

**CENTRAL ELECTRICITY REGULATORY COMMISSION  
NEW DELHI**

**Petition No. 90/TT/2012**

**Coram:**

**Shri V.S. Verma, Member**

**Shri M. Deena Dayalan, Member**

**Date of Hearing: 13.8.2013**

**Date of Order : 21.2.2014**

**In the matter of:**

Approval 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 for determination of transmission tariff from date of commercial operation to 31.3.2014 for assets (part-III) under Common Scheme for 765 kV Pooling Station and Network for NR, Import by NR from ER and Common Scheme for net work for WR and Import by WR from ER and from NER/SR/WR via ER in Northern Region for tariff block 2009-14.

**And in the matter of:**

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

**.....Petitioner**

**Vs**

- 1 Rajasthan Rajya Vidyut Prasaran Nigam Ltd  
Vidyut Bhawan, Vidyut Marg, Jaipur – 302005
2. Ajmer Vidyut Vitran Nigam Ltd  
400 KV GSS Buildig (Ground Floor) Ajmer Road,  
Heerapura, Jaipur
3. Jaipur Vidyut Vitran Nigam Ltd  
400 KV GSS Buildig (Ground Floor) Ajmer Road,  
Heerapura, Jaipur
4. Jodhpur Vidyut Vitran Nigam Ltd  
400 KV GSS Buildig (Ground Floor) Ajmer Road,  
Heerapura, Jaipur
5. Himachal Pradesh State Electricity Board  
Vidyut Bhawan, Kumar House Complex Building,  
Shimla – 171004



6. Punjab State Electricity Board  
The Mall, Patiala – 147001
7. Haryana Power Purchase Centre  
Shakti Bhawan, Sector 6,  
Panchkula – 134109
8. Power Development Department,  
Govt of Jammu and Kashmir  
Mini Secretariat, Jammu
9. Uttar Pradesh Power Corporation Limited  
Shakti Bhawan,  
14, Ashok Marg,  
Lucknow – 266001
10. Delhi Transco Limited  
Shakti Sadan, Kotla Road,  
New Delhi – 110002
11. BSES Yamuna Power Limited  
BSES Bhawan, Nehru Place, New Delhi
12. BSES Rajdhani Power Limited  
BSES Bhawan, Nehru Place, New Delhi
13. North Delhi Power Limited  
Power Trading and Load Despatch Group  
Cennet Building,  
Adjacent to 66/11 KV Pitampura – 3  
Grid Building, Near PP Jewellers  
Pitampura Delhi 110034
14. Chandigarh Administration  
Sector-9, Chandigarh
15. Uttarakhand Power Corporation Ltd  
Urja Bhawan, Kanwali Road,  
Dehradun
16. North Central Railway  
Allahabad
17. New Delhi Municipal Council  
Palika Kender, Sansad Marg,  
New Delhi – 110001

.....Respondents



**For petitioner** : Shri Prashant Sharma, PGCIL  
Shri S.S Raju, PGCIL  
Ms. Sangeeta Edwards, PGCIL  
D. Nikaandia, PGCIL  
Shri M.M. Mondal, PGCIL

**For respondent** : Shri Padamjit Singh, PSPCL  
Shri R.B. Sharma, Advocate, BRPL

### **ORDER**

The petition has been filed by Power Grid Corporation of India Limited seeking approval of the transmission charges in respect of the elements under Common Scheme for 765 kV Pooling Station and Network for Northern Region, Import by Northern Region from Eastern Region and Common Scheme for network for Western Region and Import by Western Region from Eastern Region and North–Eastern Region/Southern Region/Western Region via Eastern Region (Collectively referred to as “the transmission project”) from the date of commercial operation of the respective asset to 31.3.2014 based on the Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2009 (the 2009 Tariff Regulations).

2. The transmission project has been planned for evacuation of power from the generating stations of Damodar Valley Corporation (DVC), which were scheduled to be commissioned progressively from December 2009 to December 2010, for transfer power to Northern and Western Regions.

3. The administrative approval and expenditure sanction for the transmission project was accorded by the Board of Directors of the petitioner company under letter dated 29.8.2008 at estimated cost of ₹707533 lakh, including Interest During

Construction (IDC) of ₹71360 lakh based on 1<sup>st</sup> Quarter, 2008 price level. The scope of work covers nine transmission lines and new/augmentation work at thirteen sub-stations. The petitioner has filed instant petition for approval of the transmission charges for the assets commissioned at five sub-stations (collectively referred to as “the assets”), listed below:-

	<b>Sub-stations</b>
<b>Asset 1</b>	1 <sup>st</sup> 125 MVAR Bus Reactor at Fatehpur Sub-station along with associated bay
<b>Asset 2</b>	2 <sup>nd</sup> 125 MVAR Bus Reactor at Fatehpur Sub-station along with associated bay
<b>Asset 3</b>	125 MVAR Bus Reactor-II at Balia Sub-station
<b>Asset 4</b>	1500 MVA ICT-1 at Agra Sub-station along with associated bays
<b>Asset 5</b>	1500 MVA ICT-2 at Agra Sub-station along with associated bays

4. The above assets are to evacuate power from various generation projects of DVC. DVC has indicated that its Mejia-B (1000MW), Koderma (1000MW), Durgapur (1000MW) and Maithon-RB (1000MW) generation projects (Total=4000MW) are scheduled to be commissioned progressively. At the time of planning of the transmission system, the schedule of commissioning of these various generation projects of DVC was indicated progressively from December, 2009 to December, 2010. The proposed beneficiaries of these projects and the supply scenario of ER, NR and WR suggest that power from these projects are to be transferred to power deficit regions like NR & WR.

5. As per the administrative approval, the assets were scheduled to be commissioned within 48 months progressively from the date of administrative approval. As such, the assets were to be commissioned by August, 2012. The assets have been put under commercial operation as indicated below:-

S	Description of the	Date of commercial operation
1	Asset 1	1.1.2012
2	Asset 2	1.1.2012
3	Asset 3	1.2.2012
4	Asset 4	1.6.2012
5	Asset 5	1.9.2012

6. The transmission charges claimed by the petitioner are given hereunder:-

(₹ in lakh)

Asset-1			
Particulars	2011-12 (pro-rata)	2012-13	2013-14
Depreciation	16.03	84.70	94.98
Interest on Loan	20.39	102.91	107.66
Return on Equity	16.74	88.09	98.66
Interest on working capital	1.76	8.48	9.16
O & M Expenses	14.64	61.92	65.46
Total	69.56	346.10	375.92

(₹ in lakh)

Asset-2				Asset-3		
Particulars	2011-12 (pro-rata)	2012-13	2013-14	2011-12 (pro-rata)	2012-13	2013-14
Depreciation	17.04	88.73	99.01	7.26	59.26	71.82
Interest on Loan	21.63	107.66	112.04	8.92	70.49	80.52
Return on Equity	17.74	92.11	102.68	7.35	60.51	73.64
Interest on working capital	1.83	8.73	9.41	0.94	6.77	7.65
O & M Expenses	14.64	61.92	65.46	9.76	61.92	65.46
Total	72.88	359.15	388.60	34.23	258.95	299.09

(₹ in lakh)

Asset-4			Asset-5	
Particulars	2012-13 (pro-rata)	2013-14	2012-13 (pro-rata)	2013-14
Depreciation	570.70	744.76	410.01	754.65
Interest on Loan	700.92	854.55	506.80	878.29
Return on Equity	601.15	780.90	431.32	790.97
Interest on working capital	49.95	63.47	35.82	64.47
O & M Expenses	123.83	157.10	86.68	157.10
Total	2046.55	2600.78	1470.63	2645.48

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

(₹ in lakh)

Asset-1			
Particulars	2011-12	2012-13	2013-14
Maintenance Spares	8.78	9.29	9.82
O & M Expenses	4.88	5.16	5.46
Receivables	46.37	57.68	62.65
<b>Total</b>	<b>60.03</b>	<b>72.13</b>	<b>77.93</b>
Rate of Interest	11.75%	11.75%	11.75%
Interest	<b>7.05</b>	<b>8.48</b>	<b>9.16</b>

(₹ in lakh)

Asset-2				Asset-3		
Particulars	2011-12	2012-13	2013-14	2011-12	2012-13	2013-14
Maintenance Spares	8.78	9.29	9.82	8.78	9.29	9.82
O & M Expenses	4.88	5.16	5.46	4.88	5.16	5.46
Receivables	48.59	59.86	64.77	34.23	43.16	49.85
<b>Total</b>	<b>62.25</b>	<b>74.31</b>	<b>80.05</b>	<b>47.89</b>	<b>57.61</b>	<b>65.13</b>
Rate of Interest	11.75%	11.75%	11.75%	11.75%	11.75%	11.75%
Interest	<b>7.31</b>	<b>8.73</b>	<b>9.41</b>	<b>5.63</b>	<b>6.77</b>	<b>7.65</b>

(₹ in lakh)

Asset-4			Asset-5	
Particulars	2012-13	2013-14	2012-13	2013-14
Maintenance Spares	22.29	23.56	22.29	23.56
O & M Expenses	12.38	13.09	12.38	13.09
Receivables	409.31	433.46	420.18	440.91
<b>Total</b>	<b>443.98</b>	<b>470.11</b>	<b>454.85</b>	<b>477.56</b>
Rate of Interest	13.50%	13.50%	13.50%	13.50%
Interest	<b>59.94</b>	<b>63.46</b>	<b>61.40</b>	<b>64.47</b>

8. 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. The replies to the petition have been filed by Respondent No. 2, Ajmer Vidyut Vitran Nigam Ltd (AVVNL) vide affidavit dated 23.3.2012, Respondent No. 6, Punjab State Power Corporation Limited (PSPCL), the successor of Punjab State Electricity Board, vide affidavit dated 3.7.2012 and 22.8.2013 and Respondent No. 12, BSES Rajdhani Power Ltd (BRPL) vide affidavit dated 12.8.2013. The petitioner has filed rejoinder to the reply of AVVNL, PSPCL and BRPL vide affidavit dated 21.11.2013, 21.11.2013 and 21.11.2013 respectively. The objections raised by the respondents

and the clarifications given by the petitioner are dealt in relevant paragraphs of this order.

9. We have heard the representatives of the parties present at the hearing and have perused the material available on record. We proceed to dispose of the petition. While doing so, the submissions of the respondents have been duly taken note of.

### **Capital cost**

10. Regulation 7 of the 2009 Tariff Regulations so far as relevant provides as under:-

**“(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.”

### **Cost over-run**

11. The details of apportioned approved capital cost, actual capital cost as on the dates of commercial operation and estimated additional capital expenditure projected to be incurred as claimed by the petitioner for the assets are given hereunder:-

(₹ in lakh)						
Assets	Apportioned approved cost	Projected cost incurred as on date of commercial operation	Projected additional capital expenditure			Total estimated completion cost
			DOCO to 31.3.12	2012-13	2013-14	
Asset-1	1948.81	1074.96	403.22	403.22	-	1881.40
Asset-2	1948.81	1151.30	403.22	403.22	-	1957.74
Asset-3	1645.00	778.39	125.17	500.69	-	1404.25
Asset-4	13106.42	13186.87	-	1137.37	1132.32	15456.56
Asset-5	13106.42	13425.01	-	1348.67	617.44	15391.12
<b>TOTAL</b>	<b>31755.46</b>	<b>29616.53</b>	<b>931.61</b>	<b>3793.17</b>	<b>1749.76</b>	<b>36091.06</b>

The petitioner, vide affidavit dated 8.8.2013, has later submitted the Management Certificate for Asset 4 and 5 as per actual date of commercial operation. The total estimated completion cost of the assets, covered under the petition has been projected as ₹36091.06 lakh against the total approved cost of the asset ₹31755.46 lakh. Thus, there is an increase in cost of ₹4335.60 lakh (13.65 %). There is cost overrun in case of Asset 2, 4 and 5.

12. The petitioner has not furnished any RCE in the instant case. Accordingly, the total completion costs have been restricted up to apportioned approved cost of each asset. The same restricted costs have been considered for the purpose of tariff for the period 2009-2014. This approach has been upheld by the



Appellate Tribunal for Electricity in its order dated 28.11.2013 in Appeal No.165

of 2012, wherein it has been observed as under:-

"..... The Appellant is a Nava Public Sector Company of the Central Government. Its Board is empowered to approve its projects including the cost estimates for such projects. The Central Commission also accepts the cost approved by the Board of the Appellant. Under such circumstances, the Appellant could have approached its own Board for approval of the Revised Cost Estimates as desired by the Central Commission. ...."

13. Accordingly, following capital cost up to date of commercial operation of the Assets have been considered for the purpose of tariff:-

(₹ in lakh)

Assets	Date of commercial operation	Apportioned cost	Projected cost incurred as on date of commercial operation	Projected additional capital expenditure			Total estimated completion cost
				DOCO 31.3.2012	2012-13	2013-14	
Asset-1	1.1.2012	1948.81	1074.96	403.22	403.22	-	1881.40
Asset-2	1.1.2012	1948.81	1151.30	403.22	394.29	-	1948.81
Asset-3	1.1.2012	1645.00	778.39	125.17	500.69	-	1404.25
Asset-4	1.6.2012	13106.42	13106.42	-	-	-	13106.42
Asset-5	1.9.2012	13106.42	13106.42	-	-	-	13106.42
TOTAL		31755.46	29217.49	931.61	1298.20	-	31447.30

### **Cost variation**

14. There is cost variation in some of the items like land, switchgear (CT/PT/CB/Isolator etc.), Bus Bars, conductor/ insulator, civil works, power and control cable and misc. common equipments. As such, the petitioner was directed to submit the reasons for cost over-run. The petitioner, vide affidavit dated 20.9.2012, has submitted that the total cost has been allocated to all the assets in the Common Scheme based on the apportionment of the project. The petitioner has submitted that the large variation in cost of land is due to actual amount paid to the State authority and no land has been acquired for Balia Sub-station, i.e. Asset 3. As

regards the control room and office building including HVAC, the petitioner has submitted that the rates and scope envisaged during FR were on lower side. In case of Switchgear (CT/PT/CB/Isolators etc.), actual cost for all five assets of this petition is lower than FR cost. FR cost of all five assets is ₹4797 lakh whereas the actual cost is ₹4754 lakh. The rates and scope of power & control cables envisaged during FR are on lower side. In case of common misc. equipments, actual cost for all the five assets of the petition is lower to FR cost. FR cost of all the five assets is ₹590.66 lakh whereas actual cost is ₹553.02 lakh. In case of Bus bars/conductors/ insulators & civil works, actual cost for all the five assets of the petition is lower than FR cost. FR cost of all the five assets is ₹928.03 lakh whereas actual cost is ₹856.46 lakh.

15. AVVNL has submitted that the total estimated completion cost of some of the elements in the scheme is high and in case of other elements it is less than the apportioned approved cost. The petitioner should explain the reasons for such variation. PSPCL has submitted that there is huge cost over-run in case of 1500 MVA ICT-1 at Agra. As it is the costliest item of the project, it is necessary to have a comparison of the cost of the ICT at Agra against the cost of 1500 MVA ICTs procured and installed by the petitioner for sub-stations in NR/WR/ER/SR during the past 5 years. PSPCL has further submitted that the petitioner should furnish the name of manufacturer and supplier of the ICT. BRPL has submitted that there is a cost over-run of 9.23%.

16. In response to PSPCL's submission, the petitioner has clarified that the petitioner has filed Form-5C in line with the 2009 Tariff Regulations and that the contract was awarded to M/S Hyosung Corporation. The petitioner has clarified, in response to BRPL's reply that the estimates are prepared by the petitioner as per

well defined procedures for cost estimate. The cost estimate is broad indicative cost worked out generally on the basis of average unit rates of recently awarded contracts. For, procurement open competitive bidding route is followed and by providing equal opportunity to all eligible firms, lowest market price for required product/services is obtained and contracts are awarded on the basis of lowest evaluated eligible bidder. The best competitive bid prices against tender are lower as compared to the cost estimate depending upon prevailing market conditions.

17. It is observed that the major reason for the cost over-run is due to the variation in cost of land as per FR and the actual cost paid by the petitioner, which is due to the increase in the cost of the land of the sub-stations. The details of the cost of the land for the various sub-stations are as follows:-

(₹ in lakh)					
Cost of land	Asset 1	Asset 2	Asset 3	Asset 4	Asset 5
As per FR (i)	22.43	22.43	NA	38.51	38.51
Actual (ii)	45.65	45.65	NA	782.74	782.74
Variation (ii)-(i)	<b>23.22</b>	<b>23.22</b>	NA	<b>744.23</b>	<b>744.23</b>
Variation in %	<b>103.52</b>	<b>103.52</b>	NA	<b>1932.56</b>	<b>1932.56</b>

18. From the above table, It is observed that there is a huge variation in acquisition of land in both Fathepur and Agra Sub-stations. The reason for cost over- run is mainly due to high tendered cost. The total cost has been allocated to all the assets in common scheme based on apportionment of the project. Large variation in cost of land is due to actual amount paid to the state authority. However, no new land has been acquired for Balia Sub-station. In case of Asset-2, projected additional capital expenditure for 2012-13 has been restricted up to apportioned approved cost proportionately to the elements. In case of

Asset-4 & 5, capital cost as on date of commercial operation has been restricted up to apportioned approved cost proportionately to the elements.

### **Initial spares**

19. Regulation 8 of the 2009 Tariff Regulations provide for ceiling norms for capitalization of initial spares in respect of the 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.

20. The actual cost on the date of commercial operation claimed by the petitioner is inclusive of the cost of initial spares. The petitioner has submitted the cost of initial spares included in the capital cost as follows:-

(₹ in lakh)

Particulars	Initial spares	Capital cost as on 31.3.2014	%
Asset 1	20.78	1881.40	1.10
Asset 2	20.78	1957.73	1.06
Asset 3	15.24	1404.25	1.09
Asset 4	270.59	15456.56	1.75
Asset 5	192.78	15391.12	1.25

21. The cost of initial spares is within the ceiling limits specified under the 2009 Tariff Regulations and hence the claim on that account is in order.

## **Projected additional capital expenditure**

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

“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:”

23. Clause (11) of Regulation 3 of tariff regulations defines “cut-off” date as under:

“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”.

24. After taking in to account the dates of commercial operation of the assets, cut-off date arrived at is 31.3.2015.

25. The projected additional capital expenditure claimed by the petitioner, is stated to be on account of balance/retention payments. The expenditure claimed is within the cut-off date. Accordingly, the projected additional capital expenditure is within the scope of Regulation 9 of the 2009 Tariff Regulations. The same is given below:-

(₹ in lakh)

Assets	From DOCO to 31.3.2012	Expenditure for 2012-13	Expenditure for 2013-14	Remarks
Asset-1	403.22	403.22	Not claimed	Additional capital expenditure claimed by the petitioner has been allowed and considered for tariff computation
Asset-2	403.22	349.29	Not claimed	Additional capital expenditure of 8.93 lakh for the financial year 2012-13 has been restricted in the absence of RCE
Asset-3	125.17	500.69	Not claimed	Additional capital expenditure claimed by the petitioner is allowed and considered for tariff computation
Asset-4	-	-	-	Capital cost as on DOCO has been restricted up to apportioned approved cost and no Additional capital expenditure has been allowed for financial years 2012-13 and 2013-14
Asset-5	-	-	-	

### **Debt- equity ratio**

26. Regulation 12 of the 2009 Tariff Regulations provides as under:-

“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.”

27. The details of debt-equity (70:30) as on date of commercial operation of the assets are as follows: -

(₹ in lakh)			
		Amount	%
Asset 1	Debt	752.50	70.00
	Equity	322.46	30.00
	<b>Total</b>	<b>1074.96</b>	<b>100.00</b>
Asset 2	Debt	805.90	70.00
	Equity	345.39	30.00
	<b>Total</b>	<b>1151.29</b>	<b>100.00</b>
Asset 3	Debt	544.90	70.00
	Equity	233.49	30.00
	<b>Total</b>	<b>778.39</b>	<b>100.00</b>
Asset 4	Debt	9174.49	70.00
	Equity	3931.93	30.00
	<b>Total</b>	<b>13106.42</b>	<b>100.00</b>
Asset 5	Debt	9174.49	70.00
	Equity	3931.93	30.00
	<b>Total</b>	<b>13106.42</b>	<b>100.00</b>

28. The details of Debt-Equity ratio as on 31.3.2014 of assets are as follows: -

(₹ in lakh)			
		Amount	%
Asset 1	Debt	1317.01	70.00
	Equity	564.39	30.00
	<b>Total</b>	<b>1881.40</b>	<b>100.00</b>
Asset 2	Debt	1364.16	70.00
	Equity	584.64	30.00
	<b>Total</b>	<b>1948.80</b>	<b>100.00</b>
Asset 3	Debt	983.00	70.00
	Equity	421.25	30.00
	<b>Total</b>	<b>1404.25</b>	<b>100.00</b>
Asset 4	Debt	9174.49	70.00
	Equity	3931.93	30.00
	<b>Total</b>	<b>13106.42</b>	<b>100.00</b>
Asset 5	Debt	9174.49	70.00
	Equity	3931.93	30.00
	<b>Total</b>	<b>13106.42</b>	<b>100.00</b>

## **Return on equity**

29. 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”.

30. The petitioner has claimed RoE at the rate of 15.5% in accordance with clause (2) of Regulation 15 which has been allowed. The petitioner's prayer to recover 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 shall be settled in accordance with the provisions of Regulation 15 of the 2009 Tariff Regulations.

31. The detail calculations in support of RoE allowed are given hereunder:-

(₹ in lakh)

<b>Asset-1</b>			
<b>Particulars</b>	<b>2011-12 (pro-rata)</b>	<b>2012-13</b>	<b>2013-14</b>
Opening Equity	322.46	443.43	564.39
Addition due to Additional Capitalisation	120.97	120.97	-
Closing Equity	443.43	564.39	564.39
Average Equity	382.94	503.91	564.39
Return on Equity (Base Rate )	15.50%	15.50%	15.50%
Tax rate for the year 2008-09 (MAT)	11.33%	11.33%	11.33%
Rate of Return on Equity (Pre Tax )	17.481%	17.481%	17.481%
<b>Return on Equity (Pre Tax)</b>	<b>16.74</b>	<b>88.09</b>	<b>98.66</b>

(₹ in lakh)

<b>Particulars</b>	<b>Asset-2</b>			<b>Asset-3</b>		
	<b>2011-12 (pro-rata)</b>	<b>2012-13</b>	<b>2013-14</b>	<b>2011-12 (pro-rata)</b>	<b>2012-13</b>	<b>2013-14</b>
Opening Equity	345.39	466.35	584.64	233.49	271.04	421.25
Addition due to Additional Capitalisation	120.97	118.29	-	37.55	150.21	-
Closing Equity	466.35	584.64	584.64	271.04	421.25	421.25
Average Equity	405.87	525.50	584.64	252.27	346.14	421.25
Return on Equity (Base Rate )	15.50%	15.50%	15.50%	15.50%	15.50%	15.50%
Tax rate for the year 2008-09 (MAT)	11.33%	11.33%	11.33%	11.33%	11.33%	11.33%
Rate of Return on Equity (Pre Tax )	17.481%	17.481%	17.481%	17.481%	17.481%	17.481%
<b>Return on Equity (Pre Tax)</b>	<b>17.74</b>	<b>91.86</b>	<b>102.20</b>	<b>7.35</b>	<b>60.51</b>	<b>73.64</b>

(₹ in lakh)

Asset-4			Asset-5	
Particulars	2012-13 (pro-rata)	2013-14	2012-13 (pro-rata)	2013-14
Opening Equity	3931.93	3931.93	3931.93	3931.93
Addition due to Additional Capitalisation	-	-	-	-
Closing Equity	3931.93	3931.93	3931.93	3931.93
Average Equity	3931.93	3931.93	3931.93	3931.93
Return on Equity (Base Rate )	15.50%	15.50%	15.50%	15.50%
Tax rate for the year 2008-09 (MAT)	11.33%	11.33%	11.33%	11.33%
Rate of Return on Equity (Pre Tax )	17.481%	17.481%	17.481%	17.481%
<b>Return on Equity (Pre Tax)</b>	<b>572.78</b>	<b>687.34</b>	<b>400.95</b>	<b>687.34</b>

### Interest on loan

32. 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.”

33. AVVNL has submitted that the interest on loan should be allowed on actual basis prevailing at the time of date of commercial operation. In keeping with the provisions of Regulation 16, the petitioner’s entitlement to interest on loan has been calculated on the following basis:-

(a) Gross amount of loan, repayment of instalments and rate of interest and weighted average rate of interest on actual average loan have been considered as per the petition.

(b) The repayment for the tariff period 2009-14 shall be deemed to be equal to the depreciation allowed for that period.

(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.

34. Detailed calculations in support of the weighted average rates of interest have been given in **Annexure I to V**.

35. Based on the weighted average rates of interest considered, interest on loan has been calculated as given hereunder:-

(₹ in lakh)

Asset-1			
Particulars	2011-12 (pro-rata)	2012-13	2013-14
Gross Normative Loan	752.50	1034.75	1317.01
Cumulative Repayment upto previous year	-	16.03	100.73
Net Loan-Opening	752.50	1018.72	1216.28
Addition due to additional capital expenditure	282.25	282.25	-
Repayment during the year	16.03	84.70	94.98
Net Loan-Closing	1018.72	1216.28	1121.30
Average Loan	885.61	1117.50	1168.79
Weighted Average Rate of Interest on Loan	9.210%	9.209%	9.211%
Interest	20.39	102.91	107.66

(₹ in lakh)

Particulars	Asset-2			Asset-3		
	2011-12 (pro-rata)	2012-13	2013-14	2011-12 (pro-rata)	2012-13	2013-14
Gross Normative Loan	805.90	1088.16	1364.16	544.90	632.52	983.00
Cumulative Repayment upto previous year	-	17.04	105.54	-	7.26	66.52
Net Loan-Opening	805.90	1071.12	1258.62	544.90	625.26	916.48
Addition due to additional capital expenditure	282.25	276.00	-	87.62	350.48	-
Repayment during the year	17.04	88.50	98.56	7.26	59.26	71.82
Net Loan-Closing	1071.12	1258.62	1,160.06	625.26	916.48	844.67
Average Loan	938.51	1164.87	1209.34	585.08	770.87	880.58
Weighted Average Rate of Interest on Loan	9.219%	9.218%	9.221%	9.144%	9.144%	9.145%
Interest	21.63	107.38	111.51	8.92	70.49	80.53

(₹ in lakh)

Particulars	Asset-4		Asset-5	
	2012-13 (pro-rata)	2013-14	2012-13 (pro-rata)	2013-14
Gross Normative Loan	9174.49	9174.49	9174.49	9174.49
Cumulative Repayment upto previous year	-	542.35	-	380.07
Net Loan-Opening	9174.49	8632.15	9174.49	8794.42
Addition due to additional capital expenditure	-	-	-	-
Repayment during the year	542.35	650.82	380.07	651.55
Net Loan-Closing	8632.15	7981.33	8794.42	8142.87
Average Loan	8903.32	8306.74	8984.46	8468.65
Weighted Average Rate of Interest on Loan	8.983%	9.014%	8.990%	8.989%
Interest	666.52	748.77	471.14	761.28

## Depreciation

36. Regulation 17 of the 2009 Tariff Regulations provides as under:-

“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.”

37. The petitioner's entitlement to depreciation has been considered in accordance with clause (4) of Regulation 17 extracted above. The assets were put under commercial operation during 2012 and will complete 12 years beyond 2013-14 and hence depreciation has been calculated annually based on Straight Line Method at the rates of depreciation specified in Appendix-III to the 2009 Tariff Regulations for sub-station are as follows:-

(₹ in lakh)

Asset-1			
Particulars	2011-12 (pro-rata)	2012-13	2013-14
Opening Gross Block	1074.96	1478.18	1881.40
Addition due to Projected Additional Capitalisation	403.22	403.22	-
Closing Gross Block	1478.18	1881.40	1881.40
Average Gross Block	1276.57	1679.79	1881.40
Rate of Depreciation	5.0236%	5.0421%	5.0484%
Depreciable Value	1107.83	1470.73	1652.18
Remaining Depreciable Value	1107.83	1454.69	1551.45
Depreciation	16.03	84.70	94.98

(₹ in lakh)

Particulars	Asset 2			Asset 3		
	2011-12 (pro-rata)	2012-13	2013-14	2011-12 (pro-rata)	2012-13	2013-14
Opening Gross Block	1151.29	1554.51	1948.80	778.39	903.56	1404.25
Addition due to Projected Additional Capitalisation	403.22	394.29	-	125.17	500.69	-
Closing Gross Block	1554.51	1948.80	1948.80	903.56	1404.25	1404.25
Average Gross Block	1352.90	1751.66	1948.80	840.98	1153.91	1404.25
Rate of Depreciation	5.0381%	5.0523%	5.0572%	5.1796%	5.1354%	5.1143%
Depreciable Value	1176.53	1535.40	1712.84	756.88	1038.51	1263.83
Remaining Depreciable Value	1176.53	1518.36	1607.30	756.88	1031.25	1197.31
Depreciation	17.04	88.50	98.56	7.26	59.26	71.82

(₹ in lakh)

Asset-4			Asset-5	
Particulars	2012-13 (pro-rata)	2013-14	2012-13 (pro-rata)	2013-14
Opening Gross Block	13106.42	13106.42	13106.42	13106.42
Addition due to Projected Additional Capitalisation	-	-	-	-
Closing Gross Block	13106.42	13106.42	13106.42	13106.42
Average Gross Block	13106.42	13106.42	13106.42	13106.42
Rate of Depreciation	4.9656%	4.9656%	4.9712%	4.9712%
Depreciable Value	11095.61	11095.61	11108.03	11108.03
Remaining Depreciable Value	11095.61	10553.26	11108.03	10,727.96
Depreciation	542.35	650.82	380.07	651.55



### **Operation & maintenance expenses**

38. Clause (g) of Regulation 19 of the 2009 Tariff Regulations prescribes the norms for operation and maintenance expenses for the transmission system based on the type of sub-station and the transmission line. Norms prescribed in respect of the elements covered in the instant petition are as under:-

( ₹ in lakh/Bay)					
Element	2009-10	2010-11	2011-12	2012-13	2013-14
400 kV	52.40	55.40	58.57	61.92	65.46
765 kV	73.46	77.56	81.99	86.68	91.64

39. The allowable O&M expenses for the assets covered in the petition are as thus as under:-

( ₹ in lakh)			
Particulars	2011-12	2012-13	2013-14
Asset-1	14.64 (Pro-rata for 3 months)	61.92	65.46
Asset-2	14.64 (Pro-rata for 3 months)	61.92	65.46
Asset-3	9.76 (Pro-rata for 2 months)	61.92	65.46
Asset-4		123.83 (Pro-rata for 10 months)	157.10
Asset-5		86.68 (Pro-rata for 7 months)	157.10

40. The AVVNL, submitted that the petitioner has indicated regarding additional manpower cost. The same is not to be considered as the tariff is to be determined only as per Regulations. The petitioner clarified that the wage revision of the employees of the petitioner company has already been done.

41. The petitioner has stated that O&M expenditure for 2009-14 tariff block had been arrived on the basis of normalized actual O&M expenses of the petitioner during the



year 2003-04 to 2007-08. The wage hike of 50% on account of pay revision of the employees of public sector undertaking was also considered while calculating the O&M charges for tariff period 2009-14. The petitioner has submitted that it would approach the Commission for suitable revision in the norms for O&M expenditure in case the impact of wage hike w.e.f 1.1.2007 is more than 50%.

42. While specifying the norms for operation and maintenance expenses, the Commission has in the 2009 Tariff Regulations already factored 50% on account of pay revision of the employees of PSUs after extensive consultation with the stakeholders. At this stage there does not seem to be any justification for deviating from the norms. However, in case the petitioner separately approaches the Commission by making an appropriate application, the same shall be dealt with in accordance with law.

### **Interest on working capital**

43. 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 hereunder.

#### **(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 operation and maintenance 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 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 as on 1<sup>st</sup> April of the year in which the asset is put under commercial operation plus 350 bps. The State Bank of India Base Rate was 8.25% on 1.4.2011 and 10% as on 1.4.2014. Therefore, rate of interest works out to 11.75% in respect of Assets 1, 2 and 3 and 13.50% in respect of Assets 4 and 5. The interest on working capital for the assets covered in the petition has been worked out accordingly.

44. Necessary computations in support of interest on working capital are given overleaf:-

(₹ in lakh)

Asset-1			
Particulars	2011-12 (pro-rata)	2012-13	2013-14
Maintenance Spares	8.79	9.29	9.82
O & M Expenses	4.88	5.16	5.46
Receivables	46.38	57.68	62.65
Total	<b>60.04</b>	<b>72.13</b>	<b>77.93</b>
Rate of Interest	11.75%	11.75%	11.75%
Interest	<b>7.06</b>	<b>8.48</b>	<b>9.16</b>

(₹ in lakh)

Asset-2				Asset-3		
Particulars	2011-12 (pro-rata)	2012-13	2013-14	2011-12 (pro-rata)	2012-13	2013-14
Maintenance Spares	8.79	9.29	9.82	8.79	9.29	9.82
O & M Expenses	4.88	5.16	5.46	4.88	5.16	5.46
Receivables	48.59	59.73	64.52	34.23	43.16	49.85
Total	62.25	74.18	79.79	47.89	57.61	65.12
Rate of Interest	11.75%	11.75%	11.75%	11.75%	11.75%	11.75%
Interest	7.31	8.72	9.38	5.63	6.77	7.65

(₹ in lakh)

Asset-4			Asset-5	
Particulars	2012-13 (pro-rata)	2013-14	2012-13	2013-14
Maintenance Spares	22.29	23.57	22.29	23.57
O & M Expenses	12.38	13.09	12.38	13.09
Receivables	390.67	383.46	392.13	385.71
Total	425.34	420.11	426.80	422.37
Rate of Interest	13.50%	13.50%	13.50%	13.50%
Interest	57.42	56.72	57.62	57.02

### Transmission charges

45. The transmission charges allowed are summarized overleaf:-

(₹ in lakh)

<b>Asset-1</b>			
	<b>2011-12</b>	<b>2012-13</b>	<b>2013-14</b>
Depreciation	16.03	84.70	94.98
Interest on Loan	20.39	102.91	107.66
Return on Equity	16.74	88.09	98.66
Interest on Working Capital	1.76	8.48	9.16
O & M Expenses	14.64	61.92	65.46
<b>Total</b>	<b>69.56</b>	<b>346.09</b>	<b>375.92</b>

(₹ in lakh)

<b>Asset-2</b>				<b>Asset-3</b>		
	<b>2011-12</b>	<b>2012-13</b>	<b>2013-14</b>	<b>2011-12</b>	<b>2012-13</b>	<b>2013-14</b>
Depreciation	17.04	88.50	98.56	7.26	59.26	71.82
Interest on Loan	21.63	107.38	111.51	8.92	70.49	80.53
Return on Equity	17.74	91.86	102.20	7.35	60.51	73.64
Interest on Working Capital	1.83	8.72	9.38	0.94	6.77	7.65
O & M Expenses	14.64	61.92	65.46	9.76	61.92	65.46
<b>Total</b>	<b>72.88</b>	<b>58.38</b>	<b>387.10</b>	<b>34.23</b>	<b>258.94</b>	<b>299.09</b>

(₹ in lakh)

<b>Asset-4</b>			<b>Asset-5</b>	
	<b>2012-13</b>	<b>2013-14</b>	<b>2012-13</b>	<b>2013-14</b>
Depreciation	542.35	650.82	380.07	651.55
Interest on Loan	666.52	748.77	471.14	761.28
Return on Equity	572.78	687.34	400.95	687.34
Interest on Working Capital	47.85	56.72	33.61	57.02
O & M Expenses	123.83	157.10	86.68	157.10
<b>Total</b>	<b>1,953.34</b>	<b>2,300.75</b>	<b>1372.46</b>	<b>2314.29</b>

46. The transmission charges allowed are subject to truing up in accordance with the 2009 Tariff Regulations.

### **Filing fee and the publication expenses**

47. The petitioner has sought reimbursement of fee paid by it for filing the petition and publication expenses. The BRPL submitted that the filing fee shall be governed as per the Commission's order. The petitioner has clarified that reimbursement of expenditure has been claimed in terms of Regulation 42 of 2009 Tariff Regulations. In

accordance with the Commission's order dated 11.1.2010 in Petition No. 109/2009, the petitioner shall be entitled to recover the filing fee directly from the beneficiaries on *pro-rata* basis. The petitioner shall also be entitled for reimbursement of the publication expenses in connection with the present petition, directly from the beneficiaries on *pro-rata* basis.

### **Licence fee**

48. 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.

49. BRPL has submitted that the petitioner's request for reimbursement for licence fee should be rejected as license fee is the eligibility fee of a licence holder and it is the onus of the petitioner. The petitioner has clarified 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 42 A (1) (b) of the 2009 Tariff Regulations

### **Service tax**

50. 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 BRPL has objected to recovery of service tax from the beneficiaries in future as CBEC has exempted service tax on transmission. Vide notification No. 11/2010-service tax dated 20.7.2010. The petitioner clarified that if

notifications regarding granting of exemption to transmission service are withdrawn at a later date, the beneficiaries shall have to share the service tax paid by the petitioner. We consider petitioner's prayer pre-mature and accordingly this prayer is rejected.

**Sharing of transmission charges**

51. 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.

52. This order disposes of Petition No. 90/TT/2012.

sd/-

**(M. DEENA DAYALAN)**  
**MEMBER**

sd/-

**(V.S. VERMA)**  
**MEMBER**

**CALCULATION OF WEIGHTED AVERAGE RATE OF INTEREST ON LOAN**

(₹ in lakh)

	Details of Loan	2011-12	2012-13	2013-14
<b>1</b>	<b>Bond XXVIII</b>			
	Gross loan opening	<b>70.00</b>	<b>70.00</b>	<b>70.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>5.83</b>
	Net Loan-Opening	70.00	70.00	64.17
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	5.83	5.83
	Net Loan-Closing	70.00	64.17	58.33
	Average Loan	70.00	67.08	61.25
	Rate of Interest	9.33%	9.33%	9.33%
	Interest	6.53	6.26	5.71
	Rep Schedule	12 annual installments from 15.12.2012		
<b>2</b>	<b>Bond XXIX</b>			
	Gross loan opening	<b>5.00</b>	<b>5.00</b>	<b>5.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.42</b>
	Net Loan-Opening	5.00	5.00	4.58
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.42	0.42
	Net Loan-Closing	5.00	4.58	4.17
	Average Loan	5.00	4.79	4.38
	Rate of Interest	9.20%	9.20%	9.20%
	Interest	0.46	0.44	0.40
	Rep Schedule	12 annual installments from 12.03.2013		
<b>3</b>	<b>Bond XXX</b>			
	Gross loan opening	<b>75.00</b>	<b>75.00</b>	<b>75.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	75.00	75.00	75.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	6.25
	Net Loan-Closing	75.00	75.00	68.75
	Average Loan	75.00	75.00	71.88
	Rate of Interest	8.80%	8.80%	8.80%
	Interest	6.60	6.60	6.33
	Rep Schedule	15 annual installments from 20.09.2013		
<b>4</b>	<b>Bond XXXI</b>			
	Gross loan opening	<b>65.00</b>	<b>65.00</b>	<b>65.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>

	Net Loan-Opening	65.00	65.00	65.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	5.42
	Net Loan-Closing	65.00	65.00	59.58
	Average Loan	65.00	65.00	62.29
	Rate of Interest	8.90%	8.90%	8.90%
	Interest	5.79	5.79	5.54
	Rep Schedule	12 annual installments from 25.02.2014		
<b>5</b>	<b>Bond XXXII</b>			
	Gross loan opening	<b>15.00</b>	<b>15.00</b>	<b>15.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	15.00	15.00	15.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	1.25
	Net Loan-Closing	15.00	15.00	13.75
	Average Loan	15.00	15.00	14.38
	Rate of Interest	8.84%	8.84%	8.84%
	Interest	1.33	1.33	1.27
	Rep Schedule	12 annual installments from 29.03.2014		
<b>6</b>	<b>Bond XXXIII</b>			
	Gross loan opening	<b>90.00</b>	<b>90.00</b>	<b>90.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	90.00	90.00	90.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	0.00
	Net Loan-Closing	90.00	90.00	90.00
	Average Loan	90.00	90.00	90.00
	Rate of Interest	8.64%	8.64%	8.64%
	Interest	7.78	7.78	7.78
	Rep Schedule	12 annual installments from 08.07.2014		
<b>7</b>	<b>Bond XXXIV</b>			
	Gross loan opening	<b>95.00</b>	<b>95.00</b>	<b>95.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	95.00	95.00	95.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	0.00
	Net Loan-Closing	95.00	95.00	95.00
	Average Loan	95.00	95.00	95.00
	Rate of Interest	8.84%	8.84%	8.84%
	Interest	8.40	8.40	8.40
	Rep Schedule	12 annual installments from 21.10.2014		
<b>8</b>	<b>Bond XXXV</b>			
	Gross loan opening	<b>300.00</b>	<b>300.00</b>	<b>300.00</b>



	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	300.00	300.00	300.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	0.00
	Net Loan-Closing	300.00	300.00	300.00
	Average Loan	300.00	300.00	300.00
	Rate of Interest	9.64%	9.64%	9.64%
	Interest	28.92	28.92	28.92
	Rep Schedule	12 annual installments from 31.05.2015		
<b>9</b>	<b>Bond XXXVI</b>			
	Gross loan opening	<b>37.50</b>	<b>37.50</b>	<b>37.50</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	37.50	37.50	37.50
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	0.00
	Net Loan-Closing	37.50	37.50	37.50
	Average Loan	37.50	37.50	37.50
	Rate of Interest	9.35%	9.35%	9.35%
	Interest	3.51	3.51	3.51
	Rep Schedule	15 annual installments from 29.08.2016		
	<b>Total Loan</b>			
	Gross loan opening	752.50	752.50	752.50
	Cumulative Repayment upto DOCO/previous year	0.00	0.00	6.25
	Net Loan-Opening	752.50	752.50	746.25
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	6.25	19.17
	Net Loan-Closing	752.50	746.25	727.08
	Average Loan	752.50	749.38	736.67
	Rate of Interest	<b>9.2096%</b>	<b>9.2091%</b>	<b>9.2114%</b>
	<b>Interest</b>	69.30	69.01	67.86

## Annexure-II

### CALCULATION OF WEIGHTED AVERAGE RATE OF INTEREST ON LOAN

(₹ in lakh)

	Details of Loan	2011-12	2012-13	2013-14
<b>1</b>	<b>Bond XXVIII</b>			
	Gross loan opening	<b>70.00</b>	<b>70.00</b>	<b>70.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>5.83</b>
	Net Loan-Opening	70.00	70.00	64.17
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	5.83	5.83
	Net Loan-Closing	70.00	64.17	58.33
	Average Loan	70.00	67.08	61.25
	Rate of Interest	9.33%	9.33%	9.33%
	Interest	6.53	6.26	5.71
	Rep Schedule	12 annual installments from 15.12.2012		
<b>2</b>	<b>Bond XXIX</b>			
	Gross loan opening	<b>5.00</b>	<b>5.00</b>	<b>5.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.42</b>
	Net Loan-Opening	5.00	5.00	4.58
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.42	0.42
	Net Loan-Closing	5.00	4.58	4.17
	Average Loan	5.00	4.79	4.38
	Rate of Interest	9.20%	9.20%	9.20%
	Interest	0.46	0.44	0.40
	Rep Schedule	12 annual installments from 12.03.2013		
<b>3</b>	<b>Bond XXX</b>			
	Gross loan opening	<b>75.00</b>	<b>75.00</b>	<b>75.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	75.00	75.00	75.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	6.25
	Net Loan-Closing	75.00	75.00	68.75
	Average Loan	75.00	75.00	71.88
	Rate of Interest	8.80%	8.80%	8.80%
	Interest	6.60	6.60	6.33
	Rep Schedule	15 annual installments from 20.09.2013		
<b>4</b>	<b>Bond XXXI</b>			
	Gross loan opening	<b>65.00</b>	<b>65.00</b>	<b>65.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>



	Net Loan-Opening	65.00	65.00	65.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	5.42
	Net Loan-Closing	65.00	65.00	59.58
	Average Loan	65.00	65.00	62.29
	Rate of Interest	8.90%	8.90%	8.90%
	Interest	5.79	5.79	5.54
	Rep Schedule	12 annual installments from 25.02.2014		
<b>5</b>	<b>Bond XXXII</b>			
	Gross loan opening	<b>15.00</b>	<b>15.00</b>	<b>15.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	15.00	15.00	15.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	1.25
	Net Loan-Closing	15.00	15.00	13.75
	Average Loan	15.00	15.00	14.38
	Rate of Interest	8.84%	8.84%	8.84%
	Interest	1.33	1.33	1.27
	Rep Schedule	12 annual installments from 29.03.2014		
<b>6</b>	<b>Bond XXXIII</b>			
	Gross loan opening	<b>90.00</b>	<b>90.00</b>	<b>90.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	90.00	90.00	90.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	0.00
	Net Loan-Closing	90.00	90.00	90.00
	Average Loan	90.00	90.00	90.00
	Rate of Interest	8.64%	8.64%	8.64%
	Interest	7.78	7.78	7.78
	Rep Schedule	12 annual installments from 08.07.2014		
<b>7</b>	<b>Bond XXXIV</b>			
	Gross loan opening	<b>95.00</b>	<b>95.00</b>	<b>95.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	95.00	95.00	95.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	0.00
	Net Loan-Closing	95.00	95.00	95.00
	Average Loan	95.00	95.00	95.00
	Rate of Interest	8.84%	8.84%	8.84%
	Interest	8.40	8.40	8.40
	Rep Schedule	12 annual installments from 21.10.2014		
<b>8</b>	<b>Bond XXXV</b>			
	Gross loan opening	<b>300.00</b>	<b>300.00</b>	<b>300.00</b>

	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	300.00	300.00	300.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	0.00
	Net Loan-Closing	300.00	300.00	300.00
	Average Loan	300.00	300.00	300.00
	Rate of Interest	9.64%	9.64%	9.64%
	Interest	28.92	28.92	28.92
	Rep Schedule	12 annual installments from 31.05.2015		
<b>9</b>	<b>Bond XXXVI</b>			
	Gross loan opening	<b>90.85</b>	<b>90.85</b>	<b>90.85</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	90.85	90.85	90.85
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	0.00
	Net Loan-Closing	90.85	90.85	90.85
	Average Loan	90.85	90.85	90.85
	Rate of Interest	9.35%	9.35%	9.35%
	Interest	8.49	8.49	8.49
	Rep Schedule	15 annual installments from 29.08.2016		
	<b>Total Loan</b>			
	Gross loan opening	805.85	805.85	805.85
	Cumulative Repayment upto DOCO/previous year	0.00	0.00	6.25
	Net Loan-Opening	805.85	805.85	799.60
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	6.25	19.17
	Net Loan-Closing	805.85	799.60	780.43
	Average Loan	805.85	802.73	790.02
	Rate of Interest	<b>9.2189%</b>	<b>9.2185%</b>	<b>9.2207%</b>
	<b>Interest</b>	74.29	74.00	72.85

## CALCULATION OF WEIGHTED AVERAGE RATE OF INTEREST ON LOAN

(₹ in lakh)

	Details of Loan	2011-12	2012-13	2013-14
<b>1</b>	<b>Bond XXVIII</b>			
	Gross loan opening	50.00	50.00	50.00
	Cumulative Repayment upto DOCO/previous year	0.00	0.00	4.17
	Net Loan-Opening	50.00	50.00	45.83
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	4.17	4.17
	Net Loan-Closing	50.00	45.83	41.67
	Average Loan	50.00	47.92	43.75
	Rate of Interest	9.33%	9.33%	9.33%
	Interest	4.67	4.47	4.08
	Rep Schedule	12 annual installments from 15.12.2012		
<b>2</b>	<b>Bond XXX</b>			
	Gross loan opening	50.00	50.00	50.00
	Cumulative Repayment upto DOCO/previous year	0.00	0.00	0.00
	Net Loan-Opening	50.00	50.00	50.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	4.17
	Net Loan-Closing	50.00	50.00	45.83
	Average Loan	50.00	50.00	47.92
	Rate of Interest	8.80%	8.80%	8.80%
	Interest	4.40	4.40	4.22
	Rep Schedule	15 annual installments from 20.09.2013		
<b>3</b>	<b>Bond XXXI</b>			
	Gross loan opening	50.00	50.00	50.00
	Cumulative Repayment upto DOCO/previous year	0.00	0.00	0.00
	Net Loan-Opening	50.00	50.00	50.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	4.17
	Net Loan-Closing	50.00	50.00	45.83
	Average Loan	50.00	50.00	47.92
	Rate of Interest	8.90%	8.90%	8.90%
	Interest	4.45	4.45	4.26
	Rep Schedule	12 annual installments from 25.02.2014		
<b>4</b>	<b>Bond XXXIII</b>			
	Gross loan opening	50.00	50.00	50.00
	Cumulative Repayment upto DOCO/previous year	0.00	0.00	0.00
	Net Loan-Opening	50.00	50.00	50.00
	Additions during the year	0.00	0.00	0.00

	Repayment during the year	0.00	0.00	0.00
	Net Loan-Closing	50.00	50.00	50.00
	Average Loan	50.00	50.00	50.00
	Rate of Interest	8.64%	8.64%	8.64%
	Interest	4.32	4.32	4.32
	Rep Schedule	12 annual installments from 08.07.2014		
<b>5</b>	<b>Bond XXXIV</b>			
	Gross loan opening	<b>50.00</b>	<b>50.00</b>	<b>50.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	50.00	50.00	50.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	0.00
	Net Loan-Closing	50.00	50.00	50.00
	Average Loan	50.00	50.00	50.00
	Rate of Interest	8.84%	8.84%	8.84%
	Interest	4.42	4.42	4.42
	Rep Schedule	12 annual installments from 21.10.2014		
<b>6</b>	<b>Bond XXXV</b>			
	Gross loan opening	<b>50.00</b>	<b>50.00</b>	<b>50.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	50.00	50.00	50.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	0.00
	Net Loan-Closing	50.00	50.00	50.00
	Average Loan	50.00	50.00	50.00
	Rate of Interest	9.64%	9.64%	9.64%
	Interest	4.82	4.82	4.82
	Rep Schedule	12 annual installments from 31.05.2015		
<b>7</b>	<b>Bond XXXVI</b>			
	Gross loan opening	<b>100.00</b>	<b>100.00</b>	<b>100.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	100.00	100.00	100.00
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	0.00	0.00
	Net Loan-Closing	100.00	100.00	100.00
	Average Loan	100.00	100.00	100.00
	Rate of Interest	9.35%	9.35%	9.35%
	Interest	9.35	9.35	9.35
	Rep Schedule	15 annual installments from 29.08.2016		
<b>8</b>	<b>Bond XXXVII</b>			
	Gross loan opening	<b>144.90</b>	<b>144.90</b>	<b>144.90</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	144.90	144.90	144.90
	Additions during the year	0.00	0.00	0.00

	Repayment during the year	0.00	0.00	0.00
	Net Loan-Closing	144.90	144.90	144.90
	Average Loan	144.90	144.90	144.90
	Rate of Interest	9.25%	9.25%	9.25%
	Interest	13.40	13.40	13.40
	Rep Schedule	12 annual installments from 26.12.2015		
	<b>Total Loan</b>			
	Gross loan opening	544.90	544.90	544.90
	Cumulative Repayment upto DOCO/previous year	0.00	0.00	4.17
	Net Loan-Opening	544.90	544.90	540.73
	Additions during the year	0.00	0.00	0.00
	Repayment during the year	0.00	4.17	12.50
	Net Loan-Closing	544.90	540.73	528.23
	Average Loan	544.90	542.82	534.48
	Rate of Interest	<b>9.1445%</b>	<b>9.1438%</b>	<b>9.1446%</b>
	<b>Interest</b>	49.83	49.63	48.88

**CALCULATION OF WEIGHTED AVERAGE RATE OF INTEREST  
ON LOAN****(₹ in lakh)**

	<b>Details of Loan</b>	<b>2012-13</b>	<b>2013-14</b>
<b>1</b>	<b>Bond XXVIII</b>		
	Gross loan opening	<b>500.00</b>	<b>500.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>41.67</b>
	Net Loan-Opening	500.00	458.33
	Additions during the year	0.00	0.00
	Repayment during the year	41.67	41.67
	Net Loan-Closing	458.33	416.67
	Average Loan	479.17	437.50
	Rate of Interest	9.33%	9.33%
	Interest	44.71	40.82
	Rep Schedule	12 annual installments from 15.12.2012	
<b>2</b>	<b>Bond XXIX</b>		
	Gross loan opening	<b>200.00</b>	<b>200.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>16.67</b>
	Net Loan-Opening	200.00	183.33
	Additions during the year	0.00	0.00
	Repayment during the year	16.67	16.67
	Net Loan-Closing	183.33	166.67
	Average Loan	191.67	175.00
	Rate of Interest	9.20%	9.20%
	Interest	17.63	16.10
	Rep Schedule	12 annual installments from 12.03.2013	
<b>3</b>	<b>Bond XXX</b>		
	Gross loan opening	<b>1200.00</b>	<b>1200.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	1200.00	1200.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	100.00
	Net Loan-Closing	1200.00	1100.00
	Average Loan	1200.00	1150.00
	Rate of Interest	8.80%	8.80%
	Interest	105.60	101.20
	Rep Schedule	15 annual installments from 20.09.2013	
<b>4</b>	<b>Bond XXXI</b>		



	Gross loan opening	<b>1500.00</b>	<b>1500.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	1500.00	1500.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	125.00
	Net Loan-Closing	1500.00	1375.00
	Average Loan	1500.00	1437.50
	Rate of Interest	8.90%	8.90%
	Interest	133.50	127.94
	Rep Schedule	12 annual installments from 25.02.2014	
<b>5</b>	<b>Bond XXXII</b>		
	Gross loan opening	<b>0.00</b>	<b>0.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	0.00	0.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	0.00	0.00
	Average Loan	0.00	0.00
	Rate of Interest	8.84%	8.84%
	Interest	0.00	0.00
	Rep Schedule	12 annual installments from 29.03.2014	
<b>6</b>	<b>Bond XXXIII</b>		
	Gross loan opening	<b>1300.00</b>	<b>1300.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	1300.00	1300.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	1300.00	1300.00
	Average Loan	1300.00	1300.00
	Rate of Interest	8.64%	8.64%
	Interest	112.32	112.32
	Rep Schedule	12 annual installments from 08.07.2014	
<b>7</b>	<b>Bond XXXIV</b>		
	Gross loan opening	<b>2125.00</b>	<b>2125.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	2125.00	2125.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	2125.00	2125.00

	Average Loan	2125.00	2125.00
	Rate of Interest	8.84%	8.84%
	Interest	187.85	187.85
	Rep Schedule	12 annual installments from 21.10.2014	
<b>8</b>	<b>Bond XXXV</b>		
	Gross loan opening	<b>400.00</b>	<b>400.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	400.00	400.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	400.00	400.00
	Average Loan	400.00	400.00
	Rate of Interest	9.64%	9.64%
	Interest	38.56	38.56
	Rep Schedule	12 annual installments from 31.05.2015	
<b>9</b>	<b>Bond XXXVI</b>		
	Gross loan opening	<b>879.00</b>	<b>879.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	879.00	879.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	879.00	879.00
	Average Loan	879.00	879.00
	Rate of Interest	9.35%	9.35%
	Interest	82.19	82.19
	Rep Schedule	15 annual installments from 29.08.2016	
<b>10</b>	<b>Bond XL</b>		
	Gross loan opening	<b>0.00</b>	<b>1126.81</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	0.00	1126.81
	Additions during the year	1126.81	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	1126.81	1126.81
	Average Loan	563.41	1126.81
	Rate of Interest	9.30%	9.30%
	Interest	52.40	104.79
	Rep Schedule	12 annual installments from 28.06.2016	
<b>10</b>	<b>Bond XL (for Add Cap)</b>		
	Gross loan opening	<b>0.00</b>	<b>796.16</b>
	Cumulative Repayment upto	<b>0.00</b>	<b>0.00</b>

	DOCO/previous year		
	Net Loan-Opening	0.00	796.16
	Additions during the year	796.16	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	796.16	796.16
	Average Loan	398.08	796.16
	Rate of Interest	9.30%	9.30%
	Interest	37.02	74.04
	Rep Schedule	12 annual installments from 28.06.2016	
	<b>Total Loan</b>		
	Gross loan opening	8104.00	10026.97
	Cumulative Repayment upto DOCO/previous year	0.00	58.33
	Net Loan-Opening	8104.00	9968.64
	Additions during the year	1922.97	0.00
	Repayment during the year	58.33	283.33
	Net Loan-Closing	9968.64	9685.30
	Average Loan	9036.32	9826.97
	Rate of Interest	<b>8.9835%</b>	<b>9.0141%</b>
	<b>Interest</b>	811.77	885.81

**CALCULATION OF WEIGHTED AVERAGE RATE OF INTEREST ON  
LOAN****(₹ in lakh)**

	<b>Details of Loan</b>	<b>2012-13</b>	<b>2013-14</b>
<b>1</b>	<b>Bond XXVIII</b>		
	Gross loan opening	<b>500.00</b>	<b>500.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>41.67</b>
	Net Loan-Opening	500.00	458.33
	Additions during the year	0.00	0.00
	Repayment during the year	41.67	41.67
	Net Loan-Closing	458.33	416.67
	Average Loan	479.17	437.50
	Rate of Interest	9.33%	9.33%
	Interest	44.71	40.82
	Rep Schedule	12 annual installments from 15.12.2012	
<b>2</b>	<b>Bond XXIX</b>		
	Gross loan opening	<b>200.00</b>	<b>200.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>16.67</b>
	Net Loan-Opening	200.00	183.33
	Additions during the year	0.00	0.00
	Repayment during the year	16.67	16.67
	Net Loan-Closing	183.33	166.67
	Average Loan	191.67	175.00
	Rate of Interest	9.20%	9.20%
	Interest	17.63	16.10
	Rep Schedule	12 annual installments from 12.03.2013	
<b>3</b>	<b>Bond XXX</b>		
	Gross loan opening	<b>1200.00</b>	<b>1200.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	1200.00	1200.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	100.00
	Net Loan-Closing	1200.00	1100.00
	Average Loan	1200.00	1150.00
	Rate of Interest	8.80%	8.80%
	Interest	105.60	101.20

	Rep Schedule	15 annual installments from 20.09.2013	
<b>4</b>	<b>Bond XXXI</b>		
	Gross loan opening	<b>1500.00</b>	<b>1500.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	1500.00	1500.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	125.00
	Net Loan-Closing	1500.00	1375.00
	Average Loan	1500.00	1437.50
	Rate of Interest	8.90%	8.90%
	Interest	133.50	127.94
	Rep Schedule	12 annual installments from 25.02.2014	
<b>5</b>	<b>Bond XXXII</b>		
	Gross loan opening	<b>0.00</b>	<b>0.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	0.00	0.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	0.00	0.00
	Average Loan	0.00	0.00
	Rate of Interest	8.84%	8.84%
	Interest	0.00	0.00
	Rep Schedule	12 annual installments from 29.03.2014	
<b>6</b>	<b>Bond XXXIII</b>		
	Gross loan opening	<b>1300.00</b>	<b>1300.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	1300.00	1300.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	1300.00	1300.00
	Average Loan	1300.00	1300.00
	Rate of Interest	8.64%	8.64%
	Interest	112.32	112.32
	Rep Schedule	12 annual installments from 08.07.2014	
<b>7</b>	<b>Bond XXXIV</b>		
	Gross loan opening	<b>2125.00</b>	<b>2125.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	2125.00	2125.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00

	Net Loan-Closing	2125.00	2125.00
	Average Loan	2125.00	2125.00
	Rate of Interest	8.84%	8.84%
	Interest	187.85	187.85
	Rep Schedule	12 annual installments from 21.10.2014	
<b>8</b>	<b>Bond XXXV</b>		
	Gross loan opening	<b>400.00</b>	<b>400.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	400.00	400.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	400.00	400.00
	Average Loan	400.00	400.00
	Rate of Interest	9.64%	9.64%
	Interest	38.56	38.56
	Rep Schedule	12 annual installments from 31.05.2015	
<b>9</b>	<b>Bond XXXVI</b>		
	Gross loan opening	<b>400.00</b>	<b>400.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	400.00	400.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	400.00	400.00
	Average Loan	400.00	400.00
	Rate of Interest	9.35%	9.35%
	Interest	37.40	37.40
	Rep Schedule	15 annual installments from 29.08.2016	
<b>10</b>	<b>Bond XXXVII</b>		
	Gross loan opening	<b>468.00</b>	<b>468.00</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	468.00	468.00
	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	468.00	468.00
	Average Loan	468.00	468.00
	Rate of Interest	9.25%	9.25%
	Interest	43.29	43.29
	Rep Schedule	12 annual installments from 26.12.2015	
<b>11</b>	<b>Bond XL</b>		
	Gross loan opening	<b>1304.51</b>	<b>1304.51</b>
	Cumulative Repayment upto DOCO/previous year	<b>0.00</b>	<b>0.00</b>
	Net Loan-Opening	1304.51	1304.51

	Additions during the year	0.00	0.00
	Repayment during the year	0.00	0.00
	Net Loan-Closing	1304.51	1304.51
	Average Loan	1304.51	1304.51
	Rate of Interest	9.30%	9.30%
	Interest	121.32	121.32
	Rep Schedule	12 annual installments from 28.06.2016	
	<b>Total Loan</b>		
	Gross loan opening	9397.51	9397.51
	Cumulative Repayment upto DOCO/previous year	0.00	58.33
	Net Loan-Opening	9397.51	9339.18
	Additions during the year	0.00	0.00
	Repayment during the year	58.33	283.33
	Net Loan-Closing	9339.18	9055.84
	Average Loan	9368.34	9197.51
	Rate of Interest	<b>8.9896%</b>	<b>8.9893%</b>
	<b>Interest</b>	842.18	826.80