



Final Scoping Report

002/18-19/E0007

Final Scoping Report for a Bulk Fuel Pipeline from the Transnet depot near Heidelberg (Lesedi Local Municipality) to Econ Oil and Energy depot in Nigel (Ekurhuleni Metropolitan Municipality), Gauteng Province

June 2018

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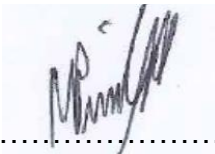
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1. OBJECTIVE OF THE SCOPING REPORT

According to Government Notice R982 of 4 December 2014, as amended on 7 April 2017, the objective and structure of the scoping report will be as follows:

- a- Details of the EAP;
- b- Location of the Activity;
- c- Project Plan;
- d- Scope of the Activity;
- e- Description of the policies and legislation in context;
- f- The need and desirability of the proposed activity;
- g- Description of the project environment;
- h- Considerations of alternatives sites;
- i- Plan of study for undertaking of the environmental impact assessment process;
- j- Responsibilities of the EAP;
- k- Information required by the Competent Authority;
- l- Conclusions and recommendations.

2. DETAILS OF THE EAP

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Expertise of EAP: Honours Degree in Environmental Management and 4 years of experience with the management and conducting of EIA's. A number of pipeline projects have been conducted in the North West Province. *Curriculum Vitae*s of EAP, who compiled this report as well as EAP who reviewed this report, is included in Appendix A.

3. LOCATION OF THE ACTIVITY

3.1 SURVEYOR GENERAL 21 DIGIT CODE OF EACH LAND PORTION TO BE TRAVERSED BY THE PROPOSED PIPELINE

Farm name	21 SG Code	Municipality
Maraisdrift 190 ptn 22	T0IR00000000019000022	Lesedi Local Municipality
Maraisdrift 190 Ptn 7 RE	T0IR00000000019000007	Lesedi Local Municipality
Noicedale 191 ptn 23	T0IR00000000019100023	Ekurhuleni Metropolitan Municipality
Varkensfontein 169 ptn 23	T0IR00000000016900023	Ekurhuleni Metropolitan Municipality
Noicedale 191 ptn 28	T0IR00000000019100028	Ekurhuleni Metropolitan Municipality
Maraisdrift 190 ptn 15	T0IR00000000019000015	Lesedi Local Municipality
Maraisdrift 190 ptn 2	T0IR00000000019000002	Ekurhuleni Metropolitan Municipality
Maraisdrift 190 ptn 6	T0IR00000000019000006	Lesedi Local Municipality
Varkensfontein 169 ptn 36	T0IR00000000016900036	Ekurhuleni Metropolitan Municipality
Droogebult 170 ptn 2	T0IR00000000017000002	Ekurhuleni Metropolitan Municipality

The proposed activity will start at the Transnet terminal situated approximately 7.5 km north east of Heidelberg in the Lesedi Local Municipality. The pipeline will then transverse towards the Econ Oil & Energy fuel depot in Nigel. Nigel is situated in the Ekurhuleni Metropolitan Municipality.

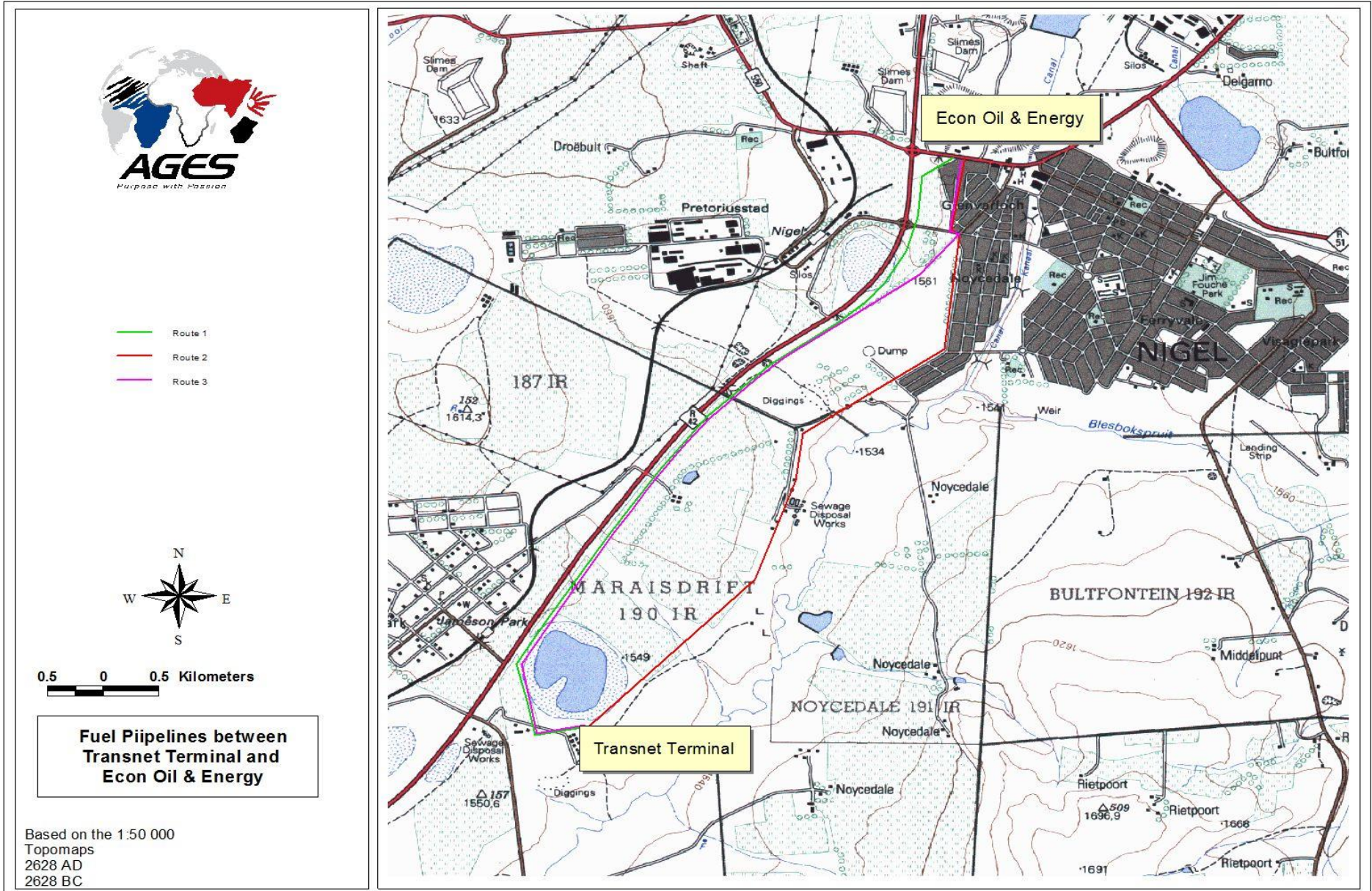


Figure 1: Location of three alternative routes investigated

Table 1: Coordinates of the three alternative routes

Metres	Alternative route 1		Alternative route 2		Alternative route 3	
	Latitude	Longitude	Latitude	Longitude	Latitude	Longitude
0	-26,464752	28,429921	-26,464752	28,429921	-26,464752	28,429921
250	-26,465102	28,427545	-26,465102	28,427545	-26,462917	28,431724
500	-26,463299	28,424141	-26,463299	28,424141	-26,461366	28,433389
750	-26,461758	28,425665	-26,461758	28,425665	-26,435138	28,435138
1000	-26,459541	28,425227	-26,459541	28,425227	-26,458195	28,436851
1250	-26,457422	28,425054	-26,457422	28,425054	-26,456685	28,438478
1500	-26,455587	28,426499	-26,455587	28,426499	-26,45499	28,440274
1750	-26,453624	28,42763	-26,453624	28,42763	-26,453327	28,442031
2000	-26,451667	28,428918	-26,451667	28,428918	-26,451655	28,44369
2250	-26,44979	28,430238	-26,44979	28,430238	-26,449561	28,44437
2500	-26,447855	28,431533	-26,447855	28,431533	-26,447463	28,445419
2750	-26,445964	28,432906	-26,445964	28,432906	-26,445375	28,446341
3000	-26,444114	28,434372	-26,444114	28,434372	-26,443186	28,447085
3250	-26,442274	28,435848	-26,442274	28,435848	-26,441168	28,447291
3500	-25,440503	28,437407	-25,440503	28,437407	-26,439024	28,44761
3750	-26,438712	28,438899	-26,438712	28,438899	-26,437761	28,449708
4000	-26,437002	28,440486	-26,437002	28,440486	-26,43648	28,451894
4250	-26,435417	28,442221	-26,435417	28,442221	-26,435218	28,454039
4500	-26,433801	28,444066	-26,433801	28,444066	-26,434053	28,456075
4750	-26,432404	28,445947	-26,432404	28,445947	-26,432787	28,45812
5000	-26,431091	28,447885	-26,431091	28,447885	-26,430994	28,459112
5250	-26,429877	28,44999	-26,429877	28,44999	-26,428865	28,459361
5500	-26,428428	28,451938	-26,4286	28,452003	-26,426762	28,459578
5750	-26,426757	28,453574	-26,427276	28,454053	-26,42454	28,459844
6000	-26,424851	28,454878	-26,425884	28,455962	-26,42229	28,459852
6250	-26,422744	28,455812	-26,424425	28,457862	-26,420573	28,459427
6500	-26,420525	28,45628	-26,430994	28,459112	-26,418334	28,459856
6750	-26,418292	28,456474	-26,428865	28,459361	-26,41636	28,460284
7000	-26,416773	28,45787	-26,426762	28,459578	-26,415303	28,458988
7250	-26,415303	28,458988	-26,42454	28,459844		
7500			-26,42229	28,459852		
7750			-26,420573	28,459427		
8000			-26,418334	28,459856		
8250			-26,41636	28,460284		
8500			-26,415303	28,458988		

Three alternative routes from the Transnet terminal to the Econ Oil and Energy fuel depot in Nigel were investigated.

4. PROJECT PLAN

It is planned to construct two pipelines, constructed from 300 mm welded steel pipes, alongside one of the three alternative routes, one to transport petrol and the other to transport diesel. Engineering design plans are currently being prepared and will be included in the CEIAR.

5. SCOPE OF THE ACTIVITY

Table 2: Listed activities triggered in terms of NEMA

Relevant notice	Description
GN R 325 Activity 6: The development of facilities or infrastructure for any process or activity which requires a permit or license or an amended permit or license in terms of national or provincial legislation governing the generation or release of emissions, pollution or effluent.	The proposed activity requires an air emissions license in terms of sub category 2.4 of GN R893 dated 22 November 2013 of the National Environmental Management: Air Quality Act (Act 39 of 2004).
GN R 325 Activity 7 (ii): The development and related operation of facilities or infrastructure for the bulk transportation of dangerous goods- (ii) in liquid form, outside an industrial complex, using pipelines exceeding 1000 m in length, with a throughput capacity of more than 50 cubic meters per day.	The proposed pipeline will be between 6 and 8 km in length with a throughput of 10 000 cubic metres per day for each of the two pipelines. The pipeline will be constructed from the Transnet terminal to the Econ Oil & Energy fuel depot in Nigel.

This Final Scoping Report was done with the objective to supply the Gauteng Department of Agriculture and Rural Development (GDARD) with the necessary environmental information to make an informed decision regarding the approval of the Final Report and the Plan of Study for Environmental Impact assessment.

This Final Scoping Report was done to comply with the requirements of Regulation (43.1) of the regulations published in the Government Notice No R.982 promulgated on 4 December 2014 in terms of Chapter 5 of the National Environmental Management Act 107 of 1998.

The proposed pipelines also require an Air Emission License (AEL) in terms of Subcategory 2.4 of Notice 893 dated 22 November 2013 of the National Environmental Management: Air Quality Act (Act 39 of 2004), and authorization from the Ekurhuleni Metropolitan Municipality.

The proposed pipelines also require a water use license in terms of section 21(c) and 21(i) of the National Water Act (Act 36 of 1998) for the crossing of drainage lines and wetland areas.

6. DESCRIPTION OF POLICY AND LEGISLATIVE CONTEXT

The following is an overview of the relevant policy and legal requirements applicable to the proposed project but the legislation is not limited to this list:

Table 3: List of relevant legislation

Constitution of the Republic of South Africa (Act 108 of 1996)
Conservation of Agricultural Resources Act (Act 43 of 1983) Regulation 15 of GN R0148
National Water Act (Act 36 of 1998) Regulations regarding the procedural requirement for water use license applications and appeals. GN R. 267 of 24 March 2017
National Forests Act (Act 84 of 1998)
National Environmental Management Act (Act 107 of 1998) NEMA EIA Regulations 2017 (GN R. 325, 326 & 327 of 7 April 2017) as Amended
National Heritage Resources Act (Act 25 of 1999)
National Environmental Management: Biodiversity Act (Act 10 of 2004) GN R150: Commencement of Threatened and Protected Species GN R15: Lists of critically endangered, vulnerable and protected species GN R152: Threatened Protected Species Regulations DWAF 2003: Wetland and Riparian Areas Identification and Delineation
National Environmental Management: Air Quality Act (Act 39 of 2004)
National Veld and Forest Fires Act, 1998 (Act 101 of 1998)
Occupational Health and Safety Act (Act 85 of 1993)
Mineral and Petroleum Resources Development Act (Act 28 of 2002)
Ekurhuleni Town Planning Scheme 2014
Ekurhuleni Metropolitan Spatial Development Framework Plan
GDARD Conservation Plan Version 3.3
Gauteng Provincial Environmental Management Framework 2015

National Water Act (Act 36 of 1998)

Section 19 of the National Water Act, Act 36 of 1998 requires that all reasonable measures be taken to prevent any water pollution from occurring, continuing or recurring. The Act further describes a number of water uses and requires that a water use License have to be obtained for the specified water uses.

The proposed bulk fuel pipelines will require a water use license to be applied for in terms of

section 21(c) and 21(i) of the National Water Act (Act 36 of 1998). The water use license application will focus on the pipeline crossing drainage lines and wetland areas. The water use license application process will take no longer than 300 days to compile, submit and receive the final decision from Gauteng Department of Water and Sanitation. AGES was commissioned by Econ Oil and Energy to compile the water use license application and complete the application process.

National Heritage Resources Act (Act 25 of 1999)

The heritage specialist input into the Environmental Impact Assessment (EIA) process is essential to ensure that, through the management of change, developments still conserve our heritage resources. It is also a legal requirement for certain development categories which may have an impact on heritage resources. The heritage component of the EIA is provided for in the National Environmental Management Act, (Act 107 of 1998) and endorsed by section 38 of the National Heritage Resources Act (NHRA - Act 25 of 1999).

Exigo Sustainability was commissioned by AGES Limpopo for an Archaeological Impact Assessment (AIA) study subject to the Environmental Impact Assessment (EIA) process. The objective of this AIA is to determine the presence of heritage resources such as archaeological and historical sites and features, graves and places of religious and cultural significance in previously unstudied areas; to consider the impact of the proposed project on such heritage resources, and to submit appropriate recommendations with regard to the cultural resources management measures that may be required at affected sites / features.

Ekurhuleni Town Planning Scheme 2014

The Ekurhuleni Town Planning Scheme was established in terms of section 18 of the Town Planning and Townships Ordinance (15 of 1986). The general purpose of the town planning scheme is:

- Developments should be co-ordinated and harmonious for it to promote the health, safety, good order, amenity, convenience and general welfare of the certain area targeted.

Ekurhuleni Metropolitan Spatial Development Framework Plan

The Ekurhuleni Metropolitan Spatial Development Framework (ESDF region E) provides the framework for making resource-effective decisions. It is a guide that can have an impact on the development of a city over the next 15 years and more if properly conceived and systematically executed.

According to the Ekurhuleni SDF, region E is highly limited to development as a result of

environmental sensitive areas. Brakpan is constrained by ecological important areas whereas Nigel is characterised by high potential agricultural land. This makes it important to avoid where possible the utilisation of available agricultural land when deciding on the preferred alternative pipeline route to follow.

There are two agricultural hubs in the Ekurhuleni Metropolitan Municipality namely the Ekurhuleni-Tshwane Region 6 Agricultural Hub and the Lesedi Agricultural Hub. The Lesedi Agricultural Hub transverses both Region E and Region D, with Nigel and Duduza as the economic centres, and covers an estimated area of 18203 ha. In total, 25% of the land surface within the municipality is covered by agricultural hubs, which provide a high potential for further agricultural development and growth.

The R42 between Heidelberg and Nigel is identified as a development corridor in the Ekurhuleni Spatial Development Framework. The SDF does not identify specific wetlands to avoid. The wetlands identified in the Ecologic and Wetland Assessment report will be focussed on during the EIA process. The SDF identifies the Transnet fuel storage facility as part of the development corridor between Heidelberg and Nigel.

GDARD Conservation Plan Version 3.3

The Gauteng Conservation Plan version 3.3 is based on the systematic conservation protocol and is based on the principles of complementarity, efficiency, defensibility and flexibility, irreplaceability, retention, persistence and accountability. It is important to have the knowledge of the distribution of biodiversity, the status of species, methods dealing with aspects such as climate change, methods of data analysis, and the nature of threats to biodiversity within a planning region constantly changing, especially in the Gauteng province which is being developed constantly.

The Ecological and Wetland Assessment Report focussed on the Gauteng Conservation Plan with regards to identifying Critical Biodiversity and Ecological Support Areas. This plays an important role in decision-making in the Environmental Impact Assessment process by identifying environmental impacts as a result of the proposed development and by identifying the best route / area where the proposed development will have the lowest impact on the environment.

The Ecological and Wetland Assessment focussed on the conservation of vegetation cover, animal species such as mammals and birds, wetlands and rivers. The report will assist in the decision-making process to choose the preferred alternative route with the lowest environmental impacts.

Gauteng Provincial Environmental Management Framework of 2015 and 2018

The objective of the Gauteng Provincial Environmental Management Framework is to guide sustainable land use management in Gauteng. This document serves the following purposes:

- A framework to guide environmental management;
- To align sustainable development initiatives;
- To guide sustainable land use management within the Gauteng Province;
- To determine specific areas in Gauteng where certain activities may be excluded from an EIA process; and
- Identify certain activities in various Environmental Management Zones that will promote proactive decision-making.

The *Gauteng Provincial Environmental Management Framework Standards and Excluded Activities* document was investigated to ensure the proposed development is not included in Zones 1 and 5 as stipulated in the GPEMF 2018 document. The relevant activities that need to be applied for according to NEMA (1998) were investigated to see whether the triggered activities may be excluded from the EIA process. The proposed linear activity does not fall within Zones 1 and/or 5. Thus the activity will go through the Environmental Impact Assessment process as stipulated in NEMA (1998) where GDARD will be the decision-making authority.

7. MOTIVATION FOR THE NEED AND DESIRABILITY OF THE PROPOSED ACTIVITY

Fuel is part of our everyday lives. It is important to manage the distribution and retail of fuel in such a manner that it impacts the lives of the local community as little as possible. The transportation of fuel through a pipeline minimises the transportation of fuel using heavy vehicles which will reduce the number of heavy vehicles on the roads in the area. This in effect will minimise the deterioration of the R42 and danger to lives on the R42 between Heidelberg and Nigel.

The R42 between Nigel and Heidelberg is a busy road with large transport volumes between the two towns for various purposes. Reducing the number of heavy transport vehicles on the road will mean safer travels between Heidelberg and Nigel. It is dangerous for heavy vehicles entering and exiting, to and from the R42, when loading fuel from the Transnet terminal and delivering it to the depot in Nigel.

The activity will create employment opportunities during the construction phase of the fuel pipelines. During the construction phase there will be skilled and un-skilled job opportunities for men and women. During the operational phase of the fuel lines there will be job opportunities for the local community for both men and women.

8. DESCRIPTION OF THE PROJECT ENVIRONMENT

8.1 LAND USE

The land use between the Transnet terminal and fuel depot in Nigel is zoned mostly for agriculture, business, industrial and residential for all three proposed alternative routes.

8.2 TOPOGRAPHY

According to the Ecological draft report the study area forms part of the Highveld Eco-region and the project area is classified as being “dissected plains”. It was found during the site assessment by the ecological specialist that the slopes of the area vary between 1 and 9 degrees. According to the Ecological specialist report, the project area can be classified as slightly undulating to moderate undulating plains. Wetlands are present in the area in the form of pans and valley bottom wetlands. The elevation on the proposed sites varies between 1540 mamsl to 1560 mamsl.

8.3 CLIMATE

Heidelberg and Nigel normally receives around 586mm of rain per year, mostly during in the summer months. The area receives the lowest rainfall (0mm) in June and the highest (115mm) in January. The average midday temperatures for Nigel range from 16.7°C in June to 26°C in January. June and July are the coldest months of the year were the temperatures drop to 0.1°C on average during the night.

8.4 LAND TYPE, GEOLOGY AND SOIL TYPES

According to the Ecological Assessment, geology is important when classifying soil and vegetation types. Land type Ba9 occurs within the study area. Shale is commonly found in the study area with soils type varying between deep sandy-loam soils of the Hutton or Clovelly soil forms to vertic, black clay soils adjacent to the drainage channels and on the low-lying bottomlands.

8.5 ECOLOGY

8.5.1 Vegetation

According to the Ecological Impact Assessment, the developed site occurs completely within the Grassland biome. The grassland cover depends on the amount of rainfall that has been present and also farming activities, especially grazing of cattle and sheep. Trees are not in abundance because of farming activities, fires and frost that give preference to grass growth. According to the Ecological Assessment report, the site is classified as Tsakane Clay Grassland with the pans representing the Eastern Temperate Freshwater Wetlands.

This grassland occurs on slightly undulating plains where the vegetation is found to be short and dense with highveld grasses dominating, namely *Themeda triandra*, *Heteropogon contortus*, *Elionorus muticus* and a number of *Eragrostis* species. According to the ecological report the conservation status is “Endangered” with only 1.5% being conserved and more than 60% being transformed.

8.5.2 Wetland

The Eastern Temperate Freshwater Wetlands are found to occur on flat landscapes or shallow depressions filled with water bodies supporting zoned systems of aquatic and hygrophilous vegetation of temporarily flooded grasslands and ephemeral herblands. This vegetation type has a conservation target of 24%.

As seen in figure 2 on the following page, there is a layout of the Critical Biodiversity & Ecological Support Areas as taken from the Ecological Impact and Wetland delineation Report. The primary purpose of a map indicating the Critical Biodiversity Areas (CBA) and Ecological Support Areas (ESA) is to guide decision-making on where it would be most suitable for development. It should inform land-use planning, environmental assessment and authorisations, and natural resource management, by a range of sectors whose policies and decisions impact on biodiversity. It is the biodiversity sector’s input into multi-sectoral planning and decision-making processes.

The study area is located partially in an ESA, as well as the following CBA categories namely “Important” and “Irreplaceable”. The pipeline alternative route that would have the lowest impact on the environment should therefore be considered as the preferred route.

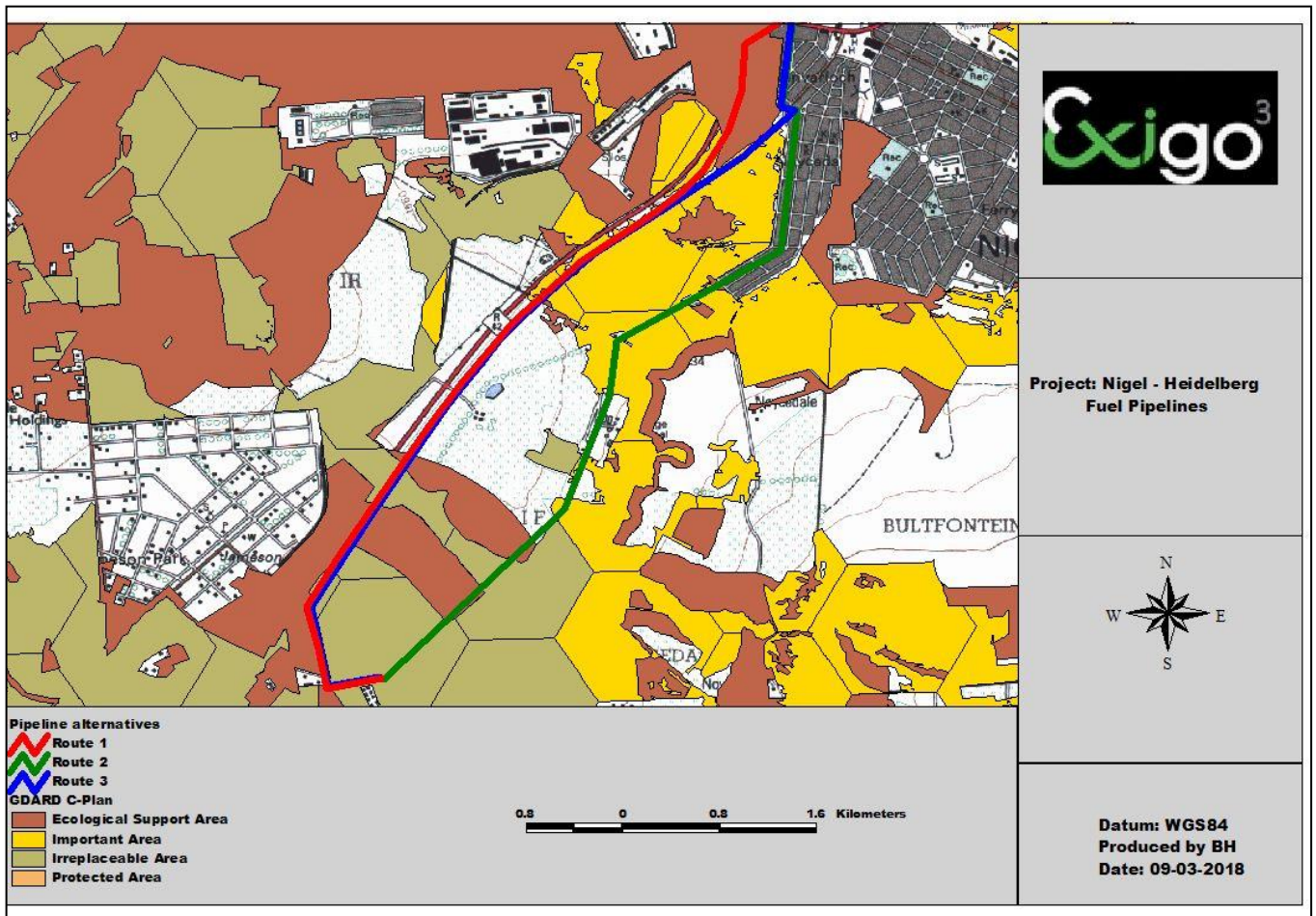


Figure 2: Critical Biodiversity & Ecological Support Areas

(Please see attached Appendix B - **Ecological Impact and Wetland Delineation Report**)

8.5.3 Important Bird Areas

An Important Bird Area (IBA) is an area classified that is globally recognised to be an important area for the conservation of bird populations. According to the Ecological Report the Marievale Wetlands and Suikerbosrand Nature Reserve IBA’s are located within close proximity to the project area.

(See Appendix B for further information)

8.6 SURFACE DRAINAGE

Quaternary catchment C21E and C21F fall within the study area of the three proposed alternative routes. The study area is drained mainly by surface run-off with surface water flowing into perennial streams and wetlands in the study area. Water eventually drains into the Blesbokspruit that is situated to the east of proposed alternative routes. The state of the Blesbok Spruit was summarised by the Ecological Specialist below:

Table 4: State of the Blesbok Spruit:

Quaternary drainage region	Name	Class	Ecoregion II	State of river / streams	Category
C21F	Blesbok	Perennial	Highveld	CLASS D: LARGELY MODIFIED	Critically endangered

8.7 AIR QUALITY AND NOISE

The proposed development will generate noise and air pollutants (dust and gasses) during the construction phase along the preferred route which will be selected after the EIA process. During the operational phase there will not be any noise generated on the pipeline route. The impacts from the air emissions from the pipeline route will be assessed during an Air Quality Impact Assessment in April 2018 and will be included in the Environmental Impact Assessment Report. An application for an air emissions license will be submitted to Ekurhuleni Metropolitan Municipality.

8.8 SOLID WASTE MANAGEMENT

The developer of the fuel pipeline will be responsible for general solid waste removal and disposal at an approved waste disposal site during the construction phase. During the operational phase, no waste will be generated on the fuel pipeline route. Waste will be generated at the Transnet terminal and fuel depot in Nigel which will be the responsibility of each operator of the site to keep the site clean and remove waste to approved landfill sites.

8.9 ARCHAEOLOGICAL AND HISTORICAL ATTRIBUTES

According to the Heritage report done by Exigo 3 the general landscape around the project area is primarily well known for its Historical Period occurrences, primarily related to the Gold Mining industry of the past century and resulting urbanization and industrialization. Locally, much of the project area has been altered by historical and recent development activities largely sterilising surface and subsurface of heritage remains, especially those dating to pre-colonial and prehistorical times.

Site Exigo-NFP-HP01 (S26.443288° E28.447271°)

A farmstead consisting out of a multi-room residential house and outbuildings occur in a fenced yard on the farm Maraisdrift 190IR in a central section of Route 2 proposed for the pipeline. The brick buildings were plastered up and painted with corrugated iron pitch roofing and a veranda along its northern edge. The building resembles a mid-1900 architectural style in the area and preservation thereof is good. It is currently occupied and a small vegetable garden and outhouse building occurs in the yard adjacent to the residence. In addition, the walls of a dilapidated stone

wall dwelling and foundations structures remain at the farmstead. An analysis of historical aerial photographs and topographic maps suggest that the farmstead was established in the time before 1952. No special cultural or social association for the structure could be established and it does not demonstrate unique architectural or scientific attributes. However, the structure is older than 60 years and the site is generally protected under the NHRA.

The site is rated as of medium-low heritage significance but it is older than 60 years, it is generally protected under the NHRA and a SAHRA destruction permit will be required should the site be altered. It is the informed opinion of the author of this Archaeological Impact Assessment Report Route 1 and Route 3 are the most suitable, and Route 2 is the least suitable from a culture resources management perspective (provided that no subsurface heritage remains are encountered during development, and subject to relevant management / mitigation requirements).

No graves of human burial places were noted during the site investigation.



Figure 3: Location of three alternative routes investigated and the heritage site on route 2
 (Please see **Appendix C** for more information)

9. CONSIDERATIONS OF ALTERNATIVES

9.1 DETAILS OF ALTERNATIVES CONSIDERED

Three alternative routes were considered as part of the specialist studies and the Scoping and EIA process. All three routes have been traversed by the Ecological and Heritage specialists. The three routes differ in length, land uses and environmental aspects (wetlands, grasslands and

agriculture). The three routes are described below:

Alternative route one - green route in Figure 1:

This route starts at coordinates -26.46471° S and 28.42986° E and immediately moves towards the R42 around a wetland classified as an Eastern Temperate Freshwater Wetland. This route is proposed to be next to the R42 in an existing servitude. This route will eventually cross access roads to the R42 at six areas and will be approximately 7.25 kilometres in length from the Transnet terminal to the fuel depot situated at coordinates -26.41498° S and 28.45949° E. This route is not close to residential areas and is mostly situated in an existing servitude. The route does not traverse agricultural properties and has, to this point, been preferred by most of the people notified during the Public Participation Process.

Alternative route two - red route in Figure 1:

During the Public Participation Process people have had issues regarding the locality of the route regarding to their residential area as well as agricultural activities taking place alongside this route. This route also starts at coordinates -26.46471° S and 28.42986° E and will be approximately 7 kilometres in length. This route will cross open natural environments that consist of agricultural activities, wedding and functions venue, correctional services facilities with crop fields and a waste water treatment works. The pipeline route moves through a residential area where erven has been marked for future development purposes. The route passes the Angelo Mall on the east and ends with route two and one at the Econ Oil and Energy fuel depot in Nigel.

Alternative route three - pink route in Figure 1:

This route is approximately 7.5 kilometres in length and also starts at coordinates -26.46471° S and 28.42986° E. This route follows the same route as alternative route 1 at the beginning and moves around the same wetland classified as an Eastern Temperate Freshwater Wetland. The route then runs next to Buffel Street, away from the R42, and passes the Angelo Mall on the eastern side. Here the route passes alongside a residential area towards the fuel depot at coordinates -26.41498° S and 28.45949° E.

9.2 DETAILS OF PUBLIC PARTICIPATION PROCESS UNDERTAKEN

Public Participation is an essential part of the environmental impact assessment process. The proposed project was advertised on 7 March 2018 in the local newspaper “The Heidelberg & Nigel Herald” and “Rekord” to inform people and request them to identify environmentally related issues and their concerns. An example of this advertisement is attached in **Appendix D**.

Site notices were placed at strategic points alongside the three alternative routes identified and described in section 9.1. An example of this notice as well as proof of placement are attached in **Appendix D**.

Background Information Documents (BID's) were delivered to all property owners as well as adjacent land owners of the three alternative routes through hand delivering, e-mail or post. The relevant departments were notified by e-mail. An example of the background information document is included in **Appendix D** as well of proof of the distribution thereof.

All interested and affected parties had 30 days from the start of the public participation process to register as an interested and affected party and to submit comments on the EIA process. Issues or concerns received from interested and affected parties were recorded and was given a response from the appointed Environmental Assessment Practitioner.

When the Consultation Scoping Report was submitted to the Gauteng Department of Agriculture and Rural Development, the available specialist reports together with the Consultation Scoping Report was available to all registered interested and affected parties for 30 days to comment and raise their concerns if there were any.

The correspondence with I&APs were recorded and included as part of this Final Scoping Report and will be included during the EIA phase. All the issues raised will be taken into account and will be addressed in the Environmental Impact Assessment Report.

All documentation lists and proof of the Public Participation process is included in **Appendix D** of this report.

9.3 SUMMARY OF ISSUES RAISED BY INTERESTED AND AFFECTED PARTIES

Stander Broers Familie Trust of Varkensfontein 169 portion 22:

There is an open field available for agricultural activities. The property owner is concerned that the fuel pipeline will cross his property and minimise his potential to farm on the piece of property. If the pipeline stays next to the road (route 1) the owner would not mind.

Spade-Reën-Sending Internasionaal - Daniel Rossouw:

The only route they do not have an issue with is route alternative 1 that is close to the R42 and away from their property. The other alternative routes will have an enormous influence on their property.

Ekurhuleni Metropolitan Municipality:

Will the fuel pipelines be constructed in servitudes?

What will the safety distance be on either side of the routes when calculating the risks?

9.4 ENVIRONMENTAL ATTRIBUTES ASSOCIATED WITH THE ALTERNATIVES

Three alternative routes have been planned and investigated by specialist. The local community has been notified regarding the proposed development. The public participation process together with the specialist studies is used to identify the preferred route for the bulk fuel pipelines to follow. Currently the specialist studies and the public give preference to alternative route 1 and alternative route two has raised complaints by residents and property owners situated alongside the route.

9.5 IMPACTS AND RISKS IDENTIFIED OF EACH ALTERNATIVE

The following potential environmental impacts associated with the Bulk Fuel Pipeline Alternatives include:

Impact on air quality and noise:

The proposed development will generate noise and air pollutants (dust and gasses) during the construction phase along the preferred route which will be selected after the EIA process. During the operational phase there will not be any noise generated on the pipeline route. The impacts from the air emissions from the pipeline route will be assessed during an Air Quality Impact Assessment in April 2018 and will be included in the Environmental Impact Assessment Report. An application for an air emissions license will be submitted to Ekurhuleni Metropolitan Municipality.

Impact on biodiversity:

An Ecological Impact Assessment has been completed which describes the impact of the fuel pipeline routes on the biodiversity of the area. The draft Ecological and Wetland Delineation report is included in the Final Scoping Report (**Appendix B**).

Impact on soils and agricultural resources:

There will be preparation of the site and trenches will be developed for the construction of the two bulk fuel pipelines from the Transnet terminal to the fuel depot in Nigel which may negatively impact on soils and agricultural resources. The construction phase of the activity may especially impact the environment when developing alongside or within wetland areas. Mitigation measures to mitigate the negative impacts will be considered during the EIA phase and will be included in the EMP.

Impact on water resources:

The construction phase of the activity may negatively impact on the environment when developing alongside or within wetland areas. Mitigation measures to mitigate the negative impacts on water resources will be considered during the EIA phase and will be included in the Environmental Management Programme. There will also be a separate water use license application according to section 21 of the National Water Act (Act 36 of 1998) where any of the section 21 water uses will be triggered during the construction and operation of the Fuel Pipelines. This is envisaged

where the pipeline route will cross any water resources like drainage lines or wetland areas.

Potential impact on heritage resources:

An Archaeological Impact Assessment has been completed and is included in the final Scoping Report in Appendix C.

Potential impacts on drainage channels and wetlands:

A Wetland Delineation study has been completed and forms part of the Final Scoping report (Appendix B)..

Socio-economic impacts:

Disruptions of traffic, impact on pedestrians, crime and job creation will be included in the EIA and EMPr.

Traffic impacts:

The impacts of the activity on traffic in the area will be important to take into consideration especially during the construction phase.

Solid waste management:

This includes the appropriate management measures regarding waste construction material (rubble) accumulated during the construction phase. The regular removal of waste to an approved facility and the provision of adequate wind and animal proof waste bins or skips on site are of importance. Sorting and recycling of waste should be promoted.

Safety, Security and Health:

Safety, security and health measures for the construction and operation phases will be covered. This relates to fire risks, excessive speed of construction and other vehicles on site and the general safety and health of construction workers.

9.6 METHODOLOGY TO IDENTIFY AND RANK ENVIRONMENTAL IMPACTS ON ALTERNATIVES

To assess the impacts on the environment, the process will be divided into two main phases namely the Construction phase and the Operational phase. The activities, products and services present in these two phases will be studied to identify and predict all possible impacts.

In any process of identifying and recognising impacts, one must recognise that the determination of impact significance is inherently an anthropocentric concept (Duinker and Beanlands, 1986) in DEAT 2002. Thompson (1988), in DEAT 2002 stated that the significance of an impact is an expression of the cost or value of an impact to society.

However, the tendency is always towards a system of quantifying the significance of the impacts so that it is a true representation of the existing situation on site. This will be done by using wherever possible, legal and scientific standards which are applicable.

The significance of the aspects/impacts of the process will be rated by using a matrix derived from Plomp (2004) and adapted to some extent to fit this process. These matrixes use the consequence and the likelihood of the different aspects and associated impacts to determine the significance of the impacts.

The consequence matrix use parameters like severity, duration and extent of impact as well as compliance to standards. Values of 1-5 are assigned to the parameters that are added and averaged to determine the overall consequence.

The same process is followed with the likelihood that consists of two parameters namely frequency and probability. The overall consequence and the overall likelihood are then multiplied to give values ranging from 1 to 25. These values, as shown in the following table, are then used to rank the significance. It must be said however that in the end, a subjective judging of an impact can still be done, but the reasons for doing so must be qualified.

Significance ratings (Plomp 2004)

Negative Impact:

Significance	Low -	Low-Medium -	Medium -	Medium-High -	High -
Overall Consequence X Overall Likelihood	1-4.9	5-9.9	10-14.9	15-19.9	20-25

Positive Impact:

Significance	Low +	Low-Medium +	Medium +	Medium-High +	High +
Overall Consequence X Overall Likelihood	1-4.9	5-9.9	10-14.9	15-19.9	20-25

Description of the parameters used in the matrixes:

Severity:

- Low Low cost/high potential to mitigate. Impacts easily reversible, non-harmful insignificant change/deterioration or disturbance to natural environments.
- Low-medium Low cost to mitigate Small/ potentially harmful Moderate change/deterioration or disturbance to natural environment.
- Medium Substantial cost to mitigate. Potential to mitigate and potential to reverse impact. Harmful Significant change/ deterioration or disturbance to natural environment.
- Medium-high High cost to mitigate. Possible to mitigate Great/Very Harmful Very significant change/deterioration or disturbance to natural environment.
- High Prohibitive cost to mitigate. Little or no mechanism to mitigate. Irreversible. Extremely Harmful Disastrous change/deterioration or disturbance to natural environment.

Duration:

Low	Up to one month
Low-medium	One month to three months
Medium	Three months to one year
Medium-high	One to ten years
High	Beyond ten years

Extent:

Low	Footprint area
Low-medium	Pipeline route
Medium	Adjacent properties
Medium-high	Heidelberg / Nigel area
High	District

Frequency:

Low	Once/more a year or once/more during operation
Low-medium	Once/more in 6 months
Medium	Once/more a month
Medium-high	Once/more a week
High	Daily

Probability:

Low	Almost never/almost impossible
Low-medium	Very seldom/highly unlikely
Medium	Infrequent/unlikely/seldom
Medium-high	Often/Regularly/Likely/Possible
High	Daily/Highly likely/definitely

These parameters will help identify the severity of impacts identified during the construction and operational phases. The rating awarded to each impact after the above method was used will then have to be addressed to lower the impact and mitigate environmental impacts as far as possible.

9.7 POSITIVE AND NEGATIVE IMPACTS ASSOCIATED WITH ALTERNATIVES AND MITIGATION MEASURES

The impact assessment will be completed for the EIA phase when all the specialist studies have been completed and finalised. The ecological and wetland assessment, heritage assessment and air quality assessment will be used to finalise the impact assessment in the EIA and EMPr.

9.8 OUTCOME OF THE SITE SELECTION MATRIX

The outcome of the site selection matrix will be described in the EIA report.

9.9 CONCLUDING STATEMENT INDICATING THE PREFERRED ALTERNATIVE AND LOCATION OF THE ACTIVITY

After conducting site visits, and taking into consideration the results of the Ecological and Wetland Delineation and Heritage assessments, as well as the current results of the public consultation, Alternative route 1 is deemed to be the preferred route to follow. The main area next to the R42 is deemed the least sensitive route of the three proposed routes. Along this route there are less waterbodies to take into consideration and also less open natural spaces where agricultural activities are common. Alternative route one is the route that does not affect any residential area.

Comments from the interested and affected parties and during interaction with the local community in the public participation process indicated that it seemed that there was no problem regarding alternative route one but a large concern regarding alternative route two and also concerns regarding alternative route three when next to the residential area. *The decision on the selected alternative can only be finalised once the impacts on all the alternatives have been taken into account during the EIA phase of the impact assessment.*

10. PLAN OF STUDY FOR UNDERTAKING OF THE ENVIRONMENTAL IMPACT ASSESSMENT PROCESS

10.1 DESCRIPTION OF ALTERNATIVES TO BE CONSIDERED

There are three alternative routes to consider as part of the specialist studies and the Scoping and EIA process. All three routes have been visited by the Ecological specialist as well as the Heritage specialist. The three routes differ in length, land uses, environmental aspects (wetlands, grasslands and agriculture). The three routes are described as:

Alternative route one:

This is the green route in Figure 1. The route starts at coordinates -26.46471° S and 28.42986° E and immediately moves towards the R42 around a wetland classified as an Eastern Temperate Freshwater Wetland. This route is proposed to be next to the R42 in an existing servitude. This route will eventually cross access roads to the R42 at six areas and will be approximately 7.25 kilometres in length from the Transnet terminal to the fuel depot situated at coordinates -26.41498° S and 28.45949° E. This route is not close to residential areas and is mostly situated in an existing servitude. The route does not cross through agricultural properties and has, to this point, been preferred by most of the people notified during the Public Participation Process.

Alternative route two:

This is the red route in Figure 1. During the Public Participation Process people have had issues regarding the locality of the route regarding to their residential area as well as agricultural activities

taking place alongside this route. This route also starts at coordinates -26.46471°S and 28.42986° E and will be approximately 7 kilometres in length. This route will traverse open natural environments that consist of agricultural activities, wedding and functions venue, correctional services facilities with crop fields and a waste water treatment works. The pipeline route runs through a residential area where erven has been marked for future development purposes. The route passes the Angelo Mall on the east and ends with route two and one at the Econ Oil and Energy fuel depot in Nigel.

Alternative route three:

This is the pink route in Figure 1. This alternative route is approximately 7.5 kilometres in length and also starts at coordinates -26.46471°S and 28.42986° E. This route follows the same route as alternative route 1 at the beginning and moves around the same wetland classified as an Eastern Temperate Freshwater Wetland. The route then runs next to Buffel Street, away from the R42, and passes the Angelo Mall on the eastern side. Here the route passes alongside a residential area towards the fuel depot at coordinates -26.41498° S and 28.45949° E.

Recommendation:

Based on results from the Ecological and Wetland Assessment, Heritage Assessment and consultation with I&AP's Route 1 is considered to be the preferred option.

10.2 DESCRIPTION OF ASPECTS TO BE ASSESSED AS PART OF THE ENVIRONMENTAL IMPACT ASSESSMENT PROCESS

Air Pollution and Noise:

Air quality impacts by the fuel pipelines will be assessed by an air quality specialist in April 2018. Air pollution may occur during the construction phase with heavy machinery and dust from construction activities. Emissions from the pipelines will also be assessed during the Air Quality Impact Assessment. An application for an Air Emissions License (AEL) will be submitted to the Ekurhuleni Metropolitan Municipality

Noise will also be generated during the construction of the bulk fuel pipeline between the Transnet terminal and fuel depot in Nigel and the impact will be assessed during the EIA process.

Water Quantity:

Water usage during the construction and operational phases will be addressed to avoid the wastage of water resources.

Surface- and Groundwater Pollution:

A specialist Ecological and Wetland Assessment has been done by a qualified ecological and wetland specialist to determine the possible impacts of the proposed pipelines on surface water resources and wetland areas in the study area. A water use license application will be submitted to the Department of Water and Sanitation for the crossing of surface water resources and wetland areas.

During the construction phase it will be important to address any activities that will occur around open trenches especially regarding spillages of lubricants and chemicals. The monitoring of the lines during the operational phase for spillages of fuel that can pollute water resources will be addressed during the EIA process.

Soils and land degradation:

The soil removal and digging of trenches will be addressed. This will include mitigation measures for the handling of top soil and stockpiles. The rehabilitation of the effected environment will be addressed in the EIA report as well as in the EMP. The monitoring of the lines during the operational phase for spillages of fuel that can pollute soil will be addressed during the EIA process.

Biodiversity Disturbances:

A specialist Ecological and Wetland Assessment has been done by a qualified ecological and wetland specialist. The impacts from preparation of the site, the construction process and operation of the lines on the biodiversity and loss of habitat have been assessed.

Heritage Disturbances:

A specialist Heritage Assessment was done by a qualified Archaeologist. The heritage impacts will be addressed especially during the construction phase. The aim is to determine the presence or not of heritage resources such as archaeological and historical sites and features, graves and places of religious and cultural significance, and to submit appropriate recommendations with regard to the cultural resources management measures that may be required at affected sites / features. The heritage study provides an overview of the heritage resources that may occur in the demarcated area where development is intended.

Visual Impacts:

The clearance of vegetation and the presence of construction vehicles during the construction phase will be addressed in the EIA process.

Socio-Economic Impacts:

The new employment opportunities during the construction and operational phases will be addressed.

10.3 ASPECTS TO BE ASSESSED BY SPECIALISTS

Due to the nature of the project, an Ecological Impact and Wetland Delineation Assessment, and Archaeological Impact Assessment was conducted to investigate the potential environmental impacts associated with the proposed development. The studies have already been conducted and the draft specialist studies have been received. The specialist studies and draft scoping report will be made available to the relevant authorities and interested and affected parties for the 30 day viewing period as part. The final specialist studies will be included in the Final Scoping Report and be submitted to GDARD.

The Environmental Impact Assessment also requires an Air Quality Impact Assessment that will be conducted by a qualified air quality specialist during April 2018. The Air Quality Impact Assessment will be included in the Consultation EIA report to be submitted to the authorities and interested and Affected Parties.

10.3.1 ECOLOGICAL IMPACT ASSESSMENT AND WETLAND DELINEATION

A detailed ecological impact and wetland delineation assessment was conducted on the study area to anticipate and identify significant environmental issues and impacts the proposed development might have on the surrounding environments.

- The following methodology was followed:

- Conduct a site visit and list the plant species;
- Investigate options for enhancing and / or maintaining biodiversity to mitigate the impact of the proposed development and related infrastructure with the overall objective of preventing further loss of biodiversity;
- Condition of all vegetation will be assessed and mapped;
- Plant communities will be identified on site and a sensitivity map will be created;
- Identify potential red data plant species, possible encroacher species, medicinal plants of value and exotic plant species;
- List the potential fauna (mammal species, red data birds, reptiles, amphibians, invertebrates) present linked to the specific potential habitats that occur as identified in the vegetation survey;
- Potential impacts of the development on the vegetation and general ecology will be

assessed;

- Delineate all wetlands and water course and assess the wetland and / or riparian functionality of the crossings along the proposed fuel supply development to specific guidelines and methodology;
- Management and mitigating measures to be implemented during the development phases will be provided.

An ecological impact assessment and wetland delineation study has already been conducted to assess the existing drainage lines on the site as well as the consideration of alternative sites and/or lay out plans. The report is available to the relevant departments and I&APs to view and is attached as **Appendix B** to this report. The final specialist report will be included in the Consultation and Final EIA reports.

10.3.2 HERITAGE IMPACT ASSESSMENT

A Heritage Impact Assessment was undertaken on the study area according to the following Terms of Reference:

- Provide a detailed description of all archaeological artefacts, structures (including graves) and settlements which may be affected, if any.
- Assess the nature and degree of significance of such resources within the area.
- Establish heritage informants/constraints to guide the development process through establishing thresholds of impact significance;
- Assess and rate any possible impact on the archaeological and historical remains within the area emanating from the proposed development activities.
- Propose possible heritage management measures provided that such action is necessitated by the development.
- Liaise and consult with the South African Heritage Resources Agency (SAHRA)

The report is available to the relevant departments and I&APs to view and is attached as **Appendix C** to this report. The final specialist report will be included in the Consultation and Final EIA reports.

10.3.3 AIR QUALITY IMPACT ASSESSMENT

An air quality Impact Assessment will be undertaken to determine the impact of the fuel pipelines on the ambient air quality in the vicinity of the pipelines

In addressing the baseline air quality for the project, emphasis will be placed on the following aspects:

- Description of the regional climate and atmospheric conditions impacting on the dispersion potential at the project site.
- Review of ambient air quality guidelines or standards and exposure criteria on the basis of which the predicted impact of the activity may be evaluated.
- Assessment of classical ambient air pollutant concentrations in the vicinity of the process.

The preliminary impact assessment component of the study will include:

- Compilation of an emissions inventory classified per category i.e. line, area or point. The inventory will also include basic source parameterisation and emission rate estimation.
- Dispersion simulations of ground level concentrations for various classical pollutants over various averaging periods (e.g. highest daily and annual averaging periods).
- Analysis of dispersion modelling results, including:
 - an assessment of the predicted spatial distributions of ground level concentrations; and
 - preliminary health and environmental risk analysis, based on the comparison of simulated concentrations to ambient air quality guidelines and standards.
- Dispersion simulation using air quality models will be in accordance with the guidelines prescribed in the South African National Standard SANS 1929:2009 “Ambient air quality – Limits for common pollutants”.

The air quality impact assessment will be used in the determination of the significance of the impact of the fuel lines on the environment and the Air Quality Impact Assessment Report will be available for review as part of the Consultation EIA report.

The Air Quality Impact Assessment and the EIA report will be used in the compilation of an Air Emissions License application to be submitted to the Ekurhuleni Metropolitan Municipality.

10.5 METHOD TO ASSESS DURATION AND SIGNIFICANCE

To assess the impacts on the environment, the process will be divided into two main phases namely the Construction phase and the Operational phase. The activities, products and services present in these two phases will be studied to identify and predict all possible impacts.

In any process of identifying and recognising impacts, one must recognise that the determination of impact significance is inherently an anthropocentric concept (Duinker and Beanlands, 1986) in DEAT 2002. Thompson (1988), in DEAT 2002 stated that the significance of an impact is an expression of the cost or value of an impact to society.

However, the tendency is always towards a system of quantifying the significance of the impacts so that it is a true representation of the existing situation on site. This will be done by using wherever possible, legal and scientific standards which are applicable.

The significance of the aspects/impacts of the process will be rated by using a matrix derived from Plomp (2004) and adapted to some extent to fit this process. These matrixes use the consequence and the likelihood of the different aspects and associated impacts to determine the significance of the impacts.

The consequence matrix use parameters like severity, duration and extent of impact as well as compliance to standards. Values of 1-5 are assigned to the parameters that are added and averaged to determine the overall consequence.

The same process is followed with the likelihood that consists of two parameters namely frequency and probability. The overall consequence and the overall likelihood are then multiplied to give values ranging from 1 to 25. These values, as shown in the following table, are then used to rank the significance. It must be said however that in the end, a subjective judging of an impact can still be done, but the reasons for doing so must be qualified.

Significance ratings (Plomp 2004)

Negative Impact (-):

Significance	Low -	Low-Medium -	Medium -	Medium-High -	High -
Overall Consequence X Overall Likelihood	1-4.9	5-9.9	10-14.9	15-19.9	20-25

Positive Impact (+):

Significance	Low +	Low-Medium +	Medium +	Medium-High +	High +
Overall Consequence X Overall Likelihood	1-4.9	5-9.9	10-14.9	15-19.9	20-25

Description of the parameters used in the matrixes:

Severity:

- Low Low cost/high potential to mitigate. Impacts easily reversible, non-harmful insignificant change/deterioration or disturbance to natural environments.
- Low-medium Low cost to mitigate Small/ potentially harmful Moderate change/deterioration or disturbance to natural environment.
- Medium Substantial cost to mitigate. Potential to mitigate and potential to reverse impact. Harmful Significant change/ deterioration or disturbance to natural environment.

Medium-high	High cost to mitigate. Possible to mitigate Great/Very Harmful Very significant change/deterioration or disturbance to natural environment.
High	Prohibitive cost to mitigate. Little or no mechanism to mitigate. Irreversible. Extremely Harmful Disastrous change/deterioration or disturbance to natural environment.

Duration:

Low	Up to one month
Low-medium	One month to three months
Medium	Three months to one year
Medium-high	One to ten years
High	Beyond ten years

Extent:

Low	Footprint area
Low-medium	Pipeline route
Medium	Adjacent properties
Medium-high	Heidelberg / Nigel area
High	District

Frequency:

Low	Once/more a year or once/more during operation
Low-medium	Once/more in 6 months
Medium	Once/more a month
Medium-high	Once/more a week
High	Daily

Probability:

Low	Almost never/almost impossible
Low-medium	Very seldom/highly unlikely
Medium	Infrequent/unlikely/seldom
Medium-high	Often/Regularly/Likely/Possible
High	Daily/Highly likely/definitely

10.6 STAGES AT WHICH THE COMPETANT AUTHORITY WILL BE CONSULTED

The competent Authority will be consulted at the following stages:

- Submission of application and Consultation Scoping Report;
- Submission of Final Scoping Report;
- Submission of Consultation EIA Report;
- Submission of Final EIA Report;
- Site visit with the competent authority.

10.7 PUBLIC PARTICIPATION PROCESS DURING ENVIRONMENTAL IMPACT ASSESSMENT PROCESS

10.7.1 Newspaper advertisements

Advertisements were placed in two Newspapers, “The Heidelberg and Nigel Herald” and “The Rekord” as which covers the EIA process, Water use licensing process as well as when applying for an Air Emissions License. The public then had 30 days to register as an interested and affected party and could raise their concerns or issues regarding the proposed new activity. Proof of the publication of newspaper advertisements is included in **Appendix D**.

10.7.2 Site Notice

Site notices were placed at strategic areas alongside the three alternative routes on 5 March 2018. The site notices were in English with a description of the activity and details of the applicant and EAP.

Proof of the placement of the site notices is included in **Appendix D**.

10.7.3 Background Information Document

The background Information Documents (BID's) were either hand delivered, e-mailed or posted to the relevant land owners or neighbours to the alternative sites. The Background information documents were also sent to the following departments:

- Sedibeng District Municipality
- Lesedi Local Municipality- Ward 88
- Ekurhuleni Metropolitan Municipality
- Gauteng Department of Agriculture and Rural Development
- Department of Water and Sanitation
- Department of Roads and Transport and SANRAL
- Department of Mineral Resources
- Gauteng Department of Infrastructure Development
- Gauteng Department of Economic Development

Proof of the distribution of BID's is included in **Appendix D**.

The public participation process ran from 7 March 2018 to 10 April 2018.

10.7.4 Consultation Scoping Report

The consultation Scoping Report was submitted to all relevant departments and registered interested and affected parties for a period of 30 days to review the report and to raise concerns or issues.

The report distribution list and proof of distribution is included in **Appendix D**.

10.7.5 Issues raised and Responses

- Stander Broers Familie Trust (Varkensfontein 169 portion 22):

There is an open field available for agricultural activities. The property owner is concerned that the fuel pipeline will cross his property and minimise his potential to farm on the piece of property. If the pipeline stays next to the road the owner would not mind.

Response:

The issue was discussed telephonically: Specialist studies are conducted on all three alternative routes. The best route will be decided on when evaluating the outcome of the concerns raised by the public participation process as well as from the specialist studies and the impact assessment process.

- Spade-Reën-Sending Internasionaal - Daniel Rossouw:

The only route they do not have an issue with is route alternative 1 that is close to the R42 and away from their property. The other alternative routes will have an enormous influence on their property.

Response:

The issue and concern was noted. They are registered as an interested and affected party. Their response will be part of the decision making in the EIA process.

- Ekurhuleni Metropolitan Municipality:

Will the fuel pipelines be constructed in servitudes?

What will the safety distance be on either side of the routes when calculating the risks?

Response:

“The development of the proposed pipeline will be in an existing or newly registered servitude. The whole property, surrounding area and community will be taken into consideration during the environmental process. The heritage assessment will be more localised on the three planned routes and the ecological and wetland assessment will be focussed on a larger area surrounding the alternative routes”.

- SANRAL

No comment or objection as the activity will have no impact on a national route or interchange.

10.7.6 Scoping Report and plan of study for EIA Report

The Consultation Scoping and Plan of Study for EIA Report was available to the relevant departments and registered interested and affected parties for 30 days to review and raise any concerns.

Comments from the departments and I&APs were received during the 30 day review period and were responded to by the appointed EAP. All comments and responses are included in the Final Scoping Report and will be used to help with the determination and ranking of impacts during the entire EIA process as well as to guide in the determination of mitigation measures.

All the specialist studies which include the Air Quality assessment will be thoroughly investigated during the compilation of the EIA report for the proposed development. All identified sensitive areas, environmental impacts and recommendations from the specialists will be included in the Impact Assessment of the EIA report. The information from the specialist assessments, the impact assessment as well as the comments received during the Public Participation process will then be used to determine the best alternative route that will have the lowest impact on the surrounding environment, for the proposed construction of the bulk fuel pipelines.

The wetland assessment identified Ecological Support Areas and Critical Biodiversity Areas. The Ecological and Wetland Assessment Report stated that route 1 next to the R42 will have a low impact on the environment and will not affect wetlands and available agricultural resources.

The EIA report will discuss the proposed development in depth with the impacts related to the development on the environment. The consultation EIA report will be made available to the relevant departments and registered interested and affected parties for review for 30 days to raise any concerns or issues. The final EIA report will include the comments and response report after the consultation EIA report was available to the public for 30 days. The final EIA report will be submitted to GDARD to review and to consider for the issue of an Environmental Authorisation.

10.8 SUITABLE MEASURES TO AVOID, REVERSE, MITIGATE OR MANAGE IDENTIFIED IMPACTS AND TO DETERMINE THE EXTENT OF THE RESIDUAL RISKS THAT NEED TO BE MANAGED AND MONITORED

Measures to avoid, reverse, mitigate or manage identified impacts will be included in the Environmental Impact Assessment Report as well as in the EMPr. Important aspects to manage and mitigate will be identified in the specialist reports.

It is important to implement monitoring especially during the construction phase of the proposed activity. This will ensure that the developer is environmentally responsible in terms of NEMA.

11. UNDERTAKING BY THE ENVIRONMENTAL ASSESSMENT PRACTITIONER IN RELATION TO-

11.1 CORRECTNESS OF INFORMATION PROVIDED IN THE REPORT

The Environmental Assessment Practitioner (EAP) undertakes to ensure that all information contained in this Draft Scoping Report is factually correct and that no available information or facts have been withheld from the report. It is in the best interest of both the applicant/developer and EAP to adhere to an honest, open and correct application process.

11.2 INCLUSION OF COMMENTS AND INPUTS FROM STAKEHOLDERS AND INTERESTED AND AFFECTED PARTIES

The Environmental Assessment Practitioner undertakes to ensure that all received comments and inputs from I&AP's as well as responses from the EAP are included in all reports.

11.3 INFORMATION PROVIDED BY THE EAP TO INTERESTED AND AFFECTED PARTIES AND RESPONSE BY THE EAP TO COMMENTS OR INPUTS

The Environmental Assessment Practitioner undertakes to ensure that all the answers and reaction from the EAP to comments and inputs from I&AP's are included in all reports to be submitted. The EAP will endeavour to keep communication and correspondence with all I&APs open, honest and transparent.

12. UNDERTAKING UNDER OATH BY THE EAP IN RELATION TO THE LEVEL OF AGREEMENT BETWEEN THE EAP AND INTERESTED AND AFFECTED PARTIES ON THE PLAN OF STUDY FOR UNDERTAKING THE ENVIRONMENTAL IMPACT ASSESSMENT

The Environmental Assessment Practitioner undertakes to ensure that the plan of study for the EIA is in agreement with requirements of the Environmental Regulations, 2014 as amended and in agreement with issues and concerns mentioned by registered Interested and Affected Parties.

13. CONCLUSIONS AND RECOMMENDATIONS

The purpose of the Final Scoping Report is to provide the Gauteng Department of Agriculture and Rural Development (GDARD) with sufficient information regarding the proposed pipelines and impacts that need to be addressed during the EIA phase. This report includes the interaction between all registered Interested and Affected Parties and the EAP. The concerns lodged by the public or authorities on the Consultation Scoping Report was investigated and included in the Final Scoping Report for the Department (GDARD) to review and consider.

The GDARD is therefore respectfully requested to evaluate and comment on this report of which the comments will be included in the EIA report for approval, as part of an application that has been lodged in terms of Regulation R 984 of 4 December 2014 as amended 7 April 2017 of the National Environmental Management Act, 1998 (Act 107 of 1998)..

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Appendix A: EAP Curriculum Vitae

Appendix B: Ecological Impact and Wetland Delineation Report

Appendix C: Archaeological Impact Assessment

Appendix D: Comments and Response Report