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Department:  
Public Works  
REPUBLIC OF SOUTH AFRICA

# 40 km Borderline Infrastructure and Installation between RSA/Zimbabwe

PRESENTATION TO PORTFOLIO COMMITTEE

April 2020

DIVISIONAL HEAD (DDG)





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REPUBLIC OF SOUTH AFRICA

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# SECTION 1

OVERVIEW



# EXECUTIVE SUMMARY (1)

- **AIM OF THE PROJECT**

- The aim of the project is to repair and replace existing borderline fence (match existing) between RSA/ZIM due to Covid-19 pandemic.

- **BACKGROUND**

- Town Planning Services issued a Provisional Site Clearance for maintenance
- PI was issued by UDM
- Following announcement on National State of Disaster, the Minister invoked Emergency Procurement.
- This contract is premised on the existing Beitbridge LPOE (WCS052500) contract
- BOQ was baselined from the scheduled rates
- BOQ activities baselined from the existing contract

- **EMERGENCY PROCUREMENT**

- The National Treasury's Instruction Note No. 08 of 2019/2020 Emergency Procurement Covid-19 in paragraph 3.5.1 (i) provides for the invocation of emergency procedures.
- Negotiated procurement strategy used.

- **CONSTRUCTION**

- Project completed on time
- Project to be completed within budget

- **COST COMPARISON**

- Covid-19 fence anticipated to be R850.66 per linear meter at final account
- A 3m high security fence is approximately R4 200 per linear meter
- Game fence (without electrification) is approximately R200 per linear meter

- **WAY FORWARD**

- The DOD to intensify patrol at the borderline fence
- An agreement between DPWI and DOD to clarify the roles and responsibility of the two departments with the borderline infrastructure.
- A Military Alliance or Treaty to manage the illegal crossing, as our borderline infrastructure is only as good as the ability to manage illegal crossings
- DPWI to ensure that an appropriate maintenance solution at the borderline fence
- Finalise the planning for overall borderline infrastructure between RSA and neighbouring countries



# EXECUTIVE SUMMARY (2)

<b>Contractor name</b>	<b>Caledon River Properties (Pty) Ltd t/a Magwa Construction</b>
<b>Principal Agent</b>	<b>Profteam cc</b>
Tender Sum Contractor (Incl VAT)	R37 176 843.50
Tender Sum Principal Agent (Incl. VAT)	R3 259 071.48
Site Handover date to Contractor	19 March 2017 (Contract Commencement date is effective on the date of signature of the contract by the Contractor, which was 23 March 2020)
Contract period	1 month
Original completion date (planned):	20 April 2020
Original completion date (Actual):	20 April 2020
Financial expenditure (Incl. Vat) Contractor	R 21 819 878.28
Financial expenditure (Incl. Vat) Principal Agents	R 1 843 004.92
Project progress	100%
Works Completion	28 April 2020
Final Account	In progress GCC (2010) clause 6.10.9 due 14days of the date of final approval



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## SECTION 2

BACKGROUND



# BACKGROUND (1)

1. DPWI was in the early stages in the process of appointing a service provider prior to the Covid-19 pandemic, after the SANDF stated that their strategic borderline infrastructure is in a bad condition
2. The particular project addresses the short to medium term solution. Due to the Covid-19 pandemic there is a very high risk for loss of life (i.e. Death), negative health impact, negative economic impact and social impact in South Africa.
3. Following President Cyril Ramaphosa's address to the nation on 15 March 2020 on the Covid-19 pandemic and the simultaneous declaration of a National State of Disaster
4. In accordance with Section 27(2)(L) of the Disaster Management Act, No 57 of 2002, the Minister of Public Works and Infrastructure, issued a directive on 16 March 2020 for the emergency securing of the South African Border Posts, to the Director General, Chief Financial Officer and the Deputy Director General: Construction Management. The first focus being on the Beitbridge Border Post and identified hotspots at this borderline
5. The three (3) salient parameters defined by the directive included a **VO with an existing contract, site visit to determine the scope and costs on 18 March 2020 and contract commencement on 20 March 2020**

## BACKGROUND (2)

6. Recognising the Ministerial Directive DPWI Officials met with SANDF Officials on the 17 March 2020, firstly, at the Military SCM (Army Camp) outside of Musina, Limpopo ( $\pm 10$ kms) to provide a brief as per the directive from the Minister, and get information on the fence specification from SANDF. Then proceeded to Beitbridge LPOE for a site meeting. The site meeting of 17 March 2020 resolved that :
  - a. Borderline fence was surveyed and there were no hotspot areas with periodic holes as the fence line was down
  - b. The focus area for the borderline infrastructure installation will be 40kms (20kms on either side of Beit bridge). In line with the provisional site clearance for maintenance
  - c. After considering the respective BOQ's of the three existing Repair and Maintenance Programme (RAMP) Contracts at the nearest border posts. The Beitbridge LPOE Contractor's BOQ had a security fence, with scheduled rates, fitting the existing fence. In line with the VO process it was resolved that the Beitbridge LPOE contract will be used. Detailed Scope of Work and priced BOQ was prepared.

## BACKGROUND (3)

7. Urgent meetings (DPWI Offices) were convened on the 18 March and resolved that:
  - a. VO process was aborted, after consultation with Chairperson of VOC, as the scope of work for the borderline fence is not related to specific project for the LPOE
  - b. Several options to meet the set deadline were discussed under emergency basis (criteria)
  - c. The ordinary procurement process would take 3months to get a contractor, which is not inline with the directive
7. The National Treasury's Instruction Note No. 08 of 2019/2020 Emergency Procurement Covid-19 in paragraph 3.5.1 (i) provides for the invocation of emergency procedures.
8. It was prudent to invoke the emergency procurement process that entailed the appointment of the required service providers through a negotiated procedure that was approved by NBAC.



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## SECTION 3

EMERGENCY PROCUREMENT



# EMERGENCY PROCUREMENT (1)

1. The National Treasury's Instruction Note No. 08 of 2019/2020 Emergency Procurement Covid-19 in paragraph 3.5.1 (i) provides for the invocation of emergency procedures.
2. The procurement strategy for nomination became the most suitable given the timelines provided by the directive
3. The memo submitted to the NBAC, requested NBAC to ratify the prior negotiation with the Contractor as it, the pricing, was done for Variation Order purposes and to approve the appointment of the Contractor through the negotiated procurement procedure
4. The market analysis was premised on the fact that the Bills of Quantities, was baselined from 2014 scheduled rates, which were determined through a competitive bidding process.

## CALCULATION OF TENDER SUMMARY

	RATE FROM WC\$052500 BOQ	4% CPI YEARLY FROM 2016 - 2020	CPAP BASE MONTH MARCH 2016	RATES WC\$055769
TOTAL : CIVIL PRELIMINARY AND GENERAL	R 1 039 500.00	R 1 039 500.00	R 1 039 500.00	R 1 039 500.00
TOTAL : CIVIL WORK	R 27 128 190.00	R 33 005 591.10	R 32 686 756.13	R 31 228 190.00
<b>TOTAL OF SCHEDULE OF QUANTITIES EXCLUDING VAT</b>	<b>R 28 227 690.00</b>	<b>R 34 105 091.10</b>	<b>R 33 786 256.13</b>	<b>R 32 327 690.00</b>
15 % VALUE-ADDED TAX (VAT)	R 4 234 153.50	R 5 115 763.67	R 5 067 938.42	R 4 849 153.50
<b>TENDER SUM CARRIED TO THE TENDER FORM</b>	<b>R 32 461 843.50</b>	<b>R 39 220 854.77</b>	<b>R 38 854 194.55</b>	<b>R 37 176 843.50</b>

## EMERGENCY PROCUREMENT (2)

5. The motivation for the contractor was that, the contractor is experienced, appropriately qualified (they holds a CIDB Grade 8CE) and was already working on a Repair and Maintenance Programme project at Beitbridge LPOE. This meant that the mobilization and establishment for this work could be done seamlessly, which was the most important consideration for procurement considering the urgency of this case
6. Upon approval by NBAC the letters of award were generated by Legal Services. The letters of award state the following:-
  - a. For the Contractor, “Your Bid dated 18 March 2020 to the amount of R37 176 843.50 (15% VAT included) for the rendering of the above mentioned service, is hereby accepted in accordance with the rate tendered, subject to your acceptance of all our terms and conditions contained in the bid documents and signing of the contract with the Department.
  - b. In paragraph (b) (3) of said Form of Offer and Acceptance you opted for payment reduction of 10% of the value certified in the payment certificate (excluding VAT) ”.
  - c. For the Principal Agent, “Your Bid dated 20 March 2020 to the amount of R3 259 071.48 (15% VAT included) for the rendering of the above mentioned service, is hereby accepted in accordance with the rates tendered, subject to your acceptance of all terms and conditions contained in the bid documents and signing of the contract with the Department”.
7. The site was handed over to the Contractor, to start with mobilisation and establishment on 19 March 2020 for practical completion on 20 April 2020.



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# SECTION 4

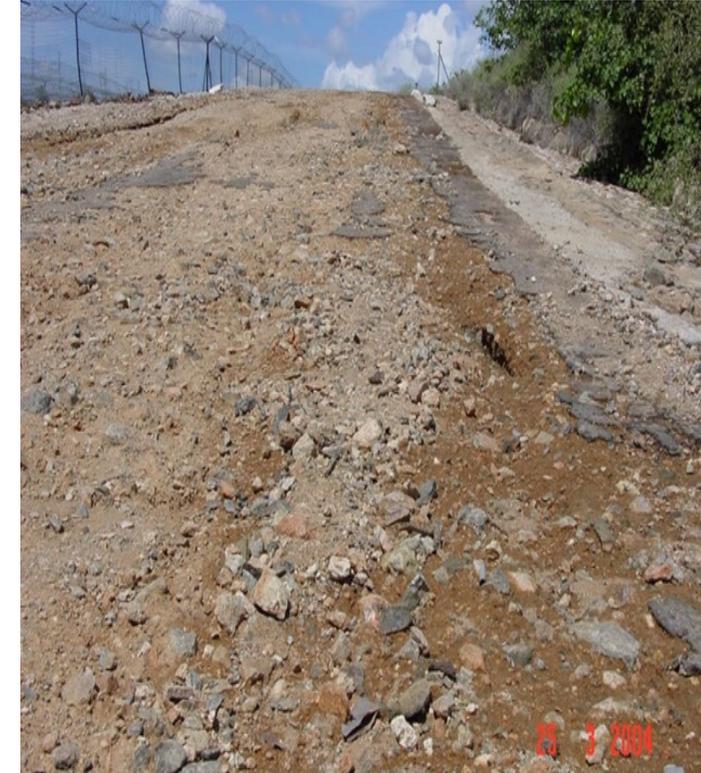
CONSTRUCTION



# SCOPE OF WORK

1. The Project Scope of work includes:
  - a. Actions to be done for all 8 portions (5km per portion) of work;
  - b. Cleaning of fence route for portion;
  - c. Inspect and repair any visible damages to the installation for portion;
  - d. Boreholes for tubular posts and stays, fix gates, fix drifts and wash-away and install tubular posts;
  - e. Install fence and check for tightness to straining wire and redress or repair of necessary, for the relevant portion;
  - f. Install and tension of straining wires and repair if necessary, for portion;
  - g. Install 6 roles of concertina razor wire for tightness to straining wire and redress or repair if necessary.

# EXISTING FENCE TYPE INSTALLED BY DOD



The borderline fence was surveyed and it was evident that there entire fence line is down and parts are not structurally sound

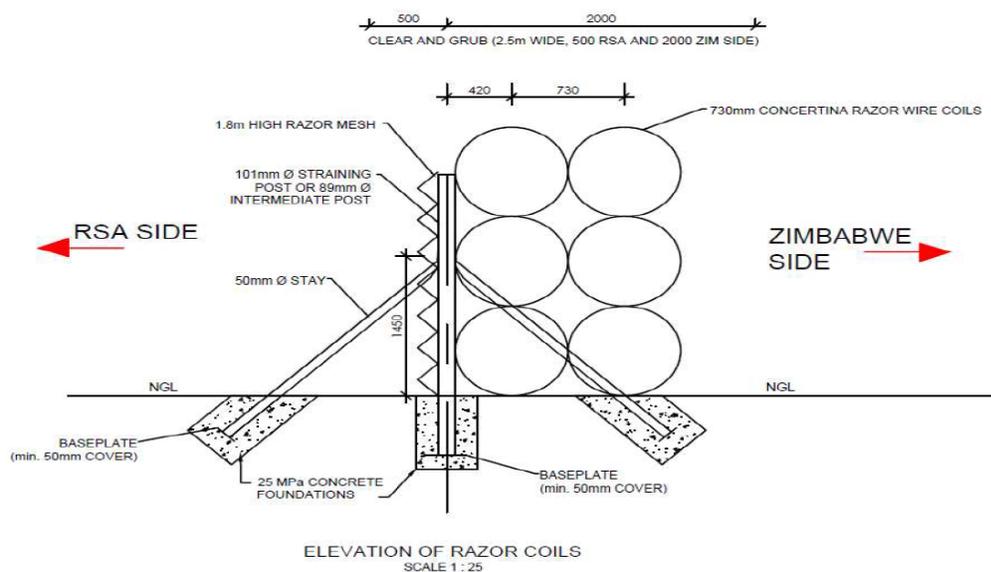
The focus area for the borderline infrastructure installation will be 40kms (20kms on either side of Beitbridge)



# SPECIFICATION

## 1. The Specification includes

- a. The fence is 1.8m high and consist of the following main elements:
- b. Galvanized Tensioning Posts of 110mm dia, 2mm thick, spaced at 90m on straight sections and smaller intervals around bends;
- c. Galvanized Intermediate Posts of 89mm dia, 2mm thick, spaced at 30m in between tensioning posts;
- d. Four (4) strands of 4mm galvanized straining wire evenly spaced at 600mm center-to-center (c.t.c.);
- e. Six (6) 730mm razor BTC Coils placed 3 high and 2 wide;
- f. 150mm x 300mm Razor mesh (6.0m x 1.8m).





# PLANT & SITE WORKERS

Type	Description	Number
Plant	TLB (Tractor Loader Backhoe)	3
	Tow- behind Grader	1
	Bobcat Auger	2
	8t Trucks	3
	Trailers	2
	Additional grader	1
	22 ton excavator	1
	Forklift	2
	Light delivery vehicles	12
Site Workers	Magwa's personnel	18 (men)
	Sub contractor's personnel	50 (men)
	Labour (Musina Local Municipality)	160 (1 x women)
	Security personnel	40 (men)



# SUB CONTRACTORS

Type	Names	Names
Sub Contractors, Suppliers and Manufacturers	Xalindri	Phoenix
	Akinna	Steel Suppliers
	Four local subcontractor	Kapela Bearings
	Maroi Farm	Labco Marketing
	Sinoville Fencing	Screwman
	Sechaba Fencing	Van der kamp Engineering
	Empowered Galvanisers	KeeWave
	Cochrane Global	Roland Olyshlager
	Harrop Allin	ARB Electrical Wholesalers
	CWI	Cosmo Industrial Welding
	NJR Brits	Batcon Services
	Bidvest Afcom	Piet Seaba Transport Services
	Tradecor Steel	DB Msiza Transport
	Astor Berning	Steel Select
Mpumalanga Discount Materials	Galvadip Silverton Engineering	

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	Tradecor Steel	DB Msiza Transport
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Mpumalanga Discount Materials	Galvadip Silverton Engineering	



# Preliminary and General

ITEM	DESCRIPTION	QUANTITY	TOTAL PRICE (Excl. VAT)
100.01	Scheduled fixed-charge and value-related items:	1 Sum	R 1 099 500.00
100.02	Scheduled time-related items	6 No	
101.01	Location and protection of existing services	400 m3	
102.01	Housing for the Engineer's representative	PC Sum	
102.02			
103.01	Compliance to OHS Act Requirements and Construction Regulations	6 No	
104.01	HIV/AIDS Awareness Champion	1 No	
104.02	HIV/AIDS Awareness Workshop	1 (sum)	
104.03	HIV/AIDS Posters, Booklets etc	1 (sum)	
104.04	Access to Condoms	1 (sum)	
104.05	HIV/AIDS Monitoring	1 (sum)	



# Fencing Installation Bill

ITEM	DESCRIPTION	QUANTITY	TOTAL PRICE
204.01	Strength concrete	192 m3	See Sub-total
206.01	Ref. No 193 mesh	200 m2	
207.01	Cold rolled lipped channel	1 ton	
207.02	Normal delivery:	1 ton	
402.01	Removal and Grubbing of large trees over 1m and up to 2m	10 No	
402.01.02	Removal and Grubbing of large trees over 2m and up to 3m	15 No	
404.02	Supply and erection of new fencing material to replace material: 730mm concertina razor wire	24 0000 (m)	
405.01	Clearing of growth along fence route 2.5m wide both sides	40000 (m)	
405.02	Supply and erection of new fencing material to replace old material: 1.8m high razor mesh	40000 (m)	
405.03.02	Supply and erection of new fencing material to replace old material: Tubular post	2000 (No)	



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# Fencing Installation Bill

ITEM	DESCRIPTION	QUANTITY	TOTAL PRICE
405.03.03	Supply and erection of new fencing material to replace old material: 65mm dia. Stay for 1.8m post	4000 (No)	See Sub-total
411.02.04	Supply and erection of new fencing material to replace old material: Y-standards for 1.2m high fence	8000 (No)	
411.02.05	Supply and erection of new fencing material to replace old material: 4mm thick fully galvanized straining wire	36 0000 (No)	
414.00.02	Repair, refix and align single or double gates 3.0m high and up to 15m wide	6 (No)	
415.05.07	Tying in to existing steel sliding	20 (No)	
415.05.01	Dismantling and removal of existing steel sliding gates	6 (No)	
707.01.01	Dismantling and removal of Excavate for restricted foundation, footings and trenches in all materials and use for backfill or embankment or dispose	500 (m3)	
707.01.02	Break up, hack off and remove existing concrete	50 (m3)	



# Fencing Installation Bill

ITEM	DESCRIPTION	QUANTITY	TOTAL PRICE
707.01.03	Importing, placing and compacting approved G6 material in layers of 150mm from commercial sources or from borrow pits to 95% MOD AASHTO density	25 (m3)	R31 228 190.00
707.01.04.0 1	Intermediate excavation	30 (m3)	
707.01.04.0 2	Hard rock excavation	40 (m3)	

SUMMARY	TENDER SUM
TOTAL: CIVIL PRELIMINARY AND GENERAL	R1 099 500.00
TOTAL: CIVIL REPAIR WORK( FENCING INSTALLATION BILL)	R31 228 190.00
TOTAL OF SCHEDULE OF QUANTITIES (EXCLUSIVE OF VAT)	R32 327 690.00
15% VALUE ADDED TAX (VAT)	R4 849 153.50
<b>TENDER SUM</b>	<b>R37 176 843.50</b>



# CONTRACT NOTIFICATIONS

1. Department and the Principal Agent were monitoring progress on a daily basis. Progress reports are sent on a daily basis. The following contractual communication was sent to the Contractor.
  - a. The letter of concern on progress and completion deadline, was issued to the Contractor on the 8 April 2020.
  - b. The Response to letter of concern raised: Ref No009 - Beitbridge - Progress on Site – received at 17:05
  - c. Notice 2: Ref No006 - Extension of Contract Period – received at 17:07 on 10th April 2020;
  - d. Notice 3: Ref No007 - Extension of Contract Period Security – received at 17:07 on 10th April 2020
  - e. Warning letter was issued on the 10th April 2020 for items raised at the Weekly Progress Meeting to the Contractor;

# SITE CHALLENGES (1)

1. An initial OHS Audit was conducted on 1 April 2020, in which the Contractor scored 50%. A follow up OHS Audit occurred on the 7 April 2020, a score of 82.6% was obtained. A follow up OHS Audit ensured that the score was improved.
2. Following a breach of security, whereby the contractor's material were allegedly stolen, the Minister of DPWI wrote a letter to the Minister of Defence and Military Veterans (dated 4 April 2020), requesting her assistance in assigning DOD officials to patrol the border fence line, to ensure that these security measures secure our borders effectively.
3. The response from the Minister of Defence and Military Veterans came through a letter dated 7 April 2020 and it states that the C SANDF has undertaken to direct the SANDF Joint Operations Division, to address this security challenge on an urgent basis. This will cover, the area where the fence is being erected and reinforce the existing private security elements on site.

## SITE CHALLENGES (2)

4. The letter from the Director General of DPWI to Secretary General of Defence dated 15 April 2020 supplemented the Ministerial correspondences, requesting DOD Top Management to expedite patrol measures at this borderline.
5. The Contractor improved the private security by ensuring that there is a security guard as follows: (one) person per km, four on motorbikes, two on vehicles and four at specific hotspot areas. This was particularly done at night between 18:00 to 6:00



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# PHOTOGRAPHS



illustrates the damage to property and criminal elements at the project



DEPARTMENT OF PUBLIC WORKS AND INFRASTRUCTURE		PRM041: CERTIFICATE OF PRACTICAL COMPLETION (Clauses 51.1 to 51.3 of the General Conditions of Contract)	
REGION:	BESTBRIDGE BORDER FENCE	WCS No:	055769
PROJECT:	PHASE 1: 40KM BORDERLINE INFRASTRUCTURE AND INSTALLATION BETWEEN RSA/ZIMBABWE APPOINTMENT THROUGH EMERGENCY DELEGATION FOR SECURING OF BORDERLINE FENCE	REFERENCE No:	055769
CLIENT/USER DEPARTMENT:	DEPARTMENT OF PUBLIC WORKS AND INFRASTRUCTURE	TENDER No:	055769
DEPARTMENTAL PROJECT MANAGER:	JABULILE MABASO		
CONSULTANT:	PROTEAM		
CONTRACTOR:	MAGWA CONSTRUCTION		
DATE OF PRACTICAL COMPLETION:			
The Works have reached a stage (practical completion) that allows their use for their intended purpose without danger or undue inconvenience			
DESCRIPTION OF WORKS: <b>PHASE 1: 40 KM BORDERLINE INFRASTRUCTURE AND INSTALLATION BETWEEN RSA/ZIMBABWE APPOINTMENT THROUGH EMERGENCY DELEGATION FOR SECURING OF BORDERLINE FENCE.</b>			
OUTSTANDING WORK: • For outstanding work to be completed see Addendum A attached			
CONSULTANT	CLIENT/USER DEPARTMENT	CONTRACTOR	DEPARTMENT OF PUBLIC WORKS AND INFRASTRUCTURE
<i>Juan Marwan</i> Representative	<i>Ac. Dindzindis</i> Representative	<i>A. Pringle</i> Representative	<i>Jabulile Mabaso</i> Representative
<i>[Signature]</i> Signature	<i>[Signature]</i> Signature	<i>[Signature]</i> Signature	<i>[Signature]</i> Signature
20/04/2020 Date	20/04/2020 Date	20/04/2020 Date	20/04/2020 Date
Note: In terms of the Conditions of Contract, only the Engineer certifies due completion of the Works. The other signatures indicate attendance at the inspection of the Works and witnessing of the Engineer's signature			
For: Director Special and Major Projects: <i>N/A</i>			Date: <i>20/04/2020</i>

Practical Completion Photographs



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# SECTION 5

COST COMPARISON



# PRELIMINARY HIGH LEVEL COST COMPARISON (1)

1. The high level cost comparison per m (anticipating project value at R34m at final account )

Fence Type	Estimated Rate/m
Covid-19 Fence	R850.66
High Security Fence	R4 200.00
Game Fence	R200.00

2. 1.8m high Covid-19 Fence



# PRELIMINARY HIGH LEVEL COST COMPARISON (2)

4. 3m high pvc coated "grid fence" (high security)



4. 2.4m high game fence with wire strands



**Note:** The picture indicate provision for an electrical component to be incorporated with the fence. The costing for the electrical portion is not include in the comparative table above. The estimated cost per linear meter of this electrical component is R300/m.



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# SECTION 5

WAY FORWARD



# WAY FORWARD

1. The Director-General issued a letter to Secretary of Defence dated 27 April 2020 stating that:
  - a. The DOD is required to intensity patrol at the borderline fence between RSA and Zimbabwe, now that the project is complete
  - b. An agreement between DPWI and DOD will be formulated to clarify the roles and responsibility of the two departments with the borderline infrastructure.
  - c. A Military Alliance or Treaty between RSA and Zimbabwe maybe necessary to manage the illegal crossing, as our borderline infrastructure is only as good as the ability to manage illegal crossings
2. DPWI to ensure that an appropriate maintenance solution at the borderline fence between RSA and Zimbabwe is provided. While withstanding that there is a 12month latent defects on material imperfections and poor workmanship, a preventative maintenance solution is required for up keeping of the asset.
3. Finalisation of the planning currently underway for the overall borderline between RSA and neighbouring countries.

Thank You