### PROSPECTING WORK PROGRAMME

## SUBMITTED FOR A PROSPECTING RIGHT APPLICATION WITH BULK SAMPLING



Name of Applicant:

**BONDEO 140 CC** 

REG NR: 2011/073771/23

PORTION 3
SAND DRIFT 101
HERBERT DISTRICT
NORTHERN CAPE

AS REQUIRED IN TERMS OF SECTION 16 READ TOGETHER WITH REGULATION 7(1) OF THE MINERAL AND PETROLEUM RESOURCES DEVELOPMENT ACT (ACT 28 OF 2002)

### 1. REGULATION 7.1 (a)

### **FULL PARTICULARS OF THE APPLICANT**

Table 1: Applicant's Contact Details

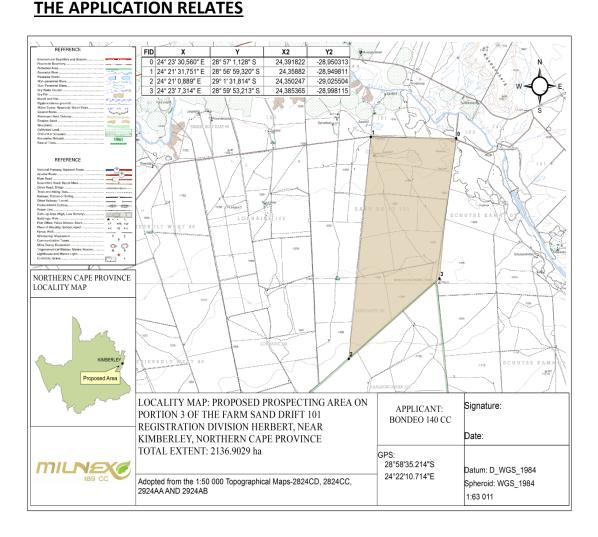
ITEM	COMPANY CONTACT DETAILS
Name	BONDEO 140 CC
Tel no	053 963 2008
Fax no	053 963 2009
Cellular no	082 461 7737
Email address	celtisc@mweb.co.za
	schalk@sdiamonds.co.za
Postal address	P.O. Box 655
	Douglas
	8730

Table 2: Consultant's Details

ITEM	CONSULTANT CONTACT DETAILS
	(If applicable)
Name	Japie van Zyl Attorneys
Tel no	053 963 2008
Fax no	053 963 2009
Cellular no	082 924 6687
Email address	japie@japievzylprok.co.za
Postal address	P.O. Box 960
	Schweizer-Reneke
	2780

#### 2. REGULATION 7(1)(b)

## PLAN CONTEMPLATED IN REGULATION 2(2) SHOWING THE LAND TO WHICH



See annexure "B"

#### 3. REGULATION 7(1)(c)

# THE REGISTERED DESCRIPTION OF THE LAND TO WHICH THE APPLICATION RELATES

1. Portion 3 of the farm Sand Drift 101;

Registration Division: Herbert RD

Extent: 2136.9029 hectares

Province: Northern Cape

### 4. REGULATION 7(1)(d) and (e)

### THE MINERAL OR MINERALS TO BE PROSPECTED FOR

Table 4.1: Minerals to be prospected for

ITEM	DETAIL
Type of mineral(s)	Diamonds Alluvial (DA)
	Diamonds General (D)
Type of mineral continued	n/a
Locality	The property is located approximately
(Direction and distance from nearest	56km South West of Kimberley in the
town)	Northern Cape Province.
Extent of the area required for	2136.9029 hectares
prospecting	
Geological formation	The area is underlain by the following
	geological types. Outcrops of the
	andesitic lavas of the Ventersdorp
	Supergroup, which is mostly overlain by
	calcrete, occur in isolated patches as
	rocky hills. Outcrops of tillite of the
	Dwyka Formation and shale of the Prince
	Albert Formation (Karoo Sequence) occur
	in the north-north-western part of the
	study area. The largest part of the study
	area is underlain by Aeolian sand and
	sometimes alluvial gravels of tertiary to
	recent age covering Dwyka tillite.
	Surface limestones occur sporadically in
	the area. During the 1920s relatively rich
	diamond deposits were found in the
	ancient gravel filled water course of the
	Vaal River within area. The heaps of
	mixed gravel still present in the area
	attest to the disturbance to which it was

subjected.

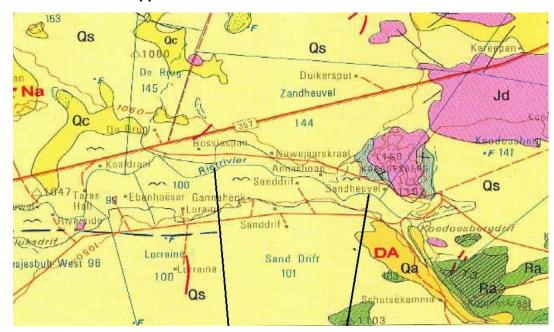
The larvas are green to grey-green in colour. The non-amygdaloidal varieties occur within the study area. The amygdaloidal, which comprise quartz, agate, chalcedony and carnelian are a major source of the Vaal Rover agates. Stratigraphically the larvas belong to the Allenridge formation and represents the uppermost volcanic stage of the Ventersdorp Supergroup. Quartzites of the Bothaville formation which underlies the ilenridge formation, rarely outcrop within the study area and are usually exposed where alluvial diggings have removed the surficial deposits.

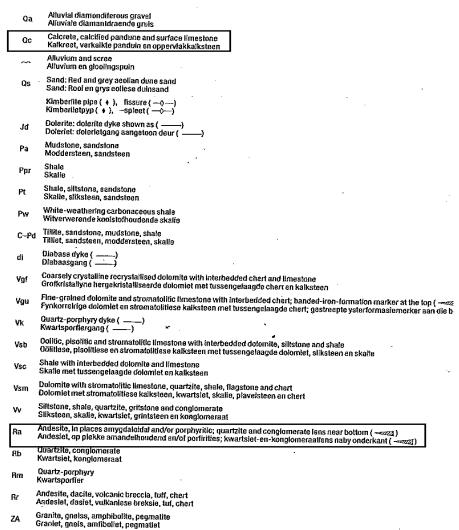
The older gravels within the study area occur in channels or so-called "sluits". One prominent "sluit" is found within the study area, however there exists no evidence in the literature to suggest that the channels are sites of eroded kimberlite dykes.

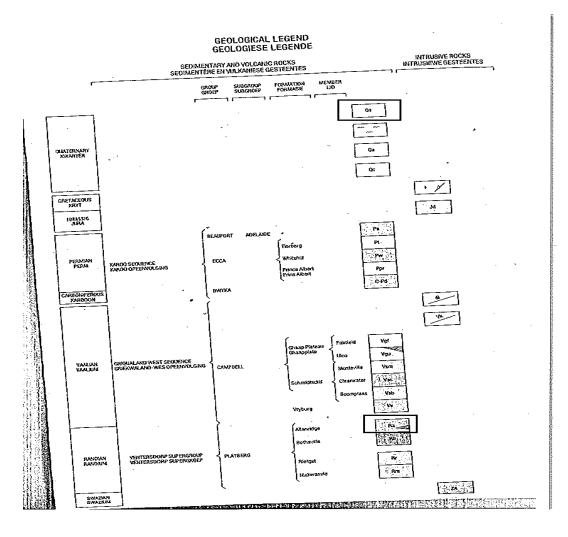
4.2 Description why the Geological formation substantiates the minerals to be prospected for (provide a justification as to why the geological formation supports the possibility that the minerals applied for could be found therein)

There are various operational alluvial diamond mines adjacent to these properties on which applications for prospecting rights have been lodged. In house information exist which substantiate the reasons for this application.

## 4.3 Attach a geological map that justifies the description why there is a possibility that the minerals applied for could occur on the land concerned.







ALSO ATTACHED AS ANNEXURE "C"

#### 5. REGULATION 7(1)(f)

# A DESCRIPTION OF HOW THE MINERAL RESOURCE AND MINERAL DISTRIBUTION OF THE PROSPECTING AREA WILL BE DETERMINED

#### 5.1 SITE VISIT

A formal site visit will be done within 90 days after the prospecting right was executed.

#### **5.2 DESKTOP STUDIES**

Desktop studies will be undertaken after a site investigation was done to determine the target areas including the identification of any infrastructure to be build and any potential problems that may need to be addressed.

#### 5.3 PITTING

Pits will be digged by an excavator to look for gravel. If gravel is found, the applicant will determine the composition and quality of the gravel.

#### 5.4 TRENCHES

The applicant will proceed with this way of prospecting by means of the open cast / trenching method, simultaneously or after pitting depending on the information obtained from the earlier work done. The trenches will be digged to remove and to wash the gravel. It will be washed by 1 x 16 feet washing pan to determine diamond proceeds per 100 ton of gravel.

#### 5.5 CONSOLIDATION AND INTERPRETATION OF RESULTS DATA

All data will be consolidated and processed to determine the diamond bearing resource on the property. This will be a continuous process throughout the prospecting work program.

#### **REGULATION 7(1)(h)**

# ALL PLANNED PROSPECTING ACTIVITIES MUST BE CONDUCTED IN PHASES AND WITHIN SPECIFIC TIMEFRAMES

PHASE	PROSPECTING METHOD	0 - 3	4 – 6	7 - 48	49-60
1	Site Visit	х			
2	Desktop Studies		Х		
3	Pitting			Х	
4	Trenches			Х	
5	Consolidation and interpretation of results data; Preparation of mining right application or renewal of the prospecting right.				X

### REGULATION 7(1)(i)

# TECHNICAL DATA DETAILING THE PROSPECTING METHOD OR METHODS TO BE IMPLEMENTED AND THE MINE REQUIRED FOR EACH PHASE OF THE PROPOSED PROSPECTING OPERATION

#### PHASE 1 – SITE VISIT

GENERAL	A site visit will be conducted within 3 months		
	after execution of the Prospecting Right. It is		
	envisaged that the information will be obtained		
	from the site visit to do the desktop studies and		
	other prospecting activities.		
TIMEFRAME	0-3 months		
COSTS	R15 000		
TECHNICAL SUPPORT	Environmental Consultant – Milnex 189 CC		
	Geologist – Lyndon de Meillon		

#### **PHASE 2- DESKTOP STUDIES**

1.	GENERAL	Desktop studies will be undertaken after the site		
		investigation has was done to determine the		
		target areas including the identification of any		
		infrastructure to be build and any potential		
		problems that may need to be addressed.		
2.	TIMEFRAME	3 months (4 -6)		
3.	COSTS	R15 000		
4.	TECHNICAL SUPPORT	Environmental Consultant – Milnex 189 CC		
		Geologist – Lyndon de Meillon		

#### PHASE 3 – PITTING

1.	GENERAL	The information obtained from the desktop				
		studies will be used to draw up a pitting map.				
		The location and GPS coordinates of where pits				

		will be digged, will be indicated on this map				
		(pitting location map). Pits will then be digged by				
		an excavator on these mapped coordinated				
		points. If gravel is found the applicant will				
		determine the composition and quality of the				
		gravel. It is envisaged that the pits will determine				
		the location and intersection of mineralization.				
2.	TIMEFRAME	42 months				
3.	NUMBER OF PITS	200				
4	EXTENT	3m x 2m x 5m				
5.	CALCULATION	Area: 2136.9029 hectares				
		Pit every 7 hectares				
6.	COSTS	R1000 x 200 = R200 000.00				
7.	TECHNICAL SUPPORT	Environmental Consultant – Milnex 189 CC				
		Geologist – Lyndon de Meillon				
		1 X Excavator				

#### PHASE 4 – TRENCHES

1.	GENERAL	The applicant will proceed with this way of
		prospecting by means of the open cast /
		trenching method, simultaneously or after pitting
		and depending on the results. The location
		where the trenches will be digged, will be
		determined after the gravel has been located by
		conducting the desktop studies and the digging of
		pits. The trenches will be digged on the parts of
		the property where the gravel is located.
		Trenches will be sited on the resource map
		according to the coordinate of each of the
		trenches made. The trenches will be digged to
		remove and wash the gravel. It will be washed by
		a 16 feet washing pan to determine diamond

		proceeds per 100 ton of gravel. The trenches will				
		be sited to determine the geological				
		representivity. Overburden will be stripped and placed next to the trench as determined in the				
		EMP. Gravel will be removed and transported to				
		the plant to be washed. Tailings will be returned				
		to the excavation to fill it up. Hereafter				
		overburden will be dumped in the excavation				
		where after topsoil will be placed in the				
		excavation.				
2.	TIMEFRAME	42 months				
3.	NUMBER OF TRENCHES	50				
4	EXTENT	100m x 30m x 8m				
5.	CALCULATION	Area: 2136.9029 hectares				
		Trench every 4 hectares				
6.	COSTS	R10, 000 x 50 = R500 000.00				
7.	TECHNICAL SUPPORT	1. DOZERS: 1 X CAT D08				
		2 X CAT D10				
		2 X CAT D11				
		2. DUMP TRUCK/TIPPERS: 4 X VOLVO A35F				
		9 X CAT 777 (100 TON)				
		3. EXCAVATOR:				
		2 X KOMATSU PC1250 3 X VOLVO EC480				
		LIEBHERR 9150 (150 TON)				
		4. LOADERS:				
		1 X CAT992				
		2 X VOLVO L220G				
		1 X VOLVO L220H  5. WATER TRUCK:				
		1 X VOLVO A35E (40 000 LITER)				
		6. DIESEL DOZER				
		1 X BELL B80				
		7. GRADER 1 X CAT 40M				
		8. 1 X VOLVO A35E DRILL RICK				
		9. 1 X COMPRESSOR				
		10. GENSETS:				
		1 X 450 KVA 1 X 100 KVA				
		1 X 100 KVA 1 X 50 KVA				
		11. 19 X BAKKIES				
		12. 16 FT WASHING PANS				
8.	TONS TO BE WASHED	100m x 30m x 3m x 1.8 x 50 = 810 00 tons				
L						

### PHASE 5- CONSOLIDATION AND INTERPRETATION

1.	GENERAL	All data will be consolidated and processed to		
		determine the diamond bearing resource on the		
		property. This will be a continuous process		
		throughout the prospecting work. Each phase of		
		prospecting will be followed by desktop studies		
		involving interpretation and modeling of all data		
		gathered and how the applicant will proceed with		
		the work program in terms of activity, quantity,		
		resources expenditures and duration. A pre-		
		feasibility study will be done to determine the		
		preliminary economic assessment of the resource		
		and to determine whether additional evaluation		
		of the deposit will be warranted to increase		
		confidence in the resource estimation.		
		Prospecting work will be conducted by a multi-		
		disciplinary team to determine whether the		
		resource can be viable exploited and if the results		
		can support an application for a mining right.		
2.	TIMEFRAME	12 months		
3.	COSTS	R50 000		
4.	TECHNICAL SUPPORT	Environmental Consultants,		
		Geologist – Lyndon de Meillon		

Table 5.1 The table below incorporates the information required in respect of Regulations 7(1)(f), 7(1)(h) and 7(1)(i):

Phase	Activity	Skill(s) required	Timeframe	Outcome	Timeframe for	What technical expert will sign
Pilase					outcome	off on the outcome?
One	Non-Invasive Prospecting	Environmental	Month 0 – 3	Finalization of the prospecting	Month 3	Environmental Consultants –
	Site Visit	Consultant,		work to be done		Milnex
		geologist				Geologist – Lyndon de Meillon
Two	Non-Invasive Prospecting	Environmental	Month 4 - 6	The finalization of the map for	Month 6	Milnex – Environmental
	Desktop Studies	Consultant,		pitting		Consultants
		geologist				
Three	Invasive Prospecting	Environmental	Month 7 - 48	Obtaining information about	Month 48	Milnex - Environmental
	Pitting	Consultant,		location of the gravel and		Consultants
		geologist		where bulk samples will be		Geologist - Lyndon de Meillon
				made		
Four	Invasive Prospecting	Environmental	Month 7 - 48	The determination of the	Month 48	Milnex - Environmental
	Trenches	Consultant,		diamond resource bearing		Consultants
		Machine Operators,		resource, the extent of the		Geologist – Lyndon de Meillon
		Pan Operators,		resource, the life of mine,		
		Mine Health and		diamond proceeds per 100		
		Safety,		tons of gravel washed (cpht)		
		Environmental		and average price per carat		
				for the diamonds		
Five	Non-Invasive Prospecting	Environmental	Month 49 – 60	The extent of the resource,	Month 60	Milnex - Environmental
	Consolidation and interpretation of	Consultant, geologist		The life of mine		Consultants
	results					Geologist - Lyndon de Meillon

#### 6 REGULATION 7 (1)(g)

# A DESCRIPTION OF THE PROSPECTING METHOD OR METHODS TO BE IMPLEMENTED

#### (i) DESCRIPTION OF PLANNED NON-INVASIVE ACTIVITIES:

(These activities do not disturb the land where prospecting will take place e.g. aerial photography, desktop studies, aeromagnetic surveys, etc)

#### 1. Site Visit

A formal site visit will be done within 90 days after the prospecting right was executed.

#### 2. Desktop Studies

Desktop studies will be undertaken after the site investigation has been done to determine the target areas including the identification of any infrastructure to be build and any potential problems that may need to be addressed.

#### 3. Consolidation and interpretation of results data

All data will be consolidated and processed to determine the diamond bearing resource on the property. This will be a continuous process throughout the prospecting work program.

#### (ii) DESCRIPTION OF PLANNED INVASIVE ACTIVITIES:

(These activities result in land disturbances e.g. sampling, drilling, bulk sampling, etc)

#### 1. Pitting

After the desktop studies, the applicant will use the info to draw a pitting map. The location and GPS coordinates of where the first pits will be digged, will be indicated on the map also referred to as a pitting location map. Pits will then be digged by an excavator at these mapped coordinated points. If gravel is found, the applicant will determine the composition and quality of the gravel. For proper evaluation of the composition and the quality of the gravel it is necessary for the applicant

to dig these prospecting pits. It is envisaged that the pits will determine the location and intersection of mineralization. The location of the further pits to be digged will be determined as pits are digged.

#### 2. Trenches

The applicant will proceed with this way of prospecting by means of the open cast / trenching method, simultaneously or after pitting. The location of the trenches will be determined after the gravel has been located by conducting the desktop studies and the digging of pits. The trenches will be digged on the parts of the property where the gravel is located. Trenches will be sited on the resource map according to the coordinate of each of the trenches made. The trenches will be digged to remove and wash the gravel. It will be washed by a 1 x 16 feet washing pans to determine diamond proceeds per 100 ton of gravel. The trenches will be sited to determine the geological representivity. Overburden will be stripped and placed next to the trench as determined in the EMP. Gravel will be removed and transported to the plant to be washed. Tailings will be returned to the excavation to fill it up. Hereafter overburden will be dumped in the excavation where after topsoil will be placed in the excavation.

#### Commitment to provide addendums in respect of additional prospecting activities

I herewith commit to provide the Department of Mineral Resources with an addendum in respect of both the EM Plan and Prospecting Work Program regarding any future infill prospecting required but not described above, prior to undertaking such activities. The addendum will cover all the Regulations as per the Prospecting Work Program.

I agree that the addendums will provide for similar activities only and if the scope changes I would be required to apply in terms of Section 102 of the MPRDA for an amendment of the Prospecting Work Program.

ACCEPT	Х

#### (iii) DESCRIPTION OF PRE-FEASIBILITY STUDIES

(Activities in this section includes but are not limited to: initial, geological modeling, resource determination, possible future funding models, etc)

All data will be consolidated and processed to determine the diamond bearing resource on the property. This will be a continuous process throughout the prospecting work program.

#### (iv) DESCRIPTION OF BULK SAMPLING ACTIVITIES

This activity requires that an application in terms of Section 20 of the Act is specifically included in your application for a prospecting right and cannot be proceeded with if such permission is not specifically granted.

See annexure "D" for an application in terms of Section 20 of the Act

**Table 6.1: Bulk Sampling Activities** 

ACTIVITY		DETAILS	
Number of pits/trenches planned		200 Pits ; 50 Trenches	
Dimensions of	Number o	f Length Width Depth	
pits/trenches, per pit/	pits/trenches		
trench	200 pits	3m x 2m x 5m	
	50 trenches	100m x 30m x 8m	
Locality		The locality of the trenches will only	
		be determined after the field mapping	
		has been done and the pits have been	
		dug.	
Volume Overburden (Waste)		100m x 30m x 8m x 50 = 750 000m <sup>3</sup>	
Volume Ore		100m x 30m x 3m x 50 = 450 000m <sup>3</sup>	
Density Overburden		1.5	
Density Ore		1.8	
Phase(s) when bulk sampling will be		Phase 4	
required			

Timeframe(s)	Pitting: 42 months
	Trenches: 42 months

### Commitment to provide for an addendum in respect of additional bulk sampling activities

I herewith commit to provide the Department of Mineral Resources with an addendum to the Prospecting Work Program, and an Environmental Management Plan for approval prior to undertaking any future bulk sampling activities not described above.

ACCEPT	Х

#### 7 REGULATION 7(1)(j)(i)

DETAILS WITH DOCUMENTARY PROOF OF THE APPLICANT'S TECHNICAL ABILITY OR ACCESS THERETO TO CONDUCT THE PROPOSED PROSPECTING OPERATION

#### 7.1 Competencies to be employed in terms of the Mine Health and Safety Act

OMPETENCIES TO BE EMPLOYED
nine Manager
quipment Manager
afety Officer
lectricians
)perators
nvironmental Consultants
Geologist

I herewith confirm that I, in Table 9.1 have budgeted and financially provided for the required skills listed above.

CONFIRMED	X

#### 7.2 List of Appropriate equipment at your disposal (If applicable)

#### Table D: Appropriate Equipment available

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1.
       DOZERS:
       1 X CAT D08
       2 X CAT D10
       2 X CAT D11
2.
       DUMP TRUCK/TIPPERS:
       4 X VOLVO A35F
       9 X CAT 777 (100 TON)
3.
       EXCAVATOR:
       2 X KOMATSU PC1250
       3 X VOLVO EC480
       LIEBHERR 9150 (150 TON)
4.
       LOADERS:
       1 X CAT992
       2 X VOLVO L220G
       1 X VOLVO L220H
5.
       WATER TRUCK:
        1 X VOLVO A35E (40 000 LITER)
6.
       DIESEL DOZER
       1 X BELL B80
7.
       GRADER
       1 X CAT 40M
8.
       1 X VOLVO A35E DRILL RICK
       1 X COMPRESSOR
9.
10.
       GENSETS:
       1 X 450 KVA
       1 X 100 KVA
       1 X 50 KVA
11.
       19 X BAKKIES
12.
       16 FT WASHING PANS
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#### 7.3 Technical skills provided Free of Charge

- 7.3.1 Information (CV's) in respect of skills already acquired
  - Environmental Consultants see annexure "E"
  - CV`S of workers "F"
  - Geologist Lyndon de Meillon "G"
- 7.3.2 Copy of the relevant contractual agreements between the service provider and the applicant relative to the duration of the planned prospecting period, where applicable
  - Environmental Consultants see annexure "E"
  - CV`S of workers "F"
  - Geologist Lyndon de Meillon "G"

#### 7.3.3 All other evidence of Technical Ability

List of Equipment and Employees

#### **8 REGULATION 7 (1)(j)(ii)**

# DETAILS WITH DOCUMENTARY PROOF OF A BUDGET AND DOCUMENTARY PROOF OF THE APPLICANT'S FINANCIAL ABILITY OR ACCESS THERETO

As proof of the applicant's financial ability or access thereto, the following documents are annexed:

- ➤ Letter of undertaking annexure "I"
- > Financial statements annexure "J

#### 9 **REGULATION 7 (1)(k)**

# A COST ESTIMATE OF THE EXPENDITURE TO BE INCURRED FOR EACH PHASE OF THE PROPOSED PROSPECTING OPERATION

Table 9.1

ACTIVITY	YEAR 1 Expenditure	YEAR 2 Expenditure	YEAR 3 Expenditure	YEAR 4+5 Expenditure
PHASE 1				
Site Visit	R15 000	-	-	-
PHASE 2				
Desktop Studies	R15 000	-	-	-
PHASE 3				
Pitting	R28, 571	R57, 142	R57, 142	R57, 142
PHASE 4				
Trenches	R71, 428	R142,856	R142,856	R142,856
PHASE 5				
Pre-Feasibility				R50, 000
Labour	R50, 000	R100, 000	R100, 000	R100, 000
Rehabilitation	R50, 000	R200, 000	R200, 000	R100, 000

Diesel & Maintenance	R100, 000	R300, 000	R300, 000	R300, 000
Annual Total	R329,999	R799,998	R799,998	R749,998
			Total Budget	R2,679,993

#### 10 FINANCIAL ABILITY TO GIVE EFFECT TO THE WORK PROGRAMME

#### 10.1 The amount required to finance the Work Program

From the proposed budget it can be assumed that the amount of R2,679,993.00 would be required to finance the Work Program.

#### 10.2 Detail regarding the financing arrangements

- Letter of undertaking "I"
- Financial Statements "J"
- Memorandum of Agreement between applicant and contractor "K"

#### 10.3 Confirmation of supporting evidence appended

- Financial Statements "J"
- Memorandum of Agreement between applicant and contractor "K"

#### 11 Confirmation of the availability of funds to implement the proposed project

- Financial Statements "J"
- 12 I herewith confirm that I have budgeted and financially provided for the total budget as identified in Regulation 7(1)(k).

CONFIRMED	Х

#### 13 REGULATION 7(1)(m)

# UNDERTAKING, SIGNED BY THE APPLICANT, TO ADHERE TO THE PROPOSALS AS SET OUT IN THE PROSPECTING WORK PROGRAMME

#### **Table 13.1**

Herewith I, the person whose name and identity number is stated below, confirm that I am the Applicant or the person authorized to act as representative of the Applicant in terms of the resolution submitted with the application, and undertake to implement this prospecting work program and adhere to the proposals set out herein.

Full Names and Surname	Shalk Willem Wessel Jakobus Steyn
Identity Number	581125 5027 083
Date	9 JUNE 2016

### **ANNEXURE D**

### <u>APPLICATION IN TERMS OF SECTION 20 (2) PERMISSION TO REMOVE AND DISPOSE</u> <u>OF MINERALS</u>

Name of applicant:	BONDEO 140 CC
Reg number:	2011/073771/23
Postal address:	P.O. Box 655
	Douglas
	8730
Telephone number:	082 461 7737
Fax number:	053 963 2009
Description of area a	oplied for:
1. Portion 3 of th	ne farm Sand Drift 101;
Registration D	Division: Herbert RD
Extent: 2136.9	9029 hectares
Province: Nor	thern Cape
• •	applies for permission to remove and dispose for own account alluvial diamonds and diamonds general found on the above
Signed at Schweizer-I	Reneke on 9 June 2016.
APPLICANT	

**ANNEXURE G: UNDERTAKING** 

**UNDERTAKING OF STEYN DIAMANTE CC** 

It is hereby undertaken that Steyn Diamante CC will fund the application for a prospecting

right in terms of sections 16 and 17 of the Mineral and Petroleum Resources Development

Act and to prospect for diamonds on:

1. Portion 3 of the farm Sand Drift 101;

Registration Division: Herbert RD

Extent: 2136.9029 hectares

Province: Northern Cape

It is confirmed that there is money available for the conducting of the prospecting activities.

This money will be made solely available for the conducting of the prospecting activities.

See the financial statements of Steyn Diamante CC attached to the application as proof of

availibility of funding.

Signed at Schweizer-Reneke on 9 June 2016

**APPLICANT** 

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