
PUBLIC UTILITIES COMMISSION OF SRI LANKA

Bulk Supply Transactions Guidelines

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Public Utilities Commission of Sri Lanka

Bulk Supply Transactions Guidelines

Note:

1. These guidelines should be considered to be a part of the “Bulk Supply Transaction Management Rules”, as provided under section 2.4.3.1 of the Methodology for Tariffs approved by the Commission. The comprehensive “Rules”, incorporating these Guidelines (modified as required) will be issued by PUCSL in due course.
2. Abbreviations have their usual meanings as in other regulatory documents.

1.0 Objective

These guidelines are provided for the establishment of an effective and transparent mechanism by the Licensees to carry out bulk supply transactions for implementation of a Tariff Regime in accordance with the Decision Document on Electricity Tariff-2011, issued by the Commission.

2.0 Introduction

In terms of Section 30 of the Sri Lanka Electricity Act No. 20 of 2009 (Act), PUCSL has issued Decision Document on Electricity Tariff - 2011, effective for the period 2011 – 2015. The Licensees are required to implement provisions of the above, which include (i) Allowed revenues of each licensee, (ii) Transfer prices between licensees, (iii) End-use customer prices, and (iv) transition arrangements for metering.

Accordingly, the bulk supply transactions between the licensees will come under direct regulatory purview in terms of the provisions of the Act and relevant license conditions.

This document provides operating guidelines for the Transmission Licensee (TL) to implement a mechanism for bulk supply transactions in coordination with the respective Generation and Distribution Licensees.

The operating guidelines are provided for;

- (i) Inter-licensee bulk supply transactions and related implementation arrangements in respect of accounting, metering, invoicing, settlements and recording.
- (ii) Transitional arrangements to be established to carry out bulk supply transactions by respective Licensees until the final arrangements are made fully operational.

3.0 License Requirements

Following are the simplified interpretation of applicable license conditions with respect to bulk supply transactions;

- (a) The Transmission Licensee is required to enter into Power Purchase Agreements (PPA) in order to purchase electricity from generators or purchase electricity under generation

license issued to the (CEB) Licensee based on the transfer tariffs determined under such generation license.

- (b) The Transmission Licensee is required to enter into Power Sales Agreements (PSAs) with the Distribution Licensees or Transmission Customers for bulk supply or sale of electricity. The applicable charges in the PSA shall be the Bulk Supply Tariffs approved by the Commission.
- (c) The Transmission Licensee shall operate merit order for dispatch of generation units based on the approved methodology subject to central dispatch, on daily basis or any other basis as directed by the Commission.
- (d) Licensees are required to maintain separate accounts and keep accounting records in respect of each licensed business activities as would be required to be kept if they were carried on by a separate entity. Further, the Transmission Licensee is required to maintain separate accounting records with respect to Transmission Business and Bulk Supply and Operations Business (BSOB).

Further, as per the approved Tariff Methodology, the Transmission Licensee (BSOB) is required to establish a 'Bulk Supply Transactions Account' to operate all bulk supply transactions. In situations of cash shortfalls, the Transmission Licensee's (BSOB) liability will be limited to the funds available in the Bulk Supply Transactions Account.

4.0 Operating Guidelines

The bulk supply transaction process to be established by the Transmission Licensee (TL) shall be in line with the following;

Transactions between TL and Generators

1. The Bulk Supply and Operations Business (BSOB) of the Transmission Licensee purchases electricity produced by the Generators (CEB Generation Licensee, IPPs, SPPs and exempted Generators) according to the operational criteria stipulated under the license / exemption order conditions and applicable Power Purchase Agreements (PPAs and SPPAs).
2. Transmission Licensee (BSOB) dispatches the available generation according to the Dispatch Methodology approved by the Commission.
3. The Generators submit monthly invoices (or 'transactions notes' as applicable) to the Transmission Licensee (BSOB) in accordance with the applicable Power Purchase Agreements (PPAs and SPPAs).
4. The Transmission Licensee (BSOB) verifies invoices submitted by Generators based on verification criteria established by the Licensee and settle the invoices (or 'transaction notes' as applicable) in accordance with the terms of the applicable PPA/SPPAs.

Transactions between the Transmission Licensee and (i) Transmission Business and (ii) Bulk Supply Operation Businesses of the Licensee

5. The Transmission Business and Bulk Supply and Operations Business (BSOB) of the Transmission Licensee shall perform their licensed businesses in accordance with relevant License conditions.
6. The (i) Transmission Business and (ii) Bulk Supply and Operations Business (BSOB) submit separate monthly invoices (or ‘transaction notes’ as applicable) to the Transmission Licensee (BSOB) based on the allowed revenues for respective businesses, established by the Commission as given in the Decision Document on Electricity Tariff – 2011..
7. The Transmission Licensee (BSOB) verifies invoices submitted by the Transmission and BSOB businesses based on verification criteria established by the Licensee and settle the invoices (or ‘transaction notes’ as applicable) within a one month period or as otherwise agreed between the Licensees.

Transactions between the Transmission Licensee and (i) Distribution Licensees or (ii) Transmission Customers

8. The Transmission Licensee (BSOB) supplies bulk power and energy requirements of the Distribution Licensees and Transmission Customers in accordance with the relevant license conditions and applicable Power Sales Agreements (PSAs).
9. The Transmission Licensee (BSOB) submits monthly invoices (or ‘transaction notes’ as applicable) to Distribution Licensees and Transmission Customers in accordance with the applicable Power Sales Agreements (PSAs).
10. The Distribution Licensees and Transmission Customers verify invoices (or transaction notes as applicable) submitted by the Transmission Licensee (BSOB) based on verification criteria established by the Licensee and make arrangements for settlement of the invoices (or ‘transaction notes’ as applicable) in accordance with the terms of the applicable PSAs.

Accounting

11. The Licensees shall maintain separate accounts and keep accounting records in respect of the licensed business activities as would be required to be kept if they were carried on by a separate entity. Further, the Transmission Licensee shall maintain separate accounting records with respect to (i) Transmission Business and (ii) Bulk Supply and Operations Business.
12. The Transmission Licensee shall establish the **Bulk Supply Transactions Account** as specified in clause 2.4.2 of the approved Tariff Methodology. This will be used to operate all bulk supply transactions by the Transmission Licensee (BSOB) and will be subject to

direct regulatory oversight by PUCSL. The following transactions shall take place in this Account:

- i. Payments made by Distribution Licensees and Transmission Customers
 - ii. Payments to the Transmission Licensee (Transmission Business and Bulk Supply Operations Business)
 - iii. Payment to Generation Licensees or other generators
 - iv. Other transactions as directed by the Commission
13. Any form of subsidy received by the CEB to compensate for subsidized customer tariffs shall be credited to the Bulk Supply Transactions Account in full.

Invoicing and Settlements

14. The Licensees shall adhere to the proposed time schedule for meter readings, issuance and settlement of invoices as indicated in Section 7.0.

Metering

15. Metering arrangements for trading of power and energy between licensees shall be in accordance with the metering code and provisions indicated in the Decision Document on Electricity Tariff – 2011 (An extract of the section is given in Annex 1). During the transition period, measures for verification of meter readings shall be mutually agreed between the respective licensees.

Billing Cycle

16. The cycle for monthly invoicing between the Licensees shall be one calendar month commencing from 1st January 2011. In the event existing cycles (such as between the Transmission Licensee and LECO) are different, necessary adjustments shall be made to implement a calendar month-based cycle from the effective date.

Reporting

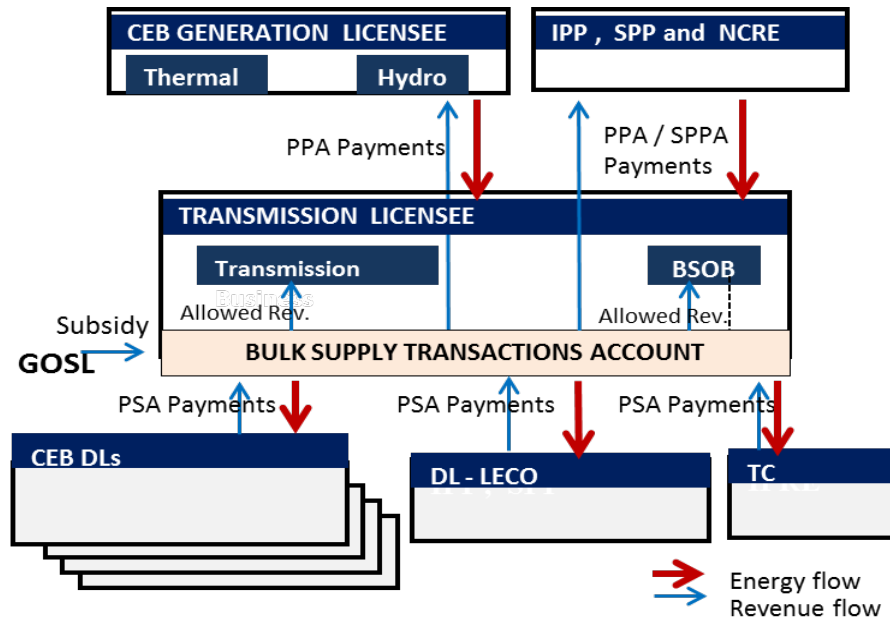
17. Transmission and Distribution Licensees are required to submit daily, weekly and monthly reports containing information on system data, measurements and transactions as required in the on-line **Licensee Information Submission System (LISS)** established by the Commission.

Disputes

18. Disputes with respect to bulk supply transactions process may be amicably resolved between the relevant Licensees and notified to the Commission. Any dispute that could not be resolved in this manner shall be referred to the Commission for resolution in accordance with the dispute resolution condition of the related licenses.

The overall bulk supply transaction process given in these Operating Guidelines is illustrated in the Fig 1 below.

Fig 1.



5.0 Implementation issues concerning CEB Licensees

Upon implementation of the bulk supply transactions process, each CEB Licensee will operate as an independent business entity. The Licensees' shall generate their revenue through the bulk and retail supply transactions and manage their own cash flows (differing from the practice of budgetary allocations from the Corporate). This will create a conducive environment for enhanced transparency, autonomy and accountability, whilst promoting performance and efficiency improvements, and facilitating effective regulation.

However during consultations with the CEB Licensees, the Commission noted following issues relating to full implementation of the proposed operating guidelines;

- (a) De-centralization of CEB revenue collection accounts - Transfer / allocation of tariff revenue collections in favor of respective DLs from central collection account should be arranged.
- (b) Provision of working capital is managed by the Corporate.
- (c) Issues relating to effective management of cash flow under current overdraft situation.
- (d) Approval of PPAs/PSAs

In consideration of the above, transitional provisions have been provided for an interim period of one year. Section 6.0 provides guidelines with respect to these transitional provisions.

CEB Licensees are required to prepare a common action plan / programme to address and resolve above and any other related issues, as early as possible and within the allowed interim period. This action plan / programme shall be submitted to the Commission within a period of one month from the date of issue of this guideline.

6.0 Operating guidelines on transitional arrangements

The CEB Licensees shall follow the operating guidelines provided in section 3.0, except for the following transitional provisions that may be used during the interim period of 12 months, ending 31st December 2011;

1. In the absence of approved PPAs between Transmission Licensee (BSOB) and CEB Generation Licensee, monthly invoicing (or ‘transaction note’) by the CEB Generation Licensee shall be based on the capacity, energy and start / stop charges for respective plants approved by the Commission. The applicable charges for each generating plant is provided in the Decision Document on Electricity Tariff 2011.
2. In the absence of approved PSAs, the Transmission Licensee (BSOB) shall issue monthly invoices (or ‘transaction notes’) to respective Distribution Licensees based on the bulk supply capacity and energy charges published in the Decision Document on Electricity Tariff 2011.
3. During the interim period, bulk supply transactions will be **metered, invoiced and recorded** in the Bulk Supply Transaction Account (BSTA) maintained by the Transmission Licensee (BSOB) and in the accounting records maintained by other Licensees for their licensed business. The existing CEB central cash collection and allocation process may be continued subject to above and until full de-centralization of the collection account, within the interim period.

The above transitional provisions are applicable only for CEB Licensees (EL/G/09-001, EL/T/09-002, EL/D/09-003, EL/D/09-004, EL/D/09-005, EL/D/09-006). LECO (EL/D/09-052) shall be responsible for full implementation of the proposed operating guidelines irrespective of the transitional provisions allowed for CEB Licensees during the interim period.

7.0 Sequence and Timing of Transactions

The sequence and timing for transactions and activities of the Bulk Supply Transactions Account shall be as indicated in the Table below;

<u>Month n</u> <u>Week</u>	Transaction / activity (month n)
1	GLs (and exempted Generators) issue the invoices to TL (BSOB) for dispatches during previous month (n-1) as per applicable PPA/SPPAs.
	TL (Transmission) and TL (BSOB) issue separate invoices for the allowed revenues for previous month (n-1) to TL (BSOB).
	TL (BSOB) issues invoices to DLs for bulk supply transactions during previous month (n-1) as per approved BST (and according to PSAs).
	DLs make final payment to TL (BSOB) to settle balance amount (15%) of the invoice for bulk supply transactions for the month n-2.
	TL (BSOB) sends a summary report on dispatch by each GL and summary of BSTA transactions to PUCSL for the previous month (n-1).

<u>Month n</u> <u>Week</u>	Transaction / activity (month n)
2	TL (BSOB) to receive monthly commitment by the Treasury to cover the subsidies incorporated in retail tariffs as per the Decision Document on Electricity Tariff-2011.
	DLs send a summary of the actual retail sales to each customer category, number of customers and actual street lighting consumption to PUCSL for the previous month (n-1).
	DLs make part payment (50%) to TL (BSOB) for current TL(BSOB) invoice (for month n-1).
3	DLs make part payment (25%) to TL (BSOB) for current TL(BSOB) invoice (for month n-1).
4	DLs make part payment (10%) to TL (BSOB) for current TL(BSOB) invoice (for month n-1).
	TL (BSOB) settle payments to IPP, SPP and CEB GL as stipulated in applicable PPAs.
	TL (BSOB) settles payments to TL (Transmission Business) and TL (BSOB).

GL-Generation Licensee, TL-Transmission Licensee, DL-Distribution Licensee

Detailed sequence and timing of the activities and guidelines with respect to meter reading, issuance and settlement of invoices are provided in Annex 2.

Annex 1

Note: The section in respect of metering provided in the Decision Document on Electricity Tariff-2011 is appended below;

METERING REQUIREMENTS

All meters measuring demand and energy transfers from

- (i) Generation Licensees to the Transmission Licensee, and
- (ii) Transmission Licensee to Distribution Licensees,

shall record the following parameters from 1st January 2011, for each monthly billing period.

- (a) maximum real power demand, measured in kW for averaging periods of 15-minute or 30-minute intervals, and the maximum real power demand coincident with the System Peak Demand
- (b) energy transferred in kWh in each time interval of the TOU tariff regime
- (c) reactive energy transferred in kvarh in each time interval of the TOU tariff regime

All meters measuring sales from Distribution Licensees to the customer categories I2, I3, H2, H3, GP2 and GP3 shall record the following parameters from 1st January 2011, for each monthly billing period.

- (a) maximum apparent power demand, measured in kVA for averaging periods of 15-minutes
- (b) energy sold in kWh in each time interval of the TOU regime
- (c) reactive energy transferred in kvarh in each time interval of the TOU regime

If for any reason, the available meters are not suitable or not programmed to read the parameters as stated above, the following transition provisions are applicable.

TRANSITION PROVISIONS FOR METERING: INTER-LICENSEE TRANSFERS

For meters measuring transfers from **Generation Licensees to the Transmission Licensee**, and from the **Transmission Licensee to Distribution Licensees**, the meters should be read manually and the relevant information should be reported to the Commission, and used for invoicing. If any meter is not capable of measuring energy for each time interval, such reading may be estimated.

On or before 30 April 2011, the Transmission Licensee shall provide a comprehensive plan to the Commission, about the status of the transfer meters, and a specific time-bound plan to upgrade the metering or other measures to be adopted, to adhere to the requirements specified in the Methodology.

TRANSITION PROVISIONS FOR METERING: DISTRIBUTION LICENSEE SALES TO END-USE CUSTOMERS

For meters measuring sales from **Distribution Licensees to end-use customers** of the customer categories I2, I3, H2, H3, GP2 and GP3, billing of any customer whose meter as of 1st January 2011 is not suitable or has not been programmed to reflect the time intervals in the TOU tariff regime, the Distribution Licensees shall follow the procedure below:

- (i) if the customer's meter is of the suitable type and if remote meter reading facility is available or can be made available to the Distribution Licensee, such remote readings shall be used to fully adhere to the new TOU tariffs when billing such customers.
- (ii) if the customer's meter is of the suitable type, but not programmed to reflect the relevant time intervals, the Distribution Licensee shall take immediate steps to program the meter and/or enable remote reading, as required.
- (iii) if the customer's meter is not of the suitable type, the Distribution Licensee shall take immediate steps to replace the meter and program it, as required.

As soon as (i) or (ii) or (iii) have been fulfilled, commencing from the next billing month, billing the customer under TOU tariffs should commence.

Until such time, all the energy sold to the customer throughout the day should be billed at the day-time Energy Charge (0530 to 1830) applicable to the relevant customer category.

This is an interim provision applicable only for the period 1st January 2011 to 31st March 2011. As of 31st March 2011, all customer meters of the categories I2, I3, H2, H3, GP2 and GP3 should be of the suitable type and programmed to reflect the requirements of recording

- (a) maximum demand, measured in kVA for each 15-minute interval
- (b) energy sold in kWh in each time interval
- (c) reactive energy transferred in kvarh in each time interval

Energy sold in each time interval shall be included in the invoice to the customer, including for customers in GP2 and GP3 categories, although customers in categories GP2 and GP3 are not charged on TOU tariffs in this Decision Document.

Annex 2

Activities and Guidelines on Meter Reading, Issuance and Settlement of Invoices for Operation of the Bulk Supply Transactions Account

Further to the provisions of the Decision Document on Electricity Tariff 2011 and in addition to bulk supply transaction operating guidelines provided in this document, the following activities and guidelines shall apply in respect of the implementation arrangements for meter reading, invoicing and settlement of invoices among Generation Licensees (GLs), Transmission Licensee (TL) and Distribution Licensees (DLs) with effect from 1st January 2011.

1. Generation Licensees

- GLs and TL (BSOB) read electricity meters as agreed between the licensees commencing from the 1st day of each month.
- It should be noted that the boundary between all GLs and TL would be the relevant high voltage receiving point by the TL. The sales boundary from SPPs to TL would be considered to be the 33 kV metering point.
- GLs issue the invoices to TL (BSOB) for energy, capacity and other charges as per the applicable PPAs/SPPAs.

2. Transmission Licensee

Bulk Supply and Operation Business (BSOB)

- TL (BSOB) and GLs read electricity meters as agreed between the Licensees commencing from the 1st day of each month.
- TL (BSOB) and DLs or nominated representative/s on their behalf read electricity meters as agreed between Licensees commencing from the 1st day of each month.
- TL (BSOB) issues invoices to DLs by 7th day of the month.
- TL (BSOB) issues invoices for the allowed revenues by 7th day of the month.
- TL (BSOB) verifies and settles invoices received from GLs before the end of the month or as per terms of the applicable PPAs.
- TL (BSOB) verifies and settles invoices received from TL (TB) and TL (BSOB) before the end of the month.
- TL(BSOB) sends data and summary reports on system data and bulk supply transactions to PUCSL in accordance with the online Licensee Information Submission System established by the Commission.

Transmission Business (TB)

- TL(TB) issue invoices to TL (BSOB) for the allowed revenues before 7th day of the month.

3. Distribution Licensees

Energy Purchase from TL (BSOB)

- TL (BSOB) and DLs or nominated representative/s on their behalf read electricity meters as agreed between Licensees commencing from the 1st day of each month.
- The meter readings and related power and energy sales figures determined by TL for respective DLs shall be verified in accordance with the agreed verification process between the Licensees.
- Energy consumption during the TOU time intervals and maximum demand readings shall be based on actual recorded readings or estimated as per mutually agreed criteria, until suitable metering facilities are installed during the interim period.
- DLs verify and settle TL (BSOB)'s invoices by part payments on weekly basis and final payment by first week of the following month.

Boundary Meters between DLs

- TL is responsible for DL/DL boundary meter readings which shall be taken on 1st day of each month. TL may delegate this responsibility to respective DLs on mutual agreement between the parties concerned.
- TL to incorporate necessary adjustments for DL/DL power and energy transfers in accordance with the agreed methodology for determination of final sales figures.

Metering Cycle Adjustments for LECO (DL5)

- TL (BSOB) shall directly invoice DL5 (LECO) for bulk supply transactions with effect from 1st January 2011.
- Respective DLs are responsible to complete all bulk supply transactions with DL5 (LECO) prior to 1st January 2011, in order to begin with calendar month based invoicing by TL (BSOB) with effect from 1st January 2011.

Reports to PUCSL

- DLs send data and summary reports of actual retail sales to each customer category, number of customers, losses and street lighting consumption etc. as per formats provided and in accordance with the online Licensee Information Submission System (LISS) established by the Commission.

Schedule of Meter Reading, Invoicing and Payments

DAY	Gen. Licensees (GL)	Tx. Licensee (TL)	Dx Licensee (DL)
Day 1	Meter Readings	Meter Readings	Meter Readings
Day 7	Invoice to TL	Invoice to DLs	
		Tx Business Invoice	Final Payments to TL for previous invoice.
		BSOB Invoice	
Day 10		Verification of invoices	Verification of invoices
		Monthly Reports to PUCSL	Monthly Reports to PUCSL
Day 14			Part Payments to TL for current invoice (50%)
Day 21			Part Payments to TL for current invoice (25%)
		Full Payment to GLs	
Day 30		Full Payment to TL TB and BSOB	Part Payments to TL for current invoice (10%)