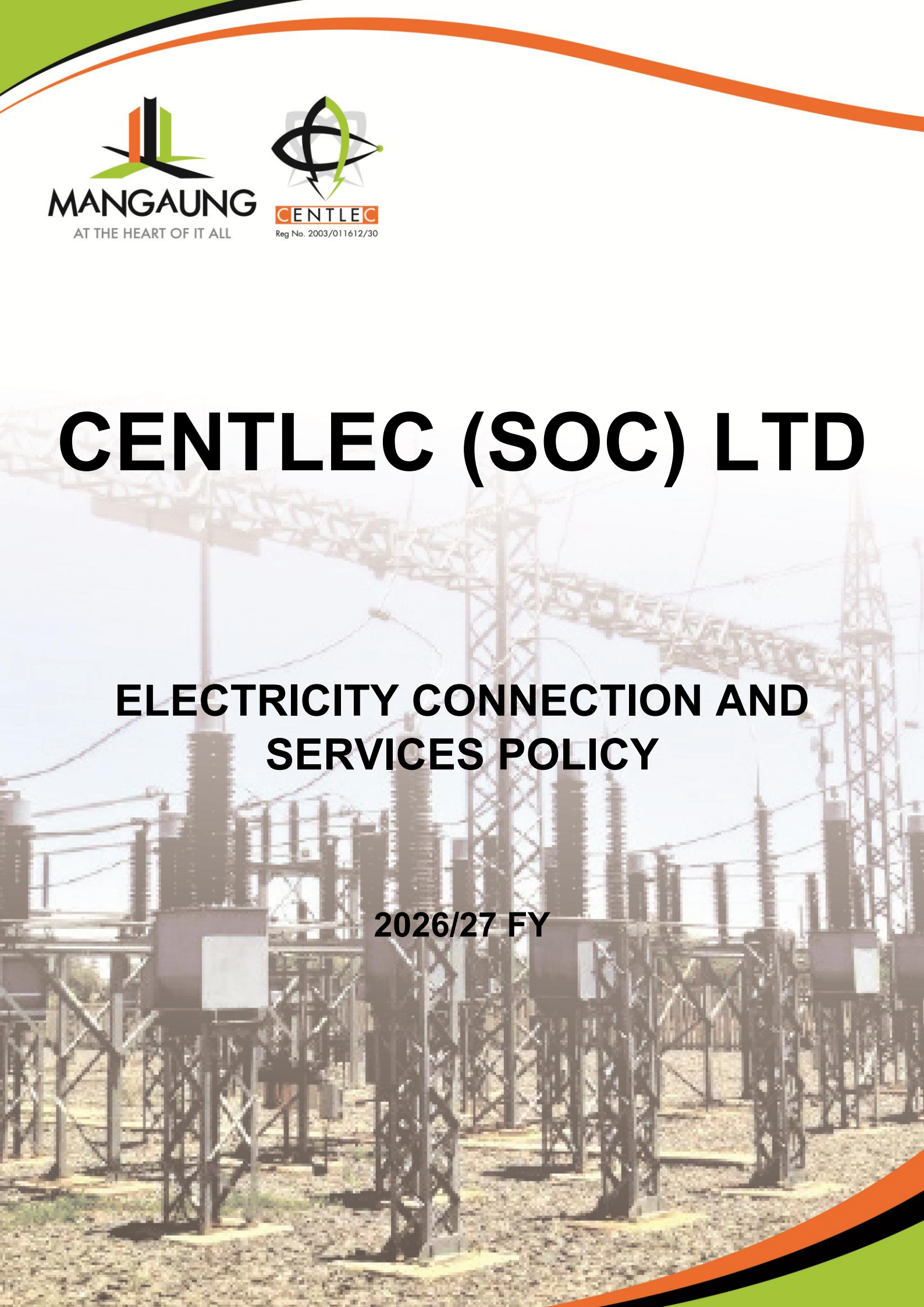
MANGAUNG
AT THE HEART OF IT ALL

CENTLEC
Reg No. 2003/011612/30

CENTLEC (SOC) LTD

ELECTRICITY CONNECTION AND SERVICES POLICY

2026/27 FY



Contents

1 PURPOSE 3
2 SCOPE 3
3 DEFINITIONS 3
4 GENERAL GUIDELINES FOR ALL SERVICE CONNECTIONS 6
5 REGULATION OF ELECTRICITY RESELLERS 10
6 DOMESTIC CONNECTIONS – URBAN 13
7 ADDITIONAL METERING: 15
7.1 DOMESTIC 15
7.2 STUDENT HOUSING 16
8 SUBDIVISION OF ERVEN – URBAN AND PERI-URBAN 18
9 RELOCATING METERS TO THE STAND BOUNDARY: DOMESTIC 19
10 CONVERSIONS OF METERS: DOMESTIC 20
11 UPGRADE OF CONNECTIONS 21
12 THREE PHASE DOMESTIC CONNECTIONS – URBAN 22
13 DOMESTIC CONNECTIONS: PERI-URBAN AREAS 25
14 NEW SINGLE-PHASE TIME OF USE (TOU) METER 26
15 NEW THREE-PHASE DOMESTIC CONNECTION - PERI-URBAN 26
16 THREE PHASE PREPAID METER – PERI-URBAN 27
17 HIGH-DENSITY HOUSING DEVELOPMENT 28
18 BULK SUPPLY CONNECTIONS 31
19 DOWNGRADING OF CONNECTION SIZE 33
20 TEMPORARY CONNECTION 33
21 REMOVAL OF ELECTRICAL SERVICES 36
22 POWER FACTOR CORRECTION 36
23 REFUNDING CONNECTION FEES 37
24 ALLOCATING PADLOCKS AND ISSUING KEYS 37
21 SMALL SCALE EMBEDDED GENERATION (SSEG) 38

1 PURPOSE

To set guidelines for internal and external stakeholders concerning applications, quotations, and construction of the electrical services.

2 SCOPE

The policy covers all the electrical connection services required by consumers within CENTLEC (SOC) Ltd (hereafter, referred to as CENTLEC), area of supply. To establish a common base for different customers during the application, payment, and implementation stages of the delivery of the connection point (Point of supply).

3 DEFINITIONS

All definitions as set out in the Electrical Installation Regulations of the Occupational Health and Safety Act (Act 85 of 1993), as amended, also apply to this policy. For this policy, the most general definitions of the OHS Act as well as other relevant definitions are stated below.

“approved inspection authority for electrical installations”
means a person or body approved by the chief inspector in terms of regulation 5 to carry out inspections, tests, and investigations on electrical installations.

“electrical certificate of compliance”

means a certificate, with a unique number obtainable from the chief inspector, in the form of annexure 4 *(not included in this document)* and issued by a registered person in respect of an electrical installation or part of any electrical installation or a certificate of compliance issued under the Electrical Installation Regulations, 1992.

“consumer tariff”

means the approved listed tariffs authorized by the Municipal Council, applicable to the consumption of electricity and chargeable to customers as specified in the license issued by the NERSA in terms of the Electricity Regulations Act of 2006.

“**electrical contractor”**

means a person who undertakes to perform electrical installation work on behalf of any other person but excludes an employee of such first-mentioned person.

“electrical installation”

means any machinery, in or on any premises, used for the transmission of electricity from the point of control to a point of consumption anywhere on the premises, including any article forming part of such an installation irrespective of whether or not it is part of the electrical circuit, but excluding –

a) any machinery of the supplier related to the supply of electricity on the premises;
b) any machinery that transmits electrical energy in telecommunication, television, or radio circuits;
c) an electrical installation on a vehicle, vessel, train, or aircraft.

“electrical tester for single-phase”

means a person who has been registered as an electrical tester for a single-phase in terms of regulation 13, Electrical Installation Regulations (EIR), and who has been approved by the Chief Inspector for the verification and certification of the construction, testing, and inspection of electrical installations supplied with a single-phase electrical supply, excluding specialized electrical installations.

“installation electrician”

means a person who has been registered as an installation electrician in terms of regulation 13, Electrical Installation Regulations (EIR), and who has been approved by the chief inspector for the verification and certification of the construction, testing, and inspection of any electrical installation, excluding specialized electrical installations.

“point of control”

means the point at which the electrical installation on or in any premises can be switched off by a user or lessor from the electricity supplied from the point of supply, or the point at which part of the installation on the premises can be switched off where different users occupy different parts of such premises.

“point of supply”

means the point at which electricity is supplied to any premises by a supplier.

“electricity services costs”

means the list of costs for the supply of respective electricity services, annually approved by the Municipal Council resolution.

“supply terminals”

concerning machinery installed as a complete unit means the terminals or connection clamps on such machinery where the external conductors supplying the machinery of electricity are terminated or connected.

“valid certificate of compliance”

means an electrical certificate of compliance that has been issued per these regulations and has been correctly completed in its entirety by a registered person.

“Peri-urban areas”

refer to all smallholdings, plots, and farms in the electricity distribution area of CENTLEC. Technically it refers to areas where electricity is supplied via transformers from overhead 11kV networks, with the point of supply on the site boundary.

4 GENERAL GUIDELINES FOR ALL SERVICE CONNECTIONS

The general guidelines which are important when implementing the connection policy are as follows:

4.1 Application for an electricity service connection must be done in writing, using an official application form that is obtainable from the Planning Application Office at the Power Station building in Fort Street and where applicable supported by an official letter;

4.2 The client must confirm the demand for the development via a consulting engineer or an electrical contractor, depending on the size of the development. The application will not be considered if the size of the connection is not mentioned or, for bigger developments or any upgrade from single phase connection Proof of load calculations shall be submitted with the application pack of documents.

4.3 No consideration shall be given to any application if it is not received in writing from the legal owner or his appointed representative with a letter of appointment by the owner;

4.4 The service costs must be paid in full, in advance, accompanied by a valid quotation provided by the Planning Section of CENTLEC;

4.5 The electrical supply to new connections shall only be switched on after the owner/developer has fulfilled the following requirements:

i. Energy deposit should be paid in full utilizing cash payment or Bank guarantee (excluding prepaid metering);
ii. The contract for the Supply of Electricity should be signed by the owner at CENTLEC Finance Directorate (excluding prepaid metering), and
iii. the client should produce the required Certificate of Compliance (through a professional and registered electrical contractor/consultant), in terms of the Occupational Health and Safety Act (Act 85 of 1993);

4.6 Whenever a substation building is required (New/Existing development), it shall be an integral part of a building's design and should not be located in the basement of buildings. For aesthetic reasons, placing substations, miniature substations, and meter boxes next to buildings, or next to each other, must be avoided if at all possible; The following positions are recommended:

i. Natural Ground Level
ii. Street front on stand boundary

4.7 CENTLEC reserves the right to place the point of supply in such a way, as to ensure optimal utilization of the electrical infrastructure;

4.8 An estimated amount shall be payable for any service that cannot be accommodated within the standard electricity service costs;

4.9 Only one point of supply shall be provided per erf, including consolidated and notarial connected erven, except for peri-urban areas where technical limitations limit the length of low voltage cables. In the case where structures are more than 300 meters apart, or as otherwise approved by the Planning Engineer, a second point of supply

will be allowed;

4.10 An application for the supply of electricity service(s) to a subdivision must be accompanied of an approved subdivision by the Surveyor General; where the approval has not been submitted, the Quotation will be given but NO construction will be done until such proof has been provided.

4.11 An electricity service supplying one stand may not pass over another stand unless a servitude or right of way has been registered for this purpose, or, if the electricity service cable is overhead;

4.12 If any changes to a building, electrical installation, or supply cabling cause CENTLEC's equipment or supply cabling to be moved or changed, whilst the energy meter is still mounted inside the building or outside against the wall, it is required that the energy meter be moved to the street front erf boundary and that changeover costs be payable by the applicant;

4.13 If any changes to a building or electrical installation with more than one (1) meter cause CENTLEC to change the connection size or metering equipment, then all the meters shall be converted to pre-payment metering where applicable.

4.14 Electricity services, irrespective of being formal or informal housing, will not be supplied to erven NOT approved by Town Planning.

4.15 The point of supply shall be provided in a distribution box/meter box on the erf boundary and CENTLEC's responsibility in respect of equipment and cabling, will only be up to the point of supply. The safety of all equipment and underground or overhead cabling from the point of supply will be the responsibility of the consumer.

4.16 Where meters are installed in dwellings, alongside the customers' distribution

board/Ready Board, or on the outside wall of the building this will be regarded to be the “point of consumption”. In both instances, CENTLEC will not be responsible for the safety of the equipment and underground or overhead cabling from the “point of supply” up to the “point of consumption”. CENTLEC will only be responsible for the meter(s) inside the dwelling while the consumer is responsible for the safety of equipment and underground cable or overhead conductor(s).

4.17 Pre-payment meters are currently installed in distribution boxes or pole-mounted distribution boxes on the erf boundary. Only the keypad (control panel) of the pre-payment meters will be installed inside dwellings. The customer will be responsible for the safety of the equipment and underground or overhead cabling after the “point of supply”, whilst CENTLEC will only be responsible for the keypad inside the dwelling. The owner/lessor/user shall be held liable for negligent damage to CENTLEC’s equipment.

4.18 No reselling of electricity will disadvantage the end user in terms of the tariff at which the electricity will be sold to them by the Reseller, NERSA-467-58 GUIDELINES ON ELECTRICITY RESALE.

4.19 Conversion to Prepayment: Centlec reserves the right to convert multi-unit installations to prepayment metering if there are changes to the building or supply. By moving customers to Centlec-managed prepaid meters, the middleman (managing agent) is removed from the billing cycle entirely.

4.20 Load control equipment (ripple control relay) for controlling geysers in dwellings, shall be installed when a domestic connection is made. The customer’s underground connection cable has to make provision for this circuitry. CENTLEC reserves the right to have a geyser controller installed inside or next to the consumer (point of control) distribution box where connections are done.

5 REGULATION OF ELECTRICITY RESELLERS

The owner or developer must indicate, in writing, whether the development will require sub-metering. Where sub-metering is required, CENTLEC will issue the applicable forms to confirm the metering arrangement. This information will clarify the type of metering to be installed for the development and the applicable tariff. The owner/developer must also identify any third-party utility appointed to manage sub-metering and/or billing. It remains the responsibility of the owner/developer to ensure that any such utility is duly registered and that CENTLEC is formally notified of their appointment, as they may act on the owner/developer's behalf from time to time in matters relating to energy consumption and billing.

To ensure compliance with the National Energy Regulator's Guidelines on Electricity Resale and to protect consumers from potential overcharging, CENTLEC (SOC) Ltd shall implement the following measures:

Registration and Agreement

- All electricity resellers operating within CENTLEC's area of supply must register with CENTLEC by completing a prescribed registration form.
- Resellers must enter into a service level agreement (SLA) with CENTLEC, which will outline the terms and conditions of reselling electricity.

Tariff Regulation

- Resellers must charge tariffs identical to CENTLEC's approved tariff rates and structures that would apply if CENTLEC supplied the customer directly.
- Resellers are generally prohibited from recovering their administrative or operational costs through the electricity unit price. These costs should be part of the general levy or a separate administration fee, not hidden in the business management overheads or as {c/kWh} rate.

Information Provision

- Upon registration, resellers must provide CENTLEC with:

  Information on customer categories supplied by the reseller,

- A sample invoice clearly showing energy consumed, charges, and billing period
- Resellers must make tariff information readily available to their customers and explain the tariffs when requested.

Monitoring and Reporting

- CENTLEC will maintain a database of registered resellers and monitor their activities.
- CENTLEC will report to NERSA annually on new bulk connections used for reselling and any tariff-related complaints received.

Disputes regarding tariffs

- Customers with complaints about reseller tariffs should first approach the reseller.
- If the complaint is not resolved, customers may escalate complaints to CENTLEC.
- CENTLEC will investigate and address these complaints, involving NERSA if necessary.

Enforcement

- CENTLEC reserves the right to conduct audits of reseller operations to ensure compliance.
- Non-compliant resellers shall face penalties, including potential termination of the bulk supply agreement.
- CENTLEC may initiate civil proceedings against resellers found to be overcharging, including recovery of overcharged amounts plus interest.

Bulk Tariffs

- CENTLEC will offer appropriate bulk tariffs to resellers that enable them to charge end customers tariffs mirroring CENTLEC's tariffs while maintaining a viable business model.

6 DOMESTIC CONNECTIONS – URBAN

New single-phase pre-payment meter – urban

A single-phase pre-payment connection is supplied according to the consumer's need. The normal single-phase domestic connection is controlled by an 80A circuit breaker at the point of supply/ control.

A three-pole circuit breaker is used to isolate the live, neutral, and geyser supply (only in areas where the load control signal is available). The pre-payment meter trips electronically if the load exceeds 60 amperes. The pre-payment meter will be installed in the distributions/pole mounted/kVA box installed on the erf boundary/outside wall. CENTLEC will install the keypad inside the dwelling at the position preferred by the owner.

Consumer connection cable

For a domestic consumer, the recommended consumer cable size to be connected to the network is 10mm^2 x 4 armored copper cable. The consumer's cable will be supplied with a separate earth wire of at least 10 mm^2 cross-section if one of the cable cores is not utilized as an earth wire. The connection cable is the consumer's responsibility and the above mentioned is only a recommendation. The owner is responsible for the installation of an additional 1.5mm² x 2core (Twin & Earth or Surfix) cable between the supply point and the dwelling for the connection of the keypad inside the dwelling.

Load control equipment (ripple control relay)

Refer to ***General guidelines for connections not exceeding 1000 kVA, section 4, sub section 4.19***

Service cost

The cost for new domestic connections is set out in the annual standard service cost.

New single-phase time of use (ToU) meter - Urban

A single-phase Time-of-Use connection is supplied according to the consumer's need. The normal single-phase domestic connection is controlled by an 80A circuit breaker at the point of supply/ control.

A three-pole circuit breaker is used to isolate the live, neutral, and geyser supply (only in areas where the load control signal is available). Time of Use meter trips electronically if the load exceeds 60 amperes. The pre-payment meter will be installed in the distributions/pole mounted/kVA box installed on the erf boundary/outside wall.

Customer connection cable

For a domestic consumer, the recommended cable size to be connected to the network is a 10 mm² x 4-core armoured copper cable. If one of the cable cores is not used as an earth conductor, a separate earth wire with a minimum cross-sectional area of 6 mm² must be provided. The connection cable is the responsibility of the consumer, and the above specifications are provided only as a recommendation. The consumer must also provide CENTLEC with a copy of the Certificate of Compliance (COC) for the installation.***Load control equipment (ripple control relay)***

Refer to ***General guidelines for connections not exceeding 1000 kVA,***

section 4, sub section 4.19

Service cost

The cost for new domestic connections is set out in the annual standard service cost (Annexure B).

7 ADDITIONAL METERING:

7.1 DOMESTIC

Additional metering is permitted for more than one dwelling on the same single residential erf. The electrical supply to the dwellings will be taken from a single point of supply located on the erf boundary. When an application for electrical connections is received, all permissible dwellings on the erf must be metered separately.

The electrical supply to the dwellings will be taken from one point of supply at either 230 V or 400 V, depending on the number of units and the demand. However, where more than four meters are required, the owner or developer will be required to upgrade to a 400 V connection size if a three-phase connection is not provided.

The total capacity of the connection is limited by an 80 A (slow-curve) main circuit breaker at the point of supply, and the supply to each dwelling is also limited by an 80 A (fast-curve) circuit breaker and meter for each permissible dwelling in a meter box located on the street boundary. The maximum size of a meter box permitted on the street boundary is an 8-way box that can accommodate up to twelve single-phase meters.

The owner, with the assistance of an electrical consultant, must calculate the estimated load to determine whether the connection (13.8 kW / 60 A single-phase) will be sufficient to supply the combined load of all permissible dwellings on the site. ***Consumer connection cable***

The owner/customer will provide separate customer connection cables from each dwelling, up to the single point of supply at the erf boundary.

Service cost

The cost for the connection will consist of the standard service costs for the first dwelling. The network contribution will be determined based on the projected demand for the property.

7.2 STUDENT HOUSING

Where student housing development is undertaken within the CENTLEC area of supply, the owner or developer must appoint an electrical consultant to perform the design duties, calculate the load requirements, and submit the application for connection.

The electrical supply to the development will be taken from a single point of supply at either 400 V or 11 000 V, depending on the number of units and the overall demand.

CENTLEC will supply individual units with meters according to the quantities requested by the owner or developer. Where the developer intends appointing a private utility for sub-metering and/or billing, the owner/developer will apply for reseller arrangements in accordance with Section 5 above and the CENTLEC Energy Tariff rules.

The approved land-use consent letter must accompany the application.***Consumer connection cable***

The owner/customer will provide separate consumer connection cables from each dwelling, up to the single point of supply at the erf boundary.

Service cost

The cost for the connection will consist of the standard service costs for the first dwelling.

There are no standard service costs applicable to student housing development. The full network contribution will be charged based on the projected demand for the property.

To make provision for an electrical connection to any of the three types of stands mentioned above, the basis for cost estimation for each type is described below, respectively.

a. Multiple single-phase pre-payment meters will be installed from a single connection point (point of supply) for Student Accomodation with a total After Diversity Maximum Demand (ADMD) of 1MVA or less;

b. Bulk domestic connection: When a Student Accomodation has an ADMD of more than 1MVA, then the following shall apply:

(i). 11 000 Volt network inside the development will be the responsibility of the Developer.

(ii) Centlec (SOC) Ltd will be responsible for sub-metering and the check meter at the “point of supply”. Alternatively, where the developer/owner appoints a Utility Management Company (UMC), the UMC may be responsible for the installation of sub-meters and the retail/billing activities. This arrangement will be governed by an agreement between the developer/owner and the UMC. The appointed UMC must register with CENTLEC as a reseller in accordance with Section 5 above and the CENTLEC Energy Tariff rules.

(iii) The Developer remains responsible for the internal reticulation, 230/400V system.

(iv) The reconciliation of the accounts will be done through the check meter.

c. Bulk domestic connection: When a Student Accomodation has an ADMD of less than 1MVA, then the following shall apply:

(i). 400 Volt network inside the development will be the responsibility of the Developer.

(ii) Centlec (SOC) Ltd will be responsible for sub-metering and the check meter at the “point of supply”. Alternatively, where the developer/owner appoints a Utility Management Company (UMC), the UMC may be responsible for the installation of sub-meters and the retail/billing activities. This arrangement will be governed by an agreement between

the developer/owner and the UMC. The appointed UMC must register with CENTLEC as a reseller in accordance with Section 5 above and the CENTLEC Energy Tariff rules.

(iii) The Developer remains responsible for the internal reticulation.

(iv) The reconciliation of the accounts will be done through the check meter.

d. The main switch inside the meter box or substation located on the erf boundary will be considered the point of supply.

e. Reselling of electricity is regulated as stipulated in the License Conditions, CENTLEC Policies and Standards as well as the By-laws relating to Electricity Supply.

8 SUBDIVISION OF ERVEN – URBAN AND PERI-URBAN

In the case of subdividing erven, the developer shall be responsible for all the alterations needed to relocate the existing and, or to create additional supply points for the newly created erven.

Consumer connection cable

The owner/customer will provide separate customer connection cables from each erf of the subdivision boundary, up to the single point of supply at the erf boundary.

Service costs - Urban

The estimated distribution network development cost for the relocation and or creation of additional connections for the new sites, as well as the backbone cost at the ruling R/kVA tariff shall be paid by the developer. The tariff consists of a contribution towards the

primary, secondary, and low voltage infrastructure. The developer pays the full estimated amount. This amount will exclude the service covered by the Standard Service cost, which is payable by the owner after purchasing the new erf (subdivision).

Service costs Peri-Urban

The estimated distribution network development cost for the relocation and or creation of additional connections for the new sites, as well as the backbone cost at the ruling R/kVA tariff shall be paid by the developer. The tariff consists of a contribution toward the primary, secondary, and low-voltage infrastructure. The developer pays the full estimated amount. This amount will exclude the service covered by the Standard Service cost, which is payable by the owner after purchasing the new erf (subdivision).

9 RELOCATING METERS TO THE STAND BOUNDARY: DOMESTIC

The relocation of meters takes place when the customer applies for such service or when there are changes requested by the client that has an existing overhead network supplying the premises.

Consumer connection cable

For a domestic consumer, the recommended consumer cable size to be connected to the network is 10mm^2 x 4 armored copper cable. The consumer's cable will be with a separate earth wire of at least 10 mm^2 cross-section if one of the cable cores is not utilized as an earth wire. The connection cable is the consumer's responsibility and the above mentioned is only a recommendation. The owner is responsible for the installation of an additional 1.5mm² x 2core (Twin & Earth or Surfix) cable between the supply point and the dwelling for the connection of the keypad inside the dwelling.

Load control equipment (ripple control relay)

Refer to ***General guidelines for connections not exceeding 1000 kVA, section 4, sub section 4.19***

The costs will be paid by the client as per the standard service costs.

10 CONVERSIONS OF METERS: DOMESTIC

Convert single-phase rotary disk meter to a pre-payment meter

Connection with meter mounted inside the dwelling or in a meter box externally mounted against an external wall. The existing single-phase rotary disk meter shall be replaced with a split pre-payment meter.

Consumer connection cable

The owner shall be required to supply and install a 1.5mm² copper twin and earth or Surfix cable for the keypad that will be installed inside the dwelling. The owner must decide on the preferred position of the keypad inside the dwelling.

Connection with meters mounted inside a meter room or in a meter box (Townhouses/Flats) the existing single-phase rotary disk meter would be replaced with a split pre-payment meter. The owner shall be required to supply and install a 1.5mm² copper twin and earth or Surfix cable for the keypad that will be installed inside the dwelling. The owner must decide on the preferred position of the keypad inside the dwelling.

Load control equipment (ripple control relay)

Refer to ***General guidelines for connections not exceeding 1000 kVA, section 4, sub section 4.19***

Service cost

Service cost for standard conversion to prepaid meters tariff is payable.

Convert three-phase rotary disk meter to pre-payment meter

Connection with meter inside the dwelling or in a meter box mounted on the external wall. The existing three-phase rotary disk meter will be replaced with a new split pre-payment meter installed in a distribution box on the erf boundary.

Consumer connection cable

Cable connection with meter box on the boundary: For a domestic customer, the recommended minimum size cable allowed to be connected to the distribution network is a 10mm² x 4 core armored copper cable. In addition to this, a separate earth conductor of at least 10 mm² must be provided. The customer is also responsible for installing 6mm² x 2 core CU/PVC conductors for controlling the geyser, as well as a 1.5mm² copper twin and earth or Suffix cable from the meter box to the position where the keypad will be installed. The connection cabling is the customer's responsibility.

Load control equipment (ripple control relay)

Refer to ***General guidelines for connections not exceeding 1000 kVA, section 4, sub section 4.19***

Service cost

Service cost: The standard Service cost is payable.

11 UPGRADE OF CONNECTIONS

Upgrade single-phase meter to three-phase time of use (tou) meter (up to 150A) - urban

Three-phase domestic connections at low voltage are provided according to the customer's need. The point of supply shall be in the meter box on the erf boundary. The Time of Use Meter connection is limited to a maximum of 103.4kVA or 150A at 400Volts per connection.

Customer connection cable: The customer will provide and install a suitable cable for the required connection size.

Service cost: The customer will be liable to pay the standard tariff if a standard domestic connection is required. If the connection size required is more than the standard then the full estimated amount necessary to strengthen the infrastructure, as well as for the metering equipment, is payable.

Phase balancing: The consumer is to ensure that the loading of the installation is balanced across all three phases so that the difference between phases is no more than 30% at any given time.

Upgrade single-phase meter to three-phase prepaid meter (up to 150A) - urban

Three-phase domestic connections at low voltage are provided according to the customer's need. The point of supply shall be in the meter box on the erf boundary. The Prepayment Meter connection is limited to a maximum of 103.4kVA or 150A at 400Volts per connection.

Customer connection cable: The customer will provide and install a suitable cable for the required connection size.

12 THREE PHASE DOMESTIC CONNECTIONS – URBAN

A new three-phase domestic time of use (TOU) meter

Three-phase domestic connections are provided according to the customer's needs. The connection is limited to a maximum of 103.4kVA or 150A at 400Volts per connection. The current carrying capacity of the circuit breakers to be installed at the point of supply, and the point of control, will be determined according to the load requirement of the connection.

Load control equipment (ripple relay) is installed at domestic connections for the control of the geysers in dwellings. The customer's connection cabling must make provision for this function.

Consumer connection cable

The connection cabling is the customer's responsibility. The recommended minimum size cable allowed to be connected to the distribution network is a 10mm^2 x 4core armored copper cable. Additional to this, a separate earth conductor of at least 10 mm^2 x 2 must be provided.

The customer is also responsible for installing a 6mm^2 x 2 CU/PVC cable for controlling the geyser, as well as a 1.5mm^2 x 2 copper twin and earth or Surfix cable from the meter box to the position where the keypad will be installed.

Load control equipment (ripple control relay)

Refer to ***General guidelines for connections not exceeding 1000 kVA, section 4, sub section 4.19***

Service cost

The applicant will be liable to pay the standard tariff if a standard domestic connection is required. If the connection size required is more than the standard then the full estimated amount necessary to strengthen the infrastructure, as well as for the metering equipment, is payable.

Phase balancing

The consumer must ensure that the loading of the installation is balanced across all three phases so that the difference between any two phases is **not more than 30%** at any given time.

THREE PHASE PRE-PAID METER- URBAN

Three-phase domestic connections with a split pre-payment meter are supplied to all new standard three-phase domestic clients with a load requirement of less than 60A per phase. The normal three-phase domestic connection is controlled by three 80A circuit breakers at the point of supply/control. A split pre-payment meter will be installed inside a meter box on the erf boundary. The keypad of the meter will be installed inside the dwelling where the owner prefers.

Consumer connection cable

The connection cabling is the customer's responsibility. The recommended minimum size cable allowed to be connected to the distribution network is a 10mm^2 4core copper cable. In addition to this, a separate earth conductor of at least 10 mm^2 x 2 must be provided.

The customer is also responsible for installing a 10mm^2 x 2 CU/PVC cable for controlling the geyser, as well as a 1.5mm^2 x 2 copper twin and earth or Surfix cable from the meter box to the position where the keypad will be installed.

Load control equipment (ripple control relay)

Refer to ***General guidelines for connections not exceeding 1000 kVA, section 4, sub section 4.19***

Service cost

The cost as set out in the standard Service costs is payable.

Phase balancing

The consumer is to ensure that the loading of the installation is balanced across all three phases so that the difference between any two phases is **not more than 30%** at any given time.

13 DOMESTIC CONNECTIONS: PERI-URBAN AREAS

New single-phase split pre-payment meter

The connection will be supplied from the 11 kV overhead line via a pole-mounted transformer to the boundary of the stand/plot.

Consumer connection cable

The recommended minimum size cable allowed to be connected to the network for a domestic customer is a 10mm2 x 4 core armored copper cable or 10mm2 x 2 core armored copper cable plus a separate suitably sized earth conductor. Concerning geyser control, additional conductors are not necessary here since a ripple relay signal is not available in peri-urban areas. The connection cabling is the customer's responsibility.

Service cost

The cost for above mentioned connection is set out in the standard Service costs.

14 NEW SINGLE-PHASE TIME OF USE (TOU) METER

The connection will be supplied from the 11 kV overhead line via a pole-mounted transformer to the boundary of the stand/plot.

Consumer connection cable

The recommended minimum size cable allowed to be connected to the network for a domestic customer is a 10mm2 x 4 core armored copper cable or 10mm2 x 2 core armored copper cable plus a separate suitably sized earth conductor. Concerning geyser control, additional conductors are not necessary here since a ripple relay signal is not available in peri-urban areas. The connection cabling is the customer's responsibility.

Service cost

The cost for above mentioned connection is set out in the standard Service costs.

15 NEW THREE-PHASE DOMESTIC CONNECTION - PERI-URBAN

The minimum load capacity for three-phase connections is 7.5kVA and is controlled at the point of supply by 80A circuit breakers. The 80A circuit breaker function is to decrease the maintenance of peri-urban connections.

Consumer connection cable

The owner/customer will provide separate customer connection cables from each dwelling, up to the single point of supply at the erf boundary.

Service cost

The cost for the above-mentioned connection is determined according to the standard service costs and is only applicable where a three-phase 11 kV network is available.

Where a three-phase 11 kV network does not exist, or where the customer requires a three-phase connection at a different location, the position proposed by the customer will be assessed and considered, provided it is the least-cost option and aligns with the master plan. The standard cost for an electricity connection in the peri-urban area applies only up to a distance of 350 m. Where the distance between the existing 11 kV network and the requested point of supply exceeds 350 m, the customer will be responsible for the full quotation cost for the desired location. The full quotation amount must be paid by the customer.

A three-phase domestic connection exceeding 80 A per phase is also available; however, the full quotation cost for such a connection must be paid. A maximum capacity of 200 kVA is applicable on peri-urban networks operating at 400 V.

16 THREE PHASE PREPAID METER – PERI-URBAN

A three-phase pre-payment meter will be installed according to the customer's needs. All the prescriptions of paragraph 4.6.2, also apply here. A maximum of 150A per phase is applicable.

Consumer connection cable

The owner/customer will provide separate customer connection cables from each dwelling, up to the single point of supply at the erf boundary.

Service cost

The cost for above mentioned connection is set out in the standard Service costs.

17 HIGH-DENSITY HOUSING DEVELOPMENT

The requirements related to meter boxes and meter rooms in the By-laws relating to Electricity Supply

Supplying townhouses: Urban

To supply electricity to the proposed townhouse development, there are three distinguished types of stands on which such development can take place:

- a stand which the Council zoned for town housing, during the planning of residence areas where provision is made for town housing in the existing township scheme;
- a stand located in an area, not re-zoned for town housing, but which the Council has earmarked for such development. A prospective developer must still apply for the re-zoning of such a stand;
- a townhouse development on a stand, not earmarked or zoned for such development. Provision for a service connection shall only take place after completion of the township establishment of the land and on receipt of the proof of the registration of the sites and the relevant zoning thereof.

Service cost: There are no standard service costs applicable to townhouse development. To make provision for an electrical connection to any of the three types of stands mentioned above, the basis for cost estimation for each type is described below, respectively.

Types of connections

b. Multiple single-phase pre-payment meters shall be installed from a single connection point (point of supply) for townhouses with a total After Diversity

Maximum Demand (ADMD) of 1MVA or less;

b. Bulk domestic connection: When a townhouse complex has an ADMD of more than 1MVA, then the following shall apply:

(i). 11 000 Volt network inside the development will be the responsibility of the Developer.

(ii) Centlec (SOC) Ltd will be responsible for sub-metering and the check meter at the “point of supply”. Alternatively, where the developer/owner appoints a Utility Management Company (UMC), the UMC may be responsible for the installation of sub-meters and the retail/billing activities. This arrangement will be governed by an agreement between the developer/owner and the UMC. The appointed UMC must register with CENTLEC as a reseller in accordance with Section 5 above and the CENTLEC Energy Tariff rules.

(iii) The Developer remains responsible for the internal reticulation, 230/400V system.

(iv) The reconciliation of the accounts will be done through the check meter.

c. Bulk domestic connection: When a townhouse complex has an ADMD of less than 1MVA, then the following shall apply:

(i). 400 Volt network inside the development will be the responsibility of the Developer.

(ii) Centlec (SOC) Ltd will be responsible for sub-metering and the check meter at the “point of supply”. Alternatively, where the developer/owner appoints a Utility Management Company (UMC), the UMC may be responsible for the installation of sub-meters and the retail/billing activities.

This arrangement will be governed by an agreement between the developer/owner and the UMC. The appointed UMC must register with CENTLEC as a reseller in accordance with Section 5 above and the CENTLEC Energy Tariff rules.

(iii) The Developer remains responsible for the internal reticulation.

(iv) The reconciliation of the accounts will be done through the check meter.

d. The main switch inside the meter box or substation located on the erf boundary will be considered the point of supply.

e. Reselling of electricity is regulated as stipulated in the License Conditions, CENTLEC Policies and Standards as well as the By-laws relating to Electricity Supply.

SUPPLYING TOWNHOUSES: PERI-URBAN

The peri-urban network does not make provision for high-density housing. Thus, any application for this type of connection shall thoroughly be investigated (in conjunction with the Planning division) concerning zoning, available capacity, and feasibility.

Townhouses, flats, and other high-density housing units may have unlimited single or three-phase meters with one main point of supply circuit breaker, but the main supply will be limited to 300A or 200kVA (largest pole-mounted transformer size on peri-urban distribution networks).

18 BULK SUPPLY CONNECTIONS

Bulk supply: - Urban

It is a connection to a customer of which the maximum demand is greater than 103.4kVA (150A per phase). The metering shall consist of a combination maximum demand / kWh-unit meter. Time of use registers for each of the time zones shall be applicable for the energy used in the period. The maximum demand is only measured inside peak periods. An excess charge, which is calculated from the highest demand during the last twelve months of consumption is also applicable.

A low-voltage bulk connection is limited to a maximum of 1MVA. The connection is limited utilizing a main circuit breaker, and consumption is measured with one bulk meter and accompanying equipment. Connections between 1MVA and 5MVA are considered medium voltage connections. Connections exceeding 5MVA are negotiable (a special arrangement is signed).

UPGRADING OF THE CONNECTION CAPACITY AND LAND ACQUISITION

When a miniature substation/substation has to be placed, to enlarge the existing capacity to accommodate the applicant's need, the applicant must then make an area of a specified servitude available on the premises where a miniature substation/substation can be placed. The preferred area for the servitude must be parallel to the boundary, street front, and accessible at all times to ensure maintenance and operation services can be easily executed. The developer registers a servitude for the miniature substation/substation in favor of CENTLEC.

Service cost

A bulk connection will be provided if the applicant is prepared to pay the full estimated cost as determined below:

The Service cost consists of two parts, namely:

T**he connection part**:

This estimated amount contains all costs concerning the applicable meter equipment (labor, material, and transport). Similar to the small demand connections.

The capital contribution part:

The applicant pays a capital contribution, in Rand per kVA, towards the estimated capacity applied for.

The two, abovementioned costs are added together, which constitutes the total calculated Service cost amount.

BULK SUPPLY - PERI-URBAN

The methods of distribution in peri-urban areas (11 kilo-Volt overhead distribution lines). A maximum capacity of 200 kVA can be supplied from a pole-mounted transformer. The meter box is placed at a position on the boundary, adjacent to the site.

When an application for a supply point exceeds 200 kVA, the applicant is required to apply for an MV connection point (11kV) and make land available on the plot for an additional transmission pole, a pole-mounted metering unit, and a stay wire.

It is required the applicant to supply and install a transformer or miniature substation on the plot and connect the supply via a suitably sized 11kV cable, terminated to a set of 11kV drop-out fuses (consumer point of control), and mounted on the transmission pole, close to the CENTLEC metering unit and point of supply.

Service cost for peri-urban areas

The Service cost is estimated, and the full amount plus the network contribution portion is payable by the applicant.

19 DOWNGRADING OF CONNECTION SIZE

The connection may be reduced on request from the customer.

Service cost

The estimated tariff is payable. The customer shall be liable for costs to reinstate the initial connection.

20 TEMPORARY CONNECTION

Temporary builders connection

A builder's connection will only be supplied if the building plans have been approved. The building approval letter must accompany the application.

A three-phase prepayment meter, 60A per phase is installed in a Peri-Urban meter box on the erf boundary. **The connection is valid for a maximum of three months unless arranged for a specific period not exceeding twelve (12) months.** The connection shall be removed by CENTLEC if the arranged period has lapsed. If the building is not completed and the final connection is not installed, then the applicant will have to re-apply for the connection and the standard tariff would be payable once again.

The small-demand business energy tariff is applicable and will only be changed when written proof is provided that all building activities have been completed and that the tariff can be changed to the relevant domestic or commercial tariff.

No extension of the electrical network will be done to accommodate a temporary connection, in such a case the client will need to apply for a permanent connection.

Service cost

The standard Service cost is payable for the 60A per phase connection. If such a temporary connection with a larger size is required, then the applicant is to pay the actual cost thereof.

Temporary connection for a social event

A temporary connection for a social event will only be supplied if the event has been approved by the Mangaung Metro. The approval letter must accompany the application.

A single-phase or three-phase prepayment meter, 80A up to a maximum of 150A per phase is installed in a meter box on the erf boundary. The connection is valid for a maximum of three months unless arranged for a specific period not exceeding twelve months. The connection shall be removed by CENTLEC if the arranged period has lapsed.

Service cost

The standard Service cost is payable for the 60A per phase connection. If such a temporary connection with a larger size is required, then the applicant is to pay the actual cost thereof.

21 REMOVAL OF ELECTRICAL SERVICES

When a building is to be renovated or demolished, and service conductors need to be removed. The owner must apply for such service at least one month before the site is to be declared safe in terms of the demolishing permit. Where such service conductors were removed, and later need to be reconnected to the renovated, or a new building, it will then be considered a new connection, unless an application to relocate has been received and paid for.

In instances where the power consumption of a premises is metered by one single meter, and the owner applies for removal of such meter, it is considered a removal of the entire connection.

NB. Metering equipment always remains the property of the CENTLEC is linked to a specific erf and cannot be relocated to another erf by the consumer.

22 POWER FACTOR CORRECTION

The by-laws of electricity dictate that a consumer is to ensure that their equipment is not causing the power factor to go beyond the acceptable levels. (The power factor of any load shall be maintained within the limits of 0,85 lagging and 0,9975 leading).

Customers shall supply and install power factor correction equipment to ensure compliance with this by law and obtain written permission from CENTLEC before installing such equipment. Such equipment must include sufficient filter circuitry

equipment and must comply with the Council's requirements. If such equipment is installed without the permission of CENTLEC, the owner shall be held liable for all correction costs involved.

23 REFUNDING CONNECTION FEES

Service costs are refundable at the request of the applicant if the connection cannot be executed for whatever reason. If the standard tariff does not make provision for a particular Service cost, and this cost was estimated, then only a portion of the estimated amount will be refundable. A charge of 10 % will be retained to cover administration expenses up to the limit of R10 000 exclusive of VAT. Further guidance will be used in conjunction with the refund policy per our Finance department.

24 ALLOCATING PADLOCKS AND ISSUING KEYS

Padlocks are utilized to prevent unauthorized entrance to buildings, areas, and equipment that belongs to CENTLEC. These areas are divided into Low-safety, Medium-safety, and High-safety areas, which are defined as follows:

LOW-RISK AREAS

Low-risk areas include meter rooms, meter boxes (on the meter side), and distribution boxes where external electrical equipment is safely screened off.

Padlocks used in these areas are those marked with CENTLEC key numbers BM 2, BM 44, or BM 66.

MEDIUM RISK AREAS

Medium-risk areas include switch and transformer rooms, switchgear, distribution centers, miniature substations, and chambers where electrical equipment is not safely screened off (the side of the meter box that contains bare conductors).

Padlocks used in these areas are those marked with CENTLEC key numbers, BM 1, BM 33, or BM 77.

HIGH-RISK AREAS

High-risk areas include distribution centers and transformer chambers.

Padlocks used in these areas are those marked with CENTLEC key numbers, BM 22 & BM11

In respect to the above-mentioned areas, keys are only issued to CENTLEC personnel to enable them to conduct work in above mentioned areas. Only those keys, for areas which he or she is authorized to access, will be issued.

With the exception, of BM 2, BM 44 and BM 66 keys will be issued to caretakers of flats and townhouses, electrical contractors, and plot owners, to enable them to switch circuit breakers in meter rooms and meter boxes. Applications to obtain such a meter box key (MB44) should be addressed to the Head of Energy and Network Control and Operations, CENTLEC (SoC) Ltd, Fort Street, Bloemfontein.

Locksmiths are not allowed to manufacture or duplicate these BM-marked keys without the written consent of the CENTLEC engineer.

21 SMALL SCALE EMBEDDED GENERATION (SSEG)

The applicant shall complete the prescribed CENTLEC application form, obtainable from the Customer Care in Fort Street, Bloemfontein, and ensure that the installation of the SSEG conforms to the requirements as set out in the National Rationalized Standards (NRS 097-2-1 & NRS 097-2-3).

No generation equipment shall be connected to the municipal electrical grid without the written consent of the Engineer of the Electricity Services, CENTLEC.

CENTLEC POLICY – AUTORISATION CONTROL SHEET

The attached revised Electrical Connection Policy – Revision 31 dated 26 June 2023 has been approved by the CENTLEC Executive Committee for immediate implementation.