



NIGERIAN ELECTRICITY REGULATORY COMMISSION

Consultation Paper on the Capping of Estimated Billing

OCTOBER, 2018

1.0 INTRODUCTION

1. The Electric Power Sector Reform Act, 2005 ('the Act') mandates the Nigerian Electricity Regulatory Commission to, among other things, regulate prices and tariffs, and issue licences for electricity Generation, Transmission, Distribution, exports and imports, and trading activities.
2. The Electric Power Sector Reform Act, 2005 serves as the establishing legislation of the Electricity Regulator and promotes the protection of the interests of vulnerable groups within the Nigerian Electricity Supply Industry (NESI).
3. The issue of estimated billing has continued to constitute a major source of complaints by customers in all the Distribution Companies in the NESI leading to calls by stakeholders such as the National Assembly and other customer groups for the Commission to find a more equitable way of ensuring that customers are billed fairly.

2.0 BACKGROUND

4. The mandate of the Commission is to protect not only the customers but also the operators. It is therefore imperative on the Commission to ensure that the responsibility of metering in line with Section (1) of the Regulation on Connection and Disconnection procedures, is fulfilled;
5. The Commission is fully aware that the Discos have contractual obligation under the Privatization programme to meter all their customers within five years as contained in the Performance Agreement signed with the Federal Government of Nigeria. This metering obligation has however not been fully met by the Distribution Companies leading to mounting complaints on the side of the customers;
6. This has been a challenge that necessitated the introduction of the Methodology for Estimated Billing (MEB) which was designed to ensure that unmetered customers are fairly billed with estimates that are scientifically derived. However, this was a complete failure owing to the Discos inability to effectively implement the guidelines;
7. It is apparent that the prevailing regime of estimation under the Commission's approved MEB has not been effectively and accurately implemented in all the Distribution Licensees. This has led to considerable burden being placed on unmetered customers who ultimately are beset with outrageous and very high estimated bills that are not objectively determined;
8. Following the review of the application of the MEB in several distribution licensee networks, a number of challenges have militated against the effective implementation of the methodology in the determination of the billings for

customers who are not metered such as technical issues which have made the implementation of the MEB a bit onerous for the Discos;

9. For effective implementation of the methodology for estimated billing, it is expected that metering of feeders in the distribution licensee's networks is done to ensure that the energy delivered to distribution transformers in an area or a cluster is appropriately accounted for;
10. In addition to required investment in feeder and DT metering and other overhead costs for the implementation of MEB, Discos' have also been required to invest in IT – infrastructure in order to integrate their vending platforms as a means of determining estimates for energy consumed by customers with prepaid meters;
11. There is also limited window for customer advocacy in challenging Discos on service quality and wrongly determined estimated bills, due to lack of relevant benchmarks and reporting on minimum supply (load shedding) requirements;
12. All of the above factors have necessitated a review of the MEB and the consideration of a Capping methodology.

3.0 PURPOSE

13. The purpose of this Consultation Paper on the Capping of Estimated Billing are to:
 - a. Solicit comments from stakeholders on the setting aside of the existing estimated billing methodology;
 - b. Explore various options provided in this document to Cap the monthly estimated bills issued to customers in line with the previous charge(s) applicable to the different tariff classes.

4.0 APPLICABLE LAWS

Electric Power Sector Reform Act 2005

14. NERC is a Regulatory Authority established under the provisions of Section 31 of the Electric Power Sector Reform Act, 2005. NERC's mandate is to regulate the Nigerian Electricity Supply Industry. In terms of section 32(2)(g) of the Electric Power Sector Reform Act, 2005, the Electricity Regulator is mandated to carry out any functions that is necessary to give effects to the objects of the Commission.

Distribution Licensee Licence Terms and Conditions

15. Condition 41(2) of the Distribution License Terms and Conditions envisaged that operational meters should first be installed before connection. It stipulates that: " *Electricity supply to a customer should be effected with an operational meter first being installed*". Section (1) of the Regulation on connection and disconnection procedures stipulates that ... a Distribution Company shall "fit meter and connect electricity supply in line with the Commission's customer service standards of performance".

16. Condition 41(6) further states that: "*The Licensee shall be responsible for installing electrical energy meters at its own expense and shall be the owner of all installed metering equipment. If malfunction or damage occurs to the meter for any reason that is out of the customer's control, the Licensee shall repair the damage/malfunction or change the meter as quickly as possible, at its own expense*".

Meter Reading, Billing, Cash Collection and Credit Management Regulation

17. Section 8 of the Meter Reading, Billing, Cash Collection and Credit Management Regulation provides guidance on why and how estimation should be done for unmetered supply of electricity. It stipulates that *“where there is no electricity meter to record electricity usage at a Customer’s supply address, a Distribution Company shall base the Customer’s bill on an estimated energy consumption which shall be calculated in accordance with a method approved by the Commission.”*

Meter Asset Providers Regulation 2018

18. Section 31 of the Meter Asset Providers Regulation provides the requirement for Capping of estimated billing to be done by all Distribution licensees. This was placed as an incentive to encourage Distribution licensees to procure MAPs and facilitate the metering of their customers within the timeframe as specified in the MAP Regulation.

5.0 OPTIONS TO CAPPING ESTIMATION

OPTION 1

Under this option, the average energy as provided for in the Multi-Year-Tariff-Order (MYTO) 2015 for each Distribution Company, would form the basis for computing the Maximum Cap for each category of customers to be affected. The variables to be considered under this option would include:

1. Tariff Class
2. Customer Numbers under each tariff class
3. Proportion of number of customers per tariff class to the total number of customers

4. Annual Consumption in Gigawatts

5. Annual Consumption in Kilowatts

These variables would be used to derive the Average Monthly Individual Consumption in Kwh per tariff class which will represent the Cap.

This option 1 is considered simple as energy delivered and customer numbers are authenticated in the MYTO 2015 model.

19. Sample of Capping for Disco A in Option 1

Class	Customer Numbers	Proportion of Total Consumers	Annual consumption (GWh)	Annual Consumption (KWh)	Monthly Fixed Charges	2016 N/KWh	Average Monthly Individual Consumption (KWh)	Average Monthly Bill/Customer (New CAP) =N=
R1	-	0.00%	-	-	0	4	-	-
R2SP	500,464	54.97%	1,892	1,891,697,967.88	0	21.3	315	6,709.14
R2TP	214,447	23.56%	144	143,551,031	0	21.8	56	1,216.08
R3	267	0.03%	15	15,381,765	0	36.49	4,801	175,163.61
R4	5	0.00%	2	2,017,969	0	36.92	33,633	1,241,884.01
C1SP	112,820	12.39%	533	533,405,776	0	27.2	394	10,716.66
C1TP	61,957	6.81%	43	42,745,832	0	28.47	57	1,636.85
C2	4,038	0.44%	198	198,287,889	0	37.74	4,092	154,455.57
C3	53	0.01%	53	52,653,519	0	38.14	82,789	3,157,800.54
D1	3,284	0.36%	7	7,132,805	0	28.68	181	5,191.04
D2	343	0.04%	64	63,807,034	0	38.38	15,502	594,998.66
D3	7,258	0.80%	727	726,798,203	0	38.85	8,345	324,188.18
A1	5,007	0.55%	20	20,347,474	0	26.82	339	9,081.71
A2	269	0.03%	49	48,717,476	0	30.2	15,092	455,770.96
A3	121	0.01%	40	39,920,868	0	30.36	27,494	834,587.47
S1	55	0.01%	1	1,317,165	0	19.42	1,996	38,755.97
Total	910,388		3,788	3,787,782,773				

OPTION 2

This Option 2 takes into consideration actual energy delivered to metered customers as the basis for deriving the Caps of the various categories of unmetered customers. In arriving at the Capped figure, the energy consumed by the metered customers is subtracted from the total energy delivered and forms the basis for determining the Caps.

Sample of all the Discos using Option 2.

Tariff Class	Disco 1	Disco 2	Disco 3	Disco 4	Disco 5	Disco 6	Disco 7	Disco 8	Disco 9	Disco 10	Disco 11
R1	105.4	168.1	0.0	0.0	282.9	0.0	38.1	0.0	66.1	238.1	140.9
R2	157.7	146.0	344.0	149.6	140.3	157.6	147.0	213.8	165.6	257.0	103.9
R3	6,862.9	6,248.5	9,066.4	1,791.9	4,421.3	5,165.0	2,058.2	14,840.6	4,570.7	3,158.9	1,603.1
R4	52,241.6	16,899.0	69,781.0	134,392.2	0.0	22,792.7	49,660.6	0.0	6,558.5	37,926.1	0.0
RESIDENTIA	163.0	149.2	451.1	152.3	147.7	159.4	144.7	219.0	163.4	261.7	108.3
C1	167.8	174.1	369.8	169.2	159.4	200.3	174.1	284.3	155.6	231.9	116.8
C2	5,514.9	4,519.8	5,710.8	2,316.4	3,443.7	4,088.1	2,042.1	3,866.5	5,389.4	3,557.7	2,260.7
C3	68,472.3	43,410.6	69,714.2	54,540.3	44,536.4	105,532.5	35,381.5	34,894.6	90,858.3	40,032.2	41,846.4
COMMERCIAL	573.0	319.2	1,268.3	272.9	244.9	324.1	268.5	428.1	347.9	424.4	258.0
D1	241.8	209.9	361.4	181.2	221.1	267.1	203.1	560.3	273.3	311.9	306.6
D2	15,441.3	16,292.3	18,480.6	8,513.5	20,034.9	15,003.9	16,569.1	11,035.8	24,786.1	8,324.6	2,022.2
D3	789,975.5	353,502.6	64,741.1	73,242.7	304,248.8	200,239.1	316,078.9	89,045.6	255,007.6	97,121.9	38,502.4
INDUSTRIAL	5,350.1	6,524.6	21,998.7	1,917.7	14,863.2	14,620.6	2,195.1	1,490.9	11,931.7	6,931.9	516.2
S1	9,178.2	2,921.4	1,033.1	11,486.5	2,288.1	298.8	1,762.7	6,887.7	4,017.2	2,576.6	2,219.6
STREET LIGHT	9,178.2	2,921.4	1,033.1	11,486.5	2,288.1	298.8	1,762.7	6,887.7	0.0	2,576.6	2,219.6
A1	299.0	281.5	593.5	287.9	222.8	203.5	157.8	749.0	313.5	344.5	570.6
A2	6,954.3	8,004.0	21,227.1	8,099.8	4,970.9	8,087.1	4,750.8	13,260.1	5,597.4	6,995.9	3,921.7
A3	18,777.0	55,063.9	100,694.9	76,321.9	111,189.0	102,293.8	25,412.4	116,920.9	79,009.7	53,460.2	33,210.4
SPECIAL	2,126.4	2,102.3	5,693.2		7,627.0	680.1	1,756.4	5,057.3	4,086.2	1,580.1	1,583.5

All figures stated above are in kWh/Month.

6.0 Implementation of Capping

23. Considering the fact that Capping is still a form of estimation, it is likely to be vulnerable to some of the following flaws for which the Commission recommends remedial actions as follows:

- a. That the Order on Capping requires that no change should apply to customers that are currently estimated below that maximum Cap;

- b. That the Order categorically states that customers with history of metered consumption cannot benefit from the Cap. Rather, an average of their previous consumption shall be used;
- c. That minimum supply benchmarks and reporting be introduced in order to checkmate abuse as experienced under the MEB framework;
- d. That the Capping process will be implemented after a moratorium of 3 months to allow the Distribution Companies to effectively conclude the procurement process for engagement of the Meter Asset Providers.

7.0 Stakeholder Questions

[Stakeholder Question 1](#)

Should the present billing estimated methodology be vacated and replaced with a fixed Capped estimate for customers not presently metered ?

[Stakeholder Question 2](#)

Should the Capped estimates be derived in such a manner as to incentivise the distribution companies to quickly conclude the MAP engagement process and facilitate the metering of all unmetered customers?

[Stakeholder Question 3](#)

Should the Capping methodology take into consideration the viability and revenue assurance of the Distribution companies as it relates to unmetered customers?

[Stakeholder Question 4](#)

Should a moratorium period be allowed before the enforcement of the Capping process and if so what is the appropriate time period that could be considered?

[Stakeholder Question 5](#)

Do you agree that any metered customers that deliberately tampers with a functional meter should remain on the existing meter consumption until the meter is replaced by the MAP?

[Stakeholder Question 6](#)

Should the Caps for the various categories of customers to be affected be delivered strictly based on the volume of energy based on the volume of energy used in setting the end user tariff?

[Stakeholder Question 7](#)

What should be put as a safeguard in this order to prevent the distribution companies from charging the Maximum Cap to all customers within a tariff class?

[Stakeholder Question 8](#)

Considering the variables provided in the options proposed by the Commission, what would you consider the most suitable option to be adopted for the Capping estimated billing in the NESI?

8.0 Response to Consultation

24. The Commission has prepared this document in order to facilitate as open consultation as possible and has provided options to be considered in setting the Caps for each of the applicable tariff classes. Accordingly, in line with provisions of Section 31 of the MAP Regulation 2018, the Commission hereby gives a 21 day notice from the date of this publication for comments, objections and representations on the Capping methodology from all stakeholders and the general public.
25. Respondents may propose either a modification or an alternative to the options, assumptions and expectations expressed by NERC for further consideration by the Commission. A public hearing on the proposed Order will be held at the expiration of the response period.
26. At the end of the consultation process, the Commission's decision on the option to be adopted for Capping of estimated billing will be issued.
27. All reactions, comments, queries and further enquiries should be sent for consideration by the Commission to info@nerc.gov.ng with copies to capping@nerc.gov.ng. Hand written or typed mails should be addressed and sent to the recipients below:

Dr. Moses A. Arigu Commissioner, Consumer Affairs Division The Nigerian Electricity Regulatory Commission, Plot 1387, Cadastral Zone A00, Central Business District, Abuja, F.C.T, Nigeria	Engr. Chinedum Ukabiala Engineering, Performance and Monitoring Division, The Nigerian Electricity Regulatory Commission, Plot 1387, Cadastral Zone A00, Central Business District, Abuja, F.C.T, Nigeria
Shittu H. Shaibu Consumer Affairs Division, The Nigerian Electricity Regulatory Commission, Plot 1387, Cadastral Zone A00,	Olisa M. Chukwuma Consumer Affairs Division, The Nigerian Electricity Regulatory Commission, Plot 1387, Cadastral Zone A00,

28. Next Steps

This consultation paper will be published on the Commission’s website. www.nerc.gov.ng for 21 days from this date. Thereafter, a public consultation will be held in November 2018 at which reactions to the Capping options may be formally presented.

All reactions and output from the public consultation will be considered by the Commission. This process will culminate with the Commission coming up with a modality for Capping estimated billing for the sector. The Order implementing this will be published at a later date.

DATED AT ABUJA THIS 11TH DAY OF OCTOBER 2018

Prof. James A. Momoh
Chairman/CEO