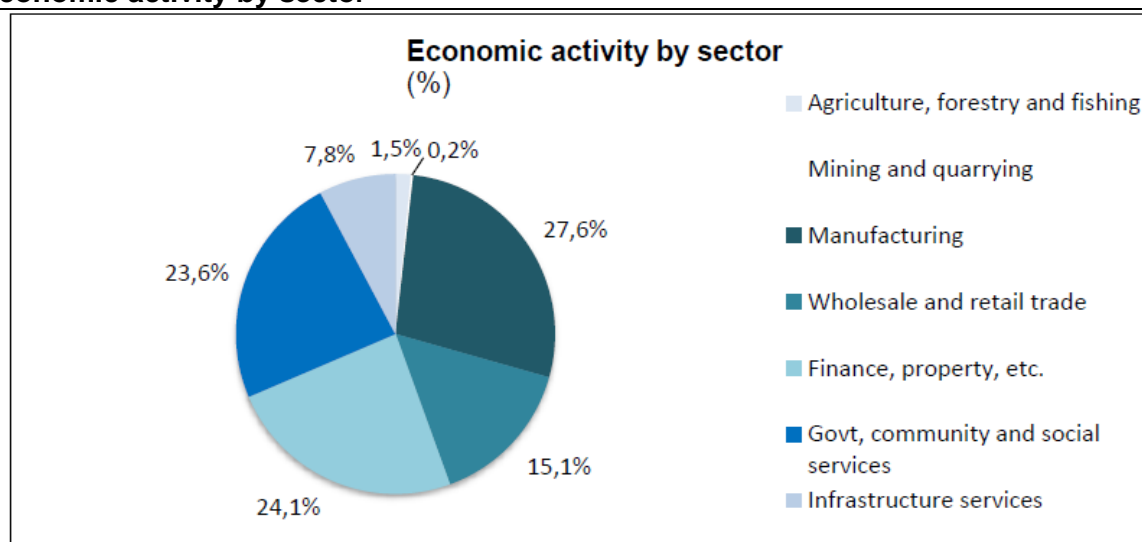


Figure 14: Economic activity by sector (Midavaal IDP 2020/2021, P62)

As can be seen in the table above, the pillars of the local economy are Manufacturing, Finance, Government, Community & Social services, Wholesale and Retail trade. These cumulatively contribute 90.4% to the local economy

Ranking the sectors from highest to lowest:

1. Manufacturing – 27.6%
2. Finance, property etc. – 24.1%
3. Government, Community and Social Services – 23.6%
4. Wholesale and retail trade – 15.1%
5. Infrastructure services – 7.8%
6. Agriculture, forestry and fishing – 1.5%
7. Mining and quarrying – 0.2%

From a growth perspective, Midvaal is endowed with the potential to diversify its economy and grow manufacturing, tourism, agriculture and construction. According to the draft spatial development framework (SDF), these are sectors with a comparative advantage. Diversification not only promotes growth within the area but also allows the economy to be resilient to negative shocks to any one specific sector.

Employment profile

The unemployment rate for Midvaal, as per the broad definition, is 18.8%¹⁷. This translates to the highest employment rate (81.2%), when compared to the provincial and district situation. The youth unemployment rate however, stands at 25.4% for those aged 15-24 (i.e. those eligible to work).

The trend within the regions extends into the employment rates of each region, with the Eastern Region experiencing the highest rates of employment across the municipality, at 85.5%, with the Central Region following closely behind at 82.8% and the Western Region

at 75.8%

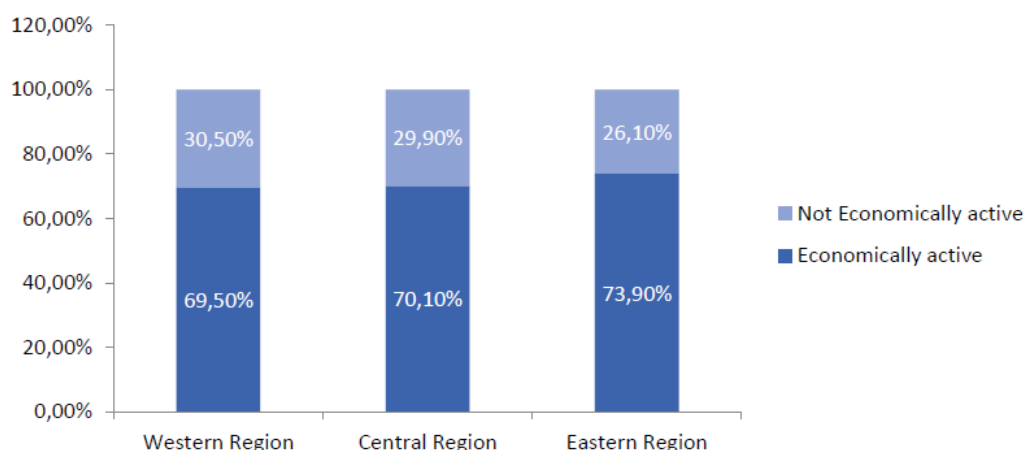


Figure 15: Employment status Midvaal regions (economically active population), 2011 (Midvaal IDP 2020/2021, P63)

2. 10. Cultural/Historical Features

Please be advised that if section 38 of the National Heritage Resources Act 25 of 1999 is applicable to your proposal or alternatives, then you are requested to furnish this Department with written comment from the South African Heritage Resource Agency (SAHRA) – Attach comment in appropriate annexure

38. (1) Subject to the provisions of subsections (7), (8) and (9), any person who intends to undertake a development categorised as-

- (a) the construction of a road, wall, powerline, pipeline, canal or other similar form of linear development or barrier exceeding 300m in length;
- (b) the construction of a bridge or similar structure exceeding 50m in length;
- (c) any development or other activity which will change the character of a site-
 - (i) exceeding 5 000 m2 in extent; or
 - (ii) involving three or more existing erven or subdivisions thereof; or
 - (iii) involving three or more erven or divisions thereof which have been consolidated within the past five years; or
 - (iv) the costs of which will exceed a sum set in terms of regulations by SAHRA or a provincial heritage resources authority;
- (d) the re-zoning of a site exceeding 10 000 m2 in extent; or
- (e) any other category of development provided for in regulations by SAHRA or a provincial heritage resources authority, must at the very earliest stages of initiating such a development, notify the responsible heritage resources authority and furnish it with details regarding the location, nature and extent of the proposed development.

Are there any signs of culturally (aesthetic, social, spiritual, environmental) or historically significant elements, as defined in section 2 of the National Heritage Resources Act, 1999, (Act No. 25 of 1999), including archaeological or palaeontological sites, on or close (within 20m) to the site?

If YES, explain:

YES

✓

A few heritage surveys have been completed in the general vicinity of the project footprint during the last few years. These include historical buildings and features as well as graves. However, no heritage sites were recorded near the survey footprint as indicated by SAHRIS 2021.

Although no Late Iron Age sites were recorded near the survey footprint, they do occur in the general region, also rock art is known in the general region

Isolated occurrences

Isolated occurrences are artefacts or small features recorded on the surface with no contextual information. No other associated material culture (in the form of structures or deposits) was noted that might provide any further context. This can be the result of various impacts and environmental factors such as erosion and modern developments. By contrast archaeological sites are often complex sites with evidence of archaeological deposit and various interrelated features such as complex deposits, stone walls and middens. However, these isolated occurrences are seen as remains of erstwhile complex or larger sites and they therefore provide a broad indication of possible types of sites or structures that might be expected to occur or have occurred in the survey footprint.

Throughout the survey footprint no isolated finds were recorded

If uncertain, the Department may request that specialist input be provided to establish whether there is such a feature(s) present on or close to the site.

Briefly explain the findings of the specialist if one was already appointed:

Palaeontological sensitivity

The palaeontological sensitivity map was extracted from the SAHRIS database and clearly shows Red (VERY HIGH) sensitivity. As a result, a field assessment and protocol for finds will be required for the survey footprint.

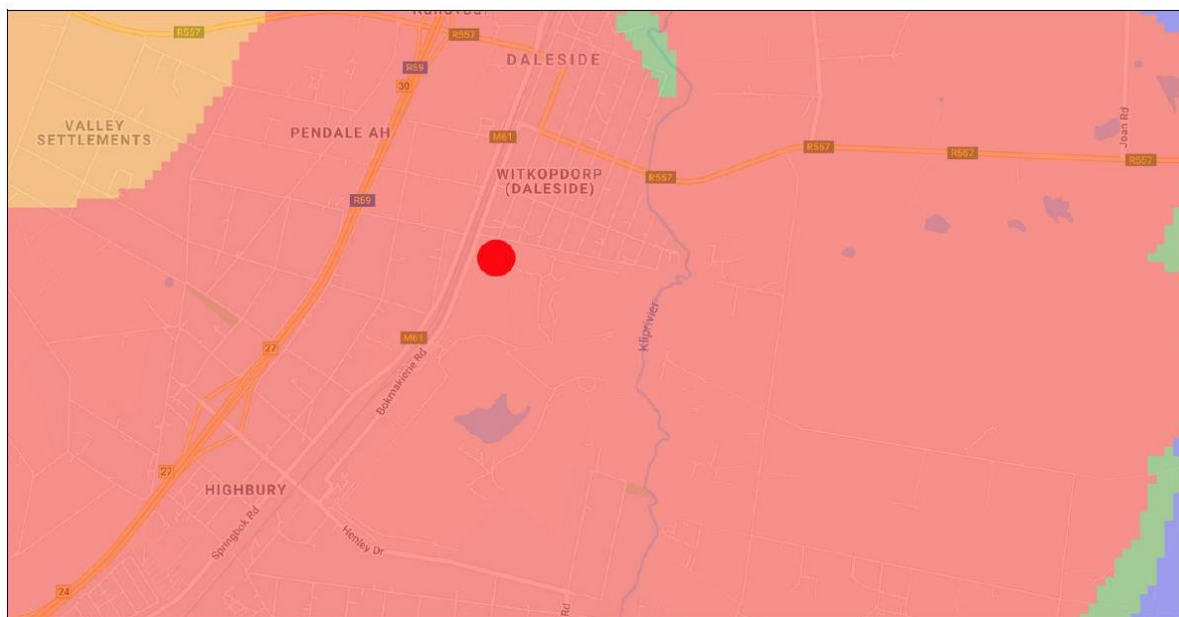


Figure 16: Palaeontological sensitivity zones as indicated for the survey footprint (SAHRIS 2021)

Colour	Sensitivity	Required Action
RED	VERY HIGH	Field assessment and protocol for finds is required
ORANGE/YELLOW	HIGH	Desktop study is required and based on the outcome of the desktop study, a field assessment is likely
GREEN	MODERATE	Desktop study is required
BLUE	LOW	No palaeontological studies are required however a protocol for finds is required
GREY	INSIGNIFICANT/ZERO	No palaeontological studies are required
WHITE/CLEAR	UNKNOWN	Will require a minimum of a desktop study. As more information comes to light, SAHRA will continue to populate the map.

Age settlements

No Stone Age settlements, structures, features, assemblages or artefacts were recorded during the survey.

Iron Age settlements

No Late Iron Age artefacts, structures, features or settlements were identified during the survey.

Graveyards

No graveyards or individual graves were identified.

Historical structures

No historical buildings or structures were recorded.

It is therefore recommended, from a cultural heritage perspective, that the proposed expansion of the existing plant, which will include the erection of a brick making plant, offices, bathroom facilities, stores and associated infrastructure may proceed.

However, please note:

Archaeological deposits usually occur below ground level. Should archaeological artefacts or skeletal material be revealed in the area during development activities, such activities should be halted, and a university or museum notified in order for an investigation and evaluation of the find(s) to take place (cf. NHRA (Act No. 25 of 1999), Section 36 (6)).

Will any building or structure older than 60 years be affected in any way?

Is it necessary to apply for a permit in terms of the National Heritage Resources Act, 1999 (Act 25 of 1999)?

If yes, please attached the comments from SAHRA in the appropriate Appendix

	NO ✓
	NO ✓

SECTION C: PUBLIC PARTICIPATION (SECTION 41)

3.1 THE ENVIRONMENTAL ASSESSMENT PRACTITIONER MUST CONDUCT PUBLIC PARTICIPATION PROCESS IN ACCORDANCE WITH THE REQUIREMENT OF THE EIA REGULATIONS, 2014.

3.2. LOCAL AUTHORITY PARTICIPATION

Local authorities are key interested and affected parties in each application and no decision on any application will be made before the relevant local authority is provided with the opportunity to give input. The planning and the environmental sections of the local authority must be informed of the application at least thirty (30) calendar days before the submission of the application to the competent authority.

Was the draft report submitted to the local authority for comment?

YES	
✓	

If yes, has any comments been received from the local authority?

	NO
	✓

If "YES", briefly describe the comment below (also attach any correspondence to and from the local authority to this application):

No comments have been received yet.

If "NO" briefly explain why no comments have been received or why the report was not submitted if that is the case.

The Draft Report was submitted to the Midvaal Local Municipality for comment; however, no comments were received from the Local Municipality. A copy of the revised report with the inclusion of the additional specialist assessments will be distributed to the Local Municipality and any comments received, will be forwarded to the GDARD for consideration.

3.3. CONSULTATION WITH OTHER STAKEHOLDERS

Any stakeholder that has a direct interest in the activity, site or property, such as servitude holders and service providers, should be informed of the application at least **thirty (30) calendar days** before the submission of the application and be provided with the opportunity to comment.

Has any comment been received from stakeholders?

YES	NO
✓	

NAME	COMMENT	RESPONSE	DATE	METHOD OF COMMUNICATION
Comments regarding Public Participation				
Daleside Community	It was indicated that not all members of the community are present and therefore, more meetings should be held to make sure that most members are consulted and informed about the proposed project	The Environmental Assessment Practitioner explained that an extension for the project timeframes to be extended has already been requested on 23rd June 2021 with the Gauteng Department of Agriculture and Rural Development (GDARD) and they are still awaiting their feedback. The ward councilor also added that prior to the lapsing time, we can try to have few meetings should the Department not grant the extension. However, this will be dependent on the presidential address that was expected over the coming weekend regarding the 3rd wave of the Covid 19 pandemic that had badly affected the Gauteng province.	24 June 2021	Community Meeting
	The community indicated that the notification and commenting period is short and requested that it be extended.	The Environmental Assessment Practitioner explained that the commenting period, which is 30 days, has been provided for as per the requirements for the NEMA EIA Regulations 2014 as amended. However, as it has been requested, more meetings will be held with community should the presidential address on Covid 19 not restrict gatherings. She concluded by saying that an extension on timeframe has also	25 June 2021	email

		been requested from the Department on 23rd June 2021 and they are awaiting the Department's response		
Peter Funke Highbury Resident	Procedure was not followed on the notice on newspapers. The ones used do not get to the people. That's why other forms of notice have to be used and the extensions on the comments needs to be extended.	<p>The public participation process was carried out as per the NEMA regulations section 41 (2) (c). It must be noted that the Environmental Assessment Practitioner confirmed with the Local Municipality and the newspaper itself that Sedibeng Ster and the Henley Herald is the right paper for the community.</p> <p>The request for extension of timeframes has already been submitted on 23rd June 2021 and we are still waiting for the Department's response. For future notifications, as agreed with the ward councillor, we will liaise with him to assist us in announcing the project on the community WhatsApp group and other forms of communication that the community use.</p>	25 June 2021	email
	The Daleside community is marginalized; feeding schemes are the order of the day. This community cannot afford in the least, to engage the applicant on a legal plane; we can only express our disgust in the way information has been fed piece-meal during the public presentation.	<p>Comment noted. As per the Daleside community meeting held on 24th June 2021, future notifications, as agreed with the ward councillor, we will liaise with him to assist us in announcing the project on the community WhatsApp group and other forms of communication that the community use.</p> <p>The full presentation was emailed on the 2nd July 2021 to all community members who have filled in the</p>		

		attendance register and provided their email addresses as per their request. The applicant has agreed to have follow-up meetings as not all the community members could attend the meeting, if Covid regulations allows.		
	The procedures and processes that need to be followed may be easily motivated by the applicant; however: if there was even a hint of transparency in this process, the applicant would have attended when told there is no newspaper distribution on this suburb, so that an advertisement in any newspaper is of absolutely no value whatsoever. Furthermore, displaying a so-called 'public notice' down the bottom of the rusted mine fence at knee-level, is a far cry from transparency	The Environmental Assessment Practitioner liaised with the newspapers and they confirmed by email that they cover Daleside and Henley on Klip areas. Site notices were placed at 8 various conspicuous areas including the site itself along Bokmakiere Road, Henley Library located 45 Regatta Rd, Henley on Klip; Randvaal Library Houtkapper Rd, Witkopdorp (Daleside), Belrose Supermarket, 87 Kroonarend Rd, Witkopdorp, Karee Road shopping complex, Witkopdorp (Daleside), Henley on Klip Post Office, 1895 Ewelme Rd, Henley on Klip, Little Austria Nursery, corner The Avenue and Wargrave ave, Henley on Klip and Henley Shopping Centre, Cnr Ewelme, Iffley Rd, Henley on Klip. After receiving this concern from numerous community members, the Environmental Assessment Practitioner has requested for an extension for timeframes with the Department on 23rd June 2021 to allow for further consultation to take place.		
Peter Meyer DMS RAPID	Please register me Peter Meyer, as an affected party with reference	Comment noted and member registered	28 June 2021	E-mail

	to the proposed brick plant			
Wynand Engelbrecht For the Daleside Volunteers	<p>There are two important points to note:</p> <ol style="list-style-type: none"> 1. Glen Douglas Mine and SA Block did not call a public meeting in Daleside for so-called 'public participation'. The city ward Councilor and the Daleside public had to call their own meeting so the mine and SA Block could present the semi-informed proposed plan. 2. The matter of the so-called brick making plant is viewed with absolute distrust by the Daleside community, as it is this community who will be worst affected by this plan. 	<p>Daleside community meeting was held on 24th June 2021 as arranged in collaboration with the ward councillor Mr Peter Teixeira. As it has been requested, more meetings will be held with community should the presidential address on Covid 19 not restrict gatherings.</p> <p>Comment noted. All comments received from Daleside community members and concerns raised have been noted in this document and will be responded to.</p>	25 June 2021	E-mail
Jon cronin 329 sontnell road, Highbury	<p>I would like to register as an interested and affected party against proposed brick plant on mine Glen Douglas in Henley/Daleside . My concerns and disagreements are</p> <ul style="list-style-type: none"> □ Lack of public notice and participation. not aimed at correct market. Most residents don't have access to 2 media adverts posted 	<p>The Environmental Assessment Practitioner liaised with the newspapers and they confirmed by email that they cover Daleside and Henley on Klip areas. Site notices were placed at 8 various conspicuous areas including the site itself along Bokmakiere Road, Henley Library located 45 Regatta Rd, Henley on Klip; Randvaal Library Houtkapper Rd, Witkopdorp (Daleside), Belrose Supermarket, 87 Kroonarend Rd, Witkopdorp, Karee Road shopping complex, Witkopdorp (Daleside), Henley on Klip Post Office, 1895 Ewelme Rd, Henley on Klip, Little Austria Nursery, corner The Avenue</p>	30 June 2021	E-mail

		<p>and Wargrave ave, Henley on Klip and Henley Shopping Centre, Cnr Ewelme, Iffley Rd, Henley on Klip.</p> <p>After receiving this concern from numerous community members, the Environmental Assessment Practitioner requested for an extension for timeframe with the Department on 23rd June 2021 to allow for further consultation to take place.</p>		
Peter Teixeira Daleside Ward Councillor	<p>I am also requesting for an extension on the public participation notice period for additional community engagements regarding this proposed development.</p>	<p>Comment noted. Request for an extension on the project timeframes to be extended has already been requested on 23rd June 2021 with the Gauteng Department of Agriculture and Rural Development (GDARD) and they are still awaiting their feedback. The applicant has also agreed to more consultation meetings with the community</p>	30 June 2021	E-mail
Stan Wallace Geln Douglas Mine Residents Forum	<p>I am the chairman of the Glen Douglas Mine resident's forum which has been in existence for roughly 30 years. It represents residents affected and potentially by mining activity within a 3km radius from the mines fence line. While theoretically this is not a mining operation, it will still take place on mining ground, which still has to be rezoned.</p> <p>On the 25 May 21021 at 16h20 I</p>	<p>The Environmental Assessment Practitioner has contacted Mr. Wallace as a courtesy call based on his position held on the Glen Douglas Mine Residence Forum to inform him about the proposed project. The Environmental Assessment Practitioner explained that the public participation process has not commenced yet and that all I&APs including members of the Mine Forum will be provided with detailed written information about the proposed project.</p>	30 June 2021	E-mail

	<p>received a call in my capacity as the chairman of The Glen Douglas Mine Residents forum which is a required organisation in the Glen Douglas mines EMP.</p> <p>It was from Ntsanko Ndlovu who informed me of the application regards a proposed brick works to be erected on the mine.</p> <p>No mention of a bitumen tar plant nor a ready-mix cement type of development. I asked for more information and was told I must wait till this is published. I enquired would there be public participation and was told yes.</p> <p>Again, enquired what is the plant and was told to wait, I ended the call as it was clear it was purely an academic call of no real value.</p>	<p>The Environmental Assessment Practitioner has sent out emails with Background Information Documents (BIDs) to all I&APs including Mr. Wallace on 27th May 2021 to announce the project and explained on the email that the Draft Basic Assessment Report (DBAR) will be shared with all stakeholders from the 1st June 2021.</p> <p>The Environmental Assessment Practitioner sent out a link with the Draft Basic Assessment Report on 1st June 2021 (see attached proof of I&APs correspondence).</p> <p>The Mine Forum requested a focus group meeting and it was held with the Environmental Assessment Practitioner and the representatives of the applicant on Monday 21st June 2021 at 6pm (see attached attendance register and minutes).</p>		
<p>Stan Wallace Glen Douglas Mine Residents Forum</p>	<p>On receiving the documents on the 1st of June, we noted there is a 30 day period to comment.</p> <p>From the outset we pointed out that many of the affected people are living under impoverished circumstances where a meal is a luxury and as the process at it stood then was purely electronic removing them from a process that may affect their lives either positively or negatively.</p> <p>I and many others were told this</p>	<p>The NEMA EIA regulations 2014 as amended stipulates that I&APs must be provided with a 30-day commenting period of Draft the Basic Assessment Report and all stakeholders for this project were asked to comment on the Draft Basic Assessment Report from Tuesday 1st June to Thursday 1st July 2021.</p> <p>On an email sent to Mr Wallace on 15th June 2021, the Environmental Assessment Practitioner explained the following: "Before Covid 19, we used to</p>	30 June 2021	E-mail

	<p>route is legally acceptable and no public meetings will be allowed due to covid regulations, which at that stage was a blatant distortion of reality.</p>	<p>place draft reports in libraries or common areas that the communities may suggest for the general public/communities to review. However, Directions issued by the Minister of Forestry, Fisheries and the Environment in terms of Regulation 10(8) of the Regulations issued in terms of section 27(2) of the Disaster Management Act, 2002 (act no. 57 of 2002): Measures to Address, Prevent and Combat the spread of covid-19, have discouraged the sharing of hard copies with any interested and affected parties as well as having meetings with large number of people to combat the spread of the Covid 19 virus. These Directions have therefore recommended the sharing of all EIA related projects in a cloud format; hence the link has been indicated on the newspaper advert, site notice and written notices sent out by email.</p> <p>As per the Glen Douglas Mine Forum request, a Focus Group meeting was held on 21st June 2021 it followed Covid 19 in terms of social distancing and keeping the number under 50. In collaboration with the ward councillor and per Glen Douglas Mine Forum's recommendations, a consultation meeting with some members of the Daleside community was held on</p>		
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		Thursday 24th June 2021 and it was on the meeting that follow-up meetings will be held with the community.		
Stan Wallace Glen Douglas Mine Residents Forum	<p>We as a mine forum insisted on a meeting which was eventually agreed to but only on the 22nd of June as the mine manager was not available.</p> <p>In correspondence it was noted by Ntsanke Ndlovu that the area councilor Peter Texiera did not answer calls or reply earlier during the process. I in a matter of minutes ascertained he and family were involved in a car accident and informed her of this.</p> <p>On the 20th I contacted him to discover it appeared no further attempts were made to contact him.</p> <p>It had taken me all of 30 seconds to make contact with him.</p> <p>On the 22nd May a presentation was done by Ntsake which said a lot about nothing.</p>	<p>The Environmental Assessment Practitioner indeed tried to contact the ward councilor from the 1st day she contacted Mr. Wallace on 24th May 2021 but could not get hold of him until she requested one of the community members (Mr. John Maphalala) to inform him that she's urgently looking for him. The Environmental Assessment Practitioner was informed by Mr. Maphalala that the ward councilor was involved in a car accident and he still recovering, however, the Environmental Assessment Practitioner's contact details were provided to ward councilor who had indicated that he'll contact the Environmental Assessment Practitioner when he is feeling better.</p>	30 June 2021	E-mail
Stan Wallace Glen Douglas Mine Residents Forum	<p>On the 22nd May a presentation was done by Ntsake which said a lot about nothing.</p> <ul style="list-style-type: none"> It was pointed out, as it had been previously in the mine furnace attempt that the newspaper they used Ster, is not available in the area, the second one The Henley 	<p>The Environmental Assessment Practitioner liaised with the newspapers and they confirmed by email that they cover Daleside and Henley on Klip areas. Site notices were placed at 8 various conspicuous areas including the site itself along Bokmakiere Road, Henley Library located 45 Regatta Rd, Henley on</p>		

	<p>Herald is more of an advertorial in Henley and is neither distributed in any of the areas directly affected by this application. We were told that's tough luck as it complies legally.</p> <ul style="list-style-type: none"> • We explained that the notices they put up had no value as it referred them to documents on the internet that they have no access to, this is contradictory to our countries constitution as they were being discriminated purely because they were poor. Which is why a public meeting is required. • We indicated that the residents especially in Daleside directly next to the mine have limited access to the internet even if it's at the library, we were initially told its legally compliant and as such not a concern in the application. • It was enquired as to what studies were done, we were told only the one to determine if there were graves or endangered animals, which there are none. • But this is common knowledge as prior to this they had 	<p>Klip; Randvaal Library Houtkapper Rd, Witkopdorp (Daleside), Belrose Supermarket, 87 Kroonarend Rd, Witkopdorp, Karee Road shopping complex, Witkopdorp (Daleside), Henley on Klip Post Office, 1895 Ewelme Rd, Henley on Klip, Little Austria Nursery, corner The Avenue and Wargrave ave, Henley on Klip and Henley Shopping Centre,Cnr Ewelmee, Iffley Rd, Henley on Klip.</p> <p>After receiving this concern from numerous community members, the Environmental Assessment Practitioner has requested for an extension for timeframes with the Department on 23rd June 2021 to allow for further consultation to take place.</p> <p>Meeting was held on Monday 21st June 2021 not May 22nd (see attached attendance register) The EIA NEMA Regulations 2014 as amended, specifies that a project must be advertised on a local newspaper. The Local Municipality and the newspaper itself confirmed that the Sedibeng Ster and Henley Herald covers the Daleside and Henley on Klip</p>		
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	<p>applied for other activities on the same ground so these reports are freely available and add zero real value. It also states this in the mines EMP.</p> <ul style="list-style-type: none"> • The reports which actually would add value to the process are: <ul style="list-style-type: none"> o Noise o Dust o Vibration o Traffic • Yet these were deemed not important enough and as such were not done. We were told if we see them as important, we can ask for them to be done, but they would only be done after closing of comments. • Two days later we discovered in a non-transparent way the mine doing noise report tests behind the mine forums back. These were done with a consultant who is aware that it was agreed to those two forum members would be invited to attend as observers. The excuse was they never knew the mine forum should have a representative there as agreed to by both parties. What is upsetting is they were reminded of this at the 	<p>area.</p> <p>The Environmental Assessment Practitioner presented studies done as requested by the National Department of Environmental, Forestry and Fisheries.</p> <p>Other potential impacts related to dust, noise, traffic and other impacts have also been identified and assessed as per the prescribed impact assessment methodology and the impact significance was found to be low due to the construction and layout of the proposed operation.</p> <p>The applicant agreed to conduct further investigations with regards to noise, dust, vibration and traffic impact. The Environmental Assessment Practitioner will liaise with the Department of Gauteng of Agriculture and Rural Development to request an extension on the project timeframes to ensure that the findings of these investigations are incorporated into the Draft Assessment Report that will have to be send out to all registered stakeholders for 30 days them to provide their comments.</p>		
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	<p>previous forum meeting about three weeks prior to this, plus why did they not mention they doing tests during the Afrimat and forum meeting regards the brick works 48 hours earlier. This raises more questions than answers one being that the community is of no importance.</p> <ul style="list-style-type: none"> • At the beginning of the forum meeting, it was asked that the process should be delayed to allow fair public participation, this was refused. After a long debate it was agreed to by afrimat that an extension would be requested to allow a more balanced public participation period. • It was stated throughout the mine forum / Afrimat meeting its impossible to arrange a public meeting due to covid. Yet Mr Texiera the areas councillor in two days arranged a public meeting fully compliant with regulations attended by nearly 50 people, all questioning why there was an attempt to side-line them and others not attending due to the short notice of the meeting. 	<p>This comment has no relevance to the proposed project and should be raised with the management of the Glen Douglas Dolomite Mine.</p> <p>In collaboration with the ward councilor and per Glen Douglas Mine Forum's recommendations, a consultation</p>		
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	<ul style="list-style-type: none"> The irony is Afimat tried at the meeting arranged by Mr Texiera in Daleside to give the impression the meeting was called and arranged by them, when the reality was, they had refused to call one since the start of this process. 	meeting with some members of the Daleside community was held on Thursday 24th June 2021 and it was on the meeting that follow-up meetings will be held with the community.		
Dougherty Alan Affected Property owner, 322 Dinsdale Rd Highbury Ext 1	Hereunder please find my comments and misgivings re your Basic assessment report and application to build a brick/block plant on portion of Glen Douglas Dolomite's property on corner of Bokmakierie and Adelaar Street. The timing of the application during Covid lockdown conditions	After receiving this concern from numerous community members, the Environmental Assessment Practitioner has requested for an extension for timeframes with the Department on 23rd June 2021 to allow for further consultation to take place. As per the Daleside community meeting held on 24th June 2021, future notifications, as	1 June 2021	E-mail

	and at a time when the Town Councilor for the area was recovering from a motor accident seem to the applicant's advantage and not the affected parties. Even though the minimum legal requirements of the application seem to be met, the most important considerations and studies have been ignored and omitted where they should have been undertaken and accurate not contradictory, vague or completely irrelevant as per the application. Public information and participation have been very low profile and inadequate considering the area.	agreed with the ward councilor, we will liaise with him to assist us in announcing the project on the community WhatsApp group and other forms of communication that the community use.		
Mr. S. Wallace	Mr. Wallace requested information on how interested and affected parties are given the necessary information if they do not have email.	<u>Response from Ms. White:</u> Ms. White responded that hard copies can be collected from Mr. Leon. Kirchner at the Firehouse Gym on Tuesday 30 November 2021	29 November 2021	Public Consultation Meeting
Mr. A. Dougherty	Mr. Dougherty wanted to know when the report will be issued.	<u>Response from Ms. White:</u> Ms. White replied and said the report will be issued during this week. Ms. White explained that she was waiting for this public meeting to complete the minutes as well as the comments and response report. The report will be sent to the applicant by no later than Wednesday (1 December 2021) for review and approval and then be	29 November 2021	Public Consultation Meeting

		submitted to the department and distributed to all interested and affected parties on Thursday (2 December 2021).		
Mr. A. Dougherty	Mr. Dougherty expressed his concern about the lack of time for commenting on the reports.	<p><u>Response from Ms. White:</u> Ms. White explained that she communicated with the department official and explained the situation, because of the delay with the specialist studies. Ms. White received a response from the official stating she will be out of the office until 30 November 2021. Ms. White will communicate with the department and request that a period of 30 days be granted for public comments to be sent to her or directly to the department.</p> <p>Ms. White stated that she cannot confirm at this time and that she is waiting for a response from the department official.</p>	29 November 2021	Public Consultation Meeting
Comments relating to traffic				
Daleside community	<p>Traffic must be diverted away from the Daleside area as the roads are currently in a bad condition.</p> <p>Trucks must use the Henley Drive off-ramp and the entrance to the proposed site must be changed not to be closer to the community</p>	<p>A possible solution might be to have the road permanently closed at Bokmakierie and Adelaar Streets. The applicant agreed to investigate the traffic impact further. Note on the matter, the community needs to consider the negative economic impact on small businesses</p>	24 June 2021	Meeting with community

	to ensure that trucks do not use the streets of Daleside	in Daleside main streets as a result of diverted traffic.		
Wynand Engelbrecht For Daleside Volunteers	<p>The Daleside Volunteers (a thoroughly constituted NPO representing the Daleside community-at-large at the Glen Douglas Mine Forum) herewith submits:</p> <ul style="list-style-type: none"> We are sorely concerned that the initial impact studies on traffic, noise and dust were not included in the presentation, yet there is concern for the impact on the flora and fauna. There is a school some 300 meters away from the proposed site, and residential properties less than 100 meters away. 	<p>The Environmental Assessment Practitioner presented studies done as requested by the National Department of Environmental, Forestry and Fisheries. Other potential impacts related to dust, noise, traffic and other impacts have also been identified and assessed as per the prescribed impact assessment methodology and the impact significance was found to be low due to the construction and layout of the proposed operation.</p> <p>The applicant agreed to conduct further investigations with regards to noise, dust, vibration and traffic impact. The Environmental Assessment Practitioner will liaise with the Department of Gauteng of Agriculture and Rural Development to request an extension on the project timeframes to ensure that the findings of these investigations are incorporated into the Draft Assessment Report that will have to be send out to all registered stakeholders for 30 days them to provide their comments</p>	25 June 2021	E-mail
Wynand Engelbrecht For Daleside Volunteers	A separate entrance for truck traffic is indicated near corner of Bokmakierie Road and Adelaar Street. It is 100 meters away from the existing gate in Bokmakierie Road. There is no clarity even as	This matter should be discussed at municipal and provincial level to find a workable solution to address this concern that has been raised in the past in this specific area.	25 June 2021	E-mail

	to which institution is responsible for the upkeep and maintenance of Bokmakierie Road; what therefore, will be the outcome of spending on bulk contribution to upgrade the 'new intersection' as proposed, to make provision for heavy trucks using the gate; normal tar surfaces do not last under these severe conditions.	A possible new intersection and bulk contribution to possible upgrade will be dealt with on local municipal level should the project be authroised by the Gauteng Department of Agriculture and Rural Development. The applicant agreed to further investigate the traffic impact of this proposed project		
Wynand Engelbrecht For the Daleside Volunteers	A traffic impact study, considering the effect of added truck traffic through Daleside, needs to be conducted. Kroonarend Street and Karee Road will come under renewed stress.	The applicant agreed to further investigate the traffic impact of this proposed project.	25 June 2021	E-mail
Grant Miles Neve Sontnell road, 323	Currently the mine cannot control the large trucks that come into the village despite there being a weight restriction, on many occasions they come down Sontnell Road to the wrong entrance only to turn round again and cause severe destruction of our road, this has many potholes due to this. The mine staff use Sontell as a raceway, my child rides his horse on the road and on several occasions, the speed has nearly caused a severe accident	Although the comment has no direct relevance to the proposed project, the applicant agreed to further investigate the traffic impact of this proposed project to ensure that the occurrence of similar incidents is minimised as far as possible.	28 June 2021	e-mail
Jon Cronin 329 Sontnell road, Highbury	Road traffic increase, already henley and bokmekkerie str are	The applicant agreed to further investigate the traffic impact of this	30 June 2021	e-mail

	heavy traffic areas and road is in ill state of repair and dirty from trucks leaving mine without lawfully being covered. mine failing already to address stipulated law.	proposed project.		
Jon Cronin 329 Sontnell road, Highbury	Sontnell road is literally a 1 lane road but trucks constantly misuse road to go to main gate instead of bokmekkerie str entrance. There is a school on sontnell road and these trucks are a major risk and also pass 2 5 tonne signs to reach sontnell street which again is unlawful	Although the comment has no direct relevance to the proposed project, the applicant agreed to further investigate the traffic impact of this proposed project to ensure that the occurrence of similar incidents is minimised as far as possible.	30 June 2021	e-mail
Stan Wallace Glen Douglas Mine Residents	Naturally such a plant will increase traffic, to what extent is unknown as no facts were presented, but the impact will be reduced if no clinker ash is trucked in. The road already can't cope and is in poor condition as Midvaal Council believes it's a provincial road and the provincial authorities can't verify or deny this, Wynand Engelbreght indicated he may submit information on this.	This matter should be discussed at municipal and provincial level to find a workable solution to address this concern that has been raised in the past in this specific area. The applicant agreed to further investigate the traffic impact of this proposed project	30 June 2021	email
Alan Dougherty Affected Property owner, 322 Dinsdale Rd Highbury Ext 1	Irrespective of whether legally required or not the following studies should have been undertaken to show willingness to transparency. • Road Access safety and	The applicant agreed to further investigate the traffic impact of this proposed project.	01 July 2021	e-mail

	maintenance responsibilities			
Stan Wallace Chairperson: Glen Douglas Mine Residents Forum	Mr Wallace requested confirmation whether the outbound lane is within the parameter of the project footprint	Ms. White confirmed that it was lanes on Bokmakierie road to ensure access from Bokmakierie road to the site	23 November 2021	Glen Douglas Mine Community Forum meeting
Alan Dougherty Affected Property owner, 322 Dinsdale Rd Highbury Ext 1	Mr Dougherty requested confirmation whether new lanes are going to be built on Bokmakierie road.	Ms. White confirmed that new lanes are going to be built as per the mitigation measures in order to ease traffic	23 November 2021	Glen Douglas Mine Community Forum meeting
	Mr Dougherty requested information on who the material will be transported from the mine to the brick plant.	<p><u>Response from Mr. Swanepoel:</u> Trucks will be used to transport the materials from the mine to the brick plant and there will be approximately 4 trucks per week delivering cement</p> <p><u>Response from Mr. Da Serra:</u> In the future conveyer belts will be used to transport materials used from the mine to the brick plant.</p>	23 November 2021	Glen Douglas Mine Community Forum meeting
Danie Grobbelaar	Mr. Grobbelaar expressed his concern about the traffic assessment that has been done. According to Mr. Grobbelaar, Bokmakierie road is in a bad condition and adding traffic to that road will only worsen the state of the road. He would like to note that the road is beyond repair.	<p><u>Response from Ms. White:</u> Ms White explained that the Traffic assessment was done by looking at how many vehicles will be travelling to and from the facility and according to these numbers (8 and 11 respectively), a conclusion was made that the additional traffic will not be significant.</p>	23 November 2021	Glen Douglas Mine Community Forum meeting

		The specialist stated that there will be an additional 8 to 11 trips on that road which is not significant.		
Comments relating to noise and vibration				
Daleside Community	The community requested that the brick plant should not operate at night because of vibrations that will be coming from the facility which will disturb their rest and sleep at night. This point is supported because they are currently experiencing vibrations from 3-5km away from another brick plant, meaning this one will be worse since it will be a few meters away from their houses	The applicant has committed to operate the proposed facility within the current working hours of the mine.	24 June 2021	Community Meeting
Peter Funke Highbury Resident	The following issues must be addressed by the EMP <ul style="list-style-type: none"> • Noise • Dust • Vibration and • Social impact 	The applicant agreed to conduct further investigations with regards to noise, dust, vibration and traffic impact. The Environmental Assessment Practitioner will liaise with the Department of Gauteng of Agriculture and Rural Development to request an extension on the project timeframes to ensure that the findings of these investigations are incorporated into the Draft Assessment Report that will have to be send out to all registered stakeholders for 30 days them to provide their comments	28 June 2021	E-mail
Grant Miles Neve Sontnell Road 323	The noise currently from the mine is annoying to say the least, we can never sleep with windows open in the summer	Although the comment has no direct relevance to the proposed project, the applicant has agreed to further investigate the possible noise impact of	28 June 2021	E-mail

		this proposed project to ensure that the occurrence of similar incidents is minimized as far as possible		
Peter Teixeira Daleside Ward Councillor	<p>Good Evening Trust this email finds you well. I would like to hereby forward the communities concerns regarding the proposed brick making plant. The important points of concern raised by the community are as follows:</p> <ul style="list-style-type: none"> Noise pollution that may emanate from the development/ Nearest residential property is 100 meters from the proposed development site. Volumes of heavy-duty vehicles that will go through the residential area/ No traffic impact study done. 	The applicant agreed to conduct further investigations with regards to noise, dust, vibration and traffic impact. The Environmental Assessment Practitioner will liaise with the Department of Gauteng of Agriculture and Rural Development to request an extension on the project timeframes to ensure that the findings of these investigations are incorporated into the Draft Assessment Report that will have to be send out to all registered stakeholders for 30 days them to provide their comments	30 June 2021	e-mail
Jon cronin 329 sontnell road, Highbury	Noise levels are a concern to residential surrounding areas	The applicant has agreed to further investigate the possible noise impact of this proposed project to ensure that the occurrence of similar incidents is minimised as far as possible. In addition, the applicant has committed not work outside the current Glen Douglas Mine working times.	30 June 2021	e-mail
Stan Wallace Glen Douglas Mine Residents Forum	The issues that need clarity are: The mine has a long history of noise issues going back decades. This has never been resolved, but	The applicant has agreed to further investigate the possible noise impact of this proposed project to ensure that the occurrence of similar incidents is	30 June 2021	e-mail

	<p>more like a compromise was accepted as there is no solution to a mine operating next door to residential stands till late at night in hours that are intrusive to the community. And the proposed brick plant has had zero noise impact studies done, naturally it will impact on the surrounding areas, but until they do what should have been done, that impact is based on guessing.</p>	<p>minimised as far as possible. In addition, the applicant has committed not work outside the current Glen Douglas Mine working times.</p>		
	<p>VIBRATION It was explained that the brick manufacturing process uses vibration to compact the bricks. Numerous people have pointed out their homes are affected by a similar brick plant that is further away that this proposed one.</p> <p>SA Block stated theirs is different but could not actually say why nor show samples of what the plant will look like as they admitted the one attached to the documents is actually just a picture and not the actual plant.</p> <p>No one from SA Block have been able to state what will happen if vibration is an issue, its already an issue with many complaining about the mines ground vibration, what will SA Block do if they add</p>	<p>The applicant has agreed to further investigate the possible vibration impact of this proposed project to ensure that it complies with relevant regulation/s and legislation which should result in minimal impact on the surrounding residences.</p> <p>The differences in specifications between the machines as referred by Mr. Wallace will be requested from the supplier and will be shared once received.</p>	30 June 2021	email

	to it, or are people simply expected to live with it?			
	Mr Wallace requested clarification whether a noise barrier could or would be placed along the northern and along part of the eastern site boundaries.	<u>Response from Ms. White:</u> If it is found that the impact is so severe a noise barrier can be placed, however, Mr. Swanepoel confirmed that a noise barrier will be placed to reduce the noise impact.	23 November 2021	Glen Douglas Mine Forum Meeting
	Mr. Wallace expressed his concern about the reverse alarm noises that will be generated and requested clarification on how this will be mitigated.	<u>Response from Mr. Da Serra:</u> Mr. Da Serra reassured Mr. Wallace that the brick manufacturing facility will have to comply with the Occupational Health and Safety regulations and not the regulations issued by the Department of Minerals and Energy and therefore the rules and regulations are not as stringent as required or the mining operation. The alarm noises will therefore be effectively mitigated, but still be audible to be heard for safety purposes.	23 November 2021	Glen Douglas Mine Forum Meeting
	Mr. Wallace requested clarification whether the Noise Study done by the Mine was separate from this project	<u>Response from Mr. Swanepoel:</u> Mr Swanepoel confirmed that it was a separate study.	23 November 2021	Glen Douglas Mine Forum Meeting
	Mr. Wallace requested information about a Vibration Impact Assessment	<u>Response from Mr. Swanepoel:</u> The Vibration Assessment was included within the scope of work for the noise impact assessment conducted. The specialist report will be reviewed to include this aspect.	23 November 2021	Glen Douglas Mine Forum Meeting

	<p>Mr. Wallace wanted to know to which regulations the operation of the conveyor belt will have to comply with when materials are transported.</p> <p>Mr. Wallace's concern with the conveyor belt is the sirens which make a lot of noise.</p>	<p><u>Response from Mr. Ackerman:</u> The operation of the conveyor belt will have to conform with the mine's regulations.</p>	23 November 2021	Glen Douglas Mine Forum Meeting
<p>Alan Dougherty Affected Property owner, 322 Dinsdale Rd Highbury Ext 1</p>	<p>Irrespective of whether legally required or not the following studies should have been undertaken to show willingness to transparency.</p> <ul style="list-style-type: none"> Noise generation & mitigation, considering the proximity to residential areas. Dust generation & mitigation also. considering the proximity to a residential area and primary school. Multiple noise creation on adjacent plants would not be possible to monitor and separate responsibility. No similar block plants exist locally allowing for site assessment of the noise & pollution. 	<p>The applicant agreed to conduct further investigations with regards to noise, dust, vibration and traffic impact. The Environmental Assessment Practitioner will liaise with the Department of Gauteng of Agriculture and Rural Development to request an extension on the project timeframes to ensure that the findings of these investigations are incorporated into the Draft Assessment Report that will have to be send out to all registered stakeholders for 30 days in order for them to provide their comments</p>	01 June 2021	e-mail
	<p>Mr. Dougherty objected to the daytime and night-time noise</p>	<p><u>Response from Ms. White:</u> Ms. White reminded Mr Dougherty that</p>	23 November 2021	Glen Douglas Mine Community Forum

	<p>levels. He expressed that the noise levels are too low. Mr Dougherty used the mine plant to explain that households that are located 3 kilometres from the mine can still hear the reverse alarms during night-time.</p>	<p>the assessment was undertaken by a noise specialist and that the comment will be noted.</p>		Meeting
	<p>Mr. Dougherty requested clarification about the operating hours for the proposed development as daytime could mean anytime from when the sun rises until the sun sets.</p> <p>He also expressed that the mine's operating hours are from 6am to 10pm and he requested information whether the plant will also be operated during these hours.</p>	<p><u>Response from Mr. Swanepoel:</u> Mr. Swanepoel confirmed that the noise specialist indicated according to international standards, day-time operating hours are indicated as 6:00 – 22:00. Confirmation will however be given upon review of the previous minutes.</p>	23 November 2021	Glen Douglas Mine Community Forum Meeting
Danie Grobbelaar	<p>Mr. Grobbelaar also requested clarification about the operating hour and expressed that it was said that the operating hours will be from 6am to 6pm during the previous meeting held.</p>	<p><u>Response from Mr. Swanepoel:</u> Mr. Swanepoel confirmed that the noise specialist indicated according to international standards, day-time operating hours are indicated as 6:00 – 22:00. Confirmation will however be given upon review of the previous minutes.</p>	23 November 2021	Glen Douglas Mine Community Forum Meeting

	Mr. Grobbelaar disagrees with the base line noise levels and argues that it is over exaggerated.	<u>Response from Ms. White:</u> No comment can be made as Ms. White is not the Noise Specialist. The comment is therefore noted.	23 November 2021	Glen Douglas Mine Community Forum Meeting
Mr. R. Geberthuel	Mr. Gaberthuel requested clarification whether the bricks are going to remain in the shed or are the bricks going to be moved out to the yard at some point. Mr Gaberthuel also wanted to know if the access gate on the west end side of the proposed operation will be open or closed during the night.	<u>Response from Mr. Swanepoel:</u> Mr Swanepoel explained that on the southwestern side, there will be an exit gate where the forklift will exit with a parcel, and it will be placed in the yard where the trucks will load the parcel. Mr Swanepoel stated that the southwestern access gate will be open at all times.	29 November 2021	Public Consultation Meeting
Mr R. Geberthuel	Mr. Gaberthuel requested clarification on how the company would assure the residents living within a close proximity of the proposed plant a peaceful night's sleep when working overtime or night shift. Mr. Gaberthuel also stated that no one has spoken about wind blowing from the west to the east which will increase noise levels. He added that the existing brick plant is causing him to have endless headaches and lack of sleep due to noise vibration. Mr. Gaberthuel wanted to know what the company is going to do to mitigate these impacts to ensure the residents a	<u>Response from Mr. Swanepoel:</u> Mr Swanepoel reassured Mr Gaberthuel that the operating hours for the plant will be from 6am to 10pm and that they will not work overtime. <u>Ms. White</u> added that the company should comply to all regulations and standards and if they do not comply, it will have to be addressed by the Competent Authority.	29 November 2021	Public Consultation Meeting

	peaceful night's sleep.			
Mr. A. Dougherty	Mr Dougherty made a statement by saying that there is already one plant generating noise and dust. The moment the second plant is put up on the same property they will be blaming one another for the noise and dust impact, and no one will be held accountable.	Noted	29 November 2021	Public Consultation Meeting
Mr S. Wallace	Mr Wallace objects to referring to the previous meeting held with the Henley Liaison Forum as a public participation meeting. According to Mr Wallace the meeting held with the Henley Liaison Forum was to discuss noise, dust, and vibration and that he has not received the information that he required in that meeting. Mr Wallace expressed his concern that he was not given a hard copy of each specialist report during that meeting.	<u>Response from Ms. White:</u> Ms. White reiterated that the specialist only concluded their assessments after their due date and therefore a summary of the findings was presented within the meetings. All I&AP's will however receive a copy of the reports as well as revised Basic Assessment Report to provide insurance that all comments received have been included within the report submitted to the GDARD.	29 November 2021	Public Consultation Meeting
Comments related to Ecology				
Stan Wallace	Mr Wallace wanted to know what species was found to be of conservation concern.	<u>Response from Ms. White:</u> The species name will be included within the Final Basic Assessment, as it was omitted from the presentation	23 November 2021	Glen Douglas Mine Community Forum Meeting
Comments related to dust				
Grant Miles Neve Sontnell road, 323	The constant dust, yes despite the mines finding, come and see our pool filter sand on a regular basis.	Comment noted. The possible impact of dust emission will be further investigated and findings will be shared	28 June 2021	e-mail

		with all interested and affected parties.		
Daleside community	Work area must be paved to reduce dust impact	Agreed	24 June 2021	Meeting with Daleside community
Peter Teixeira Daleside Ward Councillor	The important points of concern raised by the community are as follows: <ul style="list-style-type: none"> Dust that may emanate from this development. 	The possible impact of dust emission will be further investigated and findings will be shared with all interested and affected parties	30 June 2021	e-mail
Jon Cronin 329 Sontnell road, Highbury	Dust levels as initially said was going to be a Klinger ash plant but since been changed. If we are to believe anything. Non transparency	The reference to clinker ash in the original application was based on the current SA Block operational model. The proposed operation is to utilize the Glen Douglas Mine material as aggregate in the mix designs.	30 June 2021	e-mail
Stan Wallace Glen Douglas Mine Residents Forum	The mine area has a huge dust issue simply because dust and mining go hand in hand. SA Block state they will mitigate this by having most of the production inside a building. They also state that the use of clinker ash which would be used in the production process, being trucked in was incorrect and that they will not use it. That needs to be corrected in writing with an undertaking that clinker ash won't be used now or in the future as the aggregates are 100% from the mine and won't be trucked in adding to an already badly stressed traffic impact.	The possible impact of dust emission will be further investigated and findings will be shared with all interested and affected parties. The reference to clinker ash in the original application was based on the current SA Block operational model. The proposed operation is to utilize the Glen Douglas Mine material as aggregate in the mix designs.	30 June 2021	email
Dorette Funke	Also, the dust that will be	The possible impact of dust emission	30 June 2021	e-mail

3-303 Dinsdale Road, Highbury	generated will be significant and I fear for the air quality that will be diminished.	will be further investigated and findings will be shared with all interested and affected parties. Once operational, SA Block will ensure that the dust emissions will comply with minimum requirements as per the National Air Quality Act and the Occupational Health and Safety Act.		
Danie Grobbelaar	Mr Grobbelaar requested information on how a dust impact assessment was done without the plant being operational currently	<u>Response from Ms. White:</u> All specialist reports will be sent to all interested and affected parties. The PowerPoint presentation only contains the summary of all the specialist studies and does not go into detail about what methodology was used for the assessment.	23 November 2021	Glen Douglas Mine Community Forum Meeting
Alan Dougherty Affected Property owner, 322 Dinsdale Rd Highbury Ext 1	Mr. Dougherty stated that the impact of dust cannot be assessed if no design for the brick manufacturing plant exists.	<u>Response from Mr. Swanepoel:</u> The designs will be undertaken upon a decision from the Environmental Authority. Undertaking the designs for the development is an enormous cost if it is not yet known whether the development will be approved. Your comment is however noted.	23 November 2021	Glen Douglas Mine Community Forum Meeting
Comments relating to the operation of Glen Douglas Mine				
Grant Miles Neve Sontnell road, 323	The mine has made many promises to the community over the 18 years I have lived in the village, to me, they disrupt the peace and tranquillity of the village and I see the brick works as only	The possible impact of traffic, dust, noise emissions will be further investigated and findings will be shared with all interested and affected parties. Once operational, SA Block will ensure that the dust emissions will comply with	28 June 2021	e-mail

	adding to our misery both in noise, traffic and dust, this cannot be allowed to go ahead	minimum requirements as per the National Air Quality Act and the Occupational Health and Safety Act.		
	also hear from the mine forum that the mine has sneaked through rezoning	The re-zoning will be addressed with the local municipality should the proposed project be authorised by the Gauteng Department of Agriculture and Rural Development		
	The mine dump along sontnell road is placed illegally	The comment has no direct relevance to the proposed project		
Comments relating to the operating hours of the proposed brick plant				
Stan Wallace Glen Douglas Mine Residents Forum	The representatives from SA Block stated that the operation will end at 18h00 at night, this is minuted but still needs to be put in writing that this will be the hours and that they will not be increased without consultation.	The applicant agrees to not run the plant outside the Glen Douglas primary section working hours which is 06h00 to 22h00.	30 June 2021	e-mail
Peter Funke Highbury Resident	No working should be permitted after 18h00 at night should the plant be built.	The applicant agrees to not run the plant outside the Glen Douglas primary section working hours which is 06h00 to 22h00.	25 June 2021	e-mail
Alan Dougherty Affected Property owner, 322 Dinsdale Rd Highbury Ext 1	Operating times cannot be piggy-backed on the Mine operating times (which were obtained under dubious circumstances).	The applicant agrees to not run the plant outside the Glen Douglas primary section working hours which is 06h00 to 22h00.	01 July 2021	e-mail

Dorette Funke 3-303 Dinsdale Road, Highbury	<p>Dear Ntsanko,</p> <p>With this email I'm registering as a interested and affected party with regards to the proposed brick plant at Glen Douglas mine.</p> <p>I live in Highbury/Henley on Klip very close to the mine. At night we can hear the the Conframat brick plant all the way in our home and that plant is next to the R59 and significantly further away than the location of the proposed plant. One of the main reasons we moved to Henley/Highbury is due to it being a quiet small village. The proposed plant will change all of that.</p>	The applicant has agreed to further investigate the possible noise impact of this proposed project to ensure that the occurrence of similar incidents is minimised as far as possible. In addition, the applicant has committed not work outside the current Glen Douglas Mine working times.	30 June 2021	e-mail
Comments relating to employment opportunities				
Daleside community	The community proposes that the brick plant must employ 80% of community members	The applicant agrees to employ at least 80% from the local communities for this operation as long as the minimum job specific required skills and qualifications are met by community members. If the minimum qualifications and skills cannot be met by local direct communities, the applicant will have to employ from further away.	24 June 2021	Community meeting
Daleside Community	The proposed brick plant must use local businesses as suppliers	The applicant agrees to use and support local businesses and suppliers as far as possible as long it does not	24 June 2021	Community meeting

		compromise on service level, quality and costs.		
Stan Wallace Glen Douglas Mine Residents Forum	Concerns were raised at the Texiera public participation meeting about employment never being offered to the direct community first. SA Block indicated they would look at where possible employing locals, this needs to be put in writing.	The applicant agrees to employ at least 80% from the local communities for this operation as long as the minimum job specific required skills and qualifications are met by community members. If the minimum qualifications and skills cannot be met by local direct communities, the applicant will have to employ from further away.	30 June 2021	email
Alan Dougherty Affected Property owner, 322 Dinsdale Rd Highbury Ext 1	Irrespective of whether legally required or not the following studies should have been undertaken to show willingness to transparency. <ul style="list-style-type: none"> • Employment opportunities for local residents (minimal in automated plants) • The project is not as stated in the background to be of primary benefit to Midvaal and the residents but to utilise a surplus product generated by Glen Douglas Dolomite and cross subsidise other operations. 	The applicant agrees to employ at least 80% from the local communities for this operation as long as the minimum job specific required skills and qualifications are met by community members. If the minimum qualifications and skills cannot be met by local direct communities, the applicant will have to employ from further away. The applicant agrees to use and support local businesses and suppliers as far as possible as long it does not compromise on service level and quality.	01 July 2021	e-mail
Ms. Magogo	Ms. Magogo stated that she is representing the community members that has not been working for a long time and that the community members are looking forward to when the	<u>Response from Mr. Swanepoel:</u> Mr Swanepoel responded that there are job specifications and if a person complies to these specifications, priority would be given to the Daleside	29 November 2021	Public Consultation Meeting

	proposed project is operational. Ms. Magogo requested information on what the date will be when the project will be operational in order for those people that have not been working for many years, can hold hope in their hearts to have a possible job.	community. <u>Ms. White</u> added that it is noted within the Environmental Management Plan and that becomes the conditions of the Environmental Authorisation. It is also stated within the Environmental Management Plan that locals should be employed for the project.		
Mr S. Wallace	Mr Wallace addressed a question to Ms Magogo and asked if she is aware that the proposed project is not as labour intensive and that there won't be hundreds of jobs available.	Ms. Magogo responded and said if it is only 10 jobs that there will be 10 households that can sleep at night.	29 November 2021	Public Consultation Meeting
Comments relating to land rezoning				
Wynand Engelbrecht For the Daleside Volunteers	The Daleside Volunteers (a thoroughly constituted NPO representing the Daleside community-at-large at the Glen Douglas Mine Forum) herewith submits: <ul style="list-style-type: none">The zoning for the two erven is agricultural. The proposed operation is industrial. The Midvaal City Council ought to express comments on the fact that other brick works were forced to develop in the industrial corridor between Springbok Road and the R59,	The comment is correct with regards to the zoning of the property, however, the zoning does not form part of the environmental impact assessment process. The re-zoning will be addressed with the local municipality should the proposed project be authorised by the Gauteng Department of Agriculture and Rural Development.	25 June 2021	e-mail

	yet this applicant brazenly submits this proposal			
Wynand Engelbrecht For the Daleside Volunteers	The fact that transporting raw material to another site does not, in our opinion, justify this application. a. Furthermore: The home owner just across the road from the proposed site (less than 100 meters away) may not, under the town planning limitations, erect a building applicant proposes to construct two massively high silos on site. Where is the impact study proving the dolomite conditions will not affect an application for re-zoning? higher than two storeys, due to dolomite conditions; yet the	The construction plans on dolomite approvals will be addressed with the local municipality and engineers should the proposed project be authorised by the Gauteng Department of Agriculture and Rural Development.	25 June 2021	e-mail
Stan Wallace Glen Douglas Mine Residents Forum	It is unclear what the zoning is, but fundamentally its already used for mining type activity. As a result, they should give more information regards it.	The zoning does not form part of the environmental impact assessment process. The re-zoning will be addressed with the local municipality should the proposed project be authorised by the Gauteng Department of Agriculture and Rural Development.	30 June 2021	e-mail
Jon cronin 329 sontnell road, Highbury	Is the plant a mine application or industrial application. as currently mine is under DME. to best of our knowledge no industrial application to use mine lands has been lodged or approved	The zoning does not form part of the environmental impact assessment process. The re-zoning will be addressed with the local municipality should the proposed project be authorised by the Gauteng Department of Agriculture and Rural Development.	30 June 2021	e-mail
Alan Dougherty Affected Property owner, 322 Dinsdale Rd Highbury	Irrespective of whether legally required or not the following studies should have been	The zoning does not form part of the environmental impact assessment process. The re-zoning will be	01 July 2021	e-mail

Ext 1	<p>undertaken to show willingness to transparency.</p> <ul style="list-style-type: none"> • Sub-division and rezoning of the property • The size of the property also suggests future development is planned. • The proposed plant layout does not lend itself to 	addressed with the local municipality should the proposed project be authorised by the Gauteng Department of Agriculture and Rural Development.		
Comments relating to activities being applied				
Daleside community	Community is concerned about their health as tar fumes and smell will result in them inhaling contaminated air	The applicant commits to conduct further investigation on this matter and will provide feedback to the community before going ahead with the asphalt plant	24 June 2021	Community meeting
Peter Teixeira Daleside Ward Councillor	<p>The important points of concern raised by the community are as follows:</p> <p>Confusion whether this development will be for a brick manufacturing plant only or a bitumen and a ready-mix cement plant.</p>	As clarified on the meeting held with the Daleside on 24th June 2021, the application for the brick plants, the asphalt and ready-mix concrete plants. Although the applicant is only starting with brick plants for now while going through the process, they have decided to include the possible future developments like asphalt plant and ready-mix plants.	25 June 2021	e-mail
Wynand Engelbrecht	<p>The Daleside Volunteers (a thoroughly constituted NPO representing the Daleside community-at-large at the Glen Douglas Mine Forum) herewith submits:</p> <ul style="list-style-type: none"> • The proposed brick making plant cum bitumen plant cum 	The proper procedure is being followed throughout this process	25 June 2021	e-mail

	ready-mix cement plant ought to have ensured a proper route of presenting the scheme to this community. Either a poor cut-and-paste job was presented, or there is a sinister agenda.			
Jon Cronin 329 Sontnell road, Highbury Interested and affected party	There seems to be a bitumen and additional plant that has no clarity and seems to be piggy backing s a block application	As clarified on the meeting held with the Glen Douglas Mine Forum on 21st June 2021, the application for the brick plants, the asphalt and ready-mix concrete plants. Although the applicant is only starting with brick plants for now while going through the process, they have decided to include the possible future developments like asphalt plant and ready-mix plants.		
Stan Wallace Glen Douglas Mine Residents Forum	There is mention of the application being for three activities. Brick works Bitumen tar products Ready mix cement concrete. Despite this no one from Afrimat could provide any information besides the limited information provided on the brick works. But they confirmed this application is for three activities despite that only one is addressed now, but want from what we understand permission for all three based on only the brick plants limited information. Which cannot be acceptable as	As clarified on the meeting held with the Glen Douglas Mine Forum on 21st June 2021, the application for the brick plants, the asphalt and ready-mix concrete plants. Although the applicant is only starting with brick plants for now while going through the process, they have decided to include the possible future developments like asphalt plant and ready-mix plants.	30 June 2021	e-mail

	the bitumen tar plant has the potential to be the most negative of the three.			
Alan Dougherty Affected Property owner, 322, Dinsdale Rd Highbury Ext 1	Irrespective of whether legally required or not the following studies should have been undertaken to show willingness to transparency. <ul style="list-style-type: none"> • Materials handling time & motion inside the plant. • The plant will be cross subsidizing other less profitable SA Block manufacturing plants resulting in capital outflows for the area 	Comment noted, the main aim for the proposed project is <ol style="list-style-type: none"> 1. Improve future sustainability of SA Block 2. Increase/stabilise sales volumes for Glen Douglas which will improve the its sustainability and future viability 3. This will also increase job security as well as local business benefiting from these operations 	01 July 2021	e-mail
Alan Dougherty Affected Property owner, 322, Dinsdale Rd Highbury Ext 1	The RMC Plant and Asphalt Plant should be excluded from the possible activities due to a complete lack of information supplied, and an RMC plant is not able to be housed within a building	As clarified on the meeting held with the Glen Douglas Mine Forum on 21st June 2021, the application for the brick plants, the asphalt and ready-mix concrete plants. Although the applicant is only starting with brick plants for now while going through the process, they have decided to include the possible future developments like asphalt plant and ready-mix plants. Because the RMC plant does not generate significant noise, dust and vibrations like a brick manufacturing plant there is no need to house and enclose within a building.	01 July 2021	e-mail
Mr. L. Kirchner	Mr. Kirchner requested information about the number of lines that will be made.	<u>Response from Mr. Swanepoel:</u> We will be making one line. We are hoping to produce 120 000	23 November 2021	Glen Douglas Mine Forum meeting

		bricks per day.		
Mr. A. Dougherty	Mr. Dougherty required a better understanding of how the concrete will be cured within 2 days, as the concreted used at other operations take 28 days to cure.	<u>Response from Mr. Swanepoel:</u> Concrete is not going to be used. The mixture used for the brick manufacturing will be a dry mix which use less water.	23 November 2021	Glen Douglas Mine Forum meeting
General Comments				
Daleside Community	The community would like the mine/SA Block to assist with regards to providing rehabilitation measure for substance abuse as most of the community member do not get employment in the mine because they fail the substance test	The applicant will liaise with the Glen Douglas Mine management regarding this matter and investigate any possibilities of assisting in this regard.	24 June 2021	Community Meeting
	The proposed land is seating under dolomite, a dolomite study must be conducted to ensure that the proposed brick making structure will be safe	The construction plans on dolomite approvals will be addressed with the local municipality and engineers should the proposed project be authorised by the Gauteng Department of Agriculture and Rural Development.		
	Should the project be authorised, SA Block must ensure that there is a complaint structure that should include community members to ensure that the community is able to raise their complaints and that the complaints are being attended to.	Comment noted, a complaints register will be on site where the public can formally register their complaints which will be investigated and addressed accordingly.		
	The community requests that SA Block ensures that there are	Comment noted. The applicant will have 24-hour security patrolling on site. SA		

	security measures in place to protect neighboring houses from crime activities	Blok s not a law enforcement agency but they will endeavor to liaise with local municipalities and authorities to improve security in the surrounding areas as far as possible		
Grant Miles Neve Sontnell road, 323	So, in a nutshell, NO, we do not want the brick plant thank you.	Comment noted.	28 June 2021	email
Stan Wallace Glen Douglas Mine Residents Forum	<p>The end result is as a forum representing affected residents we are forced to reject and oppose this application purely because the applicant has not been transparent on providing factual information to the point of saying they would use clinker ash which was then denied it would be used, they have hidden behind the covid regulations at the time to avoid meaningful and constructive interaction regarding this project as a whole, when it was demonstrated by Mr Texiera they were simply taking the easier route.</p> <p>The end result leaves us not being able to decide is it a positive or a negative for the area, as such we urge you to instruct them to go back and do what they should have done to answer the above as to afford us the opportunity to make a constructive decision as we see both sides of the coin being development but also life</p>	<p>The Environmental Assessment Practitioner presented studies done as requested by the National Department of Environmental, Forestry and Fisheries. Other potential impacts related to dust, noise, traffic and other impacts have also been identified and assessed as per the prescribed impact assessment methodology and the impact significance was found to be low due to the construction and layout of the proposed operation.</p> <p>The applicant agreed to conduct further investigations with regards to noise, dust, vibration and traffic impact. The Environmental Assessment Practitioner will liaise with the Department of Gauteng of Agriculture and Rural Development to request an extension on the project timeframes to ensure that the findings of these investigations are incorporated into the Draft Assessment Report that will have to be send out to all registered stakeholders for 30 days them to provide their comments</p>	30 June 2021	email

	<p>quality of an already heavily impacted by mining actions community.</p> <p>As such we hope the applicant will be instructed to relook and fill in all the blank spots.</p>			
<p>Alan Dougherty Affected Property owner, 322 Dinsdale Rd Highbury Ext 1</p>	<p>The whole application is flawed and the onus placed on the affected parties to do the applicant's investigations and monitoring if the project should ever be given the green light.</p>	<p>The Environmental Assessment Practitioner presented studies done as requested by the National Department of Environmental, Forestry and Fisheries. Other potential impacts related to dust, noise, traffic and other impacts have also been identified and assessed as per the prescribed impact assessment methodology and the impact significance was found to be low due to the construction and layout of the proposed operation.</p> <p>The applicant agreed to conduct further investigations with regards to noise, dust, vibration and traffic impact. The Environmental Assessment Practitioner will liaise with the Department of Gauteng of Agriculture and Rural Development to request an extension on the project timeframes to ensure that the findings of these investigations are incorporated into the Draft Basic Assessment Report that will have to be send out to all registered stakeholders for 30 days them to provide their comments.</p>	<p>01 July 2021</p>	<p>e-mail</p>
<p>Mr S. Wallace</p>	<p>Mr Wallace expressed his concern about why they have not received</p>	<p><u>Response from Ms. White:</u> Ms. White explained that extension of</p>	<p>23 November 2021</p>	<p>Glen Douglas Mine Forum Meeting</p>

	all specialist studies prior to the public participation meeting.	the project was granted by the department on the 22 nd of October. The specialists should have completed all additional assessments by the 15 th of November, however, these assessments were only concluded two days prior to the consultation. Ms. White apologised and indicated that the specialist assessments will be shared after the meeting has been concluded.		
Mr D. Grobbelaar	Mr Grobbelaar expressed his concern that all formal questions and concerns raised by the public were not being addressed and that there is no assurance that the comment would be included within the Final Basic Assessment Report.	<u>Response from Ms. White:</u> Ms White reassured all attendees that all comments will be addressed, and everybody will receive a copy of the minutes of the stakeholder engagement as well as a copy of the comments and response report.	23 November 2021	Glen Douglas Mine Forum Meeting
Mr S. Wallace	Mr Wallace expressed his concern about the lack of time for commenting on the specialist reports	<u>Response from Ms. White:</u> Ms White explained that the Final Report needs to be submitted to the Competent Authority (GDARD) by the 6 th of December to prevent the project from lapsing and that all interested and affected parties may still send all comments and concerns even though the Final has been submitted. Any comments received will be forwarded to the competent authority for consideration. It is also noted that all I&AP's still have another opportunity to appeal the project once a decision has	23 November 2021	Glen Douglas Mine Forum Meeting

		been made by the GDARD.		
Mr. A. Dougherty	Mr Dougherty referred to the power point presentation and asked to go back to the pre-mix plant as he requires information on the proposed mitigation measures for noise, dust and transportation in and out of the plant. Mr Dougherty insisted on seeing drawing for the proposed plant.	<p><u>Response from Mr. Swanepoel:</u> Mr Swanepoel explained that there will be trucks transporting materials on site to the building of the pre bins. A front-end loader will gather the materials from the bins and put it into a small bin from where it will be transported via conveyer into the building. Mr Swanepoel stated that he has started many similar plants and that he is very excited as this plant will be using new technology. The baseline used in the noise study was generated from the reputational health and safety surveys that are done every year.</p> <p><u>Ms. White</u> added that the specialist reports were received on 20 November 2021 and the public meeting was held to share the findings of the specialist reports. She added that everyone will receive a copy of the specialist reports and should there be any additional questions or comments, it can be sent to her or directly to the department. Ms. White added that the Final Basic Assessment Report needs to be</p>	29 November 2021	Public consultation Meeting

		submitted by 6 December 2021. Therefore, all comments received to date will be included within the Final BA Report and should there be any additional comments, these can be sent to the Department directly via the Environmental Assessment Practitioner.		
Stan Wallace Chairman, Glen Douglas Community Forum	<p>Firstly, in my personal capacity I put it on record that I believe when compared to the past the mine is better run than before, yes there are issues which can / could easily be resolved. Sadly, as fast as we try convince people of this, the below destroys any convincing we have made.</p> <p>Secondly, I think the brick plant is a project worth looking at objectively as it makes business sense and if and only if certain issues are addressed (noise, dust, vibration, traffic) as it's a far lesser invasive project than others which could be done there, the once proposed furnace being one of them. But then I don't live next to it. But we represent people who will live next to it, not the shareholders of these companies, so we are morally required to see it from affected residents' eyes</p>	<p>Your comment is noted.</p> <p>Your comment is noted.</p>	24 November 2021	email

	<p>and this will affect them. So, I now reply regards the Glen Douglas mine liaison committee meeting held last night 2021.11.23.</p> <p>At the first meeting held in June the committee raised concerns, as basically the meeting was held with minimal facts available. But a meeting based on assumptions and “we think” were presented as the substance for the meeting without real tangible facts. Eventually, it was agreed this was early days and that a new more comprehensive meeting would be held and agreed that the June meeting would not be ticked off as public participation. Furthermore, the representative from Afrimat came with a long-drawn-out explanation as to why she could not hold a proper public participation meeting. Yet within two days after that meeting, the ward councillor, Peter Teixeira arranged a well turned out meeting where Afrimat were the guests, opposed to the organisers.</p> <p>In last night’s meeting the two above meeting were included in the presentation as if they were arranged by the people</p>	<p>As per the request during the meetings held in June, additional specialist assessments were undertaken which includes, Noise and Vibration Assessment, Dust Assessment and Traffic Assessment. These assessments were concluded on the 20th of November after the GDARD approved the request for extension of the application.</p> <p>As the additional specialist assessment were only concluded on the 20th of November, it was decided to provide all attendees of the meeting with a</p>		
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	<p>representing the brick manufacturers as their public participation, despite that at both meetings they agreed not to do so.</p> <p>Then on 2021.11.23 meeting we expected, as agreed to in the first meeting, that the issues regarding noise, dust and vibration that were raised at the first non-productive meeting, would be discussed as agreed to, noting that basically in a weeks' time there is a public participation meeting that only allows residents a few days to respond before closure.</p> <p>The issue is that area comprises of many poor as well as previously disadvantaged resident to who internet and email etc. is still a distant dream.</p> <p>The applicants simply have ignored this and brushed it off as insignificant, despite it being a human rights issue.</p> <p>So, most of these people rely on the mine forum network to be able to inform them opposed to the mine forum being a rubber stamping tick box exercise, which it's become clear how the</p>	<p>summary of the findings of each report. This summary was presented during both meetings (Glen Douglas Mine Forum Meeting as well as the public participation meeting) and it was confirmed during these meetings that the report which includes the specialist assessments, and comments and response report, will be distributed to all registered interested and affected parties and should there be any additional comment to what was raised previously or during the latest consultations, such comments can be submitted to the GDARD directly or through the Environmental Assessment Practitioner. A hard copy of the report will also be made available to I&AP's at the Firehouse Gym in Daleside.</p>		
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	<p>applicants are treating it.</p> <p>This begs the question as how we as a resident's mine forum can state this.</p> <p>Well, its simple, again last night a meeting was held in the good spirit of engaging with the representatives of the community to get clarity on:</p> <p>Noise. Dust. Vibration. Traffic, as in how new traffic will be mitigated on a road that's basically falling to pieces as no one takes responsibility for it between municipal and provincial government structures.</p> <p>We were told that specialists have investigated the above issues and reports have been drawn up.</p> <p>Yet at the meeting we given an excuse they were only received last week Friday and so have not been distributed, which at best should have been a simple email to all concerned to allow transparent discussion to take place at the meeting.</p>	<p>The additional specialist assessments were undertaken to address the concerns raised with regards to noise and vibration, dust and additional traffic generated. The mitigation measures proposed, minimizes or manages the impacts identified and has been included within the Environmental Management Plan for implementation, should the project be approved.</p>		
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	<p>At worst it could have been included in last night's presentation and discussed there regardless of how long it took.</p> <p>But neither of the two were done, apparently, we will get it later in the week via email which again begs the question of why was it not done before the meeting. If you going to distribute it via email then why not do it in time for the meeting. So why hold the meeting?</p> <p>This is like asking a student to write their matric exam on Monday but only provide the learning materials days after, if at all, then can't grasp why they failed. This is totally absurd concept unless it's done intentionally.</p> <p>So last night we sat and watched the presentation we saw last time with about as much factual content, which was nothing, wasting all who attended time plus further unnecessarily, adding more strain to the mine / residents at times tense relationship. We as a mine forum have again put it on record that we will not see the</p>	As noted in the response above.		
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	<p>meeting 2021.11.23 as public participation due to it being void of any facts or answers to questions raised from the first meeting.</p> <p>The only tangible positive was the withdrawal of the bitumen plant, but questions regard the ready-mix concrete remain unanswered, which raised questions as to why, no one opposed the idea, but opposed the non-transparency around this project as a whole.</p> <p>In short, we are expected to answer residents' questions regard the development, but have not been provided with any information to do so.</p> <p>The result is, I as chairman won't be treated like a mushroom, being kept in the dark and fed compost who is like anyone on the Residents mine forum being unable to answer honestly questions being asked by residents.</p> <p>Unfortunately, this made me decide to resign as chairman at the end of the year, as I see the forum is being used as a rubber-stamping exercise and seen as an</p>			
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	irritation ignoring the fact it could be a valuable tool in paving a fruitful relationship between both parties on opposite sides of the fence.			
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If "YES", briefly describe the feedback below (also attach copies of any correspondence to and from the stakeholders to this application):

If "NO" briefly explain why no comments have been received

3.4. GENERAL PUBLIC PARTICIPATION REQUIREMENTS

The Environmental Assessment Practitioner must ensure that the public participation process is adequate and must determine whether a public meeting or any other additional measure is appropriate or not based on the particular nature of each case. Special attention should be given to the involvement of local community structures such as Ward Committees and ratepayers associations. Please note that public concerns that emerge at a later stage that should have been addressed may cause the competent authority to withdraw any authorisation it may have issued if it becomes apparent that the public participation process was flawed.

The EAP must record all comments and respond to each comment of the public / interested and affected party before the application report is submitted. The comments and responses must be captured in a Comments and Responses Report as prescribed in the regulations and be attached to this application.

3.5. APPENDICES FOR PUBLIC PARTICIPATION

All public participation information is to be attached in the appropriate Appendix. The information in this Appendix is to be ordered as detailed below

Appendix 1 – Proof of site notice

Appendix 2 – Written notices issued as required in terms of the regulations

Appendix 3 – Proof of newspaper advertisements

Appendix 4 – Communications to and from interested and affected parties

Appendix 5 – Minutes of any public and/or stakeholder meetings

Appendix 6 - Comments and Responses Report

Appendix 7 –Comments from I&APs on Basic Assessment (BA) Report

Appendix 8 –Comments from I&APs on amendments to the BA Report

Appendix 9 – Copy of the register of I&APs

4. SECTION D: RESOURCE USE AND PROCESS DETAILS

Note: Section D is to be completed for the proposal and alternative(s) (if necessary)

Instructions for completion of Section D for alternatives

- 1) For each alternative under investigation, where such alternatives will have different resource and process details (e.g. technology alternative), the entire Section D needs to be completed
- 4) Each alternative needs to be clearly indicated in the box below
- 5) Attach the above documents in a chronological order

Section D has been duplicated for alternatives
when appropriate)

times

(complete
only

Section D Alternative No.

(complete only when appropriate for above)

4.1. Waste, effluent, and emission management

Solid waste management

Will the activity produce solid construction waste during the construction/initiation phase?

YES	
✓	
	m ³

If yes, what estimated quantity will be produced per month?

How will the construction solid waste be disposed of (describe)?

During construction and operation, waste must be separated at source, temporarily stored on site in designated waste skips and disposed at Henley / Midvaal Dumping Site located at 23 Waterford Road, Henley on Klip, Meyerton. Waste should be separated into recyclable and non-recyclable materials and distributed for recycling where applicable. The re-use of construction waste materials will be encouraged to minimize the amount of waste that will need to be disposed of at the municipal waste facilities. The developer should ensure that the right amount of material is used while construction takes place to ensure the optimal reuse and recycling of materials.

Chemical toilets are going to be used during the construction phase and the sewage waste will be collected by the appointed contractor for disposal at a hazardous waste disposal facility.

General waste removed from site will be disposed of at a suitably licensed disposal facility. The nearest certified landfill site is the Henley / Midvaal Dumping Site located. Safe disposal certificates must be obtained and kept on site for the duration of the construction and operational phase.

Where will the construction solid waste be disposed of (describe)?

General waste removed from site will be disposed of at a suitably licensed disposal facility. The nearest certified landfill site is the Henley / Midvaal Dumping Site located. Safe disposal certificates must be obtained and kept on site for the duration of the construction and operational phase.

Will the activity produce solid waste during its operational phase?

YES	
✓	
	m ³

If yes, what estimated quantity will be produced per month?

How will the solid waste be disposed of (describe)?

General waste removed from site will be disposed of at a suitably licensed disposal facility. Safe disposal certificates must be obtained and kept on site for the duration of the construction phase.

Has the municipality or relevant service provider confirmed that sufficient air space exists for treating/disposing of the solid waste to be generated by this activity?

	NO
	✓

Where will the solid waste be disposed if it does not feed into a municipal waste stream (describe)?

During both construction and operation phases a registered landfill site within the study area can be used as they still have capacity.

Note: If the solid waste (construction or operational phases) will not be disposed of in a registered landfill site or be taken up in a municipal waste stream, the applicant should consult with the competent authority to determine whether it is necessary to change to an application for scoping and EIA.

Can any part of the solid waste be classified as hazardous in terms of the relevant legislation?

	NO
	✓

If yes, inform the competent authority and request a change to an application for scoping and EIA.

Is the activity that is being applied for a solid waste handling or treatment facility?

YES NO

If yes, the applicant should consult with the competent authority to determine whether it is necessary to change to an application for scoping and EIA.

Describe the measures, if any, that will be taken to ensure the optimal reuse or recycling of materials:

During Construction, waste must be separated at source into recyclable and non-recyclable materials and distributed for recycling where applicable. During the construction phase, construction waste rubble should be re-used as fill material, erosion protection and gabion construction where possible. The re-use of construction waste materials will minimize the amount of waste that will need to be disposed of at registered municipal waste facilities. In addition, there will be extensive earthworks, but import and export of material will be minimised by balancing cut and fill requirements as far as possible.

Waste will be stored in designated waste bins on site that will be located strategically around the site during operation. A demarcated salvage yard that will be subdivided into a general and waste oil storage area will be established. Domestic waste will be disposed of at a registered municipal site. No hazardous waste will be generated as a result of the operation. Metal scrap will be handled by any of the scrap dealers located in the Midvaal area. African Green Oil will be contracted to collect the used oil which will be stored in drums until collection

Liquid effluent (other than domestic sewage)

Will the activity produce effluent, other than normal sewage, that will be disposed of in a municipal sewage system?

NO
✓

If yes, what estimated quantity will be produced per month?

N/A m³

If yes, has the municipality confirmed that sufficient capacity exist for treating / disposing of the liquid effluent to be generated by this activity(ies)?

NO
✓

Will the activity produce any effluent that will be treated and/or disposed of on site?

NO
✓

If yes, what estimated quantity will be produced per month?

N/A m³

If yes describe the nature of the effluent and how it will be disposed.

Note that if effluent is to be treated or disposed on site the applicant should consult with the competent authority to determine whether it is necessary to change to an application for scoping and EIA

Will the activity produce effluent that will be treated and/or disposed of at another facility?

NO
✓

If yes, provide the particulars of the facility:

Facility name:	N/A		
Contact person:	N/A		
Postal address:	N/A		
Postal code:	N/A		
Telephone:	N/A	Cell:	N/A
E-mail:	N/A	Fax:	N/A

Describe the measures that will be taken to ensure the optimal reuse or recycling of waste water, if any:

N/A

Liquid effluent (domestic sewage)

Will the activity produce domestic effluent that will be disposed of in a municipal sewage system?

NO

If yes, what estimated quantity will be produced per month?

If yes, has the municipality confirmed that sufficient capacity exist for treating / disposing of the domestic effluent to be generated by this activity(ies)?

	✓
m ³	
YES	NO

Will the activity produce any effluent that will be treated and/or disposed of on site?

YES	
✓	

If yes describe how it will be treated and disposed off.

Chemical toilets are going to be used and the sewage waste will be collected by the Contractor for treatment at a treatment facility.

Emissions into the atmosphere

Will the activity release emissions into the atmosphere?

YES	NO
	✓
YES	NO
	✓

If yes, is it controlled by any legislation of any sphere of government?

If yes, the applicant should consult with the competent authority to determine whether it is necessary to change to an application for scoping and EIA.

If no, describe the emissions in terms of type and concentration:

During construction, there will be localized liberation of dust due to excavations and the hauling of materials around the site. Localised exhaust emissions will also occur, however a significant increase in concentrations of hydrocarbons, nitrogen oxides and carbon monoxide are not anticipated. During the operation phase, increased emissions and dust particles may occur due to increased traffic coming and leaving to collect the bricks.

4.2. WATER USE

Indicate the source(s) of water that will be used for the activity

Municipal ✓	Directly from water board	groundwater	river, stream, dam or lake	other	the activity will not use water
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If water is to be extracted from groundwater, river, stream, dam, lake or any other natural feature, please indicate the volume that will be extracted per month:

	liters
--	--------

If Yes, please attach proof of assurance of water supply, e.g. yield of borehole, in the appropriate Appendix

Does the activity require a water use permit from the Department of Water Affairs?

	NO
	✓

If yes, list the permits required

--

If yes, have you applied for the water use permit(s)?

If yes, have you received approval(s)? (attached in appropriate appendix)

YES	NO
YES	NO

4.3. POWER SUPPLY

Please indicate the source of power supply eg. Municipality / Eskom / Renewable energy source

During the Construction and Operational Phases access electricity will be drawn from Glen Douglas Dolomite Mine Substation 3 which is in close proximity with the boundary line. Our electricity connection will be done by competent and qualified electricians who can guarantee for a safe electrical connection at an amount that will

render it safe to use for the purpose we intend it to be used.

If power supply is not available, where will power be sourced from?

Please see above.

4. 4. ENERGY EFFICIENCY

Describe the design measures, if any, that have been taken to ensure that the activity is energy efficient:

In other activities (construction and operation) the scope of work will be structured in a way that, where possible, the use of labour-intensive methods will be employed. Not only will it serve the local community but it also saves the use of Pneumatic Equipment that requires a lot of energy input.

Describe how alternative energy sources have been taken into account or been built into the design of the activity, if any:

In the Operational Phase we intend to utilize New Generation Equipment which uses the least amount of electricity and is more efficient in productivity and does not release any harmful toxins to the environment so to preserve air-quality that might be affected by the activities to be performed.

5. SECTION E: IMPACT ASSESSMENT

The assessment of impacts must adhere to the minimum requirements in the EIA Regulations, 2014, and should take applicable official guidelines into account. The issues raised by interested and affected parties should also be addressed in the assessment of impacts as well as the impacts of not implementing the activity (Section 24(4)(b)(i)).

5.1. Issues raised by interested and affected parties

Summarise the issues raised by interested and affected parties.

Please refer to Section C above.

Summary of response from the practitioner to the issues raised by the interested and affected parties (including the manner in which the public comments are incorporated or why they were not included)
(A full response must be provided in the Comments and Response Report that must be attached to this report):

Please refer to Section C above.

5.2. Impacts that may result from the CONSTRUCTION and operational PHASE

Briefly describe the methodology utilised in the rating of significance of impacts

The purpose of impact assessment is to assign relative significance to predicted impacts associated with the project, and to determine the manner in which impacts are to be avoided, mitigated or managed. The potential environmental impacts were identified based on the nature of the receiving environment, a review of the proposed activities, and the issues raised in the public participation process.

The potential impacts of the proposed development were identified through a site visit, the Environmental Assessment Practitioners experience and expertise in the field and specialist study reports. In the Basic Assessment Report, the potential impacts are broadly identified and outlined. An assessment of the potential impacts is provided, identifying the impacts that are potentially significant and recommending management and mitigation measures to reduce the impacts. In general, it is recognized that every development has the potential to pose various risks to the environment as well as to the residents or businesses in the surrounding area. Therefore, it is important that these possible risks are taken into account during the pre-construction phase of the development.

The significance of both positive and negative potential impacts was determined through the evaluation of impact consequence and likelihood of occurrence. The significance of potential impacts that may result from the proposed project was determined in order to assist decision-makers

The significance of both positive and negative potential impacts was determined through the evaluation of impact consequence and likelihood of occurrence.

The significance of an impact is defined as a combination of the **consequence** of the impact occurring and the **probability** that the impact will occur. The following risk

assessment model has been used for determination of the significance of impacts.

SIGNIFICANCE = CONSEQUENCE X PROBABILITY

WHERE Consequence = Extent + Intensity + Duration

The criteria used to determine impact consequence are presented on the table below. Each rating has been allocated a score weighting

Table 4: Criteria used to determine the Consequence of the Impact

Rating	Definition of Rating	Score
A. Extent - the area over which the impact will be experienced		
Local	limited to the immediate area(s) around the project site -	1
Regional	extends over a larger area that would include a major portion of an area or province	2
National/International	nationally or beyond	3
B. Intensity - the magnitude of the impact in relation to the sensitivity of the receiving environment, taking into account the degree to which the impact may cause irreplaceable loss of resources		
Low	Site-specific and wider natural and/or social functions and processes are negligibly altered	1
Medium	Site-specific and wider natural and/or social functions and processes continue albeit in a modified way	2
High	Site-specific and wider natural and/or social functions or processes are severely altered	3
C. Duration- the lifetime of the impact, that is measured in relation to the lifetime of the proposed development and its reversibility		
Short-term	(0 to 3 years)	1
Medium-term	(3 to 10 years) confined to the construction period	2
Long-term	(more than 10 years)	3
Permanent	beyond the anticipated lifetime of the project	4

The combined score of these three criteria corresponds to a **Consequence Rating**, as follows:

Table 5: Method used to determine the Consequence Score

Combined Score (A+B+C)	3 – 4	5	6	7	8 - 9
Consequence Rating	Very low	Low	Medium	High	Very high

Once the consequence was derived, the probability of the impact occurring was

considered. Probability of impact occurrence - this describes the likelihood of the impacts actually occurring. The impact may occur for any length of time during the life cycle of the activity, and not at any given time

- Improbable (very low to low likelihood).
- Possible (likely).
- Probable (distinct possibility).
- Definite (the impact would occur regardless of prevention or mitigation measures)

The probability of the impact using is presented in the table below.

Table 6: Probability Classification

<i>Probability– the likelihood of the impact occurring</i>	
Improbable	1
Possible	2
Probable	3
Definite	4

The overall significance of impacts was determined by considering consequence and probability using the rating system prescribed below

Table 7: Impact significance ratings

		Probability			
		Improbable	Possible	Probable	Definite
Consequence	Very Low	INSIGNIFICANT	INSIGNIFICANT	VERY LOW	VERY LOW
	Low	VERY LOW	VERY LOW	LOW	LOW
	Medium	LOW	LOW	MEDIUM	MEDIUM
	High	MEDIUM	MEDIUM	HIGH	HIGH
	Very High	HIGH	HIGH	VERY HIGH	VERY HIGH

Practicable mitigation and optimisation measures are recommended and impacts are rated in the prescribed way both without and with the assumed effective implementation of mitigation and optimisation measures.

The impact significance rating should be considered by authorities in their decision-making process based on the implications of ratings ascribed below:

- **Insignificant:** the potential impact is negligible and will not have an influence on the decision regarding the proposed activity/development.
- **Very Low:** the potential impact is very small and should not have any meaningful influence on the decision regarding the proposed activity/development.
- **Low:** the potential impact may not have any meaningful influence on the

decision regarding the proposed activity/development.

- **Medium:** the potential impact should influence the decision regarding the proposed activity/development.
- **High:** the potential impact will affect the decision regarding the proposed activity/development.
- **Very High:** the proposed activity should only be approved under special circumstances

Briefly describe and compare the potential impacts (as appropriate), significance rating of impacts, proposed mitigation and significance rating of impacts after mitigation that are likely to occur as a result of the construction phase for the various alternatives of the proposed development. This must include an assessment of the significance of all impacts.

Table 8: Impact Assessment significance of the proposal

Potential impacts	Proposed mitigation	Risk of the impact and mitigation not being implemented																																										
PRE-CONSTRUCTION PHASE																																												
FLORAL IMPACTS																																												
<p>Nature of impact: <u>Impact on floral Habitat and Diversity</u></p> <p>The proposed development will result in the loss of indigenous species, but the impact will be localised within the footprint area and no regional impacts on floral communities are anticipated. The study area is located within part of the vulnerable vegetation unit, namely the Soweto Highveld Grassland, however, neither of the habitat units identified on site are considered representative of the reference vegetation type. Moreover, the study area is not located within a CBA, which is important for “Red” Listed plant habitat and for primary vegetation, or within an ESA, which is important for ecological functioning.</p> <p>Degraded Grassland Habitat</p> <table><tr><th></th><th>Extent</th><th>Intensity</th><th>Duration</th><th>Consequence</th><th>Probability</th><th>Significance</th></tr><tr><td>Without Mitigation</td><td>Local 1</td><td>Medium 2</td><td>Short – term 1</td><td>Very low 4</td><td>Definite 4</td><td>VERY LOW</td></tr><tr><td>With mitigation</td><td>Local 1</td><td>Low 1</td><td>Short – term 1</td><td>Very low 3</td><td>Probable 3</td><td>VERY LOW</td></tr></table> <p>Woody Habitat -</p> <table><tr><th></th><th>Extent</th><th>Intensity</th><th>Duration</th><th>Consequence</th><th>Probability</th><th>Significance</th></tr><tr><td>Without Mitigation</td><td>Local 1</td><td>Medium 2</td><td>Short – term 1</td><td>Very low 4</td><td>Definite 4</td><td>VERY LOW</td></tr><tr><td>With mitigation</td><td>Local 1</td><td>Low 1</td><td>Short – term 1</td><td>Very low 3</td><td>Probable 3</td><td>VERY LOW</td></tr></table>		Extent	Intensity	Duration	Consequence	Probability	Significance	Without Mitigation	Local 1	Medium 2	Short – term 1	Very low 4	Definite 4	VERY LOW	With mitigation	Local 1	Low 1	Short – term 1	Very low 3	Probable 3	VERY LOW		Extent	Intensity	Duration	Consequence	Probability	Significance	Without Mitigation	Local 1	Medium 2	Short – term 1	Very low 4	Definite 4	VERY LOW	With mitigation	Local 1	Low 1	Short – term 1	Very low 3	Probable 3	VERY LOW	<ul style="list-style-type: none">Minimise loss of natural vegetation where possible through planning and where necessary by incorporating the sensitivity of the biodiversity report as well as any other specialist studies;Prior to the commencement of construction activities, an AIP Management/Control Plan should be compiled for implementation:<ul style="list-style-type: none">Removal of alien invasive species should preferably commence during the pre-construction phase and continue throughout the construction and operational phases. AIPs should be cleared within the study area before any vegetation clearing activities commence, thereby ensuring that no AIP propagules are spread, or soils contaminated with AIP seeds during the construction phase; andAn AIP Management/Control Plan should be implemented by a qualified professional. No uncertified chemicals may be used for chemical control of AIPs. Only trained professionals must be allowed to administer chemical control.During the field assessment, one floral SCC, <i>Adromischus umbraticola</i> was potentially observed within the development footprint. All potential floral SCC, if identified during the pre-construction phase, that may be affected by the construction activities, must be marked and where possible, relocated to suitable habitat surrounding the disturbance footprint. Consultation with GDARD will be required to determine whether a permit process needs to be followed.	<ul style="list-style-type: none">Potential failure to relocate floral or faunal SCC to suitable habitat outside the development footprint.Inconsiderate planning, infrastructure placement and design, leading to the loss of potential sensitive floral and faunal species and/or habitat for such species, as well as unnecessary edge effect impacts on areas outside of the proposed development footprint.Potential failure to design and implement an Alien and Invasive Plant (AIP) Management/Control plan before the commencement of construction activities, resulting in the spread of AIPs from the development footprint to surrounding natural habitat
	Extent	Intensity	Duration	Consequence	Probability	Significance																																						
Without Mitigation	Local 1	Medium 2	Short – term 1	Very low 4	Definite 4	VERY LOW																																						
With mitigation	Local 1	Low 1	Short – term 1	Very low 3	Probable 3	VERY LOW																																						
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With mitigation	Local 1	Low 1	Short – term 1	Very low 3	Probable 3	VERY LOW																																						

Nature of impact: Impact on Floral Habitat and Diversity

Due to the potential presence of *Adromischus umbraticola*, the impact of the development on floral SCC is likely to be significant. However, provided that strict mitigation measures are implemented, and that the identified SCC species are appropriately rescued, the impact on floral communities associated with all habitat units can remain localised.

Due to the study area being surrounded by man-made built-up areas, the surrounding natural vegetation is unlikely to be impacted by the proposed development. The direct impact of the proposed development on the floral ecology of the study area is not anticipated to be detrimental, as the significance of the impact varies between low and very low.

However, even with extensive mitigation, residual impacts on the receiving floral ecological environment are deemed likely. The following points highlight the key latent impacts that have been identified:

- Loss of floral habitat outside of the footprint area;
- Permanent loss of and altered floral species diversity outside of the footprint area, including loss of favourable habitat for SCC; and
- Continued AIP proliferation to adjacent natural vegetation communities.

Degraded Grassland Habitat

	Extent	Intensity	Duration	Consequence	Probability	Significance
Without Mitigation	Local 1	Medium 2	Short – term 1	Very low 4	Probable 3	VERY LOW
With mitigation	Local 1	Low 1	Short – term 1	Very low 3	Possible 2	INSIGNIFICANT

Woody Habitat

	Extent	Intensity	Duration	Consequence	Probability	Significance
Without Mitigation	Local 1	Medium 2	Short – term 1	Very low 4	Possible 2	INSIGNIFICANT
With mitigation	Local 1	Low 1	Short – term 1	Very low 3	Improbable 1	INSIGNIFICANT

Woody Habitat								
	Extent	Intensity	Duration	Consequence	Probability	Significance		
Without Mitigation	Local	Medium	Short – term	Very low	Possible	INSIGNIFICANT		
	1	2	1	4	2			
With mitigation	Local	Low	Short – term	Very low	Improbable	INSIGNIFICANT		
	1	1	1	3	1			

CONSTRUCTION PHASE								
FLORAL IMPACTS								
Nature of impact: Impact on floral Habitat and Diversity								
Degraded Grassland Habitat								
	Extent	Intensity	Duration	Consequence	Probability	Significance		
Without Mitigation	Local	Low	Short – term	Very low	Definite	VERY LOW		
	1	1	1	3	4			
With mitigation	Local	Low	Short – term	Very low	Probable	VERY LOW		
	1	1	1	3	3			
Woody Habitat								
	Extent	Intensity	Duration	Consequence	Probability	Significance		
Without Mitigation	Local	Low	Short – term	Very low	Definite	VERY LOW		
	1	1	1	3	4			
With mitigation	Local	Low	Short – term	Very low	Probable	VERY LOW		
	1	1	1	3	3			
Development Footprint - The construction footprint must be kept as small as possible to minimise impact on the surrounding environment (edge effect management); - Removal of vegetation must be restricted to what is absolutely necessary and should remain within the approved development footprint. Where possible/feasible, any remaining natural areas should be utilised as part of the landscaping of the proposed development; - Clearing of vegetation should take place in a phased manner. This will allow for faunal species within the study area to flee and avoid harm; - Smaller species that are not as readily able to move out of an area ahead of ground clearing activities such as scorpions and reptiles will be less mobile during rainfall events and cold days (winter). As such should any be observed in the construction site during clearing and construction activities, they are to be carefully and safely moved to an area of similar habitat outside of the disturbed footprint should they not self-relocate. Construction personnel are to be educated about these species and instructed not to kill them. Smaller scorpion species and harmless reptiles should be carefully relocated by a suitably nominated construction person.							- Potential failure to monitor the success of relocated floral SCC. - Dumping of construction material within areas where no construction is planned thereby leading to further habitat disturbance - allowing the establishment and spread of AIPs and further alteration of faunal habitat. - Potentially poorly managed edge effects: - Ineffective rehabilitation of compacted areas, bare soils, or eroded areas leading to continual proliferation of AIP species in disturbed areas and subsequent spread to surrounding natural areas altering the floral habitat; and - Compaction of soils outside of the study area due to indiscriminate driving of	

Nature of impact: Impact on Floral SCC

Degraded Grassland Habitat

	Extent	Intensity	Duration	Consequence	Probability	Significance
Without Mitigation	Local 1	Low 1	Short – term 1	Very low 4	Probable 3	VERY LOW
With mitigation	Local 1	Low 1	Short – term 1	Very low 3	Possible 2	INSIGNIFICANT

Woody Habitat

	Extent	Intensity	Duration	Consequence	Probability	Significance
Without Mitigation	Local 1	Low 1	Short – term 1	Very low 3	Possible 2	INSIGNIFICANT
With mitigation	Local 1	Low 1	Short – term 1	Very low 3	Improbable 1	INSIGNIFICANT

For larger venomous snakes, a suitably trained specialist, or on-site personnel, should be contacted to carry out the relocation of the species, should it not move off on its own;

- Vehicles should be restricted to travelling only on designated roadways to limit the ecological footprint of the construction activities. Additional road construction should be limited to what is absolutely necessary, and the footprint thereof kept to a minimum;
- No collection of floral SCC must be allowed by construction personnel;
- No hunting or trapping of faunal species is to be allowed by construction personnel;
- Informal fires by construction personnel should be prohibited, and no uncontrolled fires whatsoever should be allowed;
- Care should be taken during the construction and operation of the proposed development to limit edge effects to surrounding natural habitat. This can be achieved by:
 - Demarcating all footprint areas during construction activities;
 - No construction rubble or cleared alien invasive species are to be disposed of outside of demarcated areas, and should be taken to a registered waste disposal facility;
 - All soils compacted as a result of construction activities should be ripped and profiled and reseeded;
 - Manage the spread of AIP species, which may affect remaining natural habitat within surrounding areas. Specific mention in this regard is made to Category 1b and Category 2 species identified within the development footprint areas (refer to Appendix F of this report); and
- Appropriate sanitary facilities must be provided during the construction of the development and must be removed to an appropriate waste disposal site;
- No dumping of litter, rubble or cleared vegetation on site should be allowed. Infrastructure and rubble removed because of the construction activities should be disposed of at an appropriate registered dump site away from the

construction vehicles through natural vegetation.

- Possible increased fire frequency during construction
- Dust generated during construction and operational activities accumulating on the surrounding floral individuals, altering the photosynthetic ability of plants and potentially further decreasing optimal growing/re-establishing conditions

	<p>development footprint. No temporary dump sites should be allowed in areas with natural vegetation. It is advised that waste disposal containers and bins be provided during the construction phase for all construction rubble and general waste. Vegetation cuttings must be carefully collected and disposed of at a separate waste facility;</p> <ul style="list-style-type: none"> • If any spills occur, they should be immediately cleaned up to avoid soil contamination that can hinder floral rehabilitation later down the line. Spill kits should be kept on-site within workshops. In the event of a breakdown, maintenance of vehicles must take place with care, and the recollection of spillage should be practised, preventing the ingress of hydrocarbons into the topsoil; and • Upon completion of construction activities, it must be ensured that no bare areas remain, and that indigenous species be used to revegetate the disturbed area. <p>Alien Vegetation</p> <ul style="list-style-type: none"> • Edge effects arising from the proposed development, such as erosion and alien plant species proliferation, which may affect adjacent natural areas, need to be strictly managed. Specific mention in this regard is made of Category 1b AIP species (as listed in the NEMBA Alien species lists, 2020), in line with the NEMBA Alien and Invasive Species Regulations (2014) (Appendix F of this report); • Ongoing alien and invasive plant monitoring and clearing/control should take place throughout the construction and operational phase of the development, and a buffer surrounding the study area (i.e. along the fence line) should be regularly checked for AIP proliferation and to prevent spread into surrounding natural areas; and • Alien vegetation that is removed must not be allowed to lay on unprotected ground as seeds might disperse upon it. All cleared plant material to be disposed of at a licensed waste facility which complies must with legal standards. 	
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FAUNAL IMPACTS						
Nature of impact: <u>Impact on faunal Habitat and Diversity</u>						
Degraded Grassland Habitat						
	Extent	Intensity	Duration	Consequence	Probability	Significance
Without Mitigation	Local	Low	Short – term	Very low	Definite	VERY LOW
	1	1	1	3	4	
With mitigation	Local	Low	Short – term	Very low	Probable	VERY LOW
	1	1	1	3	3	
Woody Habitat						
	Extent	Intensity	Duration	Consequence	Probability	Significance
Without Mitigation	Local	Low	Short – term	Very low	Definite	VERY LOW
	1	1	1	3	4	
With mitigation	Local	Low	Short – term	Very low	Probable	VERY LOW
	1	1	1	3	3	
Nature of impact: <u>Impact on Faunal SCC</u>						
Degraded Grassland Habitat						
	Extent	Intensity	Duration	Consequence	Probability	Significance
Without Mitigation	Local	Low	Short – term	Very low	Possible	INSIGNIFICANT
	1	1	1	3	2	
With mitigation	Local	Low	Short – term	Very low	Improbable	INSIGNIFICANT
	1	1	1	3	1	
				Floral and Faunal SCC <ul style="list-style-type: none"> The relocation success of floral SCC should be monitored during the construction phase to ensure immediate actions can be taken if it becomes evident that relocation is not successful; No collection of floral SCC or medicinal floral species must be allowed by construction personnel; Edge effect control needs to be implemented to prevent further degradation and potential loss of floral and faunal habitat for SCC outside of the proposed development footprint area; It is recommended that the perimeter fence allows for movement of small mammals, such as palisade fencing, as opposed to solid constructions such as walls. Should the perimeter be walled in, it is recommended that small opening be left to allow for continuous movement of small mammal species. Such openings must be continuously monitored and cleared of debris to ensure continued movement is possible; and Should the presence of any faunal SCC be noted, or their breeding sites be located within the development footprint, a suitably qualified specialist should be consulted on the best way to proceed. 		
				<ul style="list-style-type: none"> Proliferation of AIP species that colonise in areas of increased disturbances and that outcompete native species, including the further transformation of adjacent natural habitat Dumping of construction material within areas where no construction is planned thereby leading to further habitat disturbance - allowing the establishment and spread of AIPs and further alteration of faunal habitat. Potential overexploitation through the trapping and/or hunting of faunal species, beyond the direct footprint area 		

Woody Habitat																							
<table><tr><td></td><td>Extent</td><td>Intensity</td><td>Duration</td><td>Consequence</td><td>Probability</td><td>Significance</td></tr><tr><td>Without Mitigation</td><td>Local 1</td><td>Low 1</td><td>Short – term 1</td><td>Very low 3</td><td>Possible 2</td><td>INSIGNIFICANT</td></tr><tr><td>With mitigation</td><td>Local 1</td><td>Low 1</td><td>Short – term 1</td><td>Very low 3</td><td>Improbable 1</td><td>INSIGNIFICANT</td></tr></table>		Extent	Intensity	Duration	Consequence	Probability	Significance	Without Mitigation	Local 1	Low 1	Short – term 1	Very low 3	Possible 2	INSIGNIFICANT	With mitigation	Local 1	Low 1	Short – term 1	Very low 3	Improbable 1	INSIGNIFICANT		
	Extent	Intensity	Duration	Consequence	Probability	Significance																	
Without Mitigation	Local 1	Low 1	Short – term 1	Very low 3	Possible 2	INSIGNIFICANT																	
With mitigation	Local 1	Low 1	Short – term 1	Very low 3	Improbable 1	INSIGNIFICANT																	
<p><u>Nature of Impact: Heritage</u></p> <p>No sites, features or objects of cultural heritage significance were identified in the study area.</p> <table><tr><td></td><td>Extent</td><td>Intensity</td><td>Duration</td><td>Consequence</td><td>Probability</td><td>Significance</td></tr><tr><td>Without mitigation</td><td>Local 1</td><td>Low 1</td><td>Short – term 1</td><td>Very low 3</td><td>Possible 2</td><td>LOW</td></tr><tr><td>With mitigation</td><td>-</td><td>-</td><td>-</td><td>-</td><td>-</td><td>-</td></tr></table>		Extent	Intensity	Duration	Consequence	Probability	Significance	Without mitigation	Local 1	Low 1	Short – term 1	Very low 3	Possible 2	LOW	With mitigation	-	-	-	-	-	-	<ul style="list-style-type: none">The potential for chance finds, still remains and the developer and his contractors are requested to be diligent and observant during excavations. Since there is no archaeological finding of significance, no mitigation is therefore required. However, should archaeological sites or graves are exposed during development activities, it should immediately be reported to a museum, preferably one at which an archaeologist is available, so that an investigation and evaluation of the finds can be made.	<ul style="list-style-type: none">Destruction of heritage resources that may be encountered during excavations to prepare for construction of project infrastructure
	Extent	Intensity	Duration	Consequence	Probability	Significance																	
Without mitigation	Local 1	Low 1	Short – term 1	Very low 3	Possible 2	LOW																	
With mitigation	-	-	-	-	-	-																	
<p><u>Nature of Impact: Dust generation from clearance of vegetation and excavations to establish the site</u></p> <table><tr><td></td><td>Extent</td><td>Intensity</td><td>Duration</td><td>Consequence</td><td>Probability</td><td>Significance</td></tr><tr><td>Without Mitigation</td><td>Local 1</td><td>Medium 2</td><td>Short-term 1</td><td>Very low 4</td><td>Probable 3</td><td>VERY LOW</td></tr><tr><td>With Mitigation</td><td>Local 1</td><td>Low 1</td><td>Short-term 1</td><td>Very low 3</td><td>Possible 2</td><td>INSIGNIFICANT</td></tr></table>		Extent	Intensity	Duration	Consequence	Probability	Significance	Without Mitigation	Local 1	Medium 2	Short-term 1	Very low 4	Probable 3	VERY LOW	With Mitigation	Local 1	Low 1	Short-term 1	Very low 3	Possible 2	INSIGNIFICANT	<ul style="list-style-type: none">The potential nuisance impact of dust can be mitigated by implementing dust suppression measures. The potential impact on air quality at surrounding sensitive receptors has a Very low significance rating prior to, and an Insignificant rating after, the implementation of the recommended mitigation measures.	<ul style="list-style-type: none">Dust particles may cause health effects to the surrounding communities
	Extent	Intensity	Duration	Consequence	Probability	Significance																	
Without Mitigation	Local 1	Medium 2	Short-term 1	Very low 4	Probable 3	VERY LOW																	
With Mitigation	Local 1	Low 1	Short-term 1	Very low 3	Possible 2	INSIGNIFICANT																	

SOCIAL IMPACTS						
<u>Positive Social impacts anticipated during construction</u>						
<p>Employment Opportunities</p> <ul style="list-style-type: none"> Labour will be required for construction activities of the proposed development. It is therefore expected that jobs will be created during the construction period. The construction labour requirements have not been estimated as yet. It is expected that much of the work will require mechanised construction methods because of the bulk of the works. However, there will also be a need for manual labour for construction 				<p>Enhancement:</p> <ul style="list-style-type: none"> It is recommended that local employment policy is adopted to maximise the opportunities made available to the local labour force. Where reasonable and practical SA Block should appoint local contractors and implement a (local first) policy especially for semi-skilled and low skilled job categories. Training and skills development programmes should be initiated prior to the commencement of the operation phase 		<ul style="list-style-type: none"> The impact is positive; the only risk anticipated is not providing job opportunities to local people. Influx of workers looking for employment opportunities to the area
	Extent	Intensity	Duration	Consequence	Probability	Significance
Without mitigation	Local 1	Medium 2	Medium term 1	Low 5	Probable 3	MEDIUM (Positive)
With mitigation	Local 1	Low 1	Medium term 1	Low 5	Definite 4	HIGH (Positive)
<u>Negative Social impacts anticipated during the construction period</u>						
<ul style="list-style-type: none"> The increased dust resulting from construction activities (vegetation clearing, site preparation, earthworks, uncovered topsoil stockpiles and sand piles and loads on vehicles), vehicles, plant and machinery poses a health hazard to construction staff and people living and working in the vicinity of the site. Safety and Security issues for the residents due to Inflow of Workers in the area Disturbance of daily Living and Movement Patterns Safety and Security Risks 				<ul style="list-style-type: none"> All adjacent landowners must be informed of the construction processes prior to commencement of construction activities. All flammable substances must be stored in dry area which do not pose an ignition risk to the said substances Ensure all construction vehicles and machinery is under the control of competent personnel. No open fires will be allowed on site unless in a demarcated area identified by the ECO Limit access to the construction site to the workforce only. Comply with the requirements of the Occupational Health and Safety Act, 1993 (Act No. 85 of 1993). Construction footprints, including site offices, excavations, storage areas, materials lay-down areas, stockpile area, and workers rest areas should be clearly demarcated or fenced off before construction commences. 		<ul style="list-style-type: none"> Low risk with mitigations
	Extent	Intensity	Duration	Consequence	Probability	Significance
Without mitigation	Local 1	High 3	Medium term 2	Medium 6	Probable 3	MEDIUM
With mitigation	Local 1	Medium 1	Medium term 3	Low 5	Probable 3	LOW

							<ul style="list-style-type: none">• All construction activities should be limited to the demarcated areas.• Access to these demarcated areas strictly controlled.• Entry points and access routes to the sites must be clearly marked and traffic limited to those areas as far as possible.• Suitable warning and information signage should be erected before construction commences.• Adequate sanitary and ablutions facilities must be provided for construction workers• The facilities must be regularly serviced to reduce the risk of surface or groundwater pollution.	
NOISE IMPACTS								
Noise Impacts								
	Extent	Intensity	Duration	Consequence	Probability	Significance		
Without mitigation	Local 1	Medium 2	Short-term 1	Very Low 4	Definite 4	VERY LOW		
With mitigation	Local 1	Low 1	Short-term 1	Very Low 3	Probable 3	VERY LOW		
							<ul style="list-style-type: none">• Construction activities must be limited to normal working hours and according to municipal bylaws, i.e. working hours must be limited to weekdays only.• If construction is required on the weekend; permission from adjacent landowners will be required prior to construction.• No sound amplification equipment such as sirens, loud hailers or hooters are to be used on site except in emergencies and no amplified music is permitted on site.• Equipment that is fitted with noise reduction facilities (e.g. side flaps, silencers etc) must be used as per operating instructions and maintained properly during site operations.	<ul style="list-style-type: none">• Noise pollution caused during construction could potentially be a nuisance to neighbouring residential areas. Health risk on the noise recipient if mitigation measures are not implemented.
VISUAL IMPACTS								
	Extent	Intensity	Duration	Consequence	Probability	Significance		
Without mitigation	Local 1	High 3	Short term 1	Medium 5	Definite 4	LOW		
With mitigation	Local 1	Medium 2	Short term 1	Low 4	Probable 3	VERY LOW		
							<ul style="list-style-type: none">• Ensure that no litter, refuse, waste, rubbish, rubble, debris and builders wastes generated on the premises be placed, dumped or deposited on adjacent or surrounding properties including road verges, roads or public places and open spaces during or after the construction period. All waste/litter/rubbish etc. must be disposed of at an approved dumping site as approved by the Council.• Bare surfaces must be rehabilitated as soon as possible	The risk is high as an untidy construction site will impact the site negatively.

	<ul style="list-style-type: none">with indigenous vegetation that will be able to grow in the area;The landscape must be rehabilitated in such a way that it corresponds to the surrounding topography;Should overtime/night work be authorized, the Contractor shall be responsible to ensure that lighting does not cause undue disturbance to neighboring residents. In this situation low flux and frequency lighting shall be utilized.						
OPERATIONAL AND MAINTENANCE PHASES							
FLORAL IMPACTS							
Nature of impact: <u>Impact on floral Habitat and Diversity</u>				<u>Development footprint</u>			
Degraded Grassland Habitat				<ul style="list-style-type: none">No dumping of litter or garden refuse must be allowed on-site. As such it is advised that vegetation cuttings from landscaped areas be carefully collected and disposed of at a separate waste facility.			
	Extent	Intensity	Duration	Consequence	Probability	Significance	<ul style="list-style-type: none">Potential failure to monitor the success of relocated floral SCCIncreased introduction and proliferation of alien plant species due to a lack of maintenance activities, or poorly implemented and monitored AIP Management programme, leading to ongoing displacement of natural vegetation outside of the footprint area.
Without Mitigation	Local	Low	Short – term	Very low	Definite	VERY LOW	
	1	1	1	3	4		
With mitigation	Local	Low	Short – term	Very low	Probable	VERY LOW	
	1	1	1	3	3		
Woody Habitat				<u>Alien Vegetation</u>			
	Extent	Intensity	Duration	Consequence	Probability	Significance	
Without Mitigation	Local	Low	Short – term	Very low	Definite	VERY LOW	
	1	1	1	3	4		
With mitigation	Local	Low	Short – term	Very low	Probable	VERY LOW	
	1	1	1	3	3		
				<ul style="list-style-type: none">Edge effects arising from the proposed development, such as erosion and alien plant species proliferation, which may affect adjacent natural areas, need to be strictly managed. Specific mention in this regard is made of Category 1b and Category 2 AIP species (as listed in the NEMBA Alien species lists, 2016 and 2020 from March 2021), in line with the NEMBA Alien and Invasive Species Regulations (2014) (Appendix F of this report). For any activities taking place after 1 March 2021, the Alien and Invasive Species Regulations of 2020 apply;Ongoing alien and invasive plant monitoring and clearing/control should take place throughout the operational phase, and the project perimeters should be regularly checked for AIP establishment to prevent spread into surrounding natural areas; andAlien vegetation that is removed must not be allowed to lay on unprotected ground as seeds might disperse upon it. All cleared plant material to be disposed of at a licensed waste facility, which complies with legal standards.			

Nature of impact: <u>Impact on Floral SCC</u>								
Degraded Grassland Habitat								
	Extent	Intensity	Duration	Consequence	Probability	Significance		
Without Mitigation	Local	Low	Short – term	Very low	Probable	VERY LOW		
	1	1	1	3	3			
With mitigation	Local	Low	Short – term	Very low	Possible	INSIGNIFICANT		
	1	1	1	3	2			
Woody Habitat								
	Extent	Intensity	Duration	Consequence	Probability	Significance		
Without Mitigation	Local	Low	Short – term	Very low	Possible	INSIGNIFICANT		
	1	1	1	3	2			
With mitigation	Local	Low	Short – term	Very low	Improbable	INSIGNIFICANT		
	1	1	1	3	1			
FAUNAL IMPACTS								
Nature of impact: <u>Impact on faunal Habitat and Diversity</u>							Faunal SCC	
Degraded Grassland Habitat							<ul style="list-style-type: none">Monitoring of relocation success should continue for at least three years after the completion of the construction phase, or until it is evident that the species have established self-sustaining populations.	<ul style="list-style-type: none">Increased human presence in the area once operational, potentially leading to Illegal harvesting/ collection of medicinal plants, the persecution of fauna in the adjacent natural habitat, or an increased risk of fire frequency impacting on floral and faunal communities outside of the development footprint.
	Extent	Intensity	Duration	Consequence	Probability	Significance		
Without Mitigation	Local	Low	Short – term	Very low	Probable	VERY LOW		
	1	1	1	3	3			
With mitigation	Local	Low	Short – term	Very low	Possible	INSIGNIFICANT		
	1	1	1	3	2			
Woody Habitat								
	Extent	Intensity	Duration	Consequence	Probability	Significance		
Without Mitigation	Local	Low	Short – term	Very low	Probable	VERY LOW		
	1	1	1	3	3			

With mitigation	Local 1	Low 1	Short – term 1	Very low 3	Possible 3	INSIGNIFICANT
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Nature of impact: Impact on Faunal SCC
Degraded Grassland Habitat

	Extent	Intensity	Duration	Consequence	Probability	Significance
Without Mitigation	Local 1	Low 1	Short – term 1	Very low 3	Possible 2	INSIGNIFICANT
With mitigation	Local 1	Low 1	Short – term 1	Very low 3	Improbable 1	INSIGNIFICANT

Woody Habitat

	Extent	Intensity	Duration	Consequence	Probability	Significance
Without Mitigation	Local 1	Low 1	Short – term 1	Very low 3	Possible 2	INSIGNIFICANT
With mitigation	Local 1	Low 1	Short – term 1	Very low 3	Improbable 1	INSIGNIFICANT

AIR QUALITY IMPACTS

<p>Following the previous public and stakeholder consultations undertaken, a request was received for a dust assessment to be undertaken. A Dust Assessment was subsequently undertaken by OH&AP Consulting Services to identify atmospheric and workplace dust emission sources associated with the proposed brick manufacturing plant.</p> <p>In terms of the Atmospheric Pollution Prevention Act, the predicted dustfall from the Brick Manufacturing Plant, shall not exceed the standards in Table 1 below:</p>	<ul style="list-style-type: none"> The potential nuisance impact of dust can be mitigated by implementing dust suppression measures. The potential impact on air quality at surrounding sensitive receptors has a Very low significance rating prior to, and an Insignificant rating after, the implementation of the recommended mitigation measures.
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TYPE OF AREA	Dustfall Rate (D) (mg/m ² /day, 30-day average)	Permitted frequency of exceeding dust fall rate			
Deposition in Residential Areas	< 0.6 g/m ² /day	Two within year, not sequential months			
Deposition in Non-residential Areas	0.6 g/m ² /day < Deposition < 1.2 g/m ² /day	Two within year, not sequential months			
<p>The main sources of dust emissions outside the plant will be the following:</p> <ul style="list-style-type: none"> • Road dust from the movement of haul trucks over the terrain for the delivery of process material; • Off-loading of process material; • Open storage of process material; • Movement of loaders over the terrain through loading and off-loading of process material; • Loading and off-loading of process material; • Discharge of material from loaders into bins; • Dust laden air displaced from silos through material entering silos; and • Dust emitted through material handling inside the plant. <p>The processing plant will be housed inside an enclosed structure and any dust emissions inside the plant will be controlled at an Air Quality Index of less than unity, as required by the relevant Occupational Health Legislation.</p> <p>The impact rating of the proposed project is projected to be low provided the mitigation measures are implemented against the backdrop of the prevailing dustfall conditions at the boundaries of the existing site.</p>					

Nature of Impact: Dust generation from operation activities								
	Extent	Intensity	Duration	Consequence	Probability	Significance		
Without Mitigation	Local 1	Medium 2	Short-term 3	Very low 4	Probable 3	VERY LOW		
With Mitigation	Local 1	Low 1	Short-term 1	Very low 3	Possible 2	INSIGNIFICANT		
NOISE AND VIBRATION IMPACTS								
Noise and vibration impacts: The district where the Midvaal Brick Project will be located may be described as Urban Residential interspersed with mining, industrial and commercial activities. The immediate surroundings of the project site are exposed to noise from the R59 main road and local roads, noise from the railway line, and noise from Glen Douglas Dolomite Mine. Machinery and earthwork vibrations are of no material consequence to people in the surroundings of the Brick Manufacturing Plant. Even in mining operations, the only source of potentially significant vibration is seismic vibration caused by blasting. What is often perceived to be vibration, and incorrectly referred to as vibration, is low-frequency airborne sound. Actual structural vibrations caused by heavy machinery, excavation, dozing, or by any other earth-moving equipment operations, are generally only significant on the equipment itself and in a localised area on the site or inside plant buildings (in the workplace). Moreover, vibration induced into the ground and propagated through the earth (ground-borne machine vibration), is rapidly attenuated to negligible levels even before it reaches the site boundaries. Daytime and night-time background noise levels measured in a survey conducted in 2018, are shown in Figure 17.				<ul style="list-style-type: none"> Operational activities must be limited to the working hours of the mine. 06:00 – 22:00 Should there be operational activities required on the weekend; hours must be limited from morning to early afternoon. No sound amplification equipment such as sirens, loud hailer or hooters are to be used on site except in emergencies and no amplified music is permitted on site. Equipment that is fitted with noise reduction facilities (e.g. side flaps, silencers etc) must be used as per operating instructions and maintained properly during site operations; Reverse alarm noise can be mitigated by construction of a noise barrier on the northern and north-eastern boundary. 				<ul style="list-style-type: none"> Noise pollution caused during construction could potentially be a nuisance to neighbouring residential areas. Health risk on the noise recipient if mitigation measures are not implemented.



Figure 17: Ambient noise levels of surrounding area

Noise Map (figure 17 above) depicts the estimated daytime outdoor noise impact of the Midvaal Brick Project. The contours signify the increase in the ambient noise level expected as a result of the proposed project operations, relative to the existing daytime ambient level determined in a previous survey.

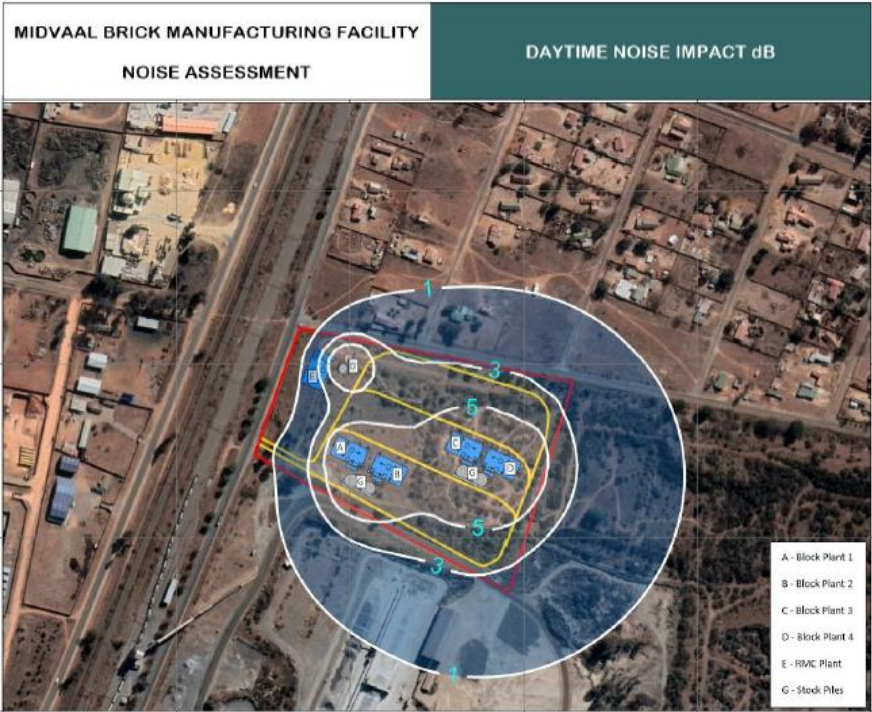


Figure 18: Daytime noise impact contours

The impacts on the map are quantified in dB. The contours serve to assess the extent (distance) of significant influence and the extent to which general operation noise will be disturbing. In terms of noise regulations, a significant impact of more than 3 dB will be deemed a disturbing noise. The noise map shows that the noise impact of the proposed Midvaal Brick Manufacturing operations at the nearest houses in the Daleside residential area is expected to be negligible (the nearest houses are outside the 3 dB impact zone). Noise from the operations will therefore not be disturbing in the residential surroundings.

<table><tr><td></td><td>Extent</td><td>Intensity</td><td>Duration</td><td>Consequence</td><td>Probability</td><td>Significance</td></tr><tr><td>Without mitigation</td><td>Local 1</td><td>Medium 2</td><td>Short-term 1</td><td>Very Low 4</td><td>Definite 4</td><td>VERY LOW</td></tr><tr><td>With mitigation</td><td>Local 1</td><td>Low 1</td><td>Short-term 1</td><td>Very Low 3</td><td>Probable 3</td><td>VERY LOW</td></tr></table>								Extent	Intensity	Duration	Consequence	Probability	Significance	Without mitigation	Local 1	Medium 2	Short-term 1	Very Low 4	Definite 4	VERY LOW	With mitigation	Local 1	Low 1	Short-term 1	Very Low 3	Probable 3	VERY LOW		
	Extent	Intensity	Duration	Consequence	Probability	Significance																							
Without mitigation	Local 1	Medium 2	Short-term 1	Very Low 4	Definite 4	VERY LOW																							
With mitigation	Local 1	Low 1	Short-term 1	Very Low 3	Probable 3	VERY LOW																							
<p>There is however a risk that reverse alarm noises, although having a negligible effect on the overall noise levels, may cause a noise nuisance. This is because of the sensitivity of human hearing to noises with a tonal character, such as produced by reverse alarms. Reverse alarm noises on the Brick Manufacturing site may be audible and cause a nuisance, even if the level is below that of the general background noise.</p>																													
TRAFFIC IMPACTS																													
<p><u>Impacts on traffic during the operational phase:</u></p> <p>A traffic impact assessment was undertaken for the proposed brick manufacturing facility. The existing surrounding road network includes the following:</p> <ul style="list-style-type: none">• <u>Bokmakierie Road:</u> The road is a single lane surfaced road, running in a north south direction. To the north the road links the applicant site with the R59, via Karee Road/Kroonarend Road/Randvaal Road. To the south the road links the study area with the R59, via Henley Drive. In terms of the data available Bokmakierie Road is Provincial Road D1289. Bokmakierie Road falls under the jurisdiction of Midvaal Local Municipality• <u>Adelaar Drive:</u> The road is a single lane surfaced road, running in an east-west direction. The existing surfaced roadway is less than 7.0m wide. Adelaar Drive falls under the jurisdiction of Midvaal Local Municipality. <p>Access to the proposed site is proposed from Bokmakierie Road, on the most southern boundary of the site.</p> <p>The proposed trip generation summary is indicated below:</p>				<p>The following measures are proposed:</p> <ul style="list-style-type: none">• Establishment of two inbound lanes (1 x 3.7m & 1 x 4.5m)• Construction of one outbound lane, minimum width of 4.5m;• Minimum throat length of 25.0m. Distance measured from road reserve boundary to the centre of the access control system;• Any structures provided as part of the access control system to have a minimum vertical clearance of 5.2m;• Minimum access bellmouth radii on local authority road to be 12.0m;• 5m x 5m splays at the site access;• To improve road safety, a 1.5m paved walkway to be provided around the taxi stops			<ul style="list-style-type: none">• The risk of the mitigation measures not being implemented, could potentially result in an access which is not safe for other road users. Although the impact is of low significance, it is imperative that the measures be implemented to improve road safety.																						

DESCRIPTION	EXTENT OF LAND USE	MORNING PEAK HOUR			AFTERNOON PEAK HOUR		
		IN	OUT	TOTAL	IN	OUT	TOTAL
Brick manufacturing	1 500m² GLA	6	2	8	3	8	11

Based on the results, the proposed development will generate approximately 8 and 11 trips, during the weekday morning and weekday afternoon peak hours respectively and the impact is therefore of low significance with the implementation of mitigation measures.

	Extent	Intensity	Duration	Consequence	Probability	Significance
Without mitigation	Local 1	Medium 2	Long term 3	Medium 6	Possible 2	LOW
With mitigation	Local 1	Low 1	Long term 3	Low 5	Possible 2	LOW

Positive Social impacts anticipated during construction

Employment Opportunities

- Labour will be required for operation activities of the proposed development. It is therefore expected that jobs will be created during the construction period.
- The operation labour requirements have not been estimated as yet. It is expected that much of the work will require mechanised construction methods because of the bulk of the works. However, there will also be a need for manual labour for construction

	Extent	Intensity	Duration	Consequence	Probability	Significance
Without mitigation	Local 1	Medium 2	Medium term 1	Low 5	Probable 3	MEDIUM (Positive)
With mitigation	Local 1	Low 1	Medium term 1	Low 5	Definite 4	HIGH (Positive)

Enhancement:

- It is recommended that local employment policy is adopted to maximise the opportunities made available to the local labour force.
- Where reasonable and practical SA Block should appoint local contractors and implement a (local first) policy especially for semi-skilled and low skilled job categories.
- Training and skills development programmes should be initiated prior to the commencement of the operation phase

- The impact is positive; the only risk anticipated is not providing job opportunities to local people.
- Influx of workers looking for employment opportunities to the area

Alternative 1 – No alternative site have been considered for the proosed development, only technology alternative has been considered and it has similar impact like above since it will be implement in the same area

Potential impacts:	Significance rating of impacts (positive or negative):	Proposed mitigation:	Significance rating of impacts after mitigation:	Risk of the impact and mitigation not being implemented

No Go – The No-Go alternative entails no change in existing status quo, of the land use on the Remaining Extent of Portion 3 of the farm Witkoppie 373 IR. This option will result in limited impacts already occurring in the study area.

If the proposed operation were not to proceed, the land may or may not be utilised for grazing of livestock in the future due its proximity to the mine and the danger that it can impose to livestock and herders/shepherds. As much as the no-go option may result in the protection of the environment in situ; however, the consequences of not proceeding with the proposed operation will include the forfeiture of a mining and factory development opportunity and therefore the loss of support towards the Midvaal Municipality for attaining some of the objectives as per their IDP goals. **The no-go option is therefore not preferred**

Table 9: Impact significance on the No Go alternative

Potential impacts:	Significance rating of impacts (positive or negative):	Proposed mitigation:	Significance rating of impacts after mitigation:	Risk of the impact and mitigation not being implemented
Floral Impacts	Low	There are no mitigation measures	Insignificant	No risk
Faunal Impacts	Low	There are no mitigation measures	Insignificant	No risk
Heritage Impacts	Insignificant	There are no mitigation measures	Insignificant	No risk
Social Impacts	High (negative)	There are no mitigation measures if the proposed project is not approved	High (negative)	The proposed development will generate job opportunities during both the construction and operational phases of the development. If the development is not approved, such opportunities will be lost.

Noise Impacts	Low	There are no mitigation measures for the no-go alternative	Low	Should the project not be approved, the current noise level will remain as is.
Visual Impacts	Insignificant	There are no mitigation measures	Insignificant	No risk
Air Quality Impact (Dust)	Low	There are no mitigation measures for the no-go alternative	Low	Should the project not be approved, the impact on air quality will remain as is.
Traffic Impacts	Insignificant	There are no mitigation measures	Insignificant	No risk

List any specialist reports that were used to fill in the above tables. Such reports are to be attached in the appropriate Appendix.

<ol style="list-style-type: none"> 1. Biodiversity Impact Assessment 2. Heritage Impact Assessment 3. Noise and Vibration Assessment 4. Traffic Assessment 5. Dust Assessment 	
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Describe any gaps in knowledge or assumptions made in the assessment of the environment and the impacts associated with the proposed development.

Biodiversity

The following assumptions and limitations apply to the biodiversity assessment:

- The biodiversity assessment was confined to the study area and did not include the neighbouring and adjacent properties. These were considered as part of the desktop assessment;
- With ecology being dynamic and complex, some aspects (some of which may be important) may have been overlooked. The assessment was undertaken on the

11th of December 2020 (summer). A more accurate assessment would require that assessments take place in all seasons of the year. However, on-site data was augmented with all available desktop data. Together with project experience in the area, the findings of this assessment are considered an accurate reflection of the ecological characteristics of the study area.

- Due to the nature and habits of most faunal taxa, it is unlikely that all species would have been observed during a field assessment of limited duration. Due to the locality of the study area (peri-urban area), continuous anthropogenic activities, the cyclical nature of many species' life stages, as well as the season of the assessment, very few faunal species were observed. As such, background data (desktop) and literature studies were used to further infer faunal species composition and sensitivities in relation to the available habitat; and
- Sampling, by its nature, means that not all individuals are assessed and identified. Some species and taxa associated with the study area may have been missed during the assessment.

Heritage Assessment:

- No severe physical restrictions were encountered as the survey area was fairly accessible.

Dust Assessment:

- As the designs for the plant are not yet available, the impact of dust is predicted, however, once the plant design is finalised, the theoretical dust impact of the project will be determined through modelling.

Noise Assessment:

- The assessment of noise was undertaken with the assumption that the brick

manufacturing site will be restricted to daytime hours (06:00 – 22:00) in accordance with SANS 10103.

Traffic Impact Assessment:

The assumption of trips generated is obtained from the guideline document entitled “South African Trip Data Manual” and is summarised as follows:

- Heavy industry/manufacturing (COTO 120)

In terms of the COTO document “**heavy manufacturing/industry land use covers developments where the primary activity is the conversion of raw materials or parts into products and where the materials or parts have a heavy nature. Examples of this land use includes brick manufacturing, machinery, metal, electrical power generation, etc. The land use also includes offices, warehouse and other facilities associated with the main activity**”.

- Weekday morning peak hour: 0.50 trips/100m² GLA, with a directional split of 75:25 (in:out)
- Weekday afternoon peak hour: 0.70 trips/100m² GLA, with a directional split of 25:75 (in:out)

5.3. Impacts that may result from the decommissioning and closure phase

Briefly describe and compare the potential impacts (as appropriate), significance rating of impacts, proposed mitigation and significance rating of impacts after mitigation that are likely to occur as a result of the decommissioning and closure phase for the various alternatives of the proposed development. This must include an assessment of the significance of all impacts.

Proposal

Potential impacts:	Significance rating of impacts (positive or negative):	Proposed mitigation:	Significance rating of impacts after mitigation:	Risk of the impact and mitigation not being implemented
Noise created by machinery	Low	<ul style="list-style-type: none"> • Refrain from conducting decommissioning activities after hours and during weekends. If 	Insignificant	Noise pollution caused during demolition of infrastructure could potentially be a nuisance

		<p>necessary to work during weekends, no construction activities will be allowed to take place after 13h00 on a Saturday.</p> <ul style="list-style-type: none"> • No decommissioning activities will be allowed on Sundays 		to neighbouring residential areas. Health risk on the noise recipient if mitigation measures are not implemented.
Soil erosion	Low	<ul style="list-style-type: none"> • Progressive rehabilitation will be implemented to minimise exposed areas 	Low	Fertile top soil necessary for revegetation could be washed away by wind or water which may delay rehabilitation
Dust pollution	Low	<ul style="list-style-type: none"> • Control through dust suppression • Control through limiting the speed of vehicle movement to a maximum speed of 40km/h • Control through monitoring of dustfall to determine if measures are effective • Progressive rehabilitation will be implemented to minimise exposed areas after removing the infrastructure areas and roads 	Insignificant	Dust nuisance on the surrounding community resulting from demolition activities
Visual Pollution	Medium	<ul style="list-style-type: none"> • Avoid/prevent leaving any building material or waste on site • Proper upkeep and maintenance of the site must be done. 	Low	The risk is low provided the mitigation measures are implemented
Establishment of alien invasive vegetation	Low	<ul style="list-style-type: none"> • The primary means of rehabilitation should involve the replacement of topsoil and hydro-seeding with an indigenous grass seed mixture at the start of the rainfall season. A suitably experienced landscaping contractor should be appointed to undertake rehabilitation • Control through ongoing alien invasive eradication programme 	Very Low	Compaction on areas that infrastructure has been removed could result in altered topsoil characteristics and vegetation composition. These areas are also prone to invasion by alien invasive plant species.

		<ul style="list-style-type: none"> • Prevent spraying of herbicides in the area as this also kills many adjacent non-target species • Regular follow up clearing of alien invasive species would be required in order to obtain successful rehabilitation • Manage by rehabilitating and backfilling all erosion damage, such as erosion channels and runnels • Phased restoration reclamation and rehabilitation of the land affected by mining must be completed prior to the final decommissioning of the brick making facility 		
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Alternative 1

Potential impacts:	Significance rating of impacts(positive or negative):	Proposed mitigation:	Significance rating of impacts after mitigation:	Risk of the impact and mitigation not being implemented
N/A	N/A	N/A	N/A	N/A

Alternative 2

Potential impacts:	Significance rating of impacts (positive or negative):	Proposed mitigation:	Significance rating of impacts after mitigation:	Risk of the impact and mitigation not being implemented
N/A	N/A	N/A	N/A	N/A

List any specialist reports that were used to fill in the above tables. Such reports are to be attached in the appropriate Appendix.

Specialist studies for decommissioning and closure phase will be undertaken at the time when decommissioning is contemplated by the developer.

Where applicable indicate the detailed financial provisions for rehabilitation, closure and ongoing post decommissioning management for the negative environmental impacts.

Ongoing post decommissioning management cost will not be determined at this stage as this phase of the development is not yet contemplated

5.4. CUMULATIVE IMPACTS

Describe potential impacts that, on their own may not be significant, but is significant when added to the impact of other activities or existing impacts in the environment. Substantiate response:

Cumulative impacts can result from actions which may not be significant on their own but which are significant when added to the impact of other similar actions. The anticipated cumulative impacts of this development (for all alternatives) include the following:

Flora

The greatest threat to the floral ecology within the study area is the continued proliferation of AIP species, and ongoing/expanding urban settlements in the surrounding areas resulting in the overall loss of native floral communities within the local area. The proposed development will also increase the movement of humans within the area and could lead to increased harvesting of floral SCC (if they establish within the area) and / or the degradation of floral habitat due to continued exposure to anthropogenic disturbances.

Fauna

The region in which the study area is located has already been subjected to extensive anthropogenic activities, historically dumping of waste material and more recently urban development. As such, this has already led to notable habitat loss, habitat degradation, loss of species diversity and the alteration and limiting of faunal species movement / migration.

The study area itself has been isolated from natural open spaces with local faunal assemblages because of surrounding anthropogenic activities, including activities within the neighbouring Glen Douglas Dolerite Mine, roads, and the development of surrounding infrastructure. Edge effects and improper environmental management during the construction of the surrounding areas has led to the degradation of the study area itself as dumping and the proliferation of AIP species was noted. Development within the study area will further add to local loss of habitat, yet species diversity is unlikely to be affected.

Increase in dust:

With the current mining activities operating within the area, dust is being generated and regularly monitored by the mining company. The addition of the brick manufacturing plant will add to the generation of dust, however, as the manufacturing plant is proposed to be within an enclosed building structure, the generation of dust affecting adjacent property owners and land users, are minimised. Various mitigation measures have been included within the Environmental Management Plan (EMP), to ensure that the impact is minimised as much as possible.

Increase in the generation of noise:

Several investigative and routine noise monitoring surveys have previously been undertaken by Acusolv in the residential surroundings of Glen Douglas Mine and according to the data obtained, the residential area bordering on the Midvaal Brick site have daytime and night-time levels of 48 dBA and 44 dBA, respectively. The noise map shows that the noise impact of the proposed Midvaal Brick Manufacturing operations at the nearest houses in the Daleside residential area is expected to be negligible, as the nearest houses are outside the 3 dB impact zone. The cumulative impact is therefore expected to be negligible.

Increased socio-economic upliftment as a result of the proposed development

Constructing the proposed development will result in direct jobs being created during the construction and operation of the brick manufacturing facility and associated infrastructure.

5.5. Environmental impact statement

Taking the assessment of potential impacts into account, please provide an environmental impact statement that sums up the impact that the proposal and its alternatives may have on the environment after the management and mitigation of impacts have been taken into account with specific reference to types of impact, duration of impacts, likelihood of potential impacts actually occurring and the significance of impacts.

Proposal

The following **conclusions were drawn from the specialist studies** undertaken within this Basic Assessment:

Biodiversity

The Degraded Grassland Habitat and the Woody Habitat units were identified as having a moderately low floral and faunal sensitivity. The moderately low sensitivity of the study area can be attributed to the extent of fragmentation (e.g. due to the location of the study area within a peri-urban setting, neighbouring an active mine) and degradation (e.g. dumping of waste material) experienced throughout the study area. Development activities within the study area will likely not have a significant impact on the floral and faunal communities found within the study area or beyond, provided that development activities are restricted to the area identified for development.

During the field assessment, one potential floral SCC, namely *Adromischus umbraticola* subsp. *umbraticola*, was potentially recorded on site. It is therefore recommended that all SCC (as identified in section 4.3) that are present or potentially within the footprint area should be rescued and relocated by a suitably qualified specialist and either relocated to suitable habitat outside of the development footprint or moved to registered nurseries such as the ARC or the SANBI. No faunal SCC were encountered during the field assessment and due to the impacts currently occurring within the study area it is highly unlikely that any SCC will permanently utilise the study area due its location within a peri-urban setting and the limited habitat, food resources and movement corridors necessary to support SCC.

Following the ecological assessment of the biodiversity within the study area, the impacts associated with the proposed development activities were determined. The impacts on the floral and faunal habitat, diversity and SCC are considered to range from medium-low to very low significance impacts prior to the implementation of mitigation measures. With mitigation fully implemented all impacts can be reduced to low to very-low significance impacts. No significant impacts on the biodiversity associated with the study area are anticipated for the proposed development.

Heritage

Stone Age settlements

No Stone Age settlements, structures, features, assemblages or artefacts were recorded during the survey.

Iron Age settlements

No Late Iron Age artefacts, structures, features or settlements were identified during the survey.

Graveyards

No Graveyards or individual graves were identified.

Historical structures

No historical buildings or structures were recorded.

It is therefore recommended, from a cultural heritage perspective, that the proposed expansion of the existing plant, which will include the erection of a brick making plant, offices, bathroom facilities, stores and associated infrastructure may proceed.

However, please note:

Archaeological deposits usually occur below ground level. Should archaeological artefacts or skeletal material be revealed in the area during development activities, such activities should be halted, and a university or museum notified in order for an investigation and evaluation of the find(s) to take place (**cf. NHRA (Act No. 25 of 1999)**, Section 36 (6)).

Dust Assessment:

The main sources of dust will be the following:

- Dust generated from the movement of haul trucks over the terrain for the delivery of process material,
- Off-loading of process material,
- Open storage of process material,
- Movement of loaders over the terrain through loading and off-loading of process material
- Dust generated through material entering silos
- Dust emitted through material handling inside the plant

The processing plant will be housed inside an enclosed structure. Any dust emissions inside the plant will be controlled as required by the relevant Occupational Health Legislation. The impact rating of the proposed project is projected to be **low** provided the mitigating measures are implemented against backdrop of the prevailing dust fall conditions at the boundaries of the existing site.

The following mitigation measures are proposed to minimize the impact:

- The paving of access roads and material storage areas
- Building of product storage bunkers to limit windblown dust
- The implementation of dust suppression at storage bunkers

- The use of dust suppression at material transfer points
- The implementation of dust extraction with a filtering system on top of silos
- Dust extraction and filtering of emissions from sources inside building

Noise and Vibration Impact Assessment:

Acusolv was appointed to investigate the noise impact of the proposed operation on the surrounding environment. The immediate surroundings of the Project site are exposed to noise from the R59 main road and local roads, noise from the railway line to the west, and noise from Glen Douglas Dolomite Mine to the south. Baseline sound levels for the area were obtained from the results of several investigative and routine noise monitoring surveys previously undertaken in the area for Glen Douglas Mine. Previous surveys indicated that the daytime and night-time levels were in the order of 50 dBA and 45 dBA, respectively.

According to the SANS 10103, a 24-hour cycle is divided as follows:

- Daytime (6:00 – 22:00)
- Night time (22:00 – 06:00)

A significant (Moderate) impact is deemed to occur if noise produced by the activity under assessment, elevates the ambient level at the property boundary (or nearest noise receptor) by 5 dB or more.

As summarized in the Figure below, the 3 dB contour delineates a Low impact and the 5 dB contour a Moderate impact. The 1 dB (negligible impact) contour is shown for context only

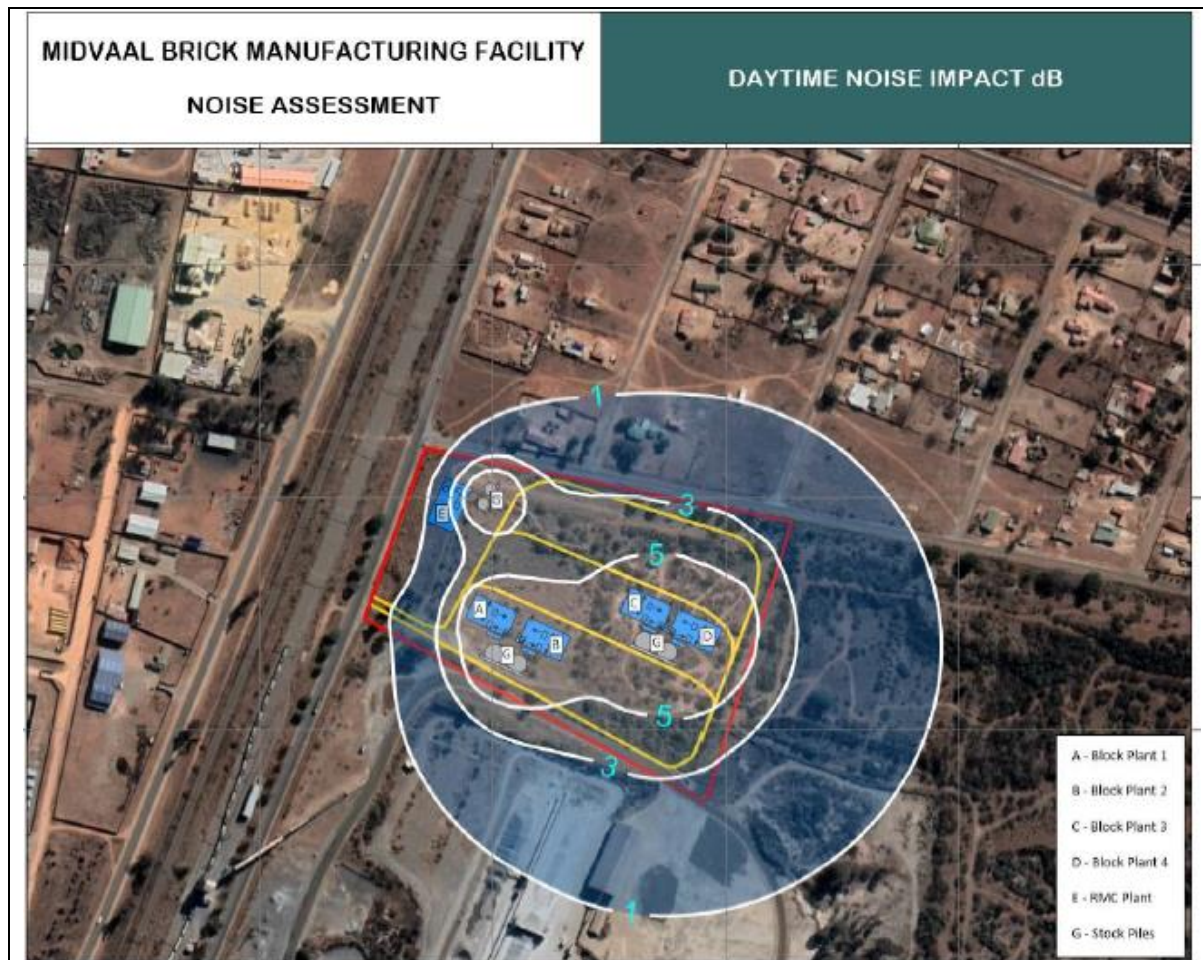


Figure 19: Daytime noise impact contours

Noise study found that the noise impact of the proposed operation on the nearest houses, will be negligible (the nearest house is outside the 3dB impact footprint).

Machinery and earthwork vibrations are of no material consequence to people in the surroundings of the Brick Manufacturing Plant. What is often perceived to be vibration, and incorrectly referred to as vibration, is low-frequency airborne sound. Actual structural vibrations caused by heavy machinery are generally only significant on the equipment itself and in a localised area on the site or inside plant buildings (in the workplace). Vibrating machinery such as the Brick Manufacturing machines, are mounted on vibration isolators. This is for the protection of the machines, but at the same time this also reduces the amplitude of vibrations induced into the ground;

Traffic Impact Assessment:

Based on the results of the traffic assessment undertaken, the proposed development will generate approximately 8 and 11 trips, during the weekday morning and weekday afternoon peak hours respectively.

The following minimum access arrangements are proposed for the site:

- Access from Bokmakierie Road, on the most southern boundary of the site;
- Two inbound lanes (1 x 3.7m & 1 x 4.5m);
- One outbound lane, minimum width 4.5m;

From a traffic engineering view point it is confirmed that the impact of the new brick manufacturing facility will be negligible on the traffic flow along Bokmakierie Road.

To compensate for the turning vehicles an exclusive right-turn lane (storage length = 25) should be provided on the southern leg of Bokmakierie Road. To improve road safety, taxi stops must be provided on Bokmakierie Road, downstream of the new access and a 1.5m paved walkway must be provided around the taxi stops.

Alternative 1

See above, the impacts are similar to those of Technology Alternative 1 therefore are not compared collectively.

Alternative 2

N/A

No-go (compulsory)

The No Go alternative for manufacturing bricks is considered in accordance with the requirements of the EIA Regulations, 2014 (as per Appendix 2. Section 2 (i) (i) of Notice R.982, 2014). The No-Go alternative entails no change in existing status quo, of the land use on on the Remaining Extent of Portion 3 of the farm Witkoppie 373 IR. If this carries a knock-on effect implicating the mine also as a No Go, it further suggests the land use will remain, as zoned, for use as agricultural land.

If the proposed operation were not to proceed, the land may or may not be utilised for grazing of livestock in the future due its proximity to the mine and the danger that it can impose to livestock and herders/shepherds. As much as the no-go option may result in the protection of the environment in situ; however, the consequences of not proceeding with the proposed operation will include the forfeiture of a mining and factory development opportunity and therefore the loss of support towards the Midvaal Municipality for attaining some of the objectives as per their IDP goals.

5.6. IMPACT SUMMARY OF THE PROPOSAL OR PREFERRED ALTERNATIVE

For proposal:

It must be noted that the impact scores in Table 8 & 9 above are not intended to be definitive measures of environmental impact, but they are a useful guide to evaluating the overall environmental performance of a new development and they assist in interpreting key influences of a development.

The report has detailed all the major impacts, their significance and the mitigation measures required. The assessment demonstrates the associated negative impacts of the development are within the lower limit and acceptable. Further, the assessment shows that there are various positive impacts that will contribute to enhance the livelihood of the community.

It' is therefore evident that, based on the biophysical and socio-economical characteristics, the site is suitable for the proposed development (only if the project is planned and managed

in accordance with an approved Environmental Management Plan). The development (both alternatives) will be compatible with the surrounding area and create numerous job opportunities during the construction and operational phases. The proposed development will furthermore not be in competition any smaller brick making companies as there is none in the area. If well planned and well located for its market.

The proposed development will have minimal negative impact on the Bio-physical environment, but have a significant positive impact on the Socio-economic Environment as the proposed development will contribute and promote economic growth of the surrounding environment and the Local Municipality.

For alternative:

Having assessed the significance of impacts of the proposal and alternative(s), please provide an overall summary and reasons for selecting the proposal or preferred alternative.

This Report has identified and assessed the potential impacts on the environment associated with the proposed lodge development.

The project will result in some unavoidable environmental impacts during both construction and operation but this is not a fatal flaw. The nature of the project has been planned in such a way that there are minimal negative environmental impacts. None of these adverse impacts are considered unacceptably significant and all can be managed to acceptable levels through the effective implementation of the recommended mitigation measures.

Alternative technology 1 (preferred) - automated brick manufacturing allows for complete indoor production, curing and packaging which dramatically reduces noise and dust in the immediate area. The main disadvantage of automation is that it requires less labour but, in this case, the extra income generated from this new facility will bolster the overall sustainability of SA Block and safeguard the remaining 8 plants, with 200+ employees, which have already been negatively impacted by cost-reducing restructuring.

From the impact assessment, it is evident that prior to mitigation, impacts associated with the proposed development are generally low. Thus, based on the specialist recommendations, it is the opinion that the project be considered favorably and environmental authorisation granted for the proposed activities, provided the essential and recommended mitigation measures as defined in this report are strictly adhered to.

Furthermore, the mitigations and adaptive monitoring outlined in this Basic Assessment and the EMP with respect to potential adverse impacts should result in limited adverse impacts on local and regional, natural and socio-economic resources. Balanced with the overall beneficial positive economic and environmental impacts identified, the potential net adverse effects attributable to the proposed development do not constitute a threat to local and regional ecological resources and social systems.

The EAP further recommends that environmentally friendly measures be implemented in the design of the proposed brick manufacturing plant. These include water and energy saving measures and the minimisation of waste production. Some green initiatives include LED lighting; dimming lights; sensor lighting; the half-flush/ full-flush toilet system; double glazed windows; recycling items such as paper, batteries, fluorescent tubes, glass and plastic; insulated water pipes; solar geysers and panels; stormwater storage tanks, etc.

Based on the assumption the EAP believes through effective implementation of the stipulated mitigation measures, the adverse impacts can be reduced. With the proposed mitigation measures, GDARD may agree that the proposed development be granted approval.

5.7. Spatial development tools

Indicate the application of any spatial development tool protocols on the proposed development and the outcome thereof.

The Gauteng PSDF is a provincial and strategic planning policy that responds to and complies with in particular the National Development Plan vision 2030 and the National Spatial Development Perspective (NSDP). This framework promotes a developmental state in accordance to the principals of global sustainability as is stated by among others, the South African constitution and enabling legislation. The Gauteng PSDF is based on six growth and development pillars, each of which has its onset of drivers with long term-programmes. Pillar 1 highlights the job creation. The proposed development will create jobs opportunities during the construction and operational phases, these employment opportunities will target local community members that are usually excluded from mainstream economic and formal employment. Therefore, the development is in line with the Gauteng PSDF.

5.8. Recommendation of the practitioner

Is the information contained in this report and the documentation attached hereto sufficient to make a decision in respect of the activity applied for (in the view of the Environmental Assessment Practitioner as bound by professional ethical standards and the code of conduct of EAPASA).

YES	<input type="checkbox"/>
✓	<input checked="" type="checkbox"/>

If "NO", indicate the aspects that require further assessment before a decision can be made (list the aspects that require further assessment):

N/A

If "YES", please list any recommended conditions, including mitigation measures that should be considered for inclusion in any authorisation that may be granted by the competent authority in respect of the application:

This Draft BAR has provided a comprehensive assessment of the potential environmental impacts associated with the proposed Midvaal Brick Manufacturing project. It is the opinion of the EAP and various specialists that there are no environmental or social impacts of high significance that would prevent the establishment of the proposed project, **it is therefore recommended that the project should be authorised and the proposed alternative automated brick plant is recommended for implementation. However, the authorisation must be subjected to the following conditions:**

- An Environmental Control Officer (ECO) should be appointed to monitor compliance with the specifications of the EMPr for the duration of the construction period.
- Should heritage features, archaeological sites or graves be exposed during construction work, it must immediately be reported to a heritage practitioner so that an investigation and evaluation of the finds can be made.
- All relevant legislation and requirements of other government departments (National, Provincial), in particular of Section 28 (duty of care) of NEMA, must be complied with
- In the event of a major incident (e.g. fire causing damage to property and environment, major spill or leak of contaminants), the relevant authorities should be notified as per the notification of emergencies/ incidents, as per the requirements of NEMA.
- Compliance with all legal requirements in relation to environmental management and conditions of the authorisation issued by GDARD.

5.9. THE NEEDS AND DESIREBILITY OF THE PROPOSED DEVELOPMENT (AS PER NOTICE 792 OF 2012, OR THE UPDATED VERSION OF THIS GUIDELINE)

There is a shortage of building construction and road construction materials in the area we intend to do business as well as in the Gauteng Province. Brick constitutes one of the major materials used for the construction of buildings. Brick belongs to the wide family of construction materials and is mainly used for the construction of outer and inner walls in buildings. The construction industry is one of the most important industrial sectors in South Africa, accounting for 6.7% of the GDP.

The proposed Brick Factory will be located in the Midvaal Municipality area. The proposed development site is located next to Glen Douglas mine and the site is easily accessible as it is situated adjacent to the road, thus accessibility will not be a constraint. This will provide an improved convenience, in terms of proximity, to local

communities who are the intended users of the proposed development. Furthermore, the proposed brick factory development will contribute to job creation during construction and operational phase.

SA Block wants to grow in the business not only for the increase of production and income, but to create sustainable job opportunities to decrease Midvaal's unemployment rate. They want to sell their bricks at market related prices to contribute to the economic upliftment of the community. Local labour from adjacent communities or Midvaal will be employed by the brick plant. This will have a positive impact on the wellbeing of employees with a multiplier effect on households of the employed.

5.10. THE PERIOD FOR WHICH THE ENVIRONMENTAL AUTHORISATION IS REQUIRED (CONSIDER WHEN THE ACITIVITY IS EXPECTED TO BE CONCLUDED)

Duration and Validity: The environmental authorization is required for a period of 10 years from the date of issue. Should a longer period be required, the applicant/EAP will be required to provide a detailed motivation on what the period of validity should be

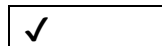
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VIRONMENTAL MANAGEMENT PROGRAMME (EMPR) (MUST INCLUDE POST CONSTRUCTION MONITORING REQUIREMENTS AND WHEN THESE WILL BE CONCLUDED.)

If the EAP answers "Yes" to Point 7 above then an EMP is to be attached to this report as an Appendix

EMPr attached



6. SECTION F: APPENDIXES

The following appendixes must be attached as appropriate (this list is inclusive, but not exhaustive):

It is required that if more than one item is enclosed that a table of contents is included in the appendix

Appendix A: Site plan(s) – *(must include a scaled layout plan of the proposed activities overlain on the site sensitivities indicating areas to be avoided including buffers)*

Appendix B: Photographs

Appendix C: Facility illustration(s)

Appendix D: Route position information

Appendix E: Public participation information

Appendix F: Water use license(s) authorisation, SAHRA information, service letters from municipalities, water supply information

Appendix G: Specialist reports

Appendix H: EMPr

Appendix I: Other information

CHECKLIST

To ensure that all information that the Department needs to be able to process this application, please check that:

- Where requested, supporting documentation has been attached;
- All relevant sections of the form have been completed.