

GRAVEL BORROW PIT NO. 5 IN BANKHARA-BODULONG

ENVIRONMENTAL MANAGEMENT PLAN

**FOR
NORTHERN CAPE
DEPARTMENT OF ROADS AND PUBLIC WORKS**

MARCH 2013



Terra Works Environmental Consultants
Physical Address: No. 41, Frans Kleynhans Drive, Groenvlei
Postal Address: P.O. Box 28242, Danhof, 9310
Telephone: 051 412 6350, Fax: 051 412 6351
Contact Person: Samuel Pauw

BORROW PIT DETAILS:

BORROW PIT NAME: Borrow Pit No. 5 in Bankara-Bodulong

FARM NAME: Farm No. 690

ADMINISTRATIVE REGION: Kuruman

LOCAL MUNICIPALITY: Ga Segonyana Local Municipality

COMMODITY TYPE: Gravel for Road Construction

MINING METHOD: Surface Mining

BORROW PIT COORDINATES:

BORROW PIT DESCRIPTION (LO23)		
	Y	X
A	-39841.920	3 032557.630
B	-39910.100	3 032606.340
C	-39931.560	3 032606.240
D	-39862.560	3 032567.420

CONTENTS

1. DESCRIPTION OF AFFECTED ENVIRONMENT	6
2. POTENTIAL IMPACTS OF THE MINING OPERATION.....	9
3. IMPACT ASSESSMENT AND MITIGATION MEASURES	13
4. FINANCIAL PROVISIONS.....	16
5. MONITORING AND PERFORMANCE.....	20
6. CLOSURE AND ENVIRONMENTAL OBJECTIVES.....	21
7. PUBLIC PARTICIPATION	22
8. ENVIRONMENTAL PLAN.....	24
9. CAPACITY TO REHABILITATE AND MANAGE IMPACTS	26
10. UNDERTAKING	27
APPENDIX 1 - BORROW PIT DIAGRAM	
APPENDIX 2 - HERITAGE IMPACT ASSESSEMENT	
APPENDIX 3 - BOTANICAL STUDY	
APPENDIX 4 - TECHNICAL AND MANAGEMENT OPTIONS FOR MITIGATION	
APPENDIX 5 - REHABILITATION MEASURES	
APPENDIX 6 - CONSULTATION DOCUMENTS	



mineral resources

Department:
Mineral Resources
REPUBLIC OF SOUTH AFRICA

NAME OF APPLICANT: DEPARTMENT OF ROADS AND PUBLIC WORKS

REFERENCE NUMBER:

ENVIRONMENTAL MANAGEMENT PLAN

**SUBMITTED
IN TERMS OF SECTION 39 AND OF REGULATION
52 OF THE MINERAL AND PETROLEUM
RESOURCES DEVELOPMENT ACT, 2002,
(ACT NO. 28 OF 2002) (the Act)**

STANDARD DIRECTIVE

Applicants for prospecting rights or mining permits, are herewith, in terms of the provisions of Section 29 (a) and in terms of section 39 (5) of the Mineral and Petroleum Resources Development Act, directed to submit an Environmental Management Plan strictly in accordance with the subject headings herein, and to compile the content according to all the sub items to the said subject headings referred to in the guideline published on the Departments website, within 60 days of notification by the Regional Manager of the acceptance of such application. This document comprises the standard format provided by the Department in terms of Regulation 52 (2), and the standard environmental management plan which was in use prior to the year 2011, will no longer be accepted.

IDENTIFICATION OF THE APPLICATION IN RESPECT OF WHICH THE ENVIRONMENTAL MANAGEMENT PLAN IS SUBMITTED.

ITEM	COMPANY CONTACT DETAILS
Name	Northern Cape Department of Roads and Public Works
Tel no	053 839 2100
Fax no:	053 839 2290/1
Cellular no	-
E-mail address	-
Postal address	P. O. Box 3132, Square Hill Park, Kimberley, 8301

ITEM	CONSULTANT CONTACT DETAILS (If applicable)
Name	Terra Works
Tel no	051 412 6350
Fax no:	051 412 6351
Cellular no	084 700 9700
E-mail address	sp@terraworks.co.za
Postal address	P.O. Box 28242, Danhof, 9310
	Samuel Pauw

DESCRIPTION OF AFFECTED ENVIRONMENT

1 REGULATION 52 (2): Description of the environment likely to be affected by the proposed prospecting or mining operation

1.1 The environment on site relative to the environment in the surrounding area.

The borrow pit is located about 250m from R31 road next to a previously utilised borrow pit. The nearest residential area is to the borrow pit is Bankara - Bodulong which is about 2km from the borrow pit. The road from R31 to Bodulong is about 600m from the site.

This site falls in the savanna biome and the vegetation type is classified as the Kalahari Plateau Bushveld. In general, this is a fairly dense bushveld composed of shrubs, and sometimes small trees, in a mixed grassland. The principal shrubs are Camphor Tree *Tarchonanthus camphoratus*, Threethorn *Rhigozum trichotomum*, Puzzle Bush *Ehretia rigida*, *Grewia flava* and *Maytenus heterophylla*. The tree layer is not dominant but the following species do occur sparsely: Wild Olive *Olea europaea* subsp.

africana, Umbrella Thorn Acacia *tortilis* and Shepherd's Tree *Boscia albitrunca*. The grass is by nature tall and dominated by Redgrass *Themeda triandra* and other grasses such as Copperwire Grass *Aristida diffusa* and Silky Bushman Grass *Stipagrostis uniplumis*. Karoo dwarf shrubs are sometimes accompanied by the development of thickets of shrubs and trees including Fringed Karee *Rhus ciliate*, Spikeflower Black Thorn Acacia *mellifera* subsp. *detinens* and Umbrella Thorn *A. tortilis*.

During assessment of the site, no animals were noted, however rodents such as the short tailed Gerbil, *Desmodillus auricularis* the ground-dwelling rodents, the black-tailed tree rat, *Thallomys nigricauda* are known to occur within the vicinity of the project site together with birds such as the crowned plover, the common quail, the hammerkop and the darter.

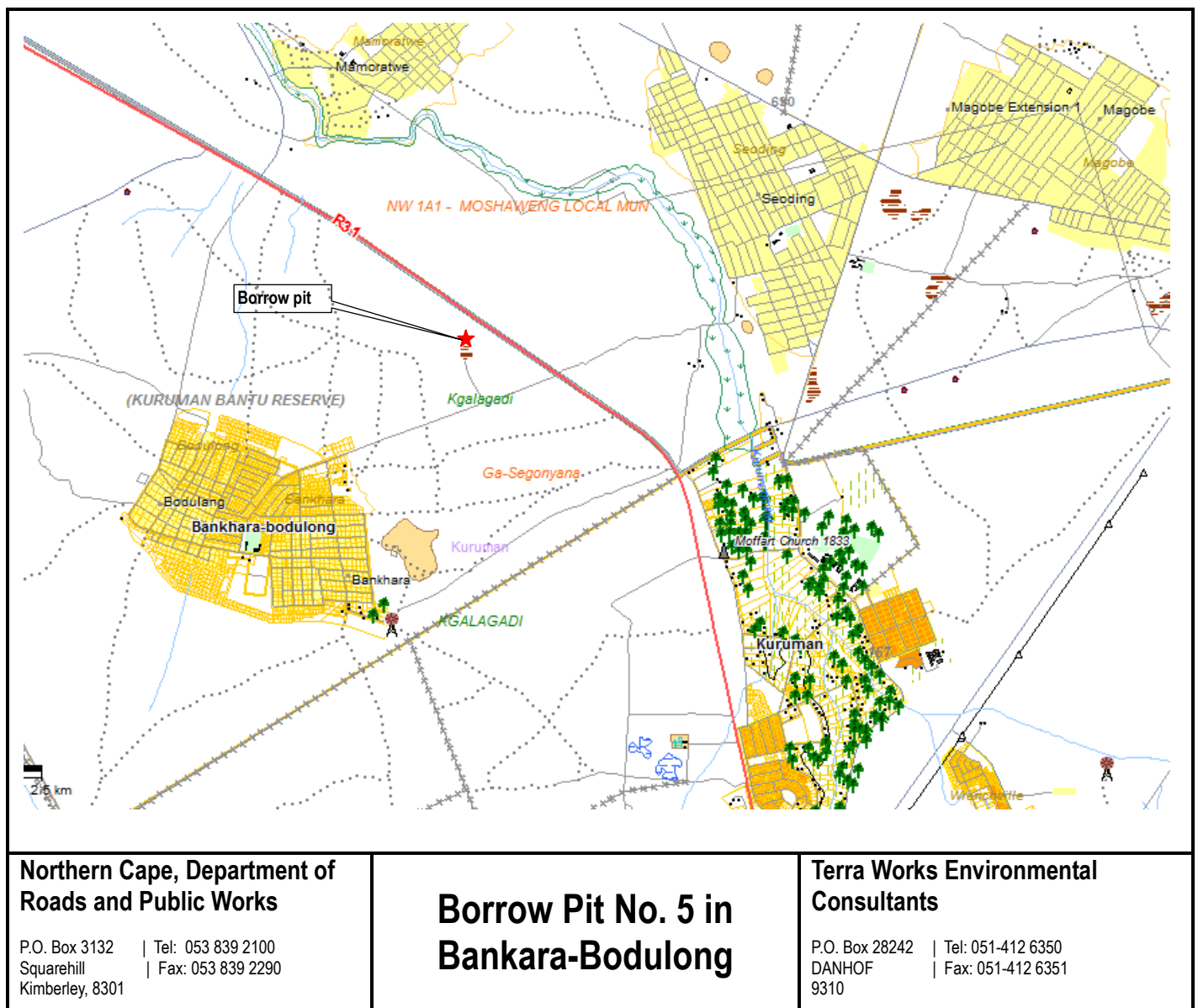
The soils on site are red-brownish gravelly soils with lots of pebbles. The area where the borrow pit is sited is generally flat. The photographs below show typical vegetation of site. The area



1.2 The specific environmental features on the site applied for which may require protection, remediation, management or avoidance.

There are no specific features on the area that require avoidance, however, the removal of vegetation to facilitate the excavation of gravel and the movement of machinery will need to be managed

1.3 Map showing the spatial locality of all environmental, cultural/heritage and current land use features identified on site.



- 1.4** Confirmation that the description of the environment has been compiled with the participation of the community, the landowner and interested and affected parties,

The borrow pit description was compiled in consultation with personnel from Vela VKE and the Ga Segonyana Local Municipality which is the land owner. The municipality's requirements on the site are shown in the agreement to utilise the borrow pit which is appended in the consultation documents.

POTENTIAL IMPACTS OF THE MINING OPERATION

- 2 REGULATION 52 (2) (b): Assessment of the potential impacts of the proposed prospecting or mining operation on the environment, socio-economic conditions and cultural heritage.**

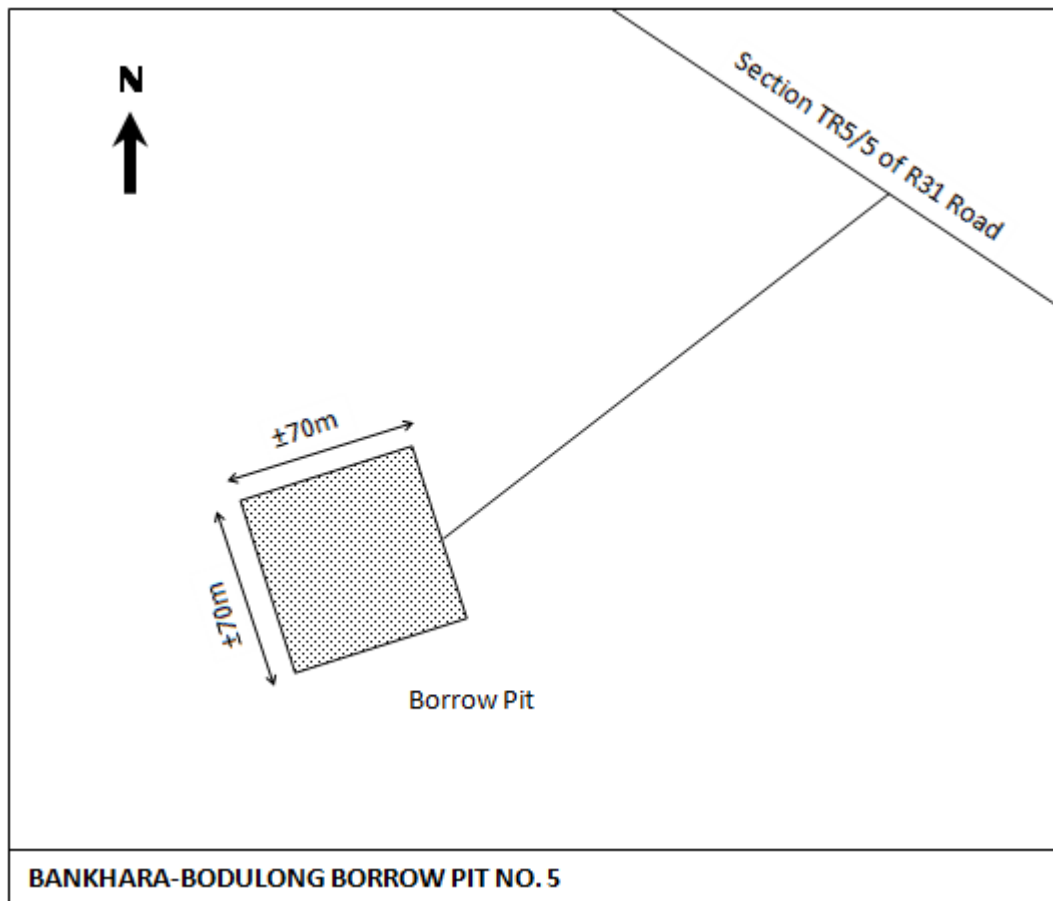
2.1 Description of the proposed prospecting or mining operation.

- 2.1.1 The main prospecting activities (e.g. access roads, topsoil storage sites and any other basic prospecting design features)**

Areas that will be dedicated for the storage of topsoil will be demarcated prior to the commencement of stripping when mining starts. A new access road will be created from the main road to reach the borrow pit. The access road will approximately be 200m from the main road. The borrow pit will only make use of mobile equipment on site so no buildings will be constructed on site.

2.1.2 Plan of the main activities with dimensions

The borrow pit diagram is shown below with the expected dimensions of the borrow area. No borrow pit infrastructure apart from the provision of adequate fencing barriers, beacons and signage is expected at the borrow pit. The borrow pit diagram is also shown in appendix 1.



2.1.3 Description of construction, operational, and decommissioning phases.

No buildings are going to be put on site. No construction of infrastructure apart from the provision of adequate fencing, barriers and beacons is expected at the borrow pit.

The method of mineral extraction will be surface based. The overall mining plan will entail removal of soil and overburden from the borrow pit zone using heavy machinery to push off the soil fraction and overburden. The topsoil will be stripped and stored separately from the other overburden in areas where it will not be disturbed when the borrow pit is in operation. Heavy machinery will be used to excavate the gravel which is required for road construction. The gravel will be removed with front end loaders and will be loaded onto tipper trucks that will transport it to the areas where it will be used. No mineral processing water will be required for processing, but water will be required to suppress dust on roads and during excavating. Whilst drilling and blasting is not expected at this borrow pit, for gravel removal, it should be noted that in the event that hard material is encountered that hinders removal of gravel, it might be carried out as necessary to facilitate the removal of required material gravel material.

The decommissioning phase and rehabilitation phase will consist of removal of unwanted infrastructure such as fences, beacons and access road. This will be followed by profiling of the borrow pit to ensure long term stability and that it is in sync with the surrounding landscape. Thereafter, the disturbed areas will be re-topsoiled and re-vegetated.

2.1.4 Listed activities (in terms of the NEMA EIA regulations)

According to Listing Notice 1 Activity No. 20 of GNR 544 of 18 June 2010, a basic assessment is required for an activity requiring the application of a mining permit. However, in terms of the MPRDA Government Notice No. R762 of 25 June 2004, which deals with exemptions of organs of state from certain provisions of the MPRDA, the Northern Cape, Department of Roads and Public Works is exempted to apply for a mining permit in order to remove any mineral for the construction and maintenance of roads but is still required to submit an environmental management plan to the department of mineral resources for approval

2.2 Identification of potential impacts

(Refer to the guideline)

2.2.1 Potential impacts per activity and listed activities.

	ACTIVITY	POTENTIAL IMPACTS
1	Site Preparation	<ul style="list-style-type: none"> • Loss of vegetation • Habitat Destruction • Visual scarring • Soil erosion
2	Excavations	<ul style="list-style-type: none"> • Surface disturbances • Dust emissions • Drainage interruption • Noise • Slope instability • Visual Scarring • Soil erosion
3	Blasting (if done)	<ul style="list-style-type: none"> • Fly rock • Noise and vibrations
4	Stockpiles	<ul style="list-style-type: none"> • Dust • Surface disturbances • Drainage disruption
5	Loading, Hauling and transportation	<ul style="list-style-type: none"> • Dust • Increased risk of accidents • Noise • Soil contamination from oil/fuel leaks

2.2.2 Potential cumulative impacts.

Loss of Vegetation: The removal of vegetation to make way for the borrow pit activities at the project site in the area will result habitat destruction.

2.2.3 Potential impact on heritage resources

A phase 1 Heritage impact assessment was done. The report is attached in the appendix. The survey revealed that:

- There is no evidence of graves, graveyards or historical structures within the confines of the proposed borrow pit.
- There is no evidence for the accumulation and preservation of intact fossil material within the Quaternary sediments (topsoils) covering the underlying sedimentary rocks.
- There are also no indications of prehistoric structures or rock engravings within the survey areas.
- The density of stone tools recorded at the site is low and the presence of both Later Stone age microliths and larger Middle Stone Age flakes and flake blades indicates that the archaeological context is most likely derived (*ex situ*).
- Impact on potential heritage resources at the site is considered to be low.
- There are no major archaeological and palaeontological grounds to suspend the proposed development.

However as excavating forms part of the project activities, there is a slim possibility that items of heritage significance such as archaeological and paleontological objects, graves and burial grounds, or geological sites of scientific or cultural importance can be uncovered.

2.2.4 Potential impacts on communities, individuals or competing land uses in close proximity.

(If no such impacts are identified this must be specifically stated together with a clear explanation why this is not the case.)

The area is on open municipal ground. The nearest residential area is about two kilometres away. The area is out of the view shed of the roads. As such, the community is unlikely to be affected by impacts on site.

2.2.5 Confirmation that the list of potential impacts has been compiled with the participation of the landowner and interested and affected parties,

Ga Segonyana Local municipality was made aware of the potential impacts and stated that the borrow pit area should be fenced off.

2.2.6 Confirmation of specialist report appended.

(Refer to guideline)

- A phase 1 archaeological impact assessment was done and is attached in the appendix 2.
- A botanical study was also done and is appended as Appendix 3.

IMPACT ASSESSMENT AND MITIGATION MEASURES

3 REGULATION 52 (2) (c): Summary of the assessment of the significance of the potential impacts and the proposed mitigation measures to minimise adverse impacts.

3.1 Assessment of the significance of the potential impacts

3.1.1 Criteria of assigning significance to potential impacts

The significance of potential impacts is derived through a synthesis of ratings of all criteria in the following calculation:

$$(\text{Duration} + \text{Intensity}) \times \text{Probability} = \text{Significance}$$

The significance of a potential impact on decision-making is indicated through significance points in the right hand column of the table below. The significance points indicate the following:

- Low (Significance points (SP) < 50): The impact will not have an influence on the project design;
- Moderate (SP between 50 and 75): It could have an influence on the environment and will require modification of the project design or operational mitigation methods;
- High (SP > 75): It could be a major implication on the project regardless of any mitigation

Table 1: Assessing Impacts for significance

Impact	Duration	Intensity	Probability	Significance points (SP) and rating
Example. Soil contamination from hazardous substances	Permanent - 5	Very high / don't know - 5	Definite / don't know - 10	High SP > 75
	Long term - 4	High - 4	High probable - 8	Moderate SP 50 to 75

Impact	Duration	Intensity	Probability	Significance points (SP) and rating
before mitigation	Medium term- 3	Moderate – 3	Medium probability – 6	Low SP < 50
	Short term - 2	Low – 2	Low probability – 4	
	Immediate - 1	Minor - 1	Improbable - 2	

3.1.2 Potential impact of each main activity in each phase, and corresponding significance assessment

	Activity	Impact	Duration	Intensity	Probability	Significance Rating	
1	Site Preparation	Loss of vegetation	3	5	10	80	High
		Habitat Destruction	3	5	10	80	High
		Visual scarring	3	4	8	56	Medium
		Soil erosion	3	4	6	42	Low
2	Excavations	Dust emissions	2	5	8	56	Medium
		Surface disturbances	4	4	10	80	High
		Drainage interruption	4	4	10	80	High
		Slope instability	4	3	6	42	Low
		Noise	2.5	5	10	75	High
		Visual Scarring	3	4	8	56	Medium
		Soil erosion	3	4	6	42	Low
3	Blasting (if done)	Fly rock	2.5	5	10	75	High
		Noise and vibrations	2.5	5	10	75	High
		Dust	2.5	5	10	75	High
4	Stockpiles	Dust	2	5	8	56	Medium
		Surface disturbances	3	5	10	80	High
		Drainage disruption	2.5	5	10	75	High
5	Loading, Hauling and transportation	Dust	2	5	10	70	Medium
		Increased risk of accidents	2	4	4	16	Low
		Noise	2.5	5	10	75	High
		Soil contamination from oil/fuel leaks	3	3	6	36	Low

3.1.3 Assessment of potential cumulative impacts.

Impact	Duration	Intensity	Probability	Significance Rating	
Habitat Destruction	3	5	5	40	Low

3.2 Proposed mitigation measures to minimise adverse impacts.

3.2.1 List of actions, activities, or processes that have sufficiently significant impacts to require mitigation.

- Clearance of area for mining activities
- Excavation of material
- Stockpiling
- Loading, hauling and transportation of material
- Use of vehicle and earth moving machinery
- Drilling and blasting if it is carried out
- Waste Disposal

3.2.2 Concomitant list of appropriate technical or management options

(Chosen to modify, remedy, control or stop any action, activity, or process which will cause significant impacts on the environment, socio-economic conditions and historical and cultural aspects as identified. Attach detail of each technical or management option as appendices)

Detailed technical and management options for mitigation are given in Appendix 4

3.2.3 Review the significance of the identified impacts

(After bringing the proposed mitigation measures into consideration).

	Activity	Impact	Duration	Intensity	Probability	Significance Rating	
1	Site Preparation	Loss of vegetation	3	3	8	48	Low
		Habitat Destruction	3	3	8	48	Low
		Visual scarring	3	3	6	48	Low
		Soil erosion	3	4	6	42	Low
2	Excavations	Dust emissions	2	3	6	30	Low
		Surface disturbances	3	3	6	48	Low
		Drainage interruption	3	4	6	42	Low

	Activity	Impact	Duration	Intensity	Probability	Significance Rating	
		Slope instability	3	3	4	24	Low
		Noise	2	4	6	36	Low
		Visual Scarring	3	3	8	48	Low
		Soil erosion	3	3	5	30	Low
3	Blasting	Fly rock	2	3	6	30	Low
		Noise and vibrations	2	3	6	30	Low
		Dust Emissions	2	3	6	30	Low
4	Stockpiles	Dust	2	3	4	20	Low
		Surface disturbances	3	3	6	36	Low
		Drainage disruption	2	3	4	20	Low
5	Loading, Hauling and transportation	Dust Emissions	2	3	6	30	Low
		Increased risk of accidents	2	3	3	15	Low
		Noise	2	3	6	30	Low
		Soil contamination from oil/fuel leaks	3	3	4	24	Low

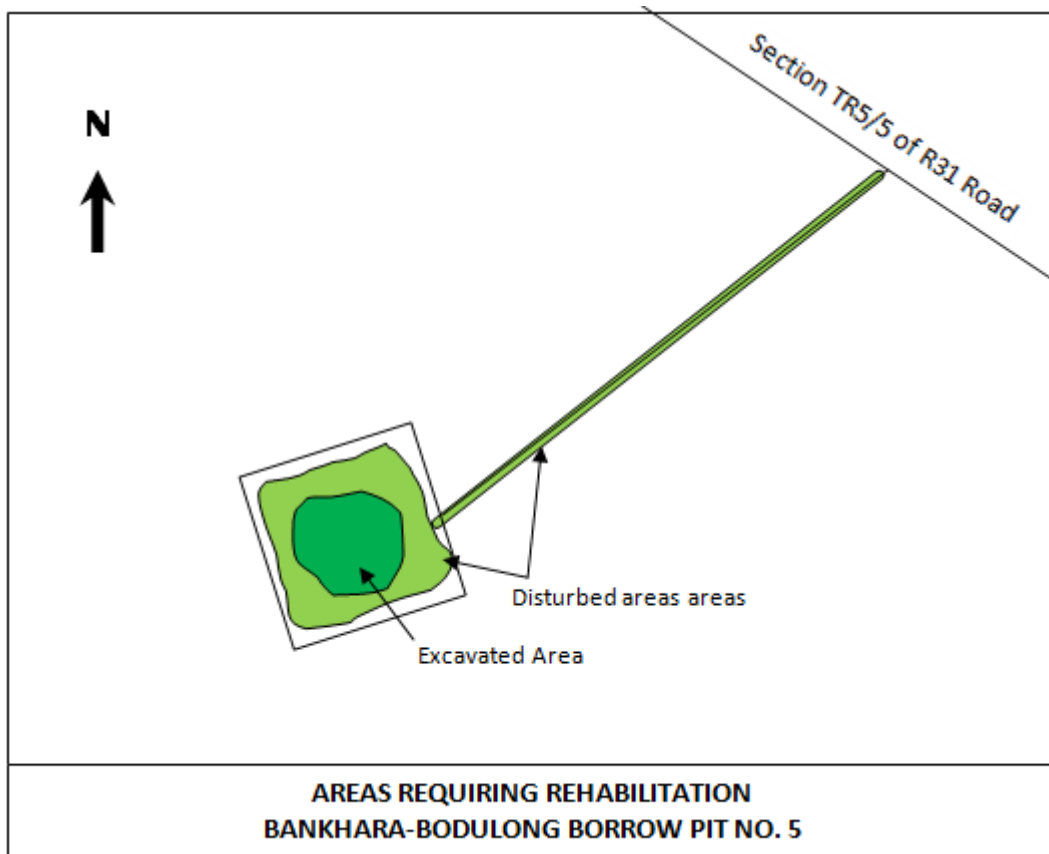
FINANCIAL PROVISIONS

4 REGULATION 52 (2) (d): Financial provision. The applicant is required to-

4.1 Plans for quantum calculation purposes.

(Show the location and aerial extent of the aforesaid main mining actions, activities, or processes, for each of the construction operational and closure phases of the operation).

About a third of the area covered by the borrow pit will be disturbed as result of excavations shown in the figure below.



4.2 Alignment of rehabilitation with the closure objectives

(Describe and ensure that the rehabilitation plan is compatible with the closure objectives determined in accordance with the baseline study as prescribed).

The rehabilitation plan is described and provided for in Appendix 5. The rehabilitation plan covers:

- Rehabilitation of Access Road
- Rehabilitation of storage areas and plant structures
- Rehabilitation of excavations and
- Rehabilitation of contaminated areas

The borrow pit operator must perform progressive rehabilitation as material extraction is done. Progressive rehabilitation means rehabilitation done sequentially within a reasonable time after extraction of borrow pit resources is complete. As one area of the pit or borrow pit is being extracted, rehabilitation must be completed in the areas where the borrow pit reserves have been stopped or exhausted. Progressive rehabilitation is beneficial in many ways as it reduces the open areas within a borrow pit, reduces soil erosion potential and reduces double-handling of soil / waste materials.

The key aims of the rehabilitation are to eliminate unacceptable risks by establishing a safe, stable and non polluting post-mining land surface which supports vegetation growth and the vegetation growth should be sustainable over the long term. It is also targeted at minimising the

downstream impacts on the ecosystem due to the interruption of drainage system.

4.3 Quantum calculations.

(Provide a calculation of the quantum of the financial provision required to manage and rehabilitate the environment, in accordance with the guideline prescribed in terms of regulation⁵⁴ (1) in respect of each of the phases referred to).

See the spreadsheet below.

FINANCIAL PROVISIONS CALCULATION OF QUANTUM
BORROW PIT NO. 5 IN BANKHARA-BODULONG ON FARM 690, KURUMAN ADMINISTRATIVE REGION

No.	Description	Unit	A	B	C	D	E=A*B*C*D
			Quantity	Master Rate	Multiplication factor	Weighting factor 1	Amount (Rands)
1	Dismantling of processing plant and related structures (including overland conveyors and powerlines)	m3	0	10.27	1	1	0
2 (A)	Demolition of steel buildings and structures	m2	0	143.09	1	1	0
2(B)	Demolition of reinforced concrete buildings and structures	m2	0	210.87	1	1	0
3	Rehabilitation of access roads	m2	225.00	25.61	1	1	5762.25
4 (A)	Demolition and rehabilitation of electrified railway lines	m	0	248.52	1	1	0
4 (A)	Demolition and rehabilitation of non-electrified railway lines	m	0	135.56	1	1	0
5	Demolition of housing and/or administration facilities	m2	0	286.18	1	1	0
6	Opencast rehabilitation including final voids and ramps	ha	0	150016.59	1	1	0
7	Sealing of shafts adits and inclines	m3	0	76.82	1	1	0
8 (A)	Rehabilitation of overburden and spoils	ha	0	100011.06	1	1	0
8 (B)	Rehabilitation of processing waste deposits and evaporation ponds (non-polluting potential)	ha	0	124561.97	1	1	0
8 (C)	Rehabilitation of processing waste deposits and evaporation ponds (polluting potential)	ha	0	361787.01	1	1	0
9	Rehabilitation of subsided areas	ha	0	83744.2	1	1	0
10	General surface rehabilitation	ha	0.45	79225.63	1	1	35651.53
11	River diversions	ha	0	79225.63	1	1	0
12	Fencing	m	280	90.37	1	1	25303.6
13	Water management	ha	0	30123.81	1	1	0
14	2 to 3 years of maintenance and aftercare	ha	0.45	10543.33	1	1	4744.4985
15 (A)	Specialist study	Sum	0			1	0
15 (B)	Specialist study	Sum				1	0
						Sub Total 1	71461.88

1	Preliminary and General	8575.42584	weighting factor 2	8575.43
			1	
2	Contingencies	7146.1882		7146.19
			Subtotal 2	87183.50

VAT (14%)	12205.69
-----------	----------

Grand Total	99389
--------------------	--------------

4.4 Undertaking to provide financial provision

(Indicate that the required amount will be provided should the right be granted).

The applicant commits to provide the amount as determined and needed as financial provision by the Department of Mineral Resources.

MONITORING AND PERFORMANCE

5 REGULATION 52 (2) (e): Planned monitoring and performance assessment of the environmental management plan.

5.1 List of identified impacts requiring monitoring programmes.

- **Removal of Vegetation**
- **Slope instability**
- **Soil erosion**
- **Soil contamination**

5.2 Functional requirements for monitoring programmes.

- **A visual inspection will be done on a daily basis to check that there are no leaking vehicles, evidence of erosion, slope subsidence and presence of any other physical pollution. Any non compliant item will be immediately be rectified and recorded on a weekly basis. Monitoring will start at the commencement of the project and will continue until closure.**
- **A monthly checklist will be developed to check all issues of compliance and any issues that are non compliance will be rectified immediately. The checklist will include the status of slopes stability, erosion on site, vegetation removal and the status of the machinery being used on site.**
- **An independent environmental practitioner must audit the place once six months to ensure environmental issues are in compliance and make recommendations for improvement if necessary.**

5.3 Roles and responsibilities for the execution of monitoring programmes.

It is the responsibility of the applicant, the Northern Cape Department of Roads and Public Works to ensure that the monitoring program is fully

implemented. The applicant shall appoint an independent environmental control person to inspect and audit the place.

5.4 Committed time frames for monitoring and reporting.

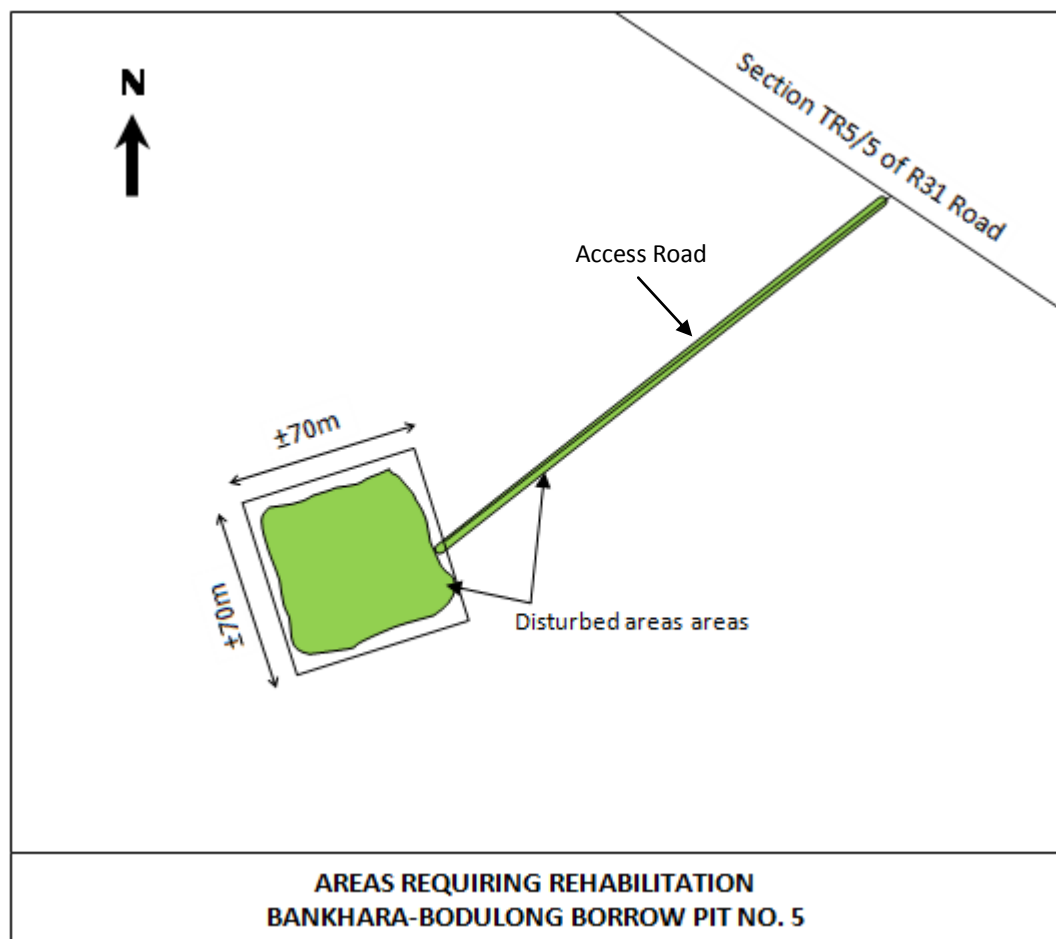
Monthly checklist will be filled in and monthly report on non conformances observed and corrective and preventative action taken will be done.

CLOSURE AND ENVIRONMENTAL OBJECTIVES

6 REGULATION 52 (2) (f): Closure and environmental objectives.

6.1 Rehabilitation plan

(Show the areas and aerial extent of the main prospecting activities, including the anticipated prospected area at the time of closure).



6.2 Closure objectives and their extent of alignment to the pre-mining environment.

- To create a post mining environment that eliminates unacceptable health hazards and ensures public safety and is in line with applicable legislation
- To establish a safe and stable post-mining land surface which has been rehabilitated, that supports vegetation growth, is erosion resistant and has long term sustainability.
- To leave the site in a stable, non-polluting and tidy condition with no remaining plant or infrastructure that is not required by the landowner.
- To minimise or eliminate the downstream environmental impacts on the ecosystem due to interruption of drainage once the borrow pit operations cease

6.3 Confirmation of consultation

(Confirm specifically that the environmental objectives in relation to closure have been consulted with landowner and interested and affected parties).

An agreement was reached that the area will be rehabilitated. It will be left in a safe and stable condition for both animals and people. In addition the areas should be fenced off.

PUBLIC PARTICIPATION

7 REGULATION 52 (2) (g): Record of the public participation and the results thereof.

7.1 Identification of interested and affected parties.

(Provide the information referred to in the guideline)

The following were identified as interested and affected parties.

- The land owner which is Ga Segonyana Local Municipality
- The ward councillor for Bankhara Bodulong (Ward 2) and the community liaison officer to represent the nearby community.
- Forestry Directorate – Department of Agriculture, Fisheries and Forestry
- The Department of Water Affairs
- The Northern Cape Provincial Heritage Resources Agency
- The Northern Cape Department of Agriculture, Land Reform and Rural Development.

In addition, an advertisement was put in the Volkblad of 6 February 2013 notifying the public of the intention to mine and the environmental process and to allow any other interested party to comment on the issue. Site notices were also placed on the Road to Bankara- Bodulong and near the borrow pit to allow nearby residents to register as interested and affected parties. The land where the borrow pit is to be situated is not involved in any land claim. The details of the public participation is given in Appendix 6.

7.2 The details of the engagement process.

7.2.1 Description of the information provided to the community, landowners, and interested and affected parties.

The ward councillor was provided a summary of why the borrow pit was required and the activities that would take place at the mine. The minutes of the meeting is shown in appendix 6. An agreement was reached with the landowner, Ga Segonyana local municipality. Letters were written to the government departments who were provided with an information document summarising the borrow pit location and key activity. The details and minutes are given in appendix 6.

7.2.2 List of which parties identified in 7.1 above that were in fact consulted, and which were not consulted.

All the parties identified specifically listed above were consulted.

7.2.3 List of views raised by consulted parties regarding the existing cultural, socio-economic or biophysical environment.

The ward councillor stated that at least 5 people from the Bankhara-Bodulong area should be employed at the borrow pit and that the borrow pit should be properly profiled to make it safe for both people and animals.

Ga Segonyana Local Municipality wants the borrow pit to be fenced to make it safe during operations.

7.2.4 List of views raised by consulted parties on how their existing cultural, socio-economic or biophysical environment potentially will be impacted on by the proposed prospecting or mining operation.

- People from the nearby community need to benefit in terms of employment opportunities generated by the establishment of the borrow pit.
- The borrow pit edges may become unsafe and needs to be properly profiled / contoured and fenced to make it safe.

7.2.5 Other concerns raised by the aforesaid parties.

No other concerns were raised by the parties.

7.2.6 Confirmation that minutes and records of the consultations are appended.

The minutes of the meeting held with the ward councillor, the agreement to utilise the area from the municipality and other consultation documents are shown in appendix 6.

7.2.7 Information regarding objections received.

No objections were received.

7.3 The manner in which the issues raised were addressed.

- The borrow pit area will be fenced off prior to use up to a time when rehabilitation efforts have established sustainable vegetation.
- The contractor who will work on site will employ at least five people from the Bankhara-Bodulong area.
- The side of the borrow pit will be profiled to a low slope to make them safe for people and animals and will be re-vegetated.

ENVIRONMENTAL PLAN

8 SECTION 39 (3) (c) of the Act: Environmental awareness plan.

8.1 Employee communication process

(Describe how the applicant intends to inform his or her employees of any environmental risk which may result from their work).

All employees will go through an induction of general environmental issues and given specifics on their jobs. The training will include:

- Making employees aware that everyone has a right to a clean environment and that everyone has a responsibility to protect the environment.
- Explanation of the importance of complying with the EMP specifications.
- Discussion of the potential environmental impacts of operational activities and mitigation measures that must be implemented when carrying out activities.
- The importance of personal performance on dealing with environmental issues and explanations of the management structure of individuals responsible for matters pertaining to the EMP.
- Employees' roles and responsibilities, including emergency preparedness.
- Explanation of the specifics of activities pertaining to their work and the mitigation required. This will include waste management, dust management, artifacts, hazardous materials, fire prevention, importance of good housekeeping, noise management, importance of water conservation and will also emphasize on importance of minimizing vegetation removal
- The training should include showing on the excavations area, areas where vegetation clearance is not to be done, showing the personnel No Go areas, locations for stockpiles and access roads to be used.

Communication can be done either in a written or verbal format but will be in an appropriate format for the receiving audience. Records of all training done are to be kept.

8.2 Description of solutions to risks

(Describe the manner in which the risk must be dealt with in order to avoid pollution or degradation of the environment).

- The applicant will endeavour to improve the competence and skills of personnel. A culture of environmental protection will be promoted.
- Procedures will be put in place to effectively minimise any identified high risk areas in line with the environmental mitigation measures stated in appendix 4.
- The applicant will proactively control any environmental incidents that may occur.
- The applicant will also continuously improve and promote a code that goes beyond minimal compliance with environmental legislation.

8.3 Environmental awareness training.

(Describe the general environmental awareness training and training on dealing with emergency situations and remediation measures for such emergencies).

- The borrow pit operator shall identify all situations that can lead to emergency situations and provide response strategies. The situations should include fire.
- Contact details of all departments/service providers to be contacted in case of an emergency shall be made available to employees. These include the police, ambulance, local fire fighting unit.
- Equipment for dealing with emergencies such as spill kits, fire fighting equipment, first aid boxes etc shall be made available.
- People will be trained in the appropriate use of emergency equipment such as fire extinguishers etc
- All employees will be made aware who the first aiders on site are.
- Drills/ rehearsals should be conducted periodically to ensure that staff prepared to handle emergencies

CAPACITY TO REHABILITATE AND MANAGE IMPACTS

9 SECTION 39 (4) (a) (iii) of the Act: Capacity to rehabilitate and manage negative impacts on the environment.

9.1 The annual amount required to manage and rehabilitate the environment.

(Provide a detailed explanation as to how the amount was derived)

The required amount will be provided as part of the overall budget of the construction of Section TR5/5 of the Hotazel to Kuruman Road where the gravel from the borrow pit will be used.

9.2 Confirmation that the stated amount correctly reflected in the Prospecting Work Programme as required.

No work program has been provided.

UNDERTAKING

10 REGULATION 52 (2) (h): Undertaking to execute the environmental management plan.

Herewith I, the person whose name and identity number is stated below, confirm that I am the person authorised to act as representative of the applicant in terms of the resolution submitted with the application, and confirm that the above report comprises EIA and EMP compiled in accordance with the guideline on the Departments official website and the directive in terms of sections 29 and 39 (5) in that regard, and the applicant undertakes to execute the Environmental management plan as proposed.

Full Names and Surname	Samuel Pauw
Identity Number	660519 5041 082

-END-

APPENDIX 1

BORROW PIT DIAGRAM

SUMMARY OF AREAS OF QUARRY/BORROW PIT

1. TOTAL AREA OF QUARRY	2. EXISTING AREA (COMPENSATION PAID OUT)	3. NEW AREA (1 - 2)
0.4819 ha	-	0.4819 ha
GRAZING	-	0.4819 ha
FIELD	-	-
IRRIGATION LANDS	-	-
SUB TOTAL	-	0.4819 ha

SUMMARY OF AREAS OF ACCESS ROAD

1. TOTAL AREA OF QUARRY	2. EXISTING AREA (COMPENSATION PAID OUT)	3. NEW AREA (1 - 2)
0.0884 ha	-	0.0884 ha
GRAZING	-	-
FIELD	-	-
IRRIGATION LANDS	-	-
SUB TOTAL	-	0.0884 ha
TOTAL	-	0.5703 ha

DETAIL PLAN SCALE 1 : 15000

LOCALITY PLAN SCALE 1 : 7400

SUMMARY OF BEACON CO-ORDINATE LIST

NO.	Y	X	100g	1st
A	-39841.920	3 032537.830	23.402881	-27.404875
B	-39810.100	3 032543.340	23.403550	-27.404744
C	-39931.560	3 032606.240	23.403768	-27.405311
D	-39862.560	3 032625.080	23.403072	-27.405483
E	-40081.240	3 032436.950	23.405378	-27.403775
F	-39818.820	3 032587.420	23.403647	-27.404861

LOCALITY PLAN SCALE 1 : 7400

SUMMARY OF BEACON CO-ORDINATE LIST

NO.	Y	X	100g	1st
A	-39841.920	3 032537.830	23.402881	-27.404875
B	-39810.100	3 032543.340	23.403550	-27.404744
C	-39931.560	3 032606.240	23.403768	-27.405311
D	-39862.560	3 032625.080	23.403072	-27.405483
E	-40081.240	3 032436.950	23.405378	-27.403775
F	-39818.820	3 032587.420	23.403647	-27.404861

LOCALITY PLAN SCALE 1 : 7400

APPENDIX 2

HERITAGE IMPACT

ASSESSMENT

APPENDIX 3

BOTANICAL STUDY

APPENDIX 4

TECHNICAL AND MANAGEMENT OPTIONS FOR MITIGATION OF IMPACTS

TECHNICAL AND MANAGEMENT OPTIONS FOR MITIGATION OF IMPACTS

1. INTRODUCTION

These technical and management processes have been developed to enable Northern Cape Department of Roads and Public Works to mitigate negative environmental impacts and to provide a proactive approach to managing identified environmental risk. They provides systematic and explicit mitigation and monitoring measures for the proposed borrow pit so as to ensure that they are implemented during the planning, construction, operational and decommissioning phase of the project. It also mandates the company to internalise the environmental impacts that would otherwise be a social cost.

2. COMPLIANCE WITH LEGISLATION

In addition to the Mineral and Petroleum Resources Development Act, the other relevant legislative provisions of the following should be adhered to are:

- National Environmental Management: Waste Management Act (Act 59 of 2008)
- National Environmental Management: Air Quality Act (Act 39 of 2004)
- National Heritage Resources Act (Act 25 of 1999)
- Hazardous Substances Act (Act 15 of 1973)
- Environment Conservation Act (Act 73 of 1989)
- Occupational Health and Safety Act (Act 85 of 1993)
- National Water Act (Act 36 of 1998).
- Conservation of Agricultural Resources Act (Act 43 of 1983)
- Explosives Act (Act 26 of 1956)
- National Forest Act, (Act 84 of 1998)
- National Veldt and Forest Fire Act (Act 101 of 1998)
- Northern Cape Nature Conservation Act (No. 9 of 2009)

3. PERMITS AND PERMISSIONS

All pertinent permits, approvals and agreements are to be obtained before activities commence on site and the conditions are to be strictly adhered to.

4. GENERAL SITE ESTABLISHMENT

Access at the borrow pit shall be controlled and adequate precautions taken to prevent unauthorised entry to the borrow pit. A fence or other barrier should be erected to restrict access

- The area must be clearly demarcated along its boundaries.
- Permanent beacons must be firmly erected and maintained in their correct position throughout the life of the operation.
- Resultant operations shall only take place within this demarcated area.
- Borrow pit boundaries shall be signposted and laid out so as to be clearly visible and identifiable.
- Adequate precautions shall be taken to protect persons present at, or in the vicinity of, the borrow pit from risks that may arise from borrow pit operations.

5. MANAGING SOCIAL IMPACT RELATED ISSUES

- Community should be adequately informed in advance of activities being done at the borrow pit that are likely to affect them.
- Labour recruitment should occur in a manner that is objective, transparent, and wherever possible, provide opportunities for people from the local area.
- Priority should be given to the local supplier of goods and services, which meet requirements of project procurement.
- Effective two-way public disclosure and public consultation should be implemented to allay community perceptions. There should be an opportunity provided for the resolution of grievances or complaints received and recorded from individuals in the community.

6. SPECIFIC MITIGATION MEASURES

6.1 MANAGING SOIL IMPACTS

These measures are targeted at managing soil erosion, soil contamination, compaction of soil and removal of topsoil

- The area that is stripped of vegetation should be kept to an absolute minimum
- Contractor shall at all times carefully consider what machinery is appropriate to the task while minimising the extent of environmental damage and unnecessary movements should be prohibited
- The topsoil, including the existing grass cover is to be shallowly ripped (only the depth of the topsoil) before removal. This is to ensure that organic plant material, and the natural seed base is included in the stripping process. The soil is to be stored and the soil stockpiles shall not be higher than 2 m or stored for a period longer than one year. The slopes of soil stockpiles shall not be steeper than 1 vertical to 2.5 horizontal.
- Topsoil shall be stored separately from subsoil and other overburden material.
- No vehicles shall be allowed access onto the stockpiles after they have been placed.
- Stockpiles shall not be allowed to become contaminated with oil, diesel, petrol, garbage or any other material, which may inhibit the later growth of vegetation.
- The contractor shall apply soil conservation measures to the stockpiles to prevent erosion.
- Ensure regular maintenance of equipment to prevent diesel and hydraulic spillages
- Where possible ensure low work surface gradients so that run-off flows at a controlled rate so as to minimize channelling and soil erosion during high rainfall

- At the end of operations, all disturbed areas shall be re-vegetated.

6.2 LOSS OF VEGETATION

- Clearance of vegetation should be restricted to the absolute minimum required to facilitate access and undertake borrow pit activities. Disturbance of topsoil and vegetation rootstock must be minimized as far as possible.
- Trees larger than 2m should not be removed unless it is absolutely necessary and cannot be avoided.
- No protected species must be removed without a permit. A final walkthrough must be done by an ecologist to ensure that the areas where vegetation is to be cleared do not have protected species.
- Any alien species identified should be cleared.
- Burning of any waste material is not permitted under any circumstances.
- Rehabilitation strategies following operational activities must ensure that appropriate indigenous plant species are used and should be done as per rehabilitation plan

6.3 DUST AND VEHICLE FUMES

- Avoid unnecessary excessive vehicle movement.
- Limit vehicle speeds on unsurfaced roads.
- Rehabilitate disturbed areas with vegetation as soon as operation is completed.
- Maintain equipment and vehicles in good working order to avoid excessive emissions
- Borrow pit working floors should be sprayed with water from time to time to reduce dust emission during operations
- Use rubber curtains/other material to limit dust during screening should be considered.
- Spray roads, material stockpiles and screening areas with water if dust becomes problematic.
- No fires should be allowed on the borrow pit site.

6.4 BLASTING

- All blasting and handling of blasting materials should be done in accordance with the Explosives Act and the Mine Health and Safety Act
- A risk assessment has to be that takes into account the safety of the people, infrastructure and the surrounding environment. A pre and post blasting survey should be done.
- A blasting time schedule shall be distributed to all surrounding villages indicating the time and date for blasting activities. It is recommended that blasting takes place between 1200hrs and 1500hrs.
- At all times blasting shall be carried out that ground vibration, air blast and scatter are kept within such limits as to avoid damage to adjacent structures/machinery etc already placed at the works. Any fly rock should be cleared after blasting.

6.5 WASTE DISPOSAL

- All personnel must be instructed to dispose of waste in a proper manner.
- Suitable receptacles shall be available at all times and conveniently placed for the disposal of waste.
- No waste shall under any circumstance be disposed of in the veldt. No burning of waste is permitted on site and the borrow pit area should be protected from illegal dumping of waste.
- All used oils, grease or hydraulic fluids shall be placed in appropriate impervious containers and

these receptacles will be removed from the site on a regular basis for disposal at a registered or licensed disposal facility or sent for recycling/reuse with a registered facility.

- Spills should be cleaned up immediately by removing the spillage together with the polluted soil and by disposing of them at a recognised facility. In areas where the spills are some, an absorbent agent can be used and the area treated
- Contaminated materials and residues from machinery maintenance and other sources contaminated with hazardous waste should be stored in proper containers that avoid seepage to ground.
- The reduce, reuse, recycle waste management philosophy will be used where possible.
- Only authorized registered waste disposal contractors should be hired for collection of waste for all waste streams

6.6 SOCIAL IMPACTS

- Effective two-way public disclosure and public consultation should be implemented to allay community perceptions. There should be an opportunity provided for the resolution of grievances or complaints received and recorded from individuals in the community.
- Community should be adequately informed of activities being done at the borrow pit that are likely to affect them.
- Labour recruitment should occur in a manner that is objective, transparent, and wherever possible, provide opportunities for people from the local area.
- The activities of contractors, consultants, and company employees should be routinely reviewed to ensure good community relations are being maintained. The project proponent should use its influence as employer to encourage responsible behaviour among employees.

6.7 STABILITY OF EXCAVATIONS

- Excavations shall take place only within the approved demarcated borrow pit area and appropriate barriers should be put as necessary.
- The borrow pit operator shall ensure that a place of work, whether temporary or permanent in or near the excavation has a structure and solidity appropriate to its use is operated, supervised and maintained, so as to withstand the environmental forces anticipated and be safe.
- The borrow pit operator shall ensure that material is not placed, stacked or used at the borrow pit near the edge of any excavation, where it is likely to endanger people at work and equipment or where it is likely to cause collapse of the side of the excavation.
- Excavations should be routinely inspected. If cracks occur in any structure they need to be investigated to ascertain if there is a risk to safety
- Overburden rocks and coarse material shall be placed concurrently in the excavations or stored adjacent to the excavation, if practicable, to be used as backfill material once the mineral or gravel has been excavated.
- An appropriate drainage provisions must be constructed as necessary to accommodate the surface water movement. If the water table is reached during excavations appropriate pumping facilities should be provided.
- Excavated areas should be kept in a safe and stable manner. No unstable block should be present. Reshaping of the borrow pit may need to be done to ensure that this objective is reached. The

profiling should be done to match the surrounding landscape

- The borrow pit should be finished in such a manner that it is self draining
- Top soil should be put back on the surfaces and the areas revegetated.

6.8 VISUAL IMPACTS

- The excavated area must serve as a final depositing area for the placement of overburden. Rocks and coarse material removed from the excavation must be dumped into the excavation.
- Once excavation parts that can be filled have been refilled with overburden, rocks and coarse natural materials, the borrow pit shall be profiled with acceptable contours and erosion control measures, the topsoil previously stored shall be returned to its original depth over the area. The profiling shall be done to match the surrounding landscape as far as is reasonable possible.
- The area shall be fertilised if necessary to allow vegetation to establish rapidly. The site shall be seeded with a local or adapted indigenous seed mix in order to propagate the locally or regionally occurring flora.
- If a reasonable assessment indicates that the re-establishment of vegetation is unacceptably slow, there may be need for the soil to be analysed and any deleterious effects on the soil arising from the borrow pit, be corrected and the area be seeded with a vegetation seed mix to his or her specification.

6.9 EQUIPMENT USED ON SITE

- Only well-maintained vehicles and equipment should be operated onsite and all machinery should be serviced regularly during the borrow pit operation.
- The maintenance of vehicles and some equipment used for any purpose during the borrow pit operation will take place only in the maintenance workshops which are not located on the borrow pit. No vehicle may be extensively repaired in any place other than in the maintenance yard
- A maintenance schedule should be prepared in order to ensure that equipment is in its best form so as to not cause unnecessary pollution such as noise, emissions and makes effective use of energy.
- Equipment used in the borrow pit process must be adequately maintained so that during operations it does not spill oil, diesel, fuel, or hydraulic fluid.
- Machinery or equipment used on the borrow pit area must not constitute a pollution hazard. No equipment leaking oil should be used. Drip tray should be used to prevent pollution

6.10 NOISE

- Construction activities required outside normal working hours must be approved by the Project Manager, and where necessary, advance warning provided to adjacent residents.
- Noise levels exceeding 85dB shall only be permitted where approved and with appropriate advanced warning to adjacent residents (minimum of 2 days) being provided.
- Noise that could cause a major disturbance should only be carried out during daylight hours and with advance warning provided as above.
- Adequate ear protection should be provided to employees in noisy areas
- No amplified music shall be allowed at the site.
- Construction vehicles and plant to be in good working order.

APPENDIX 5

REHABILITATION PLAN

BORROW PIT REHABILITATION AND CLOSURE

1.0 INTRODUCTION

The key aims of the rehabilitation are to eliminate unacceptable risks by establishing a safe, stable and non polluting post-mining land surface which supports vegetation growth and the vegetation growth should be sustainable over the long term. It is also targeted at minimising the downstream impacts on the ecosystem due to the interruption of drainage system.

The borrow pit operator must perform progressive rehabilitation as material extraction is done. Progressive rehabilitation means rehabilitation done sequentially within a reasonable time after extraction of borrow pit resources is complete. As one area of their pit or borrow pit is being extracted, rehabilitation must be completed in the areas where the borrow pit reserves have been stopped or exhausted. Progressive rehabilitation is beneficial in many ways as it reduces the open areas within a borrow pit, reduces soil erosion potential and reduces double-handling of soil / waste materials.

The final rehabilitation takes into account that the borrow pit is located in a semi arid region. The environment affected by the operations shall be rehabilitated, as far as is practicable, to its natural state or to a predetermined and agreed to standard or land use which conforms with the concept of sustainable development. The affected environment shall be maintained in a stable condition that will not be detrimental to the safety and health of humans and animals and that will not pollute the environment or lead to the degradation thereof. The rehabilitation activities shall require the re-planting of vegetation in some areas cleared for the borrow pit activities. This will promote soil stability, improve the visual environment and provide faunal habitat into the operation stage

2.0 REHABILITATION OF ACCESS ROADS

- Whenever borrow pit is suspended, cancelled or abandoned any access road or portions thereof, constructed by the holder and which will no longer be required by the landowner/tenant, shall be removed and/or rehabilitated to the satisfaction of the owner.
- Any gate or fence erected by the borrow pit operator which is not required by the landowner/tenant, shall be removed and the situation restored to the pre-borrow pit situation.
- Roads shall be ripped or ploughed, and if necessary, appropriately fertilised (based on a soil analysis) to ensure the regrowth of vegetation. Imported road construction materials which may hamper regrowth of vegetation must be removed and disposed of in an approved manner prior to rehabilitation.
- If a reasonable assessment indicates that the re-establishment of vegetation is unacceptably slow, the soil be analysed and any deleterious effects on the soil arising from the borrow pit,

be corrected and the area be seeded with a seed mix which is in similar with the vegetation of the area.

3.0 OFFICES, STORAGES AREA AND PLANT STRUCTURES

- On completion of operations, all buildings, structures or objects on the camp/office site shall be demolished and removed.
- Where office/camp sites have been rendered devoid of vegetation/grass or where soils have been compacted owing to traffic, the surface shall be scarified or ripped.
- Areas containing French drains shall be compacted and covered with a final layer of topsoil to a height of 10cm above the surrounding ground surface.
- On completion of borrow pit operations, the above areas shall be cleared of any contaminated soil, which must be dumped as per the waste management plan
- All infrastructure, equipment, plant, temporary housing and other items used during the borrow pit period will be removed from the site
- Waste material of any description, including receptacles, scrap, rubble and tyres, will be removed entirely from the borrow pit area and disposed of at a registered waste disposal facility. It will not be permitted to be buried or burned on the site
- Photographs of the camp and office sites, before and during the borrow pit and after rehabilitation, shall be taken at selected fixed points and kept on record.
- The surface shall then be ripped or ploughed and the topsoil previously stored shall be spread evenly to its original depth over the whole area. The area shall then be fertilised if necessary (based on a soil analysis).
- The site shall be seeded with a vegetation seed mix adapted to reflect the local indigenous flora.
- If a reasonable assessment indicates that the re-establishment of vegetation is unacceptably slow, the might be need that the soil be analysed and any deleterious effects on the soil arising from the borrow pit operation be corrected and the area be seeded with a seed mix to his or her specification.

4.0 REHABILITATION OF EXCAVATION AREAS

- Excavated areas should be kept in a safe and stable manner. No unstable block should be present. Reshaping of the borrow pit may need to be done to ensure that this objective is reached
- Preventative measures may be necessary during closure to construct adequate drainage structures including ditches and other structures to facilitate the movement of surface water and prevent damming. An assessment will need to be done when mining has ceased to determine if there is need for such measures. The objective of these measures is to avoid water build-up that affects the physical stability of the slopes and also interferes with the drainage of the whole area.

- The excavated area must serve as a final depositing area for the placement of overburden and gangue during processing.
 - Rocks and coarse material removed from the excavation must be dumped into the excavation simultaneously with waste, as described in previous paragraph. Waste will not be permitted to be deposited in the excavations.
 - Once excavation parts that can be filled have been refilled with overburden, rocks and coarse natural materials and profiled with acceptable contours and erosion control measures, the topsoil previously stored shall be returned to its original depth over the area.
 - The area shall be fertilised if necessary to allow vegetation to establish rapidly. The site shall be seeded with a local or adapted indigenous seed mix in order to propagate the locally or regionally occurring flora.
 - If a reasonable assessment indicates that the re-establishment of vegetation is unacceptably slow, there may be need for the soil to be analysed and any deleterious effects on the soil arising from the borrow pit, be corrected and the area be seeded with a vegetation seed mix to his or her specification.
-

APPENDIX 6

CONSULTATION DOCUMENTS

Woensdag 6 Februarie 2013 **Volksblad**

DAN PIENAAR:
1 slk tuin woonstel.
Onmiddellik beskikbaar.
R3 800 p.m. Water en ligte
ingesluit. ☎082 463 7865.

GROOT eenmanwoonstel
vir enkelpersoon. Semi-ge-
meubileerd. DStv, water en
krag ingesluit. R2 800. Ska-
kel 071 680 6696.

Navalsig: 2 slk, 1badk, 1ste
vloer. Beskikbaar 1 Maart.
R3 900 p.m. plus dep.
Elmarie 051 322 9028.
Rawson.

PELLISSIER: New 2-
bedroom maisonnettes
available immediately.
051 446 0316 or
082 553 6552

UNIVERSITAS: Nuwe, mo-
derne eenmanw/stelle. Tuin,
DStv, internet, betaal- krag,
stoof, swembad. ☎Eienaar
082 222 3533.

WILLOWS: R499 000. Net-
jiese 2 slk, naby SUT. Min
eenhede in kompleks!
Nancy 072 220 2520
Empire Prop

101 **Te koop: plase**
37 HA langs
Modderrivier, ± 1,2 km
waterfront met 14 ha
waterregte, R650 000.
Skakel 076 761 6145.

102 **Te koop: sakepersele**
Kommersiële eiendom:
Ha-milton. Totale grootte
1 358 vk m. Twee store,
bestaande huurinkomste
van een stoor R6 000 per
maand. R795 000. Leon
083 310 3243.

105 **Te huur: eiendomme**
WOONSTELLE:
Verskeie netjiese eenhede.
Onm. beskikbaar. In alle
uitbreidings in
Bloemfontein.
MEENTHUISE:
Verskeie netjiese eenhede.
Onm. beskikbaar. In alle
uitbreidings in
Bloemfontein en Brandfort.
**STUDENTE-
AKKOMMODASIE:**
Netjiese 7-slk-huis vir
studente, volgeenubileer,
onm. beskikbaar.
Universitas.
Chantel/Linda
PPA SOLUTIONS
051 444 4660/079 665 3065
/ 071 008 4894.

110 **Betrekkings gevra**
EK BOEKEN EN TEËL.
Ek doen. Skakel
Joseph 078 731 2962/
051 535 1001.

EK SOEK HUISWERK:
3 dae, uitslaap, ek doen alles,
goed met kinders.
Skakel 072 771 8499.

95 **Te koop: besighede**
1. Take-Away: R265 000.
2. Pub: R225 000.
3. Distribution company:
R858 000.
4. Vehicle workshop:
R880 000 and many more.
Call Aldes Brokers now
on: 076 153 3061.

**VERSKEIDENHEID BE-
SIGHEDTE TE KOOP/
VERKOOP.** Skakel Nick
(DYNPRO) ☎082 800 4598

96 **Te koop: eiendomme**
national real estate
**Vir die koop en verkoop van
Kommersiële en beleggings-
eiendomme.**
Charl
083 675 7114 en
Ronnie
082 454 0371.
**Vir die koop en verkoop van
besighede.**
Neil 072 116 9190

RWC Ruwacón
Position available with Ruwacón in the NC for students looking to complete experiential training for ND Civil/Building or similar qualification.
PLEASE FORWARD YOUR CV to ilze@ruwacón.co.za or fax: 086 537 9192.

2002) of the intent to mine gravel for road construction activities.
Applicant: Northern Cape Department of Roads and Public Works
Location: In Bankhara-Bedulong, Northern Cape province (Farm 690 in the Kuruman administrative area)
Consultant: Terra Works
POBox 23242
Danhof 9310
Tel. 051 412 6350
Fax 051 412 6351
E-mail: sp@terraworks.co.za
Notice date: 6 February 2013
In order to ensure that you are identified as an interested and/or affected party, please submit your name, contact information and interest in the matter to the consultant given by 15 March 2013.

48 **Volwasse ontspanning en vermaak**
CATWALK STRIP SHOWS
FREE ENTRY TILL 19:00
R50 ENTRY
082 965 5566
060 395 8450. New in town! Girl with super, curvy body, very busty. PVT.
071 036 0856. Nuut in Bloem. 1 uit 'n miljoen, baie mooi boerenooi. Die beste! All nights. Travel 24/7.
071 056 3373
Connie, warm en mooi. Kleurlingdame met strandlyf om jou te bederf.
071 074 7499. New, 1,8 tall, wild. African doll to rock your world, leave and relax. Extras available.
071 165 7896. Sexy, tall, beautiful babe. Nice boobs to die for.
071 290 5079 New Muslim coloured student for pleasure. *Mimo*

120 **ENVIRONMENTAL IMPACT ASSESSMENT NOTIFICATION**
Notice is hereby given in terms of the Mineral and Petroleum Resources Development Act (Act 28 of

071 510 9172. New sexy African prin Fulfill your fanta www.sextrader.co

☎072 437
1,8 m tall, long-le wild, mature, s Durbanite to t please. PVT a

074 625 9434. New Coloured from D body massage, B movies, toys. Rela 24/7

078 515 6846. Afr beauty, 20 yrs. Yo experienced, sexy and ready to tease please.

078 886 9982 New cious, busty angel dazzling smile 4 e satisfaction. 24/7. *Cassandra* TVI

079 239 4585. Na Nymph. Come gra and eat my soft lip *Electra*

079 409 5507 New town, 20 yrs. Dark bootylicious. I hav that every woman dream of and you i mean.

082 752 4596. Pet Miss India look al sexy, 100% Indian PVT, parking.

083 721 0119. Bus groot, stywe borst Beste BJ oolt. Bai stout. 32 jaar.

083 726 0631. Alt Kleurling (23), Bir parking. 24/7, r Mooi lyf.

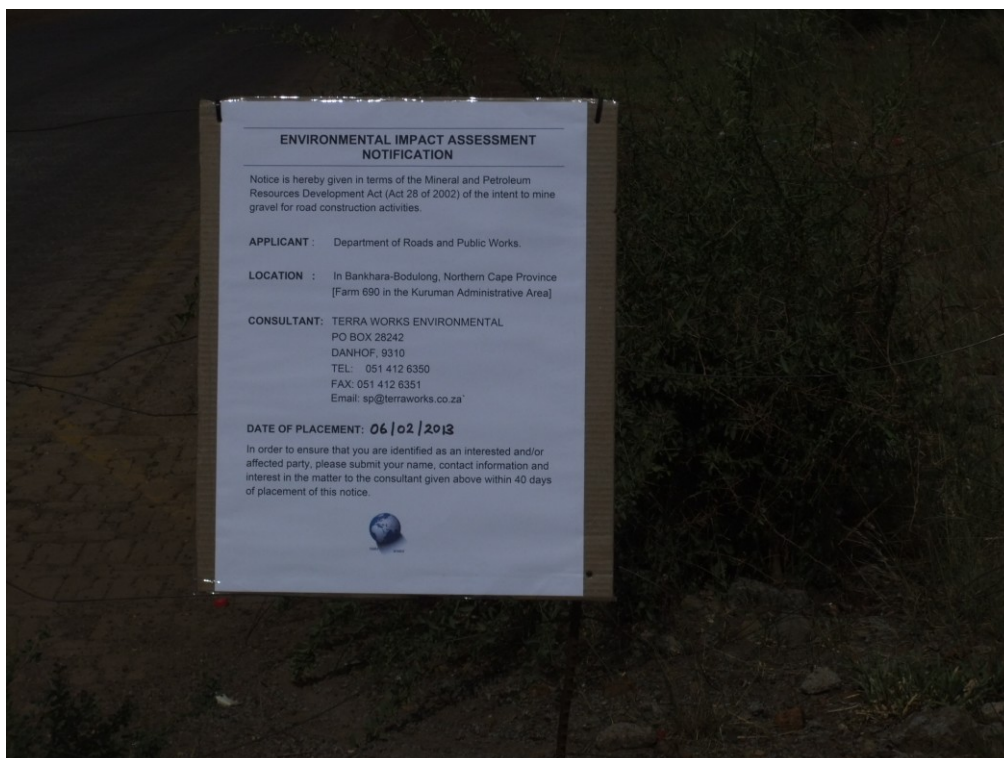
100% INDIAN M Naughty, kinky, s Rani. Greek. Toys 078 727 1130.

20 HOT GIRLS your lo R30/ sn


BLOEMFON Verfynd, hoe klas professioneel. M plus ekstra. 073 915 24

BUSTY, SEXY, v babe for you. Ever goes, plus movies. 072 415 6130.

APPENDIX 6.2 : SITE NOTICES PLACED



APPENDIX 6.3 : AGREEMENT WITH GA-SEGONYANA LOCAL MUNICIPALITY

	<h1>Ga-Segonyana</h1> <p>MUNISIPALITEIT • MUNICIPALITY • MASEPALA</p> <p>Our Ref No.: Ons Verw. Nr.: Tshupelo ya rona: 17.3.4.2</p> <p>Enquiries: Navrae: Dipatlisiso: M.A. MANHE Acting Technical Manager</p> <p>Cnr Voortrekker and School Streets Private Bag X 1522, KURUMAN 8460 Tel (053) 712 9300 Fax (053) 712 3581 E-mail: kurmun@ga-segonyana.gov.za VAT Reg. no. 4890117197</p>
---	--

SMEG
23 Second Avenue
Westdene
BLOEMFONTEIN
9301

Attention: Peet Bezuidenhout
Tel: 087 310 6345

Sir

CONTRACT BCC 160: REPAIR OF TRUNK ROAD 5, SECTION 5, BETWEEN KURUMAN AND HOTAZEL


Your letter dated 18 January 2013, refers. The Municipality has considered your request to utilize the borrow pit at Bankhara/Bodulong.

However, you are requested to meet with the Ward Councillor at Bankhara/Bodulong in order to discuss your social responsibility.

It is requested that the social responsibility agreed upon must benefit the community of Bankhara/Bodulong. It will be appreciated if the said borrow-pit could be fenced off to ensure that illegal soil mining is prohibited.

We hope you find the above in order.

Yours faithfully


G.E. NTEFANG
MUNICIPAL MANAGER

99

Date: 2013 - 01 - 21

/mm
12A-64

CONTRACT NO: BCC 160

**THE REPAIR OF TRUNK ROAD 5, SECTION 5 BETWEEN
KURUMAN AND HOTAZEL**



**SPECIAL MEETING REGARDING THE USE OF
BANKARA BORROW PIT**

**HELD ON TUESDAY, 24 JANUARY 2013 AT
VelaVKE'S SITE OFFICES**

Item	Contract No: BCC 160	Action / Due date									
1.	<p>WELCOME</p> <p>Mr. Peet Bezuidenhout welcomed everybody present and thanked Bankara's Councillor for making herself available.</p> <p>The meeting was called to discuss to discuss the agreement regarding the use of the borrow area near Bankara.</p>										
2.	<p>ATTENDANCE</p> <table border="1"> <tr> <td>Matshidiso Leberegang</td><td>ML</td><td>Councillor - Bankara</td></tr> <tr> <td>Loraine Mosala</td><td>LM</td><td>Community Liaison Officer</td></tr> <tr> <td>Peet Bezuidenhout</td><td>PB</td><td>VelaVKE, Resident Engineer</td></tr> </table>	Matshidiso Leberegang	ML	Councillor - Bankara	Loraine Mosala	LM	Community Liaison Officer	Peet Bezuidenhout	PB	VelaVKE, Resident Engineer	
Matshidiso Leberegang	ML	Councillor - Bankara									
Loraine Mosala	LM	Community Liaison Officer									
Peet Bezuidenhout	PB	VelaVKE, Resident Engineer									
3.	<p>PERMISSION TO USE BANKARA BORROW PIT</p> <p>As discussed during initial negotiations with Ms. Leberegang in November 2012 the extension of the project towards Kuruman depended on acquiring an additional borrow area in the vicinity as a source for natural gravel required for the roadworks.</p> <p>Ms. Leberegang acted promptly and communicated that the community agreed to the use of the borrow pit, and that the Municipality would give formal permission in this regard.</p> <p>Mr. Bezuidenhout wrote a letter to the Municipality requesting permission to use the said borrow pit, to which the Municipality responded requesting this meeting be held to formalise any plough back, or social responsibility.</p> <p>The following agreement was reached (as also agreed during initial negotiations):</p> <ul style="list-style-type: none"> ➤ A minimum of 5 people, but up to 10 people, will be employed from the Bankara community by the project. ➤ Two informal borrow pits within the village will be shaped so as to smooth out the near-vertical slopes and to prevent people falling into them and injuring themselves, especially at night. 										

APPENDIX 6.5 : LIST OF PARTIES CONTACTED AS PART OF THE CONSULTATION PROCESS

	NAME	ORGANISATION	CONTACT DETAILS
1	Nozi Mazwi	Department of Water Affairs Water Quality Management	Private Bag X6101, Kimberley, 8301, Phone : 053 836 7600
2	Attention: Jacoline Mans	Department of Forestry The Chief Forrester	P. O. Box 2782, Upington, 8800 Phone: 054 338 5860 , Fax 054 334 0030
3	Attention: Mr. Mashishi	Northern Cape Department of Agriculture, Land Reform and Rural Development.	P. O. Box 26, Kuruman, 8460 Phone 053 773 1590. Fax: 053 773 1800
4	Rose Cwangae	Northern Cape Provincial Heritage Resources Authority	P.O. Box 1930, Kimberley , 8300 Tel: 053 831 2537, Fax: 053 833 1435
5	Matshidiso Leberegang	Councillor – Ward 2 Councillor (Bankhara - Bodulong Ga Segonyana Local Municipality Council	Private Bag X1522, Kuruman, 8460 Phone 053 712 9300, Fax 053 712 3581
6	Lorraine Mosala	Community Liaison Officer	Cell: 072 562 4421
7	Mr. M. A. Manhe	Ga Segonyana Local Municipality Technical Manager	Private Bag X1522, Kuruman, 8460 Phone 053 712 9300, Fax 053 712 3581

APPENDIX 6.6 : TYPICAL LETTERS AND INFORMATION SENT TO AUTHORITIES



**41 Frans Kleynhans
Groenvlei
Bloemfontein
RSA**

**PO BOX 28242
Danhof
9310
RSA**

**Tel:
+27 51 412 6350**

**Fax:
+27 51 412 6351**

**Terra Graphics
(PTY) Ltd T/A Terra
Works.**

**Reg No:
2000/020654/07**

**VAT Reg No:
4700 197 405**

**Directors:
AC Pauw
(Managing)**

**Environmental
Management**

6 February 2013

Attention: Jacoline Mans

Department of Agriculture, Fisheries and Forestry
The Chief Forrester
P. O. Box 2782
Upington
8800

Dear Madam

**RE: ESTABLISHMENT OF A BORROW PIT FOR ROAD CONSTRUCTION
MATERIAL IN BANKHARA-BODULONG BY THE NORTHERN CAPE
DEPARTMENT OF ROADS AND PUBLIC WORKS: EMP CONSULTATION
PROCESS**

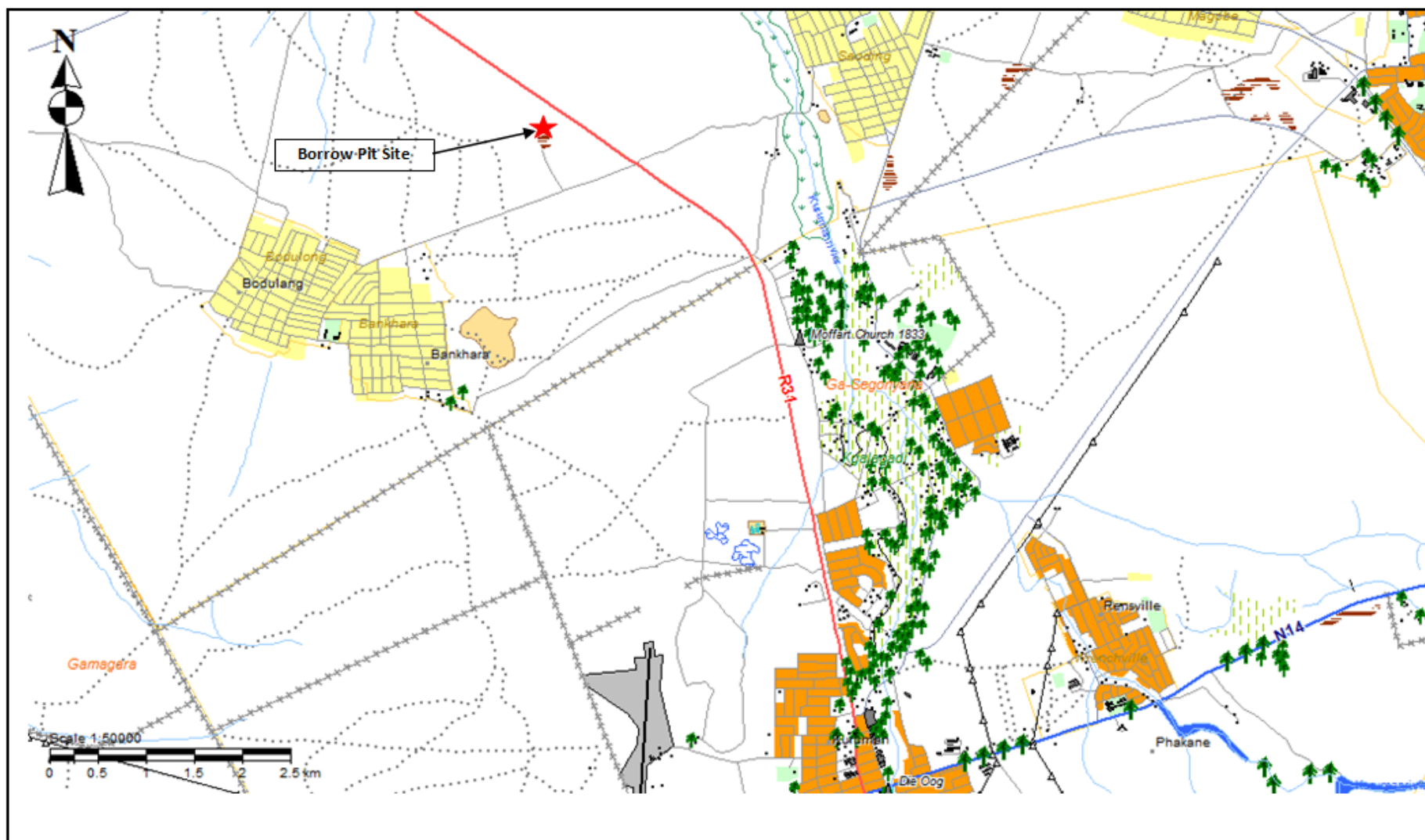
The Northern Cape Department of Roads and Public Works intends to establish a borrow pit to mine gravel for road construction activities for the rehabilitation of the a section of the Kuruman to Hotazel Road. The proposed borrow pit will be located near Bankhara-Bodulong in the Ga-Segonyana local Municipal area close to R31 Road as shown in the map attached.

The Department of Roads and Public Works is in the process of applying for approval of the Environmental Management Plan (EMP) from the Department of Mineral Resources in order to utilise the borrow pit in line with the Minerals and Petroleum Resources Development Act, Act 28 of 2002. Terra Works are the independent environmental assessment practitioners appointed to handle the environmental assessment of the borrow pit.

As part of the consultation process, your organization is being informed of the intentions of the Department of Roads and Public Works. If you have any comments or concerns regarding the borrow pit, please submit your comments or concerns to our offices by the 15 March 2013. Your comments will be greatly appreciated. If you require further information or clarifications, do not hesitate to contact us immediately.

Yours faithfully,

Samuel Pauw
Environmental Consultant
E-mail: sp@terraworks.co.za



Department of Roads and Public Works
Northern Cape Province

P. O. Box 3132 | Tel: 053 839 2100
Square Hill Park | Fax: 053 839 2290
8301

LOCALITY MAP

Bankhara- Bodulong Borrow Pit No. 5

Terra Works Environmental Consultants

P.O. Box 28242 | Tel: 051 412 6350
DANHOF | Fax: 051 412 6351
9310



