Head Office, Pretoria

Tel: +27 (0)12 844 0306
info@techso.co.za

Box 35, Mark Shuttleworth Street, The Innovation Hub,
0087, South Africa

Suite L11, The Enterprise Building
Mark Shuttleworth Street, The Innovation Hub,
Pretoria, Gauteng, South Africa

Cape Town

Tel: +27 (0)21 557 7730
info@techso.co.za

PostNet Suite #31, Private Bag X3, Bloubergrant,
7443, South Africa

3 Arauna Road
Brackenfell
Cape Town, Western Cape, South Africa

My Ref: TJ1813
17 August 2021

Holland & Associates Environmental Consultants
PO Box 31108
Tokai
7966

Attention Ms. Nicole Holland

Dear Madam

Traffic Specialist Confirmation for the Highlands South Wind Energy Facility (WEF): Proposed Amendments to the Environmental Authorisation (DFFE REF: 14/12/16/3/3/1/1960): Addendum to the Traffic Impact Assessment dated 4 September 2018

Your Terms of Reference dated 12 June 2020, and updates to the Terms of Reference dated 15 December 2020, refer.

The relevant Traffic Specialist Assessment Report dated 4 September 2018, for the Highlands WEF, assessed Highlands South WEF with 18 Wind Turbines and associated infrastructure.

1 PROPOSED AMENDMENT

It is noted that Highlands South Wind Energy Facility (RF) (Pty) Ltd wish to increase the maximum dimensions of the Wind Turbine Generators (WTG's) for the Highlands South Wind Energy Facility (WEF), in order to align to current international WTG models. Other amendments are also proposed, including for example, the addition of a Battery Energy Storage System (BESS), and are outlined below.

The approved number of Wind Turbines is 15 and the proposed amendment is for up to 12 Wind Turbines (see Table 1 below).

Table 1: Highlands South WEF: Summary of proposed amendments to the project description

Component	Approved	Proposed amendment
Number of turbines:	Up to 15 turbines	Up to 12 turbines
Generation capacity of the WEF	Up to 90 MW	No change
Generation capacity per turbine	Up to 6 MW	Remove generation capacity per turbine
Rotor / blade diameters:	Maximum of 150 m	Maximum of 175 m
Hub height	Up to 135 m	Up to 180 m
Tip height	Up to 200 m	Up to 267.5 m
Foundation Size:	up to approximately 25 m x 25 m in total and up to 5 m deep per turbine	up to approximately 35 m x 35 m in total and up to 7 m deep per turbine
Hard Stand area per turbine:	5000 m²	6000 m²
Battery Storage	N/A (Not currently included in project description)	Battery storage technology adjacent to the substation on the temporary laydown area (with a footprint of approximately 1 ha, and a height of approximately 8 m).
Length of internal roads	approximately 50 km	approximately 45 km

In addition, the following amendments are proposed:

- Slight adjustments to the turbine positions in the preliminary approved layout are proposed, in order to minimise wake effects, as well as to avoid the proposed new blade length extending into areas identified as highly sensitive for birds and bats.
- Refinement to the proposed access roads layout (due to amendments to turbine positions and the reduction in the number of turbines at the WEF).
- Rotation of the Highlands South WEF Substation yard, to fit the proposed amended road layout.
- The proposed Battery Energy Storage System (BESS), adjacent to the substation (on the temporary laydown area), would have a footprint of approximately 1 ha, and a height of approximately 8 m.
- Removal of Condition 17.1 (relating to the requirement of an Electromagnetic Compatibility (EMC) Control Plan for acceptance by the SKA-SA, for inclusion in the Final EMPr).
- Removal of Condition 42 which states that "*The development footprint must exclude the area identified as a potential target for the protected area expansion (NPAES)".*

According to the Applicant, the proposed amendments will not result in an increase in the size of the approved development footprint for the project. (In this regard, the EA currently states the following: "Surface area to be covered (including associated infrastructure such as roads): Typically in wind energy facilities, the amount of surface area covered by turbines and associated infrastructure such as roads is less than 1% of the total site. The footprint of the facility is estimated at 51.4 ha". The development footprint with the proposed amendments would be approximately 48ha.[1]

[1] Note: The estimated 51.8ha development footprint for the authorized project includes the access roads that go through the Highlands North WEF and Highlands Central WEF to reach the Highlands South WEF. The approximately 48ha development footprint for the proposed amendment has been estimated on the same principle, i.e. the 48ha includes the access road that goes through Highlands North and Central WEFs to reach the Highlands South WEF. Therefore, if all three WEFs are constructed, the total footprint of the combined WEFs would be smaller than the sum of all three individual WEFs (given that sections of access roads would be shared).

The proposed amended Wind Turbine layout, and associated infrastructure (including road layout) is shown in the image below.

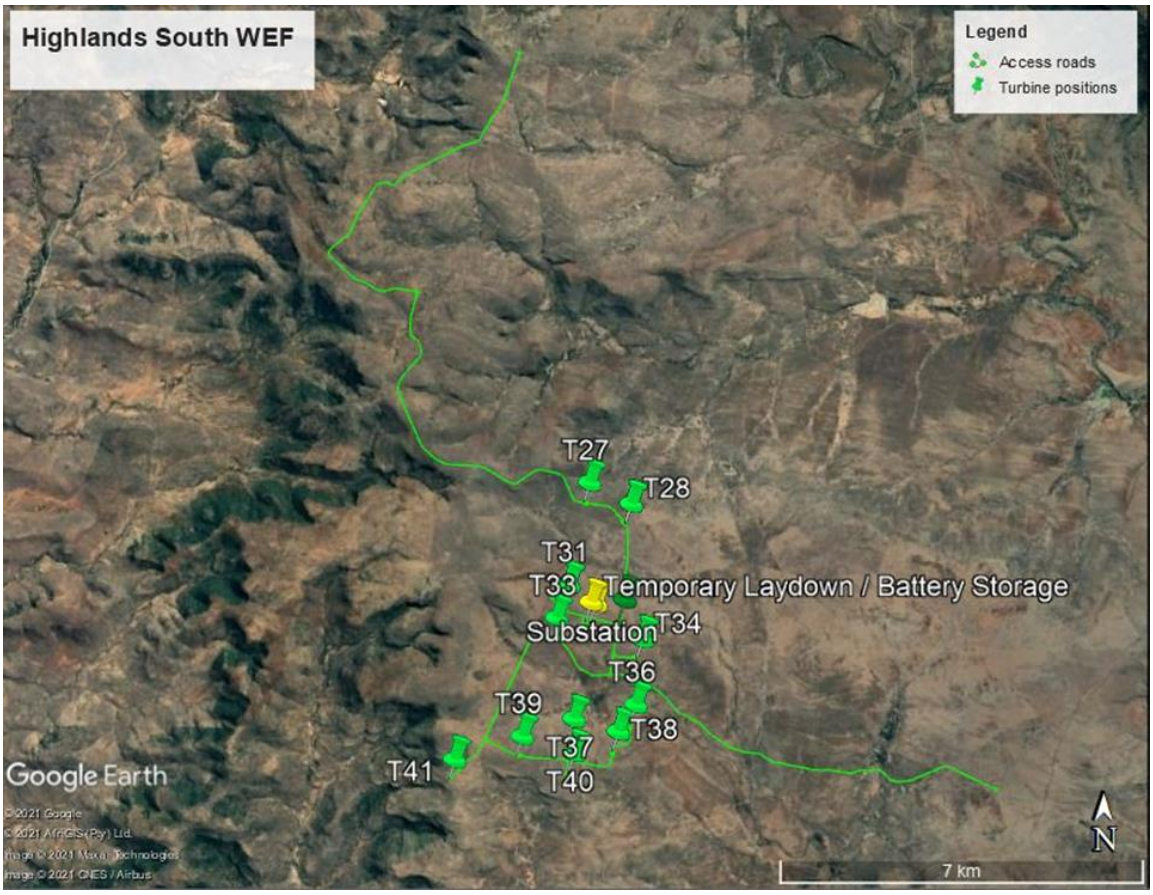

Figure 1 – Highlands South WEF Proposed Amended Layout

2 ASSESSMENT

The above (proposed amended) layout that differs from the Assessed Layout (dated 2018/05/25) as considered in the Traffic Assessment of 4 September 2018 is noted and is acceptable from a traffic impact perspective.

The Highlands South WEF with 12 Wind Turbines and associated infrastructure would generate an insignificant increase in the average number of trips per day on the road network than the originally proposed WEF comprising 18 Wind Turbines for Highlands South WEF as evaluated in the 2018 Traffic Specialist Report, and likewise compared to the approved WEF with 15 Wind Turbines, due to increase in Turbine size with larger foundations and inclusion of a Battery Energy Storage System.

The advantages of the proposed amendments are:

- There will be fewer super-load vehicle trips on the road network transporting Wind Turbine components to site.

The disadvantages of the proposed amendments are:

- Wind turbine components to be transported to site will have increased mass and spatial dimensions (i.e. longer Wind Turbine blades).

3 ENVIRONMENTAL IMPACTS

The following impacts were identified for the project lifecycle in the Traffic Assessment dated 4 September 2018:

- Construction:
  - Traffic Flow
  - Route Constraints
  - Minor Road Degradation
  - Minor Road Dust
  - Intersection Safety
- Operations:
  - Route Constraints
- Decommissioning:
  - Minor Road Degradation
  - Minor Road Dust
- Cumulative:
  - Route Constraints

It is confirmed that the proposed Amendments to the EA for the Highlands South WEF do not impact on the 4 September 2018 Traffic Specialist Report findings and recommendations. Accordingly, the proposed impact assessment ratings for the proposed amended Highlands South WEF are unchanged from the original Traffic Assessment and are shown in the Tables below for completeness.

3.1 Construction

Highlands South WEF Table – Construction – Traffic Flow

Impact Phase: Construction							
Potential impact description: Traffic congestion, impedance to traffic flow due to increase in traffic volumes.							
	Intensity	**Extent**	**Duration**	**Status**	**Probability**	**Significance**	**Confidence**
Without Mitigation	Medium	Medium	Low	Negative	Medium	Medium	Medium
With Mitigation	Medium	Medium	Low	Negative	Low	Low	Medium
Can the impact be reversed?	Yes						
Will the impact cause irreplaceable loss of resources?	No						
Can the impact be avoided, managed or mitigated?	Yes, manage and mitigate traffic						
Mitigation measures to reduce risk or enhance opportunities: Obtain and adhere to a Transport Management Plan to: • Ensure safe transport of materials, equipment, etc. to site; • Optimise route selection and time of travel; • Co-ordinate traffic law-enforcement and transport to site.							

Rationale for scoring as shown in the table above.

Extent: Medium due to vehicle travel on National and Regional Routes in the Eastern Cape only.

Duration: Low due to build period less than 5 years.

Intensity: Medium due to risk of serious crashes.

Highlands South WEF Table – Construction – Route Constraints

Impact Phase: Construction							
Potential impact description: Constraints for large vehicles en-route to site could result in unacceptable traffic impact (safety and congestion). Abnormally long, low or high vehicles will experience constraints along the chosen route, i.e. inadequate space to accommodate turning movements at some intersection and interchange ramps, N10 Olifantskop Pass horizontal alignment inadequate for very long vehicles (transporting turbine blades), low rail over road bridge at Cookhouse with road in a vertical dip, restricted turning space on R63 in Somerset East, low speed road design on minor roads could be problematic for very low vehicles, no suitable roads on-site to access Wind Turbine locations.							
	Intensity	**Extent**	**Duration**	**Status**	**Probability**	**Significance**	**Confidence**
Without Mitigation	High	Medium	Low	Negative	High	Medium	High
With Mitigation	Low	Medium	Low	Negative	Low	Low	High
Can the impact be reversed?	Yes						
Will the impact cause irreplaceable loss of resources?	No						
Can the impact be avoided, managed or mitigated?	Yes, impacts can be managed and mitigated						
Mitigation measures to reduce risk or enhance opportunities: Prepare a Transport Management Plan to: • Ensure safe transport of materials, equipment, etc. to site; • Optimise route selection and time of travel; • Co-ordinate traffic law-enforcement and transport to site; • Design on-site roads to facilitate access to laydown areas, substations and wind turbines; • Conduct a dry-run prior to implementation of the Transport Management Plan.							

Rationale for scoring as shown in the table above.

Extent: Medium due to vehicle travel on National and Regional Routes in the Eastern Cape only.

Duration: Low due to build period less than 5 years.

Intensity: High due to risk of fatal crashes. Low due to risk of minor damage crashes.

Highlands South WEF Table – Construction – Minor Road Degradation

Impact Phase: Construction							
Potential impact description: Deterioration of gravel Minor Roads. Additional heavy traffic on Minor roads could degrade the existing road pavement.							
	Intensity	**Extent**	**Duration**	**Status**	**Probability**	**Significance**	**Confidence**
Without Mitigation	Medium	Low	Low	Negative	Medium	Medium	Medium
With Mitigation	Low	Low	Low	Negative	Low	Low	Medium
Can the impact be reversed?	Yes						
Will the impact cause irreplaceable loss of resources?	No						

Can the impact be avoided, managed or mitigated?	Yes, impacts can be managed and mitigated
Mitigation measures to reduce risk or enhance opportunities: Carry out regular maintenance of the road to ensure that its condition is maintained or improved: • Document condition of gravel roads prior to construction. • Upgrade gravel roads to suitable condition for proposed construction vehicles. • Ensure that the minor road is left in a better condition post-construction.	

Rationale for scoring as shown in the table above.

Extent: Low due to vehicle travel on two Minor Roads only.

Duration: Low due to build period less than 5 years.

Intensity: Medium due to risk of serious damage and injury crashes. Low due to risk of minor damage crashes.

Highlands South WEF Table – Construction – Minor Road Dust

Impact Phase: Construction							
Potential impact description: Additional traffic on gravel Minor Roads will result in more dust that reduces visibility and increases potential for crashes on the Minor Roads.							
	Intensity	**Extent**	**Duration**	**Status**	**Probability**	**Significance**	**Confidence**
Without Mitigation	High	Low	Low	Negative	Medium	Medium	Medium
With Mitigation	Low	Low	Low	Negative	Low	Low	Medium
Can the impact be reversed?	Yes						
Will the impact cause irreplaceable loss of resources?	No						
Can the impact be avoided, managed or mitigated?	Yes, impacts can be managed and mitigated						
Mitigation measures to reduce risk or enhance opportunities: Reduce travel speed on gravel road to reduce dust: • Post speed restriction signage for construction vehicles on minor roads.							

Rationale for scoring as shown in the table above.

Extent: Low due to dust risk only on Minor Roads.

Duration: Low due to build period less than 5 years.

Intensity: High due to risk of fatal crashes. Low due to risk of minor damage crashes.

Highlands South WEF Table – Construction – Intersection Road Safety

Impact Phase: Construction							
Potential impact description: Additional traffic at the Minor Road M00412 intersection with the R63 increases chances of vehicle crashes.							
	Intensity	**Extent**	**Duration**	**Status**	**Probability**	**Significance**	**Confidence**
Without Mitigation	High	Low	Low	Negative	Medium	Medium	Medium
With Mitigation	High	Low	Low	Negative	Low	Low	Medium
Can the impact be reversed?			Yes				
Will the impact cause irreplaceable loss of resources?			No				
Can the impact be avoided, managed or mitigated?			Yes, impacts can be managed and mitigated				
Mitigation measures to reduce risk or enhance opportunities: Alert motorists to construction traffic at the access: • Place warning construction vehicle signage on the R63 on each approach to Minor Road M00412. • Ensure that all construction vehicles are roadworthy • Ensure that all construction vehicles have appropriate drivers licence.							

Rationale for scoring as shown in the table above.

Extent: Low due to single site location at intersection of R63 and Minor Road MN00412

Duration: Low due to build period less than 5 years.

Intensity: High due to risk of fatal crashes.

3.2 Operations

Highlands South WEF Table – Operations – Route Constraints

Impact Phase: Operations							
Potential impact description: Constraints for large maintenance related vehicles en-route to site could result in unacceptable traffic impact (safety and congestion). Abnormally long, low or high vehicles will experience constraints along the chosen route, i.e. inadequate space to accommodate turning movements at some intersection and interchange ramps, Olifantskop pass horizontal alignment inadequate for very long vehicles (transporting turbine blades), restricted turning space on R63 in Somerset East, low rail over road bridge at Cookhouse with road in a vertical dip, low speed road design on minor roads could be problematic for very low vehicles.							
	Intensity	**Extent**	**Duration**	**Status**	**Probability**	**Significance**	**Confidence**
Without Mitigation	High	Medium	Low	Negative	Medium	Medium	High
With Mitigation	Low	Medium	Low	Negative	Low	Low	High
Can the impact be reversed?			Yes				
Will the impact cause irreplaceable loss of resources?			No				

Can the impact be avoided, managed or mitigated?	Yes, impacts can be managed and mitigated
Mitigation measures to reduce risk or enhance opportunities: Refer to Transport Management Plan to: • Ensure safe transport of materials, equipment, etc. to site; • Optimise route selection and time of travel; • Co-ordinate traffic law-enforcement and transport to site.	

Rationale for scoring as shown in the table above.

Extent: Medium due to vehicle travel on National and Regional Routes in the Eastern Cape only.

Duration: Low due to build period less than 5 years.

Intensity: High due to risk of fatal crashes. Low due to risk of minor damage crashes.

3.3 Decommissioning

Highlands South WEF Table – Decommissioning – Minor Road Degradation

Impact Phase: Decommissioning							
Potential impact description: Deterioration of gravel Minor Roads. Additional heavy traffic on Minor roads could degrade the existing road pavement.							
	Intensity	**Extent**	**Duration**	**Status**	**Probability**	**Significance**	**Confidence**
Without Mitigation	Medium	Low	Low	Negative	Medium	Medium	Medium
With Mitigation	Low	Low	Low	Negative	Low	Low	Medium
Can the impact be reversed?			Yes				
Will the impact cause irreplaceable loss of resources?			No				
Can the impact be avoided, managed or mitigated?			Yes, impacts can be managed and mitigated				
Mitigation measures to reduce risk or enhance opportunities: Carry out regular maintenance of the road to ensure that its condition is maintained or improved: • Document condition of gravel roads prior to construction. • Upgrade gravel roads to suitable condition for proposed construction vehicles. • Ensure that the minor road is left in a better condition post-construction.							

Rationale for scoring as shown in the table above.

Extent: Low due to vehicle travel on two Minor Roads only.

Duration: Low due to build period less than 5 years.

Intensity: Medium due to risk of serious crashes. Low due to risk of minor damage crashes.

Highlands South WEF Table – Decommissioning – Minor Road Dust

Impact Phase: Decommissioning							
Potential impact description: Additional traffic on gravel Minor Roads will result in more dust, that reduces visibility and increases potential for crashes on the Minor Roads.							
	Intensity	**Extent**	**Duration**	**Status**	**Probability**	**Significance**	**Confidence**
Without Mitigation	High	Low	Low	Negative	Medium	Medium	Medium
With Mitigation	Low	Low	Low	Negative	Low	Low	Medium
Can the impact be reversed?	Yes						
Will the impact cause irreplaceable loss of resources?	No						
Can the impact be avoided, managed or mitigated?	Yes, impacts can be managed and mitigated						
Mitigation measures to reduce risk or enhance opportunities: Reduce travel speed on gravel road to reduce dust: • Post speed restriction signage for construction vehicles on minor roads.							

Rationale for scoring as shown in the table above.

Extent: Low due to dust risk only on Minor Roads.

Duration: Low due to build period less than 5 years.

Intensity: High due to risk of fatal crashes. Low due to risk of minor damage crashes.

3.4 Cumulative Impacts

The Table below shows a list of similar projects within 35 km radius of the Highlands South WEF, as considered in the Traffic Assessment Specialist Report dated 4 September 2018.

DEA_REF	PROJ_TITLE	APP_RECEIV	TECHNOLOGY	MEGAWATT	PROJ_STATU
12/12/20/2361	Proposed Construction Of A 10mw Photovoltaic (Pv) Solar Farm In Pearston, Blue Crane Route Municipality, Eastern Cape Province	2011/07/21	Solar PV	10	Approved
12/12/20/2635	The Construction Of A Second 10 Mw Photovoltaic Solar Farm In Pearston In The Blue Crane Route Municipality, Erf 468-Portion Of The Pearson Municipal Commonage, Eastern Cape Province	2011/11/01	Solar PV	55	Approved
12/12/20/2657	Proposed Construction And Operation Of A 55MW Photovolytaic Solar Farm And Associated Infrastructure On Portion 2 Of The Farm Kraan Vogel Kuil No.50, Pearston, Eastern Cape Province	2013/07/16	Solar PV	55	Approved
14/12/16/3/3/2/372	Proposed Middleton wind energyproject Blue Crane Route Municipality Eastern Cape province	2013/01/25	Onshore Wind	140	In process
12/12/20/2657/AM1	Proposed Construction And Operation Of A 55MW Photovolytaic Solar Farm And Associated Infrastructure On Portion 2 Of The Farm Kraan Vogel Kuil No.50, Pearston, Eastern Cape Province	2013/07/16	No Technology	55	Approved
12/12/20/2657/AM2	Proposed Construction And Operation Of A 55MW Photovolytaic Solar Farm And Associated Infrastructure On Portion 2 Of The Farm Kraan Vogel Kuil No.50, Pearston, Eastern Cape Province	2016/03/29	No Technology	55	Approved

Note: *Highlands Central WEF and Highlands North WEF are excluded from the Table. They are discussed below.*

The Highlands Central WEF and Highlands North WEF and their associated infrastructure are not expected to generate a significant number of trips.

From the table above, all approved projects are in the Pearston Area. It could be assumed that these projects might be completed before the Highlands South WEF is approved and constructed, judging by the approvals process timelines.

As a worst-case scenario, it is assumed that all these developments could be constructed simultaneously. It is possible that this could coincide with the Highlands South WEF abnormal load trips to site, along the N2 and N10.

These cumulative impacts are considered below.

Highlands South WEF Table – Cumulative – Route Constraints

Impact Phase: Construction							
Potential impact description: Constraints for large vehicles en-route to site could result in unacceptable traffic impact (safety and congestion). Abnormally long, low or high vehicles will experience constraints along the chosen route, i.e. inadequate space to accommodate turning movements at some intersection and interchange ramps, N10 Olifantskop Pass horizontal alignment inadequate for very long vehicles (transporting turbine blades).							
	Intensity	**Extent**	**Duration**	**Status**	**Probability**	**Significance**	**Confidence**
Without Mitigation	High	Medium	Low	Negative	High	Medium	High
With Mitigation	Low	Medium	Low	Negative	Low	Low	High
Can the impact be reversed?	Yes						
Will the impact cause irreplaceable loss of resources?	No						
Can the impact be avoided, managed or mitigated?	Yes, impacts can be managed and mitigated						
Mitigation measures to reduce risk or enhance opportunities: Prepare a Transport Management Plan to: • Where possible co-ordinate safe transport of materials, equipment, etc. to site, most particularly through the N10 Olifantskop Pass; • Co-ordinate traffic law-enforcement and transport to site.							

Rationale for scoring as shown in the table above.

Extent: Medium due to vehicle travel on National and Regional Routes in the Eastern Cape only.

Duration: Low due to build period less than 5 years.

Intensity: High due to risk of fatal crashes. Low due to risk of minor damage crashes.

4 CONCLUSION

The proposed amendments to the Environmental Authorisation do not trigger any new impact to the traffic and transportation on site and to and from, and no further recommendations or mitigation measures to those outlined in the Traffic Assessment dated 4 September 2018 are required. The proposed amendments therefore will not result in any significant increased level or change in the nature of traffic impacts. Based on the further assessment and original Traffic Specialist Report, the amendment can be granted to the applicant.

Yours Sincerely

Stephen Fautley
for Techso (Pty) Ltd

Annexure A – Site Verification Report

I hereby confirm that the site sensitivity verification as per the Traffic Specialist Report by Techso (Pty) Ltd, dated 4 September 2018 for the Highlands South WEF has been undertaken through the use of:

(a) a desk top analysis, using satellite imagery (google earth). This was to determine site and route spatial aspects / conditions;

(b) a preliminary on-site inspection. This was conducted on 26 July 2018 to assess possible routes to site and to gain insight to possible issues and constraints along the various routes, from Ngqura (also known as Coega) Harbour (point of origin in South Africa for Wind Turbine components) to the proposed Highlands South WEF site (destination), and to assess the roadside and site environment from a transport (route capacity and road safety) perspective.

(c) other available and relevant information was also sourced, such as South African National Road Authority Limited (SANRAL) Traffic Count Database. This was done to obtain background traffic flows required in assessment of traffic impact on road capacity, from origin to destination, for the transport of Wind Turbine components.

The development of the Highlands South WEF and associated infrastructure will not have undue detrimental impact on traffic, further statements and mitigation measures as assessed are recorded in the Traffic Specialist Report dated 4 September 2018.

Annexure B - Curriculum Vitae

CURRICULUM VITAE **STEPHEN FAUTLEY**

Surname	Fautley
Christian names	Stephen Mark
Identity number	6107 1551 75 083
Date of Birth	15 July 1961
Nationality	South African
Profession	Traffic Engineer
Years' experience	34

KEY QUALIFICATIONS

Stephen Fautley Stephen is a traffic engineering technologist with over 30 years of experience in traffic and transportation engineering. He has completed the Transportation Planning and Study Methodology course and the Highway Capacity course at the University of Stellenbosch. Stephen has been involved with civil, traffic and transportation engineering for ten (10) years at Provincial Government of the Western Cape, 18 months with Kantey and Templer Consulting Engineers and 10 years at local authority/city level and joined Techso in August 2008

Countries of work experience include South Africa, Namibia and Mozambique.

CAREER SUMMARY

2008 – Date	Senior Transportation Engineer, Techso
2006 – 2008	Regional Head, Traffic Impact Assessments and Development Control, City of Cape Town
1998 – 2006:	Principal Technician: Traffic Engineering, City of Cape Town
1997 – 1998:	Senior Technician, Kantey and Templer
1995 – 1996:	Chief Industrial Technician, Urban Transportation: Provincial Government: Western Cape
1994 – 1995:	Chief Industrial Technician Regional Services: Provincial Government: Western Cape
1993 – 1994:	Chief Industrial Technician: Mapping and Proclamations: Provincial Government: Western Cape
1986– 1992:	Principal Industrial and (1986 -1991) Industrial Technician: Geometric Design: Provincial Administration: Western Cape

PROFESSIONAL EXPERIENCE

Key Experience

- Transportation Planning
- Traffic Engineering
- Road Safety Audits

Development of Public Transport Safety Plan (*2017 – 2018*) – Input to rail safety section in the development

[redacted]

- Msunduzi Municipality
- Ubehlebezwe Municipality
- Mandeni Municipality
- Hibiscus Municipality
- Howick Municipality
- Ethekweni Municipality

Contract 24G/2009/10 IRT AFC - City of Cape Town - Integrated Rapid Transport - sub-consultant review and design of intersection and traffic signals for Cape Town Integrated Rapid Transport (2009)

PV Solar Plant at ACSA George - Traffic Impact Statement for the proposed PV Solar Plant at Airport Company South Africa (ACSA) George Airport (2015). The report dealt with building in the Road Building Line (Roads and Ribbon Development Act, Act 21 of 1940) and also included assessment of Hazardous Solar Glare Analysis impact on Road Users.

City of Cape Town - Integrated Rapid Transit Phase 1B – Conduct Stage 3 Road Safety Audits on a number of sites as below (2015):

- Koeberg Road / Royal Road Intersection in Maitland
- Koeberg Road / Loxton Road Intersection in Milnerton
- Koeberg Road / Boundary Road Intersection in Milnerton
- Koeberg Road / Ysterplaat Primary School in Ysterplaat
- Koeberg Road / Section Street Intersection in Brooklyn

City of Cape Town - Integrated Rapid Transit Phase 1B – Conduct a Stage 3 Road Safety Audit on R27 Reversible Bus Lane (2016).

City of Cape Town - Integrated Rapid Transit Phase 1B – Conduct Stage 6 Road Safety Audits (Road Safety Appraisals) on a number of sites as below (2018):

- Koeberg Road / Royal Road Intersection in Maitland
- Koeberg Road / Loxton Road Intersection in Milnerton
- Koeberg Road / Boundary Road Intersection in Milnerton
- Koeberg Road / Ysterplaat Primary School in Ysterplaat
- Koeberg Road / Section Street Intersection in Brooklyn

SANRAL Project No. NRA: N.001-290-2017/1F for the rehabilitation of National Route 1 Section 29 from Masekwaspoort (km 27.80) to km 70 in Limpopo - SANRAL - Conduct a Stage 6 (Appraisal) Road Safety Audit (2017)

SANRAL Project No. NRA: N.001-290-2017/1F for the rehabilitation of National Route 1 Section 29 from Masekwaspoort (km 27.80) to km 70 in Limpopo - SANRAL - Conduct a Stage 1 (Prelim Design) Road Safety Audit (2018)

Outdoor Advertising Applications – Provided input and assistance to client applications for outdoor advertising signage on sites as below (2017):

- Application for 3rd Party Billboard Sign on Erven 24622 & 24623, Maitland
- Application for 3rd party flat sign on Erf 10118, 50 Riebeeck St, Cape Town
- Application for 3rd Party Billboard on Erf 2849 Brackenfell High School

Traffic Management Plan - R21/2 in Gauteng – SANRAL - compile a Traffic Management Plan for the proposed closure of the national road R21 north and southbound between km 0.00 at the R562 Olifantsfontein interchange and km 12.8 at the M31 Nellmapius interchange for the maintenance of overhead power lines (2017).

Traffic Engineering Specialist Reports for Environmental Impact Assessments: Input to Various Environmental Impact Assessment (residential developments, solar, wind renewable energy plants, power stations, mines, industrial sites). These include Environmental Risk Impact Assessment from a traffic and transportation perspective (2016 to date).

- Paulputs CSP Project near Pofadder

- Farm Scuitdrift 426 near Augrabies, Northern Cape
- Noupoort CSP Northern Cape Desktop traffic study
- CCGT power plant in Richards Bay Traffic Scoping Report
- 100 MW Orkney Solar Farm, Northern Cape
- Castle (Mulilo) Tower Batching Plant near De Aar
- Mutso Coal Power Plant near Makhado in Limpopo Province
- Paulputs Wind Energy Farm near Pofadder
- Solar PV Plant in Wildebeestekuil in NorthWest Province
- Solar PV Plant in Leeuwbosch in North West Province
- Highlands Wind Energy Farm in Somerset East

Outdoor Advertising Signage Audit - Audit of 3rd party advertising signage encroachment in road reserve in Cape Town CBD, and key roads in Bellville, Parow Goodwood, Woodstock, Salt River and Sea Point (June 2015 – Dec 2015)

TIA for Prime Ministers Offices in Windhoek - Develop a PTV Transportation Model and compile Traffic Impact Statement (TIA) for the proposed Prime Minister office in Windhoek (Feb 2013 – April 2013)

The Nest Student Housing (570 beds) - Compile Traffic Impact Assessment Report for the proposed student residence (and commercial shops) on Erf 31993 in Rondebosch. (Feb 2014 – June 2014)

Campuskey Student Housing (536 beds) - Compile Traffic Impact Assessment Report for the proposed student residence in Rondebosch. (July 2016 – Sept 2016)

Rhodes Square Student Housing (600 beds) - Compile Traffic Impact Assessment Report for the proposed student residence (for various design proposals) on Erf 31990 in Mowbray and propose new traffic signal timing (Jan 2016 – May 2016)

Traffic Impact Assessment for PMR 189 / PMR 205 intersection in Paarl - Assessed Non-motorised Transport, Public Transport activity and conduct traffic counts and vehicle delay studies to determine warrants for traffic signal installation and compile TIA. (Feb 2016 – April 2016)

TIA and Traffic Eng Input to Netcare Hospital and Gym –- June 2016Provide traffic engineering input to building parking, access, ramps, etc. and compile Traffic Impact Assessment reports for the new Netcare Hospital (and Gym) located in the City of Cape Town. Assess City Precinct network trips and traffic impact and City precinct traffic signal upgrading requirements. (Jan 2014 – June 2016)

Traffic Impact Assessment for PMR 189 Paarl - Compile Traffic Impact Assessment evaluating various signalised and unsignalized intersection on PMR 189 in Paarl area in view of a substantially large Val da Vie residential development and other recently approved developments in the area. The TIA viewed collective development impact over an extended period of time, as requested by the WCG. (May 2017 - June 2017)

TIS Panorama Primary School in Riversdale – Compile Traffic Impact Statement (TIS) for redevelopment of school considering park, access, traffic and scholar safety on roads around the school (July 2017 to Sept 2017)

Jones Pre-School Somerset West - Compile TIS considering parking and traffic impact on traffic signals and access for development application for private pre-school (Sept 2017 – Nov 2017)

Wallacedene EHP incremental Development Area Housing - Compile TIS – Wallacedene EHP (Emergency Housing Project in Wallacedene) for 318 units (Jan 2018 - May 2018)

Drakenstein UISP Housing - Compile TIS and Traffic Engineering Services – Drakenstein Upgrade of Informal Settlements Programme (UISP) in Paarl for 654 units (May 2018 – Nov 2018)

TIS for Erf 2326 in Table View - Compile TIS considering scholar NMT safety, parking and traffic impact in area surrounding site and Table View Primary School in support of application for consent use for Early Childhood Development Centre. (March 2019 – May 2019)

TIA for Charlesville Residential Housing - Undertook traffic counts, intersection analysis, and compiled TIA. (Oct 2019 – Dec 2019)

TIS for rezoning Erf 5236 Strand - Compile TIS considering parking and traffic impact for rezoning application for mixed use in Urban Environment (Feb 2019 – March 2019)

Traffic Specialist Study for Environmental Impact Basic Assessment – Azalea Residential Flats on Erf 46 and Erf 47 in Bantry Bay - Compile Traffic Specialist Report as input to Basic Assessment for Environmental Impact Assessment application (July 2020 – Aug 2020)

Symphony Way UISP Housing Tender 201C/2016/17 - Symphony Way UISP (Upgrading Informal Settlement Programme) Housing in Philippi for 3000 units. Provide traffic engineering input to road planning and Site Development Framework, undertook Traffic counts, compile TIA considering traffic, propose traffic signal design and intersection upgrading for 7 intersections, consider NMT, public transport and road safety for the project. (Aug 2018 – Dec 2020)

Stage 6 Road Safety Appraisal – NMT Paul Roux - Road Safety Audit Team Leader - Conduct Road Safety Appraisal for the improvement of pedestrian facilities on National Route 5 Section 3 Paul Roux as input to the road design. (Nov 2020 – Jan 2021)

Traffic Impact Assessment for PMR 191 / Val de Vie Access Link Road intersection in Paarl - Assessed background traffic studies, determine appropriate growth factors, undertook intersection analysis for signals and traffic roundabout configurations for various horizon years, recommend intersection design. (Feb 2021)

Other

City of Cape Town Multi-Function Transport Management Centre (2011) **-** Development of a Facility Management Plan for the City of Cape Town Transport Management Centre. This included facility safety and security measures and protocols.

City of Cape Town Multi-Function Electricity Headquarters (2013) **-** Development of a Facility Management Plan for the City of Cape Town Electricity Headquarters. This included facility safety and security measures and protocols.

Traffic Impact Assessments and Traffic Impact Statements (2009 – date) **-** Commercial and Residential Developments, Schools, Gym, Hospital, Service Stations, Sand-mines, Housing developments. Many of these projects include traffic engineering and road safety aspects.

ACADEMIC QUALIFICATIONS

1989 National Higher Diploma (Civil Engineering), Cape Technikon, South Africa

PROFESSIONAL ASSOCIATIONS

Engineering Council of South Africa (ECSA) (Professional Engineer No. 200270171)
South African Institution for Civil Engineering (Member - 201500599)

LANGUAGE PROFICIENCY

	Reading	Writing	Speaking
English	Excellent	Excellent	Fluent

Mr SM Fautley — Signature — 05/03/2021
Name of Expert — Date

Annexure C – Specialist Declaration

environmental affairs
Department:
Environmental Affairs
REPUBLIC OF SOUTH AFRICA

DETAILS OF THE SPECIALIST, DECLARATION OF INTEREST AND UNDERTAKING UNDER OATH

	(For official use only)
File Reference Number:	
NEAS Reference Number:	DEA/EIA/
Date Received:	

Application for authorisation in terms of the National Environmental Management Act, Act No. 107 of 1998, as amended and the Environmental Impact Assessment (EIA) Regulations, 2014, as amended (the Regulations)

PROJECT TITLE

PROPOSED HIGHLANDS SOUTH WIND ENERGY FACILITY AND ASSOCIATED INFRASTRUCTURE NEAR SOMERSET EAST IN THE EASTERN CAPE PROVINCE: APPLICATION FOR AMENDMENT OF THE ENVIRONMENTAL AUTHORISATION

Kindly note the following:

1. This form must always be used for applications that must be subjected to Basic Assessment or Scoping & Environmental Impact Reporting where this Department is the Competent Authority.
2. This form is current as of 01 September 2018. It is the responsibility of the Applicant / Environmental Assessment Practitioner (EAP) to ascertain whether subsequent versions of the form have been published or produced by the Competent Authority. The latest available Departmental templates are available at https://www.environment.gov.za/documents/forms.
3. A copy of this form containing original signatures must be appended to all Draft and Final Reports submitted to the department for consideration.
4. All documentation delivered to the physical address contained in this form must be delivered during the official Departmental Officer Hours which is visible on the Departmental gate.
5. All EIA related documents (includes application forms, reports or any EIA related submissions) that are faxed; emailed; delivered to Security or placed in the Departmental Tender Box will not be accepted, only hardcopy submissions are accepted.

Departmental Details

Postal address:
Department of Environmental Affairs
Attention: Chief Director: Integrated Environmental Authorisations
Private Bag X447
Pretoria
0001

Physical address:
Department of Environmental Affairs
Attention: Chief Director: Integrated Environmental Authorisations
Environment House
473 Steve Biko Road
Arcadia

Queries must be directed to the Directorate: Coordination, Strategic Planning and Support at:
Email: EIAAdmin@environment.gov.za

1. SPECIALIST INFORMATION

Specialist Company Name:	Techso (Pty) Ltd			
B-BBEE	Contribution level (indicate 1 to 8 or non-compliant)	2	Percentage Procurement recognition	18
Specialist name:	Stephen Fautley			
Specialist Qualifications:	National Higher Diploma			
Professional affiliation/registration:	Engineering Council of South Africa (ECSA) 200270171			
Physical address:	13 Riverside Drive, Milnerton			
Postal address:	13 Riverside Drive, Milnerton			
Postal code:	7441	Cell:	0843007722	
Telephone:	021 - 5577730	Fax:	-	
E-mail:	steve@techso.co.za			

2. DECLARATION BY THE SPECIALIST

I, _____Stephen Mark Fautley_____, declare that –

- I act as the independent specialist in this application;
- I will perform the work relating to the application in an objective manner, even if this results in views and findings that are not favourable to the applicant;
- I declare that there are no circumstances that may compromise my objectivity in performing such work;
- I have expertise in conducting the specialist report relevant to this application, including knowledge of the Act, Regulations and any guidelines that have relevance to the proposed activity;
- I will comply with the Act, Regulations and all other applicable legislation;
- I have no, and will not engage in, conflicting interests in the undertaking of the activity;
- I undertake to disclose to the applicant and the competent authority all material information in my possession that reasonably has or may have the potential of influencing - any decision to be taken with respect to the application by the competent authority; and - the objectivity of any report, plan or document to be prepared by myself for submission to the competent authority;
- all the particulars furnished by me in this form are true and correct; and
- I realise that a false declaration is an offence in terms of regulation 48 and is punishable in terms of section 24F of the Act.

Signature of the Specialist

Techso (Pty) Ltd

Name of Company:

24 May 2021

Date

3. UNDERTAKING UNDER OATH/ AFFIRMATION

I, _____Stephen Mark Fautley_____, swear under oath / affirm that all the information submitted or to be submitted for the purposes of this application is true and correct.

Signature of the Specialist

Techso (Pty) Ltd

Name of Company

24 / May 2021

Date

Signature of the Commissioner of Oaths

24/5/2021

Date

Pauline Fautley
Commissioner of Oaths (RSA)
Accounting Officer A0651439
Ad: 13 Riverside Drive, Milnerton, 7441
Tel: 021 555 2077