

**CENTRAL ELECTRICITY REGULATORY COMMISSION  
NEW DELHI**

**Petition No. 44/TT/2013**

**Coram:**

**Shri Gireesh B. Pradhan, Chairperson  
Shri A.K. Singhal, Member  
Shri A.S. Bakshi, Member**

**Date of Hearing : 26.03.2015  
Date of Order : 07.12.2015**

**In the matter of:**

Approval of transmission tariff for Asset-1: LILO of 220 kV Misa-Kathalguri Transmission line at Mariani alongwith Mariani Switching Station (Anticipated COD: 1.4.2013); Asset-2: 4x6.67 MVAR, 132 kV, I-Ph Bus Reactor at 132 kV Ziro Sub-station (Anticipated COD: 1.1.2013); Asset-3: 132/33 kV Imphal Sub-station (New) and LILO of 132 kV S/C Ningthoukhong-Yurembam line at Imphal (New) Sub-station (Anticipated COD: 1.4.2013) and Asset-4: 20 MVAR, Bus Reactor at 220 kV Mariani Switching Station (Anticipated COD: 1.4.2013) under Transmission System associated with Pallatana Gas Based Power Project and Bongaigaon Thermal Power Station in North Eastern Region (NER) for tariff block 2009-14, under Regulation-86 of Central Electricity Regulatory Commission (Conduct of Business) Regulations, 1999 and Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2009

**And in the matter of:**

Power Grid Corporation of India Limited,  
"Saudamini", Plot No.2,  
Sector-29, Gurgaon -122 001

.....**Petitioner**

**Vs**

1. Assam State Electricity Board,  
Bijulee Bhawan, Paltan Bazar,  
Guwahati-781 001, Assam
2. Meghalaya Energy Corporation Limited,  
(Formerly Meghalaya State Electricity Board)  
Short Round Road, Shillong-793 001
3. Government of Arunachal Pradesh,  
Itanagar,  
Arunachal Pradesh

4. Power & Electricity Department,  
Government of Mizoram,  
Mizoram, Aizwal
5. Electricity Department,  
Government of Manipur,  
Keishampat, Imphal
6. Department of Power,  
Government of Nagaland,  
Kohima, Nagaland
7. Tripura State Electricity Corporation Limited,  
Bidyut Bhawan, North Banamalipur,  
Agartala, Tripura-700 001
8. ONGC Tripura Power Corporation Limited (OTPC),  
6<sup>th</sup> Floor, A Wing, IFCI Towers,  
New Delhi-110 019
9. NTPC Limited,  
NTPC Bhawan, Scope Complex,  
Institutional Area, Lodhi Road,  
New Delhi-110 003

....Respondents

**For petitioner** : Shri S. K. Venkatesan, PGCIL  
Shri M. M. Mondal, PGCIL  
Shri Jasbir Singh, PGCIL  
Shri S.S Raju, PGCIL

**For respondents** : None

### **ORDER**

The petition has been filed by Power Grid Corporation of India Limited (PGCIL) for approval of transmission charges for Asset-1: LILO of 220 kV Misa-Kathalguri Transmission line at Mariani alongwith Mariani Switching Station, Asset-2: 4x6.67 MVAR, 132 kV, I-Ph Bus Reactor at 132 kV Ziro Sub-station, Asset-3: 132/33 kV Imphal Sub-station (New) and LILO of 132 kV S/C Ningthoukhong-Yurembam line at Imphal (New) Sub-station and Asset-4: 20 MVAR, Bus Reactor at 220 kV Mariani Switching Station

(hereinafter referred to as “transmission assets”) under Transmission System associated with Pallatana Gas Based Power Project and Bongaigaon Thermal Power Station in NER from the date of commercial operation of the assets to 31.3.2014 for tariff block 2009-14 under Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations’ 2009 (hereinafter referred to as the "2009 Tariff Regulations").

2. The petitioner has been entrusted with the implementation of Transmission System associated with Pallatana Gas Based Power Project and Bongaigaon Thermal Power Station in NER. The Investment Approval (IA) of the project was accorded by the petitioner’s Board of Directors vide Memorandum No. C/CP/Pallatana-Bongaigaon dated 26.2.2010 at an estimated cost of ` 214400 lakh including IDC of ` 17835 lakh (based on 3rd quarter, 2009 price level). The scope of work covered under the project was scheduled to be commissioned within 34 months progressively from the date of IA i.e. by 25.12.2012 say 1.1.2013. The scope of project broadly includes:-

**Transmission Lines:**

- |   |          |
|---|----------|
| a. Bongaigaon TPS-Bongaigaon 400 kV D/C line                                      | : 3 km   |
| b. Silchar-Badarpur (POWERGRID) Switching Station Interconnecting 132 kV D/C line | : 21 km  |
| c. Pallatana-Surajmaninagar (TSECL) 400 kV D/C line (Charged at 132 kV)           | : 35 km  |
| d. Silchar-Purba Kanchan Bari (TSECL) 400 kV D/C line (Charged at 132 kV)         | : 122 km |
| e. Silchar-Melriat (New) 400 kV D/C line (Charged at 132 kV)                      | : 160 km |

- |  |          |
|--|----------|
| f. Silchar-Imphal (New) 400 kV D/C line<br>(Charged at 132 kV)                             | : 140 km |
| g. Melriat (New)-Melriat (Mizoram) Interconnecting<br>132 kV D/C line                      | : 30 km  |
| h. Silchar-Srikona (AEGCL) 132 kV D/C line   | : 3 km   |
| i. Silchar-Hailakandi (AEGCL) 132 kV D/C line  | : 25 km  |
| j. LILO of Loktak-Imphal (POWERGRID) 132 kV S/C line<br>at Imphal (New)                    | : 6 km   |
| k. LILO of Kathalguri-Misa 400 kV S/C line at Mariani<br>(Charged at 220 kV)               | : 2 km   |
| l. Mariani (New)-Mokokchung (POWERGRID) 220 kV<br>D/C line                                 | : 56 km  |
| m. Mokokchung (POWERGRID)- Mokokchung (Nagaland)<br>132 kV D/C line (with Zebra conductor) | : 1 km   |
| n. Pasighat-Roing 132 kV S/C line (on D/C tower)   | : 70 km  |
| o. Roing-Tezu 132 kV S/C line (on D/C tower)   | : 60 km  |
| p. Tezu-Namsal 132 kV S/C line (on D/C tower)  | : 90 km  |

**Sub-stations:**

- a. 2x200 MVA, 400/132 kV New Sub-station at Silchar
- b. 2x50 MVA, 132/33 kV New Sub-station at Melriat (upgradable to 400 kV)
- c. 2x50 MVA, 132/33 kV Imphal (New) Sub-station
- d. 200 kV New Switching Station at Mariani
- e. 2x50 MVA, 200/132 kV New Sub-station at Mokokchung
- f. 2x15 MVA, 132/33 kV New Sub-station at Roing
- g. 2x15 MVA, 132/33 kV New Sub-station at Tezu
- h. 2x15 MVA, 132/33 kV New Sub-station at Namsal

3. The petitioner initially filed the instant petition based on the anticipated dates of commercial operation of the instant assets. However, the petitioner vide affidavit dated 19.12.2013 submitted the actual date of commercial operation of assets covered in the instant petition as well as bifurcation of Asset-3 into 5 different parts and the details are as follows:-

Particulars	Schedule DOCO as per IA	Actual DOCO	Delay
<b>Asset-1:</b> LILO of 220 kV Misa-Kathalguri Transmission line at Mariani alongwith Mariani Switching Station	1.1.2013	1.4.2013	3 months
<b>Asset-2:</b> 4x6.67 MVAR, 132 kV, I-Ph Bus Reactor at 132 kV Ziro Sub-station		1.2.2013	1 month
<b>Asset-3.1:</b> 1 no. 50 MVA, 132/33 kV ICT-1 (2 <sup>nd</sup> Transformer) alongwith associated bays at 132 kV Imphal Sub-station		1.5.2013	4 months
<b>Asset-3.2:</b> Loop-in line 132 kV Imphal-Ningthoukhong T/L alongwith associated bays at Imphal Sub-station		1.4.2013	3 months
<b>Asset-3.3:</b> Loop-out line 132 kV Imphal-Ningthoukhong T/L alongwith associated bays at Imphal Sub-station		1.9.2013	8 months
<b>Asset-3.4:</b> 1 no. 50 MVA, 132/33 kV ICT alongwith associated bays at 132 kV Imphal (New) Sub-station		1.4.2013	3 months
<b>Asset-3.5:</b> 1x20 MVAR Bus Reactor alongwith associated bays at 132/33 kV Imphal (New) Sub-station		1.3.2013	2 months
<b>Asset-4:</b> 20 MVAR, Bus Reactor at 220 kV Mariani Switching Station		1.4.2013	3 months

4. This order has been issued after considering PGCIL affidavits dated 19.12.2013, 11.4.2014, 27.5.2014, 21.10.2014 19.5.2015 and 29.6.2015.

5. The transmission charges claimed by the petitioner are as follows:-

Particulars	( ` in lakh)				
	Asset-1 2013-14	Asset-2 2012-13 (pro-rata)	Asset-2 2013-14	Asset-3.1 2013-14 (pro-rata)	Asset-3.2 2013-14
Depreciation	60.78	3.32	23.06	11.59	4.78
Interest on Loan	89.17	3.99	26.37	13.34	19.69
Return on Equity	85.32	3.65	25.70	12.91	18.27
Interest on working capital	10.25	0.54	3.54	2.48	2.74
O & M Expenses	91.77	5.16	32.73	30.00	32.84

<b>Total</b>	<b>337.29</b>	<b>16.66</b>	<b>111.40</b>	<b>70.32</b>	<b>78.32</b>
<b>Particulars</b>	<b>Asset-3.3</b>	<b>Asset-3.4</b>	<b>Asset-3.5</b>		<b>Asset-4</b>
	<b>2013-14 (pro-rata)</b>	<b>2013-14</b>	<b>2012-13 (pro-rata)</b>	<b>2013-14</b>	<b>2013-14</b>
Depreciation	4.54	16.79	1.70	21.38	32.84
Interest on Loan	5.18	19.69	2.02	24.33	38.79
Return on Equity	4.95	18.71	1.88	23.82	36.59
Interest on working capital	1.37	3.01	0.27	3.41	4.91
O & M Expenses	19.14	32.73	2.58	32.73	45.82
<b>Total</b>	<b>35.18</b>	<b>90.93</b>	<b>8.45</b>	<b>105.67</b>	<b>158.95</b>

6. The details submitted by the petitioner in support of its claim for interest on working capital are as under:-

( ₹ in lakh)

<b>Particulars</b>	<b>Asset-1</b>	<b>Asset-2</b>		<b>Asset-3.1</b>	<b>Asset-3.2</b>
	<b>2013-14</b>	<b>2012-13 (pro-rata)</b>	<b>2013-14</b>	<b>2013-14 (pro-rata)</b>	<b>2013-14</b>
Maintenance Spares	13.77	4.64	4.91	4.91	4.93
O & M Expenses	7.65	2.58	2.73	2.73	2.74
Receivables	56.22	16.66	18.57	12.78	13.05
<b>Total</b>	<b>77.64</b>	<b>23.88</b>	<b>26.21</b>	<b>20.42</b>	<b>20.72</b>
Rate of Interest	13.20%	13.50%	13.50%	13.20%	13.20%
<b>Interest</b>	<b>10.25</b>	<b>0.54</b>	<b>3.54</b>	<b>2.48</b>	<b>2.74</b>
<b>Particulars</b>	<b>Asset-3.3</b>	<b>Asset-3.4</b>	<b>Asset-3.5</b>		<b>Asset-4</b>
	<b>2013-14 (pro-rata)</b>	<b>2013-14</b>	<b>2012-13 (pro-rata)</b>	<b>2013-14</b>	<b>2013-14 (pro-rata)</b>
Maintenance Spares	4.92	4.91	4.64	4.91	6.87
O & M Expenses	2.73	2.73	2.58	2.73	3.82
Receivables	10.05	15.16	16.90	17.61	26.49
<b>Total</b>	<b>17.70</b>	<b>22.80</b>	<b>24.12</b>	<b>25.25</b>	<b>37.18</b>
Rate of Interest	13.20%	13.20%	13.50%	13.50%	13.20%
<b>Interest</b>	<b>1.37</b>	<b>3.01</b>	<b>0.27</b>	<b>3.41</b>	<b>4.91</b>

7. No comments or suggestions have been received from the general public in response to the notices published by the petitioner under Section 64 of the Electricity Act and none of the respondents have filed any reply.

8. Having heard the petitioner and perused the material on record, we proceed to dispose of the petition.

## **Capital Cost**

9. Regulation 7 of the 2009 Tariff Regulations provides as follows:-

**“(1) Capital cost for a project shall include:-**

(a) The expenditure incurred or projected to be incurred, including interest during construction and financing charges, any gain or loss on account of foreign exchange risk variation during construction on the loan – (i) being equal to 70% of the funds deployed, in the event of the actual equity in excess of 30% of the funds deployed, by treating the excess equity as normative loan, or (ii) being equal to the actual amount of loan in the event of the actual equity less than 30% of the fund deployed, - up to the date of commercial operation of the project, as admitted by the Commission, after prudence check.

(b) capitalised initial spares subject to the ceiling rates specified in regulation 8; and

(c) additional capital expenditure determined under regulation 9:

Provided that the assets forming part of the project, but not in use shall be taken out of the capital cost.

(2) The capital cost admitted by the Commission after prudence check shall form the basis for determination of tariff:

Provided that in case of the thermal generating station and the transmission system, prudence check of capital cost may be carried out based on the benchmark norms to be specified by the Commission from time to time:

Provided further that in cases where benchmark norms have not been specified, prudence check may include scrutiny of the reasonableness of the capital expenditure, financing plan, interest during construction, use of efficient technology, cost over-run and time over-run, and such other matters as may be considered appropriate by the Commission for determination of tariff.”

10. The petitioner has submitted the capital cost incurred as on the actual date of commercial operation and capital cost projected to be incurred from COD to 31.3.2014 as per auditors' certificate dated 25.4.2015 and 2.5.2015, submitted vide affidavit dated 19.5.2015 and 29.6.2015. The petitioner has submitted the estimated additional capital expenditure for the years 2014-15 and 2015-16. However, in the instant petition, the estimated additional capital expenditure for the years 2014-15 and 2015-16 has not been considered for

the purpose of tariff computation as it falls beyond the tariff period of 2009-14. The details of apportioned approved cost, actual capital cost as on the date of commercial operation and estimated additional capital expenditure incurred or projected to be incurred for the instant assets covered in the petition are as under:-

(` in lakh)

Particulars	Apportioned approved cost	Cost as on COD (A)	Projected expenditure	Estimated completion Cost upto 31.3.2014 (C)=(A)+(B)	Projected expenditure		Total estimated completion Cost (F)=(C)+(D)+(E)
			2013-2014 (B)		2014-15 (D)	2015-16 (E)	
Asset-1	3095.64	1393.31	114.00	1507.31	33.60	156.48	1697.39
Asset-2	772.89	377.01	119.60	496.61	45.41	-	542.02
Asset-3.1	555.23	233.67	11.57	245.24	20.67	76.35	342.26
Asset-3.2	2089.80	275.83	69.50	345.33	-	88.86	434.19
Asset-3.3	388.76	127.62	33.00	160.62	9.56	35.72	205.90
Asset-3.4	569.16	297.51	41.00	338.51	16.27	19.29	374.07
Asset-3.5	466.15	387.23	35.40	422.63	4.48	36.32	463.43
Asset-4	545.56	587.48	68.90	656.38	8.34	28.65	693.37

#### **Cost over-run/variation**

11. As indicated in para-10 above, the estimated completion cost of the Asset-4 is in excess of the approved apportioned cost. The estimated completion cost of Asset-4 as on 31.3.2014 is ` 656.38 lakh and total estimated completion cost is ` 693.37 lakh against the apportioned approved cost of ` 545.56 lakh. Hence, there is cost over-run in the case of Asset-4. Accordingly, the capital cost claimed by the petitioner in the case of Asset-4 is restricted upto apportioned approved cost and considered for the purpose of computation of transmission charges. This approach has been upheld by the Appellate Tribunal for Electricity in its order dated 28.11.2013 in Appeal No. 165 of 2012. Subsequently, the Commission, in its order dated 18.2.2014 in Petition No. 216/TT/2012, has considered the apportioned approved cost of individual asset for restricting the capital expenditure due to cost over-run



for the purpose of tariff determination. The same approach has been adopted in the present case and capital expenditure has been restricted to apportioned approved cost. The petitioner is directed to submit the reasons for cost over-run in case of Asset-4 at the time of truing up.

12. There is cost variation in all the other three assets i.e. Asset-1, Asset-2 and combined Asset-3. The petitioner vide letter dated 31.10.2013 and vide RoP for hearing dated 26.3.2015 was directed to submit the reasons for the cost variations/over estimation of cost in respect of Asset-1, 2, and 3 as well as cost over-run in the case of Asset-4 as per details as under:-

**Asset-1:**

- a. -79% (Lower Expenses) in Transmission Line Material
- b. +31% (higher Expenses) in Civil Works.

**Asset-2:**

- a. +68% (higher Expenses) in Civil Works

**Combined Asset-3:**

- a. -63.8% (Lower Expenses) in Civil Works
- b. -34% (lower Expenses) in sub-station Equipments

**Asset-IV:**

- a. +281% (higher Expenses) in Misc. civil works

13. The petitioner was directed to explain the above cost variation alongwith documentary proof such as the approval of committee on transmission planning for NER as the length of transmission line had undergone a change, detailed computation of FR estimates including the details of assets (name of assets/equipment/date of order/quantity and value) which were considered for preparing the basis of estimates alongwith the price levels at which these estimates were prepared as well as the indices at the time of preparation of FR, at the time of order and at the time of COD to

be submitted as the overall cost estimates at FR stage were observed to be higher as compared to actual cost in the case of Asset-1, 2 and combined Asset-3, data for capital cost benchmarking in accordance with the commissions' orders dated 27.4.2010 and 16.6.2010 on capital cost benchmarking for 765/400 kV Transmission Lines and Sub-Stations and details of element wise and year wise actual capital expenditure incurred upto 31.3.2014.

14. The petitioner vide affidavits dated 19.12.2013, 11.4.2014 and 29.6.2015 has submitted asset wise reasons as under:-

(a) As regards Asset-1, the petitioner has submitted that the overall reduction of cost by `1398 lakh in comparison to FR cost is due to reduction of line length from 2 km at FR stage to 0.17 km and the consequent reduction in number for towers from seven to two towers. The petitioner has submitted that the reduction in line length led to decrease in quantity of tower steel, conductor, hardware fitting, earth wire, insulators, civil works, etc which resulted in saving of cost by `480 lakh. The petitioner has further submitted that the construction of township colony which was envisaged at FR stage was not constructed and non-execution thereof resulted in reduction of cost by `730 lakh.

(b) As regards Asset-2, the petitioner has submitted that the Civil works have increased as per site requirement and execution thereof. However, reduction of `230 lakh was achieved on account of reduction in taxes and duties as compared to FR cost, in view of domestic supplies as against imported supplies envisaged in the FR. The petitioner has further

submitted that the Imphal Sub-station (New) is being constructed adjacent to the existing Imphal Sub-station of POWERGRID with extension of the existing 132 kV bus. In view of this, the colony as envisaged in the FR was no longer required resulting in considerable reduction in cost of civil works. The reduction in cost of sub-station equipment is on account of lower awarded price as compared to original FR estimate.

(c) Asset-3 was split into five assets. The petitioner has submitted that in case of Asset 3.1 there was a total reduction of approximately `212 lakh on account of reduction in cost of transformer by `134 lakh, cost of switchgear equipment, structures, control and relay panels etc. by `43 lakh and reduction in IDC & IEDC thereon by `34 lakh. As regards Asset 3.2, the petitioner has submitted that a total reduction of approximately `1655 lakh is on account of change in scope, as against construction of LILO of 132 kV S/C Loktak PH (NHPC)-Imphal (PG) existing sub-station at Imphal (PG) New sub-station envisaged during FR stage LILO of 132 kV Loktak-Ningthoukhong-Yurembam/Imphal (Manipur State) at Imphal (PG) extended sub-station was constructed in line with agreement reached in 8<sup>th</sup> NERPC meeting, resulting in reduction of line length of 7 km to two single circuit line (loop-in-448 meters and Loop-out-332 meters) and inter-alia decrease in quantity of tower steel, conductor, hardware fittings, earth wire, insulators, civil work etc. (`159 lakh), township colony, site preparation, roads and drainage, structures foundations etc. envisaged during FR stage not constructed (`743 lakh), reduction in cost of switchgear equipment, structures, control & relay

panels etc. ( ₹ 142 lakh), reduction on account of IDC & IEDC ( ₹ 158 lakh) and contingency overheads ( ₹ 126 lakh). As regards Asset 3.3, the petitioner has submitted that there was total reduction of approximately ₹ 183 lakh on account of reduction in cost of switchgear equipment, structures, control and relay panels, etc. by ₹ 136 lakh, contingency overheads by ₹ 20 lakh and reduction in IDC & IEDC by ₹ 22 lakh. As regards Asset 3.4, the petitioner has submitted that there was total reduction of ₹ 195 lakh on account of reduction in cost transformer by ₹ 119 lakh, reduction in cost of switchgear equipment, structures, control and relay panels, etc. by ₹ 54 lakh and reduction in IDC & IEDC by ₹ 21 lakh. As regards Asset 3.5, the petitioner has submitted that total reduction of ₹ 2 lakh is on account of reduction in cost of switchgear equipment, structures, control and relay panels etc.

(d) Regarding Asset-4, the petitioner has submitted that a total increase of ₹ 147 lakh is on account of increase in the cost of civil works for the entire sub-station as per site requirement and execution thereof by ₹ 94 lakh, increase in the cost of the Bus Reactor ₹ 35 lakh and resultant increase in IDC & IEDC ₹ 18 lakh.

15. The petitioner has further submitted the relevant indices and basis of unit rates used for preparation of DPR for transmission system associated with Pallatana Gas Based Power Plant and Bongaigaon Thermal Power Station under the scope of the petitioner. As regards the data for capital cost benchmarking, the petitioner has submitted that it may not be applicable in case of the instant assets as they are of 220 kV and below voltage level as

against the Commissions' orders dated 27.4.2010 and 16.6.2010 wherein the capital cost benchmarking data is required for transmission lines and substations of 400 kV and above voltage level.

16. We have considered the submissions made by the petitioner. It is observed that there is over estimation of cost in case of Asset-1, 2, 3.1, 3.2, 3.3, 3.4 and 3.5 and there is cost over-run in case of Asset-4. The petitioner has submitted that some of the works envisaged at the FR stage were not executed as there was no requirement for such work and due to reduction of IDC and IEDC and reduction in cost of some of the equipments. The increase in cost of Asset-4 was due to increase in cost of civil works, Bus Reactor and resultant IDC and IEDC. The cost increase in case of Asset-4 and reduction in other assets is approved. However, we would like to point out that the cost estimates of the petitioner are not realistic not only in this petition but also in other similar petitions. In our view, the petitioner should adopt a prudent procedure to make cost estimates of different elements of the transmission projects more realistic.

#### **Time over-run**

17. The commissioning schedule of the project is 34 months from the date of IA which was 26.2.2010. Hence, the instant assets were scheduled to be commissioned by 25.12.2012 i.e. 1.1.2013. The actual commissioning dates and the delay in the commissioning of instant assets are as discussed at para-3. The instant assets have been commissioned after delay ranging from one month to eight months. Hence, there is time over-run in commissioning of all the instant assets.

18. The Commission directed the petitioner to submit detailed reasons for time over-run in the case of each asset. The petitioner vide affidavits dated 11.4.2014 and 29.6.2015 has submitted detailed reasons and these are tabulated as follows:-

Asset	Scheduled COD	Actual COD	Planned activity		Achieved		Main reason for delay
			From	To	From	To	
<b>Asset-1:</b> LILO of 220 kV Misa-Kathalguri T/L	1.1.2013	1.4.2013	Aug. 2011	Dec. 2012	Aug. 2012	Apr. 2013	Interruption in supplies of S/S equipment due to riots in Assam.
<b>Asset-2:</b> 4x6.67 MVAR, 132 kV, 1-Ph Bus Reactor at 132 kV Ziro Sub-station		1.2.2013	-	-	-	-	Interruption in supplies of S/S equipment due to riots in Assam. Minor delay of 1 month.
<b>Asset-3:</b>							
<b>3.1:</b> No.50 MVA, 132/33 KV ICT-I(2 <sup>nd</sup> Transformer) alongwith associated Bays at 132 KV Imphal S/S		1.5.2013	Aug. 2011	Dec. 2012	Sep. 2011	May. 2013	Delay in land acquisition and Economic blockade of Manipur State
<b>3.2:</b> Loop-in line 132 KV Imphal Ningthoukhong T/L alongwith associated bay at Imphal		1.4.2013	Mar. 2012	Dec. 2012	Dec. 2012	Mar. 2013	
<b>3.3:</b> Loop-out line of 132 KV Imphal Ningthoukhong T/L alongwith associated bay at Imphal		1.9.2013	Feb. 2012	Dec. 2012	Sep. 2012	Sep. 2013	
<b>3.4:</b> 1 No. 50 MVA, 132/33 KV ICT along with associated Bays at 132/33 KV Imphal(new) S/S		1.4.2013	Aug. 2011	Nov. 2011	Sep. 2011	Apr. 2013	
<b>3.5:</b> 1X20 MVAR Bus Reactor along with associated Bays at 132/33 KV Imphal (new) S/S		1.3.2013	Aug. 2011	Dec. 2012	Sep. 2011	Mar. 2013	
<b>Asset-4:</b> 20MVAR Bus Reactor at 220kV Mariani Switching Station			1.4.2013	Feb. 2011	Dec. 2012	Apr. 2011	Mar. 2013

19. We have considered the submissions made by the petitioner. The time over-run in case of Asset-1, Asset-2 and Asset-4 was due to delays caused by blockage of roads due to which limited time was available for supply of material and equipment. The time over-run in case of Asset-3.1, 3.2, 3.3, 3.4 and 3.5 was due to delay in land acquisition on account of stiff protests of villagers during August, 2009 and March, 2010, as well as delay in construction of LILO due to 100 days economic blockade of Manipur State and consequential crisis of diesel/petrol prices in the State. The reasons for time over-run are beyond the control of the petitioner and as such the time over-run in respect of the instant assets is condoned. Accordingly, the IDC and IEDC for this period are allowed to be capitalized.

**Treatment of IDC & IEDC**

20. The petitioner has claimed `99.49 lakh, `32.12 lakh, `12.62 lakh, `15.41 lakh, `10.36 lakh, `26.26 lakh, `29.26 lakh and `49.47 lakh towards Interest During Construction (IDC) in respect of Asset-1, Asset-2, Asset-3.1, Asset-3.2, Asset-3.3, Asset-3.4, Asset-3.5 and Asset-4 respectively as on the date of commercial operation. However, detailed working of IDC calculation i.e. details of IDC paid upto the date of commercial operation as well as after the date of commercial operation are not available. As per the provisions of Regulation 7(1) read with Regulation 3(2) of the 2009 Tariff Regulations, IDC has to be worked out on cash basis. Accordingly, IDC has been worked out based on the loans deployed for the asset as per Form-13, assuming that the petitioner has not made any default in the payment of interest, considering cash basis methodology. Further, the amount of IDC accrued as on the date of commercial operation and to be discharged after the date of commercial

operation has not been considered in the capital cost due to non-availability of adequate information. The petitioner is directed to submit the detailed working corresponding to the IDC, the actual cash expenditure in Form-14A and also to confirm if any undischarged IDC is included in the projected additional capital expenditure incurred or to be incurred to enable the Commission to consider the un-discharged liability once it is discharged subject to prudence check and submission of adequate information by the petitioner. In view of above, details of IDC claimed, allowed and considered in computation of tariff and disallowed are as under:-

( ₹ in lakh)

Particulars	IDC claimed by the petitioner on accrual basis	IDC considered on cash basis	IDC accrued and hence Disallowed
Asset-1	99.49	53.08	46.42
Asset-2	32.12	14.79	17.33
Asset-3.1	12.62	1.71	10.91
Asset-3.2	15.41	10.36	5.05
Asset-3.3	10.36	1.96	8.40
Asset-3.4	26.26	11.74	14.52
Asset-3.5	29.26	1.22	28.04
Asset-4	49.47	8.52	40.95

21. Similarly, the petitioner has claimed ₹ 102.64 lakh, ₹ 38.15 lakh, ₹ 9.03 lakh, ₹ 15.90 lakh, ₹ 6.54 lakh, ₹ 27.10 lakh, ₹ 34.76 lakh and ₹ 51.30 lakh in respect of Asset-1, Asset-2, Asset-3.1, Asset-3.2, Asset-3.3, Asset-3.4, Asset-3.5 and Asset-4 respectively as Incidental Expenditure During Construction (IEDC). The petitioner has not submitted details of admissible IEDC. Therefore, IEDC has been worked out as 5% on Hard Cost submitted in the Abstract Cost Estimates by the petitioner. Thus, in the absence of proper and sufficient details, IEDC claim has been restricted to 5% of Hard



Cost upto date of commercial operation for the purpose of the tariff in the instant petition. The petitioner is directed to submit year-wise details of actual IEDC paid till COD of the instant assets. In view of above, details of IEDC claimed, allowed and considered in computation of tariff and disallowed are as under:-

( ` in lakh)

Particulars	Hard Cost Claimed as on COD	IEDC Claimed	IEDC considered in Tariff Calculations (5% of Hard Cost or amount claimed, whichever is less)	IEDC Disallowed
Asset-1	1191.18	102.64	59.56	43.08
Asset-2	306.74	38.15	15.34	22.81
Asset-3.1	212.02	9.03	10.60	-
Asset-3.2	244.52	15.90	12.23	3.67
Asset-3.3	110.72	6.54	5.54	1.00
Asset-3.4	244.15	27.10	12.21	14.89
Asset-3.5	323.21	34.76	16.16	18.60
Asset-4	486.98	51.03	24.35	26.68

22. Regulation 9 of the 2009 Tariff Regulations provides for the treatment of undischarged liabilities after the same are discharged. However, as the petitioner has not submitted the required information with regard to the IDC/IEDC actually discharged, we are not inclined to allow the amount of IDC/IEDC as claimed by the petitioner. The petitioner is directed to submit the amount of IDC/IEDC pertaining to the transmission assets considered in this petition upto date of commercial operation and balance IDC discharged after the date of commercial operation. IDC/IEDC allowed shall be reviewed at the time of truing up on submission of adequate information by the petitioner as directed at paras 20 and 21.

## Initial Spares

23. Regulation 8 of the 2009 Tariff Regulations specifies ceiling norms for capitalization of initial spares in respect of transmission system as under:-

**“8. Initial Spares.** Initial spares shall be capitalised as a percentage of the original project cost, subject to following ceiling norms:

(iv) Transmission system

(a) Transmission line - 0.75%

(b) Transmission Sub-station - 2.5%

(c) Series Compensation devices and HVDC Station - 3.5%

Provided that where the benchmark norms for initial spares have been published as part of the benchmark norms for capital cost under first proviso to clause (2) of regulation 7, such norms shall apply to the exclusion of the norms specified herein.

24. The petitioner has claimed `16.68 lakh, `6.52 lakh and `0.98 lakh towards the cost of the initial spares and are included in the capital cost, which have been discharged from COD to 31.3.2014, for Asset-1, Asset-2 and Asset-4 respectively. It is observed that initial spares claimed by the petitioner in respect of Asset-4 corresponding to sub-station are within the specified ceiling limit, whereas initial spares claimed by the petitioner in respect of Asset-1 and Asset-2 corresponding to sub-station exceed the ceiling limit specified in Regulation 8 of the 2009 Tariff Regulations and accordingly the claim for initial spares in the case of Asset-1 and Asset-2 is restricted. Thus, the initial spares allowed in the capital cost in the case of Asset-1 and Asset-2 are as follows:-

(` in lakh)

Particulars	Capital cost claimed	Initial spares claimed	Capital Cost after adjustment of considering IDC/IEDC disallowed	Proportionate claim of initial spares against the adjusted capital cost	Ceiling limit	Initial spares worked out	Excess initial spares claimed
Asset-1: Sub-	114.00	16.78	114.00	16.78	2.50%	2.49	14.29

station including land, building and PLCC) from COD to 31.3.2014								
<b>Asset-2:</b> Sub-station including land, building and PLCC) from COD to 31.3.2014	119.60	6.52	119.60	6.52	2.50%	2.90	3.62	

25. The details of capital cost as on the date of commercial operation after taking into account admissible IDC, IEDC and admissible cost of initial spares considered for the purpose of the determination of transmission tariff are as follows:-

(` in lakh)

Particulars	Capital cost considered before adjustment of IDC/IEDC & initial spares as on COD (A)	Disallowed			Capital cost as on COD allowed for tariff calculation (E)= (A)-(B+C+D)
		IDC (B)	IEDC (C)	Excess initial spares as on COD (D)	
Asset-1	1393.31	46.42	43.08	-	1303.81
Asset-2	377.01	17.33	22.81	-	336.87
Asset-3.1	233.67	10.91	-	-	222.76
Asset-3.2	275.83	5.05	3.67	-	267.11
Asset-3.3	127.62	8.40	1.00	-	118.22
Asset-3.4	297.51	14.52	14.89	-	268.10
Asset-3.5	387.23	28.04	18.60	-	340.59
Asset-4	587.48	40.95	26.68	-	519.85

### **Projected Additional Capital Expenditure**

26. Clause (1) of Regulation 9 of the 2009 Tariff Regulations provides as follows:-

“Additional Capitalisation: (1) The capital expenditure incurred or projected to be incurred, on the following counts within the original scope of work, after the date of commercial operation and up to the cut-off date may be admitted by the Commission, subject to prudence check:

- (i) Undischarged liabilities;

- (ii) Works deferred for execution;
- (iii) Procurement of initial capital Spares within the original scope of work, subject to the provisions of Regulation 8;
- (iv) Liabilities to meet award of arbitration or for compliance of the order or decree of a court; and
- (v) Change in Law:"

27. Clause (11) of Regulation 3 of the 2009 Tariff Regulations defines "cut-off" date as follows:-

"cut-off date" means 31<sup>st</sup> March of the year closing after 2 years of the year of commercial operation of the project, and in case the project is declared under commercial operation in the last quarter of the year, the cut-off date shall be 31<sup>st</sup> March of the year closing after 3 years of the year of commercial operation".

28. Therefore, the cut-off date for the instant assets is 31.3.2016.

29. The admissibility of additional capital expenditure incurred after the date of commercial operation is to be dealt in accordance with the provisions of Regulation 9 (1) of the 2009 Tariff Regulations. The projected additional capital expenditure claimed is mainly on account of balance and retention payments.

30. It is observed that the additional capital expenditure incurred and projected to be incurred for the instant assets from the date of commercial operation and during 2013-14 is on account of Balance/Retention payments. The additional capital expenditure claimed by the petitioner upto 31.3.2014 is within the cut-off date and accordingly is allowed in terms of Regulation 9 (1) (i) of the 2009 Tariff Regulations. The additional capital expenditure claimed by the petitioner during 2014-15 and 2015-16 falls beyond the tariff period 2009-14. Hence, it shall be considered in the next tariff period. The projected

additional capital expenditure shall be reviewed at the time of truing up on the submission of the actual additional capital expenditure. However, as discussed at para-11, in the case of Asset-4, the claim of the petitioner has been restricted upto apportioned approved cost as the petitioner's claim for capital cost upto 31.3.2014 is in excess of the apportioned approved cost. As such, the additional capital expenditure projected for the year 2013-14 in the case of Asset-4 has been allowed for an amount of `25.71 lakh as against the claim of `68.90 lakh so as to restrict the capital cost in the case of Asset-4 upto `545.56 lakh as on 31.3.2014 i.e. equal to the apportioned approved cost. Further, the excess initial spares disallowed as discussed at para-24 in respect of Asset-1 and Asset-2 corresponding to sub-station have also been reduced from the additional capital expenditure projected for the year 2013-14 to determine the additional capital expenditure considered for the purpose of allowing tariff in the instant petition. The capital cost of the asset shall be reviewed at the time of truing-up on submission of RCE. Accordingly, the details of additional capital expenditure allowed in respect of the instant assets are as under:-

(` in lakh)

Particulars	Additional Capital expenditure claimed		Additional Capital expenditure		
	COD to 31.3.2013	2013-14	Total claimed	Disallowed	Allowed
Asset-1	-	114.00	114.00	14.29	99.71
Asset-2	-	119.60	119.60	3.62	115.98
Asset-3.1	-	11.57	11.57	-	11.57
Asset-3.2	-	69.50	69.50	-	69.50
Asset-3.3	-	33.00	33.00	-	33.00
Asset-3.4	-	41.00	41.00	-	41.00
Asset-3.5	-	35.40	35.40	-	35.40
Asset-4	-	68.90	68.90	43.19	25.71

## **Debt-Equity Ratio**

31. Regulation 12 of the 2009 Tariff Regulations provides as follows:-

“12. Debt-Equity Ratio (1) For a project declared under commercial operation on or after 1.4.2009, if the equity actually deployed is more than 30% of the capital cost, equity in excess of 30% shall be treated as normative loan:

Provided that where equity actually deployed is less than 30% of the capital cost, the actual equity shall be considered for determination of tariff:

Provided further that the equity invested in foreign currency shall be designated in Indian rupees on the date of each investment.

**Explanation-** The premium, if any, raised by the generating company or the transmission licensee, as the case may be, while issuing share capital and investment of internal resources created out of its free reserve, for the funding of the project, shall be reckoned as paid up capital for the purpose of computing return on equity, provided such premium amount and internal resources are actually utilised for meeting the capital expenditure of the generating station or the transmission system.

(2) In case of the generating station and the transmission system declared under commercial operation prior to 1.4.2009, debt-equity ratio allowed by the Commission for determination of tariff for the period ending 31.3.2009 shall be considered.

(3) Any expenditure incurred or projected to be incurred on or after 1.4.2009 as may be admitted by the Commission as additional capital expenditure for determination of tariff, and renovation and modernisation expenditure for life extension shall be serviced in the manner specified in clause (1) of this regulation.”

32. The petitioner has claimed debt: equity in the ratio of 70:30 as on the date of commercial operation of the instant assets and for additional capital expenditure and it is in accordance with the above Regulations and has been considered for the purpose of computation of tariff. The details of debt-equity ratio in respect of the instant assets as on date of commercial operation and as on 31.3.2014 are as under:-

( ₹ in lakh)

Particulars	Asset-1			
	Cost as on COD		Cost as on 31.3.2014	
	Amount	%	Amount	%
Debt	912.67	70.00	982.47	70.00
Equity	391.14	30.00	421.06	30.00

<b>Total</b>	<b>1303.81</b>	<b>100.00</b>	<b>1403.53</b>	<b>100.00</b>
<b>Particulars</b>	<b>Asset-2</b>			
	<b>Cost as on COD</b>		<b>Cost as on 31.3.2014</b>	
	<b>Amount</b>	<b>%</b>	<b>Amount</b>	<b>%</b>
Debt	235.81	70.00	316.99	70.00
Equity	101.06	30.00	135.85	30.00
<b>Total</b>	<b>336.87</b>	<b>100.00</b>	<b>452.84</b>	<b>100.00</b>
<b>Particulars</b>	<b>Asset-3.1</b>			
	<b>Cost as on COD</b>		<b>Cost as on 31.3.2014</b>	
	<b>Amount</b>	<b>%</b>	<b>Amount</b>	<b>%</b>
Debt	155.93	70.00	164.03	70.00
Equity	66.83	30.00	70.30	30.00
<b>Total</b>	<b>222.76</b>	<b>100.00</b>	<b>234.33</b>	<b>100.00</b>
<b>Particulars</b>	<b>Asset-3.2</b>			
	<b>Cost as on COD</b>		<b>Cost as on 31.3.2014</b>	
	<b>Amount</b>	<b>%</b>	<b>Amount</b>	<b>%</b>
Debt	186.97	70.00	235.62	70.00
Equity	80.13	30.00	100.98	30.00
<b>Total</b>	<b>267.10</b>	<b>100.00</b>	<b>336.60</b>	<b>100.00</b>
<b>Particulars</b>	<b>Asset-3.3</b>			
	<b>Cost as on COD</b>		<b>Cost as on 31.3.2014</b>	
	<b>Amount</b>	<b>%</b>	<b>Amount</b>	<b>%</b>
Debt	82.75	70.00	105.85	70.00
Equity	35.46	30.00	45.36	30.00
<b>Total</b>	<b>118.21</b>	<b>100.00</b>	<b>151.21</b>	<b>100.00</b>
<b>Particulars</b>	<b>Asset-3.4</b>			
	<b>Cost as on COD</b>		<b>Cost as on 31.3.2014</b>	
	<b>Amount</b>	<b>%</b>	<b>Amount</b>	<b>%</b>
Debt	187.67	70.00	216.37	70.00
Equity	80.43	30.00	92.73	30.00
<b>Total</b>	<b>268.10</b>	<b>100.00</b>	<b>309.10</b>	<b>100.00</b>
<b>Particulars</b>	<b>Asset-3.5</b>			
	<b>Cost as on COD</b>		<b>Cost as on 31.3.2014</b>	
	<b>Amount</b>	<b>%</b>	<b>Amount</b>	<b>%</b>
Debt	238.41	70.00	263.19	70.00
Equity	102.18	30.00	112.80	30.00
<b>Total</b>	<b>340.59</b>	<b>100.00</b>	<b>375.99</b>	<b>100.00</b>
<b>Particulars</b>	<b>Asset-4</b>			
	<b>Cost as on COD</b>		<b>Cost as on 31.3.2014</b>	
	<b>Amount</b>	<b>%</b>	<b>Amount</b>	<b>%</b>
Debt	363.90	70.00	381.89	70.00
Equity	155.95	30.00	163.66	30.00
<b>Total</b>	<b>519.85</b>	<b>100.00</b>	<b>545.56</b>	<b>100.00</b>

33. The above stated debt-equity ratios have been applied for the purpose of tariff calculation in this order.

### **Return on Equity**

34. Regulation 15 of the 2009 Tariff Regulations provides as under:-

“15. (1) Return on equity shall be computed in rupee terms, on the equity base determined in accordance with regulation 12.

(2) Return on equity shall be computed on pre-tax basis at the base rate of 15.5% for thermal generating stations, transmission system and run of the river generating station, and 16.5% for the storage type generating stations including pumped storage hydro generating stations and run of river generating station with pondage and shall be grossed up as per clause (3) of this regulation:

Provided that in case of projects commissioned on or after 1st April, 2009, an additional return of 0.5% shall be allowed if such projects are completed within the timeline specified in **Appendix-II**:

Provided further that the additional return of 0.5% shall not be admissible if the project is not completed within the timeline specified above for reasons whatsoever.

(3) The rate of return on equity shall be computed by grossing up the base rate with the Minimum Alternate/Corporate Income Tax Rate for the year 2008-09, as per the Income Tax Act, 1961, as applicable to the concerned generating company or the transmission licensee, as the case may be:

(4) Rate of return on equity shall be rounded off to three decimal points and be computed as per the formula given below:

Rate of pre-tax return on equity = Base rate / (1-t)

Where t is the applicable tax rate in accordance with clause (3) of this regulation.

(5) The generating company or the transmission licensee as the case may be, shall recover the shortfall or refund the excess Annual Fixed charge on account of Return on Equity due to change in applicable Minimum Alternate/Corporate Income Tax Rate as per the Income Tax Act, 1961 (as amended from time to time) of the respective financial year directly without making any application before the Commission;

Provided further that Annual Fixed charge with respect to the tax rate applicable to the generating company or the transmission licensee, as the case may be, in line with the provisions of the relevant Finance Acts of the respective financial year during the tariff period shall be trued up in accordance with Regulation 6 of these regulations”.



35. Regulation 15 of 2009 Tariff Regulation provides for working out return on equity. The details of return on equity worked out are as follows:-

(` in lakh)

Particulars	Asset-1	Asset-2		Asset-3.1	Asset-3.2
	2013-14	2012-13 (pro-rata)	2013-14	2013-14 (pro-rata)	2013-14
Opening Equity	391.14	101.06	101.06	66.83	80.13
Addition due to Additional Capitalization	29.91	-	34.79	3.47	20.85
Closing Equity	421.06	101.06	135.85	70.30	100.98
Average Equity	406.10	101.06	118.45	68.56	90.56
Return on Equity (Base Rate )	15.50%	15.50%	15.50%	15.50%	15.50%
Tax rate for the year (MAT) (Truing-up)	20.961%	20.008%	20.961%	20.961%	20.961%
Rate of Return on Equity (Pre-tax )	19.611%	19.377%	19.611%	19.611%	19.611%
<b>Return on Equity (Pre-tax)</b>	<b>79.64</b>	<b>3.26</b>	<b>23.23</b>	<b>12.33</b>	<b>17.76</b>
Particulars	Asset-3.3	Asset-3.4	Asset-3.5		Asset-4
	2013-14 (pro-rata)	2013-14	2012-13 (pro-rata)	2013-14	2013-14
Opening Equity	35.46	80.43	102.18	102.18	155.95
Addition due to Additional Capitalization	9.90	12.30	-	10.62	7.71
Closing Equity	45.36	92.73	102.18	112.80	163.66
Average Equity	40.41	86.58	102.18	107.49	159.81
Return on Equity (Base Rate )	15.50%	15.50%	15.50%	15.50%	15.50%
Tax rate for the year 2008-09 (MAT)	20.961%	20.961%	20.008%	20.961%	20.961%
Rate of Return on Equity (Pre-tax )	19.611%	19.611%	19.377%	19.611%	19.611%
<b>Return on Equity (Pre-tax)</b>	<b>4.62</b>	<b>16.98</b>	<b>1.65</b>	<b>21.08</b>	<b>31.34</b>

36. The petitioner's prayer for recovery of the shortfall or refund the excess Annual Fixed Charges, on account of RoE due to change in applicable Minimum Alternate/Corporate Income Tax rate as per the Income Tax Act, 1961 of the respective financial year directly without making any application before the Commission shall be dealt with Regulation 15 (5) of 2009, Tariff Regulation. We wish to clarify that in respect of Asset-1, Asset-3.1, Asset-3.2, Asset-3.3, Asset-3.4 and Asset-4, pre-tax ROE of 20.961% p.a has been considered for the year 2013-14 and in respect of Asset-2 and Asset-3.5, pre-tax ROE of 20.008% p.a and 20.961% p.a have been

considered for the years 2012-13 and 2013-14 respectively on average equity as per Regulation 15 of the 2009 Tariff Regulations in this order itself.

### **Interest on Loan**

37. Regulation 16 of the 2009 Tariff Regulations provides as under:-

“16. **Interest on loan capital** (1) The loans arrived at in the manner indicated in regulation 12 shall be considered as gross normative loan for calculation of interest on loan.

(2) The normative loan outstanding as on 1.4.2009 shall be worked out by deducting the cumulative repayment as admitted by the Commission up to 31.3.2009 from the gross normative loan.

(3) The repayment for the year of the tariff period 2009-14 shall be deemed to be equal to the depreciation allowed for that year:

(4) Notwithstanding any moratorium period availed by the generating company or the transmission licensee, as the case may be the repayment of loan shall be considered from the first year of commercial operation of the project and shall be equal to the annual depreciation allowed.

(5) The rate of interest shall be the weighted average rate of interest calculated on the basis of the actual loan portfolio at the beginning of each year applicable to the project:

Provided that if there is no actual loan for a particular year but normative loan is still outstanding, the last available weighted average rate of interest shall be considered:

Provided further that if the generating station or the transmission system, as the case may be, does not have actual loan, then the weighted average rate of interest of the generating company or the transmission licensee as a whole shall be considered.

(6) The interest on loan shall be calculated on the normative average loan of the year by applying the weighted average rate of interest.

(7) The generating company or the transmission licensee, as the case may be, shall make every effort to re-finance the loan as long as it results in net savings on interest and in that event the costs associated with such re-financing shall be borne by the beneficiaries and the net savings shall be shared between the beneficiaries and the generating company or the transmission licensee, as the case may be, in the ratio of 2:1.

(8) The changes to the terms and conditions of the loans shall be reflected from the date of such re-financing.

(9) In case of dispute, any of the parties may make an application in accordance with the Central Electricity Regulatory Commission (Conduct of Business) Regulations, 1999, as amended from time to time, including statutory re-enactment thereof for settlement of the dispute:

Provided that the beneficiary or the transmission customers shall not withhold any payment on account of the interest claimed by the generating company or the transmission licensee during the pendency of any dispute arising out of re-financing of loan.”

38. In keeping with the provisions of Regulation 16 of the 2009 Tariff Regulations, the petitioner’s entitlement of interest on loan has been calculated on the following basis:-

- (a) Gross amount of loan, repayment of instalments and rate of interest on actual loans have been considered as per the petition;
- (b) The yearly repayment for the tariff period 2009-14 has been considered to be equal to the depreciation allowed for that year; and
- (c) Weighted average rate of interest on actual average loan worked out as per (a) above is applied on the notional average loan during the year to arrive at the interest on loan.

39. The petitioner has submitted that the interest on loan has been considered on the basis of rate prevailing as on 1.4.2009 and the change in interest due to floating rate of interest applicable, if any, for the project needs to be claimed/ adjusted over the tariff block 2009-14. We would like to clarify that the interest on loan has been calculated on the basis of rate prevailing as on the date of commercial operation. Any change in rate of interest subsequent to the date of commercial operation will be considered at the time of truing up.

40. Detailed calculations in support of the weighted average rates of interest have been given at Annexure-1 to Annexure-8.

41. Based on the above, interest on loan allowed is as overleaf:-

(` in lakh)

Particulars	Asset-1	Asset-2		Asset-3.1	Asset-3.2
	2013-14	2012-13 (pro-rata)	2013-14	2013-14 (pro-rata)	2013-14
Gross Normative Loan	912.67	235.81	235.81	155.93	186.97
Cumulative Repayment upto Previous Yr	-	-	2.96	-	-
Net Loan-Opening	912.67	235.81	232.84	155.93	186.97
Addition due to Additional Capitalisation	69.80	-	81.19	8.10	48.65
Repayment during the year	56.69	2.96	20.85	11.06	4.69
Net Loan-Closing	925.78	232.84	293.18	152.97	230.93
Average Loan	919.23	234.33	263.01	154.45	208.95
Weighted Avg. Rate of Interest on Loan	9.0540%	9.1213%	9.0636%	8.9903%	9.1593%
<b>Interest</b>	<b>83.23</b>	<b>3.56</b>	<b>23.84</b>	<b>12.73</b>	<b>19.14</b>

Particulars	Asset-3.3	Asset-3.4	Asset-3.5		Asset-4
	2013-14 (pro-rata)	2013-14	2012-13 (pro-rata)	2013-14	2013-14
Gross Normative Loan	82.75	187.67	238.41	238.41	363.90
Cumulative Repayment upto Previous Yr	-	-	-	1.50	-
Net Loan-Opening	82.75	187.67	238.41	236.91	363.90
Addition due to Additional Capitalisation	23.10	28.70	-	24.78	18.00
Repayment during the year	4.24	15.24	1.50	18.92	28.13
Net Loan-Closing	101.61	201.14	236.91	242.78	353.77
Average Loan	92.18	194.40	237.66	239.85	358.83
Weighted Avg. Rate of Interest on Loan	9.0022%	9.1925%	8.9866%	8.9741%	9.2587%
<b>Interest</b>	<b>4.84</b>	<b>17.87</b>	<b>1.78</b>	<b>21.52</b>	<b>33.22</b>

## Depreciation

42. Regulation 17 of the 2009 Tariff Regulations provides as follows:-

“17. **Depreciation** (1) The value base for the purpose of depreciation shall be the capital cost of the asset admitted by the Commission.

(2) The salvage value of the asset shall be considered as 10% and depreciation shall be allowed up to maximum of 90% of the capital cost of the asset.

Provided that in case of hydro generating stations, the salvage value shall be as provided in the agreement signed by the developers with the State Government for creation of the site;

Provided further that the capital cost of the assets of the hydro generating station for the purpose of computation of depreciable value shall correspond to the percentage of sale of electricity under long-term power purchase agreement at regulated tariff.

(3) Land other than the land held under lease and the land for reservoir in case of hydro generating station shall not be a depreciable asset and its cost shall be excluded from the capital cost while computing depreciable value of the asset.

(4) Depreciation shall be calculated annually based on Straight Line Method and at rates specified in Appendix-III to these regulations for the assets of the generating station and transmission system:

Provided that, the remaining depreciable value as on 31st March of the year closing after a period of 12 years from date of commercial operation shall be spread over the balance useful life of the assets.

(5) In case of the existing projects, the balance depreciable value as on 1.4.2009 shall be worked out by deducting the cumulative depreciation as admitted by the Commission up to 31.3.2009 from the gross depreciable value of the assets.

(6) Depreciation shall be chargeable from the first year of commercial operation. In case of commercial operation of the asset for part of the year, depreciation shall be charged on pro rata basis.”

43. The petitioner has claimed actual depreciation as a component of Annual Fixed Charges. The instant assets were put under commercial operation between 1.2.2013 to 1.9.2013 i.e. during 2012-13 and 2013-14. Accordingly, the instant assets will complete 12 years beyond 2013-14. Thus, depreciation has been calculated annually based on Straight Line Method and at rates specified in Appendix-III of the 2009 Tariff Regulations, as per details hereunder:-

(` in lakh)

Particulars	Asset-1	Asset-2		Asset-3.1	Asset-3.2
	2013-14	2012-13 (pro-rata)	2013-14	2013-14 (pro-rata)	2013-14
Opening Gross Block	1303.81	336.87	336.87	222.76	267.10
Additional Capital Expenditure	99.71	-	115.98	11.57	69.50
Closing Gross Block	1403.53	336.87	452.84	234.33	336.60
Average Gross Block	1353.67	336.87	394.85	228.54	301.85
Rate of Depreciation	4.1876%	5.2800%	5.2800%	5.2800%	1.5532%
Depreciable Value	954.07	303.18	355.37	205.69	80.41
Remaining Depreciable Value	954.07	303.18	352.40	205.69	80.41
<b>Depreciation</b>	<b>56.69</b>	<b>2.96</b>	<b>20.85</b>	<b>11.06</b>	<b>4.69</b>
Particulars	Asset-3.3	Asset-3.4	Asset-3.5		Asset-4
	2013-14 (pro-rata)	2013-14	2012-13 (pro-rata)	2013-14	2013-14 (pro-rata)
Opening Gross Block	118.21	268.10	340.59	340.59	519.85
Additional Capital Expenditure	33.00	41.00	-	35.40	25.71
Closing Gross Block	151.21	309.10	340.59	375.99	545.56
Average Gross Block	134.71	288.60	340.59	358.29	532.70
Rate of Depreciation	5.3992%	5.2800%	5.2800%	5.2800%	5.2800%

Depreciable Value	121.24	259.74	306.53	322.46	479.43
Remaining Depreciable Value	121.24	259.74	306.53	320.96	479.43
<b>Depreciation</b>	<b>4.24</b>	<b>15.24</b>	<b>1.50</b>	<b>18.92</b>	<b>28.13</b>

### **Operation & Maintenance Expenses (O&M Expenses)**

44. The norms for O&M Expenses for the transmission system based on the type of sub-station and the transmission line are prescribed vide clause (g) of Regulation 19 of the 2009 Tariff Regulations. The norms for assets covered in this petition are as under:-

<b>Element</b>	<b>2009-10</b>	<b>2010-11</b>	<b>2011-12</b>	<b>2012-13</b>	<b>2013-14</b>
D/C twin conductor T/L ( ₹ lakh/km)	0.627	0.663	0.701	0.741	0.783
S/C twin conductor T/L ( ₹ lakh/km)	0.358	0.378	0.400	0.423	0.447
S/C single conductor T/L ( ₹ lakh/km)	0.179	0.189	0.200	0.212	0.224
400 kV bay ( ₹ lakh/bay)	52.40	55.40	58.57	61.92	65.46
132 kV and below bay ( ₹ lakh/bay)	26.20	27.70	29.28	30.96	32.73

45. Accordingly, as per norms specified in 2009 Tariff Regulations, O&M Expenses have been allowed as under:-

<b>Element</b>	<b>( ₹ in lakh)</b>	
	<b>2012-13</b>	<b>2013-14</b>
<b>Asset-1: (COD: 1.4.2013)</b>		
0.17 km, 220 kV D/C twin conductor T/L conductor T/Line	-	0.13
2 nos. 220 kV bays	-	91.64
<b>Asset-2: (COD: 1.2.2013)</b>	(pro-rata for 2 months)	
1 no. 132 kV bay	5.16	32.73
<b>Asset-3.1: (COD: 1.5.2013)</b>		(pro-rata for 11 months)
1 no. 132 kV bay	-	30.00
<b>Asset-3.2: (COD: 1.4.2013)</b>		
0.352 km S/C, 1 conductor T/L	-	0.08
0.09 km D/C , 1 conductor T/L	-	0.03

1 no. 132 kV bay	-	32.73
<b>Asset-3.3:</b> (COD: 1.9.2013)		(pro-rata for 7 months)
0.339 km S/C, 1 conductor T/L	-	0.04
1 no. 132 kV bay	-	19.09
<b>Asset-3.4:</b> (COD: 1.4.2013)		
1 no. 132 kV bay	-	32.73
<b>Asset-3.5:</b> (COD: 1.3.2013)	(pro-rata for 1 months)	
1 no. 132 kV bay	2.58	32.73
<b>Asset-4:</b> (COD: 1.4.2013)		
1 no.220 kV bay	-	45.82

46. The petitioner has submitted that O & M Expenses for the period 2009-14 were arrived at on the basis of normalized actual O & M Expenses during the period 2003-04 to 2007-08. The wage hike of 50% on account of pay revision of the employees of public sector undertaking has also been considered while calculating the O & M Expenses for the tariff period 2009-14. The petitioner has further submitted that it may approach the Commission for additional manpower cost on account of wage revision (if any) during the tariff block 2009-14 for claiming in the tariff.

47. The petitioner has also submitted that the claim for transmission tariff is exclusive of any statutory taxes, levies, duties, cess or any other kind of impositions etc. Such kinds of payments are generally included in the O & M Expenses. While specifying the norms for the O & M Expenses, the Commission has in the 2009 Tariff Regulations, given effect to impact of pay revision by factoring 50% on account of pay revision of the employees of PSUs after extensive consultations with the stakeholders, as one time compensation for employee cost. We do not see any reason why the admissible amount is inadequate to meet the requirement of the employee

cost. In this order, we have allowed O&M Expenses as per the existing norms.

### **Interest on Working Capital**

48. The petitioner is entitled to claim interest on working capital as per the 2009 Tariff Regulations. The components of the working capital and the petitioner's entitlement to interest thereon are discussed hereinafter:-

#### **(i) Receivables**

As per Regulation 18(1) (c) (i) of the 2009 Tariff Regulations, receivables as a component of working capital will be equivalent to two months of fixed cost. The petitioner has claimed the receivables on the basis of 2 months of annual transmission charges claimed in the petition. In the tariff being allowed, receivables have been worked out on the basis of 2 months transmission charges.

#### **(ii) Maintenance Spares**

Regulation 18 (1) (c) (ii) of the 2009 Tariff Regulations provides for maintenance spares @ 15% per annum of the O & M Expenses as part of the working capital from 1.4.2009. The value of maintenance spares has accordingly been worked out.

#### **(iii) O & M Expenses**

Regulation 18(1) (c) (iii) of the 2009 Tariff Regulations provides for O&M Expenses for one month to be included in the working capital. The petitioner has claimed O&M Expenses for 1 month of the respective year. This has been considered in the working capital.



#### (iv) Rate of Interest on Working Capital

In accordance with clause (3) of Regulation 18 of the 2009 Tariff Regulations, as amended, rate of interest on working capital shall be on normative basis and shall be equal to State Bank of India Base Rate plus 350 basis point. As such, rate of interest on working capital @ 13.50% (Base rate as on 1.4.2012 and 350 basis points) has been considered in respect of Asset-2 and Asset-3.5 and 13.20% (Base rate as on 1.4.2013 and 350 basis points) has been considered in respect of Asset-1, Asset-3.1, Asset-3.2, Asset-3.3, Asset-3.4 and Asset-4. Interest on working capital has been worked out accordingly.

49. Computations in support of interest on working capital allowed are as follows:-

Particulars	Asset-1	Asset-2		Asset-3.1	Asset-3.2
	2013-14	2012-13 (pro-rata)	2013-14	2013-14 (pro-rata)	2013-14
Maintenance Spares	13.77	4.64	4.91	4.91	4.93
O & M Expenses	7.65	2.58	2.73	2.73	2.74
Receivables	53.54	15.46	17.34	12.46	12.86
<b>Total</b>	<b>74.95</b>	<b>22.68</b>	<b>24.97</b>	<b>20.10</b>	<b>20.52</b>
Rate of Interest	13.20%	13.50%	13.50%	13.20%	13.20%
<b>Interest</b>	<b>9.89</b>	<b>0.51</b>	<b>3.37</b>	<b>2.43</b>	<b>2.71</b>
Particulars	Asset-3.3	Asset-3.4	Asset-3.5		Asset-4
	2013-14 (pro-rata)	2013-14	2012-13 (pro-rata)	2013-14	2013-14 (pro-rata)
Maintenance Spares	4.92	4.91	4.64	4.91	6.87
O & M Expenses	2.73	2.73	2.58	2.73	3.82
Receivables	9.77	14.29	15.53	16.25	23.84
<b>Total</b>	<b>17.42</b>	<b>21.92</b>	<b>22.75</b>	<b>23.88</b>	<b>34.54</b>
Rate of Interest	13.20%	13.20%	13.50%	13.50%	13.20%
<b>Interest</b>	<b>1.34</b>	<b>2.89</b>	<b>0.26</b>	<b>3.22</b>	<b>4.56</b>

## Transmission Charges

50. The transmission charges allowed for the assets are as given under:-

( ` in lakh)

Particulars	Asset-1	Asset-2		Asset-3.1	Asset-3.2
	2013-14	2012-13 (pro-rata)	2013-14	2013-14 (pro-rata)	2013-14
Depreciation	56.69	2.96	20.85	11.06	4.69
Interest on Loan	83.23	3.56	23.84	12.73	19.14
Return on Equity	79.64	3.26	23.23	12.33	17.76
Interest on Working Capital	9.89	0.51	3.37	2.43	2.71
O & M Expenses	91.77	5.16	32.73	30.00	32.84
<b>Total</b>	<b>321.22</b>	<b>15.46</b>	<b>104.02</b>	<b>68.55</b>	<b>77.13</b>

  

Particulars	Asset-3.3	Asset-3.4	Asset-3.5		Asset-4
	2013-14 (pro-rata)	2013-14	2012-13 (pro-rata)	2013-14	2013-14 (pro-rata)
Depreciation	4.24	15.24	1.50	18.92	28.13
Interest on Loan	4.84	17.87	1.78	21.52	33.22
Return on Equity	4.62	16.98	1.65	21.08	31.34
Interest on Working Capital	1.34	2.89	0.26	3.22	4.56
O & M Expenses	19.13	32.73	2.58	32.73	45.82
<b>Total</b>	<b>34.18</b>	<b>85.71</b>	<b>7.76</b>	<b>97.48</b>	<b>143.07</b>

## Filing Fee and the Publication Expenses

51. The petitioner has sought reimbursement of fee paid by it for filing the petition and publication expenses. The petitioner has clarified that reimbursement of expenditure has been claimed in terms of Regulation 42 of the 2009 Tariff Regulations. The petitioner shall be entitled for reimbursement of the filing fees and publication expenses in connection with the present petition, directly from the beneficiaries on *pro-rata* basis in accordance with Regulation 42 of the 2009 Tariff Regulations.

## Licence Fee

52. The petitioner has submitted that in O&M norms for tariff block 2009-14, the cost associated with license fees had not been captured and the

license fee may be allowed to be recovered separately from the respondents. The petitioner has submitted that the licence fee has been a new component of cost to the transmission licence under O&M stage of the project and has become incidental to the petitioner only from 2008-09. The petitioner shall be entitled for reimbursement of licence fee in accordance with Regulation 42A (1) (b) of the 2009 Tariff Regulations.

### **Service Tax**

53. The petitioner has made a prayer to be allowed to bill and recover the service tax on transmission charges separately from the respondents, if it is subjected to such service tax in future. The petitioner submitted that service tax on transmission has been put on negative list w.e.f. 1.4.2012 and therefore the transmission charges, is exclusive of service tax and shall be born and additionally paid by the respondents. We consider petitioner's prayer pre-mature and accordingly this prayer is rejected.

### **Sharing of Transmission Charges**

54. The billing, collection and disbursement of the transmission charges approved shall be governed by the provisions of Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations, 2010, as amended from time to time.

55. This order disposes of Petition No. 44/TT/2013.

sd/-  
**(A.S. Bakshi)**  
Member

sd/-  
**(A.K. Singhal)**  
Member

sd/-  
**(Gireesh B. Pradhan)**  
Chairperson

**Annexure-1**

( ₹ in lakh)

<b>Asset-1</b>		
<b>CALCULATION OF WEIGHTED AVERAGE RATE OF INTEREST ON LOAN</b>		
	<b>Details of Loan</b>	<b>2013-14</b>
<b>1</b>	<b>Bond XLI</b>	
	Gross loan opening	200.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	200.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	200.00
	Average Loan	200.00
	Rate of Interest	8.85%
	Interest	17.70
	Rep Schedule	12 annual instalments from 19.10.2016
<b>2</b>	<b>Bond XXXI</b>	
	Gross loan opening	50.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	50.00
	Additions during the year	0.00
	Repayment during the year	4.17
	Net Loan-Closing	45.83
	Average Loan	47.92
	Rate of Interest	8.90%
	Interest	4.26
	Rep Schedule	12 annual instalments from 25.02.2014
<b>3</b>	<b>Bond XXXIII</b>	
	Gross loan opening	25.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	25.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	25.00
	Average Loan	25.00
	Rate of Interest	8.64%
	Interest	2.16
	Rep Schedule	12 annual instalments from 08.07.2014
<b>4</b>	<b>Bond XXXIV</b>	
	Gross loan opening	50.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	50.00
	Additions during the year	0.00

	Repayment during the year	0.00
	Net Loan-Closing	50.00
	Average Loan	50.00
	Rate of Interest	8.84%
	Interest	4.42
	Rep Schedule	12 annual instalments from 21.10.2014
<b>5</b>	<b>Bond XXXVIII</b>	
	Gross loan opening	150.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	150.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	150.00
	Average Loan	150.00
	Rate of Interest	9.25%
	Interest	13.88
	Rep Schedule	Bullet Payment as on 09.03.2027
<b>6</b>	<b>Bond XXXIX</b>	
	Gross loan opening	135.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	135.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	135.00
	Average Loan	135.00
	Rate of Interest	9.40%
	Interest	12.69
	Rep Schedule	Bullet Payment as on 29.03.2027
<b>7</b>	<b>Bond XL</b>	
	Gross loan opening	200.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	200.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	200.00
	Average Loan	200.00
	Rate of Interest	9.30%
	Interest	18.60
	Rep Schedule	12 annual instalments from 28.06.2016
<b>8</b>	<b>Bond XLII</b>	
	Gross loan opening	165.32
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	165.32
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	165.32
	Average Loan	165.32
	Rate of Interest	8.80%

	Interest	14.55
	Rep Schedule	Bullet Payment as on 13.03.2023
<b>9</b>	<b>Bond XLIV</b>	
	Gross loan opening	0.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	0.00
	Additions during the year	79.80
	Repayment during the year	0.00
	Net Loan-Closing	79.80
	Average Loan	39.90
	Rate of Interest	8.70%
	Interest	3.47
	Rep Schedule	3 equal annual instalments on 15.07.2018, 15.07.2023 & 15.07.2028
	<b>Total Loan</b>	
	Gross loan opening	975.32
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	975.32
	Additions during the year	79.80
	Repayment during the year	4.17
	Net Loan-Closing	1050.95
	Average Loan	1013.14
	Rate of Interest	<b>9.0540%</b>
	<b>Interest</b>	<b>91.73</b>

**Annexure-2**

( ₹ in

lakh)

<b>Asset-2</b>			
<b>CALCULATION OF WEIGHTED AVERAGE RATE OF INTEREST ON LOAN</b>			
	<b>Details of Loan</b>	<b>2012-13</b>	<b>2013-14</b>
<b>1</b>	<b>Bond XL</b>		
	Gross loan opening	140.00	<b>140.00</b>
	Cumulative Repayment upto DOCO/previous year	0.00	<b>0.00</b>
	Net Loan-Opening	140.00	140.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	140.00	140.00
	Average Loan	140.00	140.00
	Rate of Interest	9.30%	9.30%
	Interest	13.02	13.02
	Rep Schedule	12 annual instalments from 28.06.2016	
<b>2</b>	<b>Bond XLI</b>		
	Gross loan opening	81.91	<b>81.91</b>
	Cumulative Repayment upto DOCO/previous year	0.00	<b>0.00</b>
	Net Loan-Opening	81.91	81.91
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	81.91	81.91
	Average Loan	81.91	81.91
	Rate of Interest	8.85%	8.85%
	Interest	7.25	7.25
	Rep Schedule	12 annual instalments from 19.10.2016	
<b>3</b>	<b>Bond XXXIV</b>		
	Gross loan opening	20.00	<b>20.00</b>
	Cumulative Repayment upto DOCO/previous year	0.00	<b>0.00</b>
	Net Loan-Opening	20.00	20.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	20.00	20.00
	Average Loan	20.00	20.00
	Rate of Interest	8.84%	8.84%
	Interest	1.77	1.77
	Rep Schedule	12 annual instalments from 21.10.2014	
<b>4</b>	<b>Bond XXXVIII</b>		
	Gross loan opening	22.00	<b>22.00</b>
	Cumulative Repayment upto DOCO/previous year	0.00	<b>0.00</b>
	Net Loan-Opening	22.00	22.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	22.00	22.00

	Average Loan	22.00	22.00
	Rate of Interest	9.25%	9.25%
	Interest	2.04	2.04
	Rep Schedule	Bullet Payment as on 09.03.2027	
<b>5</b>	<b>Bond XLIV</b>		
	Gross loan opening	0.00	<b>0.00</b>
	Cumulative Repayment upto DOCO/previous year	0.00	<b>0.00</b>
	Net Loan-Opening	0.00	0.00
	Additions during the year	0.00	83.72
	Repayment during the year	0.00	0.00
	Net Loan-Closing	0.00	83.72
	Average Loan	0.00	41.86
	Rate of Interest	8.70%	8.70%
	Interest	0.00	3.64
	Rep Schedule	3 equal annual instalments on 15.07.2018, 15.07.2023 & 15.07.2028	
	<b>Total Loan</b>		
	Gross loan opening	263.91	263.91
	Cumulative Repayment upto DOCO/previous year	0.00	0.00
	Net Loan-Opening	263.91	263.91
	Additions during the year	0.00	83.72
	Repayment during the year	0.00	0.00
	Net Loan-Closing	263.91	347.63
	Average Loan	263.91	305.77
	Rate of Interest	<b>9.1213%</b>	<b>9.0636%</b>
	<b>Interest</b>	<b>24.07</b>	<b>27.71</b>



**Annexure-3**

(₹ in lakh)

<b>Asset-3.1</b>		
<b>CALCULATION OF WEIGHTED AVERAGE RATE OF INTEREST ON LOAN</b>		
	<b>Details of Loan</b>	<b>2013-14</b>
<b>1</b>	<b>Bond XLI</b>	
	Gross loan opening	60.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	60.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	60.00
	Average Loan	60.00
	Rate of Interest	8.85%
	Interest	5.31
	Rep Schedule	12 annual instalments from 19.10.2016
<b>2</b>	<b>Bond XXXIII</b>	
	Gross loan opening	4.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	4.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	4.00
	Average Loan	4.00
	Rate of Interest	8.64%
	Interest	0.35
	Rep Schedule	12 annual instalments from 08.07.2014
<b>3</b>	<b>Bond XXXVII</b>	
	Gross loan opening	<b>3.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>
	Net Loan-Opening	3.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	3.00
	Average Loan	3.00
	Rate of Interest	9.25%
	Interest	0.28
	Rep Schedule	12 annual instalments from 26.12.2015.
<b>4</b>	<b>Bond XXXVIII</b>	
	Gross loan opening	8.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	8.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	8.00

	Average Loan	8.00
	Rate of Interest	9.25%
	Interest	0.74
	Rep Schedule	Bullet Payment as on 09.03.2027
<b>5</b>	<b>Bond XL</b>	
	Gross loan opening	50.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	50.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	50.00
	Average Loan	50.00
	Rate of Interest	9.30%
	Interest	4.65
	Rep Schedule	12 annual instalments from 28.06.2016
<b>6</b>	<b>Bond XLII</b>	
	Gross loan opening	38.57
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	38.57
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	38.57
	Average Loan	38.57
	Rate of Interest	8.80%
	Interest	3.39
	Rep Schedule	Bullet Payment as on 13.03.2023
<b>7</b>	<b>Bond XLIV</b>	
	Gross loan opening	0.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	0.00
	Additions during the year	8.10
	Repayment during the year	0.00
	Net Loan-Closing	8.10
	Average Loan	4.05
	Rate of Interest	8.70%
	Interest	0.35
	Rep Schedule	3 equal annual instalments on 15.07.2018, 15.07.2023 & 15.07.2028
	<b>Total Loan</b>	
	Gross loan opening	163.57
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	163.57
	Additions during the year	8.10
	Repayment during the year	0.00
	Net Loan-Closing	171.67
	Average Loan	167.62
	Rate of Interest	<b>8.9903%</b>

Interest	15.07
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**Annexure-4**

(` in lakh)

<b>Asset-3.2</b>		
<b>CALCULATION OF WEIGHTED AVERAGE RATE OF INTEREST ON LOAN</b>		
	<b>Details of Loan</b>	<b>2013-14</b>
<b>1</b>	<b>Bond XLI</b>	
	Gross loan opening	20.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	20.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	20.00
	Average Loan	20.00
	Rate of Interest	8.85%
	Interest	1.77
	Rep Schedule	12 annual instalments from 19.10.2016
<b>2</b>	<b>Bond XXXI</b>	
	Gross loan opening	5.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	5.00
	Additions during the year	0.00
	Repayment during the year	0.42
	Net Loan-Closing	4.58
	Average Loan	4.79
	Rate of Interest	8.90%
	Interest	0.43
	Rep Schedule	12 annual instalments from 25.02.2014
<b>3</b>	<b>Bond XXXIII</b>	
	Gross loan opening	5.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	5.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	5.00
	Average Loan	5.00
	Rate of Interest	8.64%
	Interest	0.43
	Rep Schedule	12 annual instalments from 08.07.2014
<b>4</b>	<b>Bond XXXIV</b>	
	Gross loan opening	11.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	11.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	11.00

	Average Loan	11.00
	Rate of Interest	8.84%
	Interest	0.97
	Rep Schedule	12 annual instalments from 21.10.2014
<b>5</b>	<b>Bond XXXVIII</b>	
	Gross loan opening	20.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	20.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	20.00
	Average Loan	20.00
	Rate of Interest	9.25%
	Interest	1.85
	Rep Schedule	Bullet Payment as on 09.03.2027
<b>6</b>	<b>Bond XXXIX</b>	
	Gross loan opening	30.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	30.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	30.00
	Average Loan	30.00
	Rate of Interest	9.40%
	Interest	2.82
	Rep Schedule	Bullet Payment as on 29.03.2027
<b>7</b>	<b>Bond XL</b>	
	Gross loan opening	60.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	60.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	60.00
	Average Loan	60.00
	Rate of Interest	9.30%
	Interest	5.58
	Rep Schedule	12 annual instalments from 28.06.2016
<b>8</b>	<b>Bond XLII</b>	
	Gross loan opening	27.08
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	27.08
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	27.08
	Average Loan	27.08
	Rate of Interest	8.80%
	Interest	2.38
	Rep Schedule	Bullet Payment as on

		13.03.2023
<b>9</b>	<b>SBI</b>	
	Gross loan opening	15.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	15.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	15.00
	Average Loan	15.00
	Rate of Interest	10.29%
	Interest	1.54
	Rep Schedule	22 half yearly instalment from 31.08.2016
<b>10</b>	<b>Bond XLIV</b>	
	Gross loan opening	0.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	0.00
	Additions during the year	48.65
	Repayment during the year	0.00
	Net Loan-Closing	48.65
	Average Loan	24.33
	Rate of Interest	8.70%
	Interest	2.12
	Rep Schedule	3 equal annual instalments on 15.07.2018, 15.07.2023 & 15.07.2028
	<b>Total Loan</b>	
	Gross loan opening	193.08
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	193.08
	Additions during the year	48.65
	Repayment during the year	0.42
	Net Loan-Closing	241.31
	Average Loan	217.20
	Rate of Interest	<b>9.1593%</b>
	<b>Interest</b>	<b>19.89</b>

**Annexure-5**

( ₹ in lakh)

<b>Asset-3.3</b>		
<b>CALCULATION OF WEIGHTED AVERAGE RATE OF INTEREST ON LOAN</b>		
	<b>Details of Loan</b>	<b>2013-14</b>
<b>1</b>	<b>Bond XLI</b>	
	Gross loan opening	35.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	35.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	35.00
	Average Loan	35.00
	Rate of Interest	8.85%
	Interest	3.10
	Rep Schedule	12 annual instalments from 19.10.2016
<b>2</b>	<b>Bond XXXIX</b>	
	Gross loan opening	10.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	10.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	10.00
	Average Loan	10.00
	Rate of Interest	9.40%
	Interest	0.94
	Rep Schedule	Bullet Payment as on 29.03.2027
<b>3</b>	<b>Bond XLII</b>	
	Gross loan opening	34.33
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	34.33
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	34.33
	Average Loan	34.33
	Rate of Interest	8.80%
	Interest	3.02
	Rep Schedule	Bullet Payment as on 13.03.2023
<b>4</b>	<b>SBI</b>	
	Gross loan opening	10.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	10.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	10.00

	Average Loan	10.00
	Rate of Interest	10.18%
	Interest	1.02
	Rep Schedule	22 half yearly instalment from 31.08.2016
<b>5</b>	<b>Bond XLIV</b>	
	Gross loan opening	0.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	0.00
	Additions during the year	23.10
	Repayment during the year	0.00
	Net Loan-Closing	23.10
	Average Loan	11.55
	Rate of Interest	8.70%
	Interest	1.00
	Rep Schedule	3 equal annual instalments on 15.07.2018, 15.07.2023 & 15.07.2028
	<b>Total Loan</b>	
	Gross loan opening	89.33
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	89.33
	Additions during the year	23.10
	Repayment during the year	0.00
	Net Loan-Closing	112.43
	Average Loan	100.88
	Rate of Interest	<b>9.0022%</b>
	<b>Interest</b>	<b>9.08</b>

**Annexure-6**

( ₹ in lakh)

<b>Asset-3.4</b>		
<b>CALCULATION OF WEIGHTED AVERAGE RATE OF INTEREST ON LOAN</b>		
	<b>Details of Loan</b>	<b>2013-14</b>
<b>1</b>	<b>Bond XLI</b>	
	Gross loan opening	20.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	20.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	20.00
	Average Loan	20.00
	Rate of Interest	8.85%
	Interest	1.77
	Rep Schedule	12 annual instalments from 19.10.2016
<b>2</b>	<b>Bond XXXI</b>	
	Gross loan opening	5.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	5.00
	Additions during the year	0.00
	Repayment during the year	0.42
	Net Loan-Closing	4.58
	Average Loan	4.79
	Rate of Interest	8.90%
	Interest	0.43
	Rep Schedule	12 annual instalments from 25.02.2014
<b>3</b>	<b>Bond XXXIII</b>	
	Gross loan opening	5.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	5.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	5.00
	Average Loan	5.00
	Rate of Interest	8.64%
	Interest	0.43
	Rep Schedule	12 annual instalments from 08.07.2014
<b>4</b>	<b>Bond XXXIV</b>	
	Gross loan opening	11.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	11.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	11.00



	Average Loan	11.00
	Rate of Interest	8.84%
	Interest	0.97
	Rep Schedule	12 annual instalments from 21.10.2014
<b>5</b>	<b>Bond XXXVIII</b>	
	Gross loan opening	25.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	25.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	25.00
	Average Loan	25.00
	Rate of Interest	9.25%
	Interest	2.31
	Rep Schedule	Bullet Payment as on 09.03.2027
<b>6</b>	<b>Bond XXXIX</b>	
	Gross loan opening	40.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	40.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	40.00
	Average Loan	40.00
	Rate of Interest	9.40%
	Interest	3.76
	Rep Schedule	Bullet Payment as on 29.03.2027
<b>7</b>	<b>Bond XL</b>	
	Gross loan opening	60.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	60.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	60.00
	Average Loan	60.00
	Rate of Interest	9.30%
	Interest	5.58
	Rep Schedule	12 annual instalments from 28.06.2016
<b>8</b>	<b>Bond XLII</b>	
	Gross loan opening	27.26
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	27.26
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	27.26
	Average Loan	27.26
	Rate of Interest	8.80%
	Interest	2.40
	Rep Schedule	Bullet Payment as on

		13.03.2023
<b>9</b>	<b>SBI</b>	
	Gross loan opening	15.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	15.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	15.00
	Average Loan	15.00
	Rate of Interest	10.29%
	Interest	1.54
	Rep Schedule	22 half yearly instalment from 31.08.2016
<b>10</b>	<b>Bond XLIV</b>	
	Gross loan opening	0.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	0.00
	Additions during the year	28.70
	Repayment during the year	0.00
	Net Loan-Closing	28.70
	Average Loan	14.35
	Rate of Interest	8.70%
	Interest	1.25
	Rep Schedule	3 equal annual instalments on 15.07.2018, 15.07.2023 & 15.07.2028
	<b>Total Loan</b>	
	Gross loan opening	208.26
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	208.26
	Additions during the year	28.70
	Repayment during the year	0.42
	Net Loan-Closing	236.54
	Average Loan	222.40
	Rate of Interest	<b>9.1925%</b>
	<b>Interest</b>	<b>20.44</b>

**Annexure-7**

( ₹ in lakh)

<b>Asset-3.5</b>			
<b>CALCULATION OF WEIGHTED AVERAGE RATE OF INTEREST ON LOAN</b>			
	<b>Details of Loan</b>	<b>2012-13</b>	<b>2013-14</b>
<b>1</b>	<b>Bond XL</b>		
	Gross loan opening	86.00	<b>86.00</b>
	Cumulative Repayment upto DOCO/previous year	0.00	<b>0.00</b>
	Net Loan-Opening	86.00	86.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	86.00	86.00
	Average Loan	86.00	86.00
	Rate of Interest	9.30%	9.30%
	Interest	8.00	8.00
	Rep Schedule	12 annual instalments from 28.06.2016	
<b>2</b>	<b>Bond XLI</b>		
	Gross loan opening	90.00	<b>90.00</b>
	Cumulative Repayment upto DOCO/previous year	0.00	<b>0.00</b>
	Net Loan-Opening	90.00	90.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	90.00	90.00
	Average Loan	90.00	90.00
	Rate of Interest	8.85%	8.85%
	Interest	7.97	7.97
	Rep Schedule	12 annual instalments from 19.10.2016	
<b>3</b>	<b>Bond XXXIII</b>		
	Gross loan opening	6.00	<b>6.00</b>
	Cumulative Repayment upto DOCO/previous year	0.00	<b>0.00</b>
	Net Loan-Opening	6.00	6.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	6.00	6.00
	Average Loan	6.00	6.00
	Rate of Interest	8.64%	8.64%
	Interest	0.52	0.52
	Rep Schedule	12 annual instalments from 08.07.2014	
<b>4</b>	<b>Bond XXXVII</b>		
	Gross loan opening	<b>2.00</b>	<b>2.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	2.00	2.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	2.00	2.00

	Average Loan	2.00	2.00
	Rate of Interest	9.25%	9.25%
	Interest	0.19	0.19
	Rep Schedule	12 annual instalments from 26.12.2015.	
<b>5</b>	<b>Bond XXXVIII</b>		
	Gross loan opening	7.00	<b>7.00</b>
	Cumulative Repayment upto DOCO/previous year	0.00	<b>0.00</b>
	Net Loan-Opening	7.00	7.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	7.00	7.00
	Average Loan	7.00	7.00
	Rate of Interest	9.25%	9.25%
	Interest	0.65	0.65
	Rep Schedule	Bullet Payment as on 09.03.2027	
<b>6</b>	<b>Bond XLII</b>		
	Gross loan opening	80.06	<b>80.06</b>
	Cumulative Repayment upto DOCO/previous year	0.00	<b>0.00</b>
	Net Loan-Opening	80.06	80.06
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	80.06	80.06
	Average Loan	80.06	80.06
	Rate of Interest	8.80%	8.80%
	Interest	7.05	7.05
	Rep Schedule	Bullet Payment as on 13.03.2023	
<b>7</b>	<b>Bond XLIV</b>		
	Gross loan opening	0.00	<b>0.00</b>
	Cumulative Repayment upto DOCO/previous year	0.00	<b>0.00</b>
	Net Loan-Opening	0.00	0.00
	Additions during the year	0.00	24.78
	Repayment during the year	0.00	0.00
	Net Loan-Closing	0.00	24.78
	Average Loan	0.00	12.39
	Rate of Interest	8.70%	8.70%
	Interest	0.00	1.08
	Rep Schedule	3 equal annual instalments on 15.07.2018, 15.07.2023 & 15.07.2028	
	<b>Total Loan</b>		
	Gross loan opening	271.06	271.06
	Cumulative Repayment upto DOCO/previous year	0.00	0.00
	Net Loan-Opening	271.06	271.06
	Additions during the year	0.00	24.78
	Repayment during the year	0.00	0.00
	Net Loan-Closing	271.06	295.84
	Average Loan	271.06	283.45
	Rate of Interest	<b>8.9866%</b>	<b>8.9741%</b>

	<b>Interest</b>	<b>24.36</b>	<b>25.44</b>
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**Annexure-8**

( ` in lakh)

<b>Asset-4</b>		
<b>CALCULATION OF WEIGHTED AVERAGE RATE OF INTEREST ON LOAN</b>		
	<b>Details of Loan</b>	<b>2013-14</b>
<b>1</b>	<b>Bond XLI</b>	
	Gross loan opening	35.24
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	35.24
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	35.24
	Average Loan	35.24
	Rate of Interest	8.85%
	Interest	3.12
	Rep Schedule	12 annual instalments from 19.10.2016
<b>2</b>	<b>Bond XXXI</b>	
	Gross loan opening	5.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	5.00
	Additions during the year	0.00
	Repayment during the year	0.42
	Net Loan-Closing	4.58
	Average Loan	4.79
	Rate of Interest	8.90%
	Interest	0.43
	Rep Schedule	12 annual instalments from 25.02.2014
<b>3</b>	<b>Bond XXXIII</b>	
	Gross loan opening	3.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	3.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	3.00
	Average Loan	3.00
	Rate of Interest	8.64%
	Interest	0.26
	Rep Schedule	12 annual instalments from 08.07.2014
<b>4</b>	<b>Bond XXXIV</b>	
	Gross loan opening	2.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	2.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	2.00

	Average Loan	2.00
	Rate of Interest	8.84%
	Interest	0.18
	Rep Schedule	12 annual instalments from 21.10.2014
<b>5</b>	<b>Bond XXXV</b>	
	Gross loan opening	1.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	1.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	1.00
	Average Loan	1.00
	Rate of Interest	9.64%
	Interest	0.10
	Rep Schedule	12 annual instalments from 31.05.2015.
<b>6</b>	<b>Bond XXXVIII</b>	
	Gross loan opening	20.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	20.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	20.00
	Average Loan	20.00
	Rate of Interest	9.25%
	Interest	1.85
	Rep Schedule	Bullet Payment as on 09.03.2027
<b>7</b>	<b>Bond XXXIX</b>	
	Gross loan opening	30.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	30.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	30.00
	Average Loan	30.00
	Rate of Interest	9.40%
	Interest	2.82
	Rep Schedule	Bullet Payment as on 29.03.2027
<b>8</b>	<b>Bond XL</b>	
	Gross loan opening	300.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	300.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	300.00
	Average Loan	300.00
	Rate of Interest	9.30%
	Interest	27.90
	Rep Schedule	12 annual instalments from

		28.06.2016
<b>9</b>	<b>SBI</b>	
	Gross loan opening	15.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	15.00
	Additions during the year	0.00
	Repayment during the year	0.00
	Net Loan-Closing	15.00
	Average Loan	15.00
	Rate of Interest	10.29%
	Interest	1.54
	Rep Schedule	22 half yearly instalment from 31.08.2016
<b>10</b>	<b>Bond XLIV</b>	
	Gross loan opening	0.00
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	0.00
	Additions during the year	48.23
	Repayment during the year	0.00
	Net Loan-Closing	48.23
	Average Loan	24.12
	Rate of Interest	8.70%
	Interest	2.10
	Rep Schedule	3 equal annual instalments on 15.07.2018, 15.07.2023 & 15.07.2028
	<b>Total Loan</b>	
	Gross loan opening	411.24
	Cumulative Repayment upto DOCO/previous year	0.00
	Net Loan-Opening	411.24
	Additions during the year	48.23
	Repayment during the year	0.42
	Net Loan-Closing	459.05
	Average Loan	435.15
	Rate of Interest	<b>9.2587%</b>
	<b>Interest</b>	<b>40.29</b>