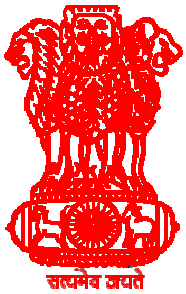



भारत सरकार Government of India
विद्युत मंत्रालय Ministry of Power
केंद्रीय विद्युत प्राधिकरण
Central Electricity Authority

**उत्तर पूर्वी क्षेत्रीय विद्युत समिति**
**North Eastern Regional Power Committee**

**शिलोंग Shillong**

# Progress Report

*For the month of*

**February, 2011**

## CONTENTS

# NORTH EASTERN REGIONAL POWER COMMITTEE

***Brief highlights of North Eastern Regional Power System for the month of February, 2011***

- The maximum unrestricted demand during the month of February, 2011 was 1665 MW, which was 1667 MW in the month of January, 2011. The peak demand met in NER during the period under review was 1551 MW, which was 1547 MW last month.

- The energy requirement during the month of February, 2011 was 748.22 MU, which was 790.59 MU in the month of January, 2011. The energy availability in NER during the period under review was 704.43 MU, which was 744.68 MU last month.

- The maximum, minimum & average system frequency were 50.67, 49.08 & 49.88 Hz respectively. The maximum, minimum & average FVI were 1.940, 0.250 & 0.602 respectively. The average FVI was less than its previous month's figure. (refer Annex-II).

- Maximum export of power from NER to ER was 220 MW (on 12/02/11 at 21:00 hrs) and that from ER to NER was 462 MW (24/02/11 at 18:00 hrs). Total net energy import during the month was 164.73 MU (from ER).

## SALIENT FEATURES OF
## NORTH EASTERN REGIONAL GRID FOR FEBRUARY, 2011

| | | | | |
|---|---|---|---|---|
| 1 | New unit/ transmission lines/Transformers commissioned during this month | | **Nil** | |
| 2 | Number of total grid disturbance during this month | | **Nil** | |
| | | | **Feb-11** | **Feb-10** |
| 3 | **Installed Capacity** of the Region ( in MW )(grid) | | 2054.12 | 2033.12 |
| 4 | **Energy Generation in MU (Gross)::** | | | |
| | Thermal | | 405.438 | 369.710 |
| | Hydel | | 164.572 | 103.518 |
| | Diesel / Oil | | 0.000 | 0.000 |
| | Total | | 570.010 | 473.228 |
| 5 | **Demand in MW ::** | | | |
| | Registered Peak demand | | 1665.00 | 1654.00 |
| | Peak demand met | | 1551.00 | 1415.00 |
| | Shortage ( % age ) | | -6.85 | -14.45 |
| 6 | **Regional Energy(Gross) in MU ::** | | | |
| | Energy requirement | | 748.22 | 680.41 |
| | Energy availability | | 704.43 | 621.20 |
| | Surplus (+) / Deficit (-) ( % age ) | | -5.85 | -8.70 |
| 7 | **Inter Regional Energy Exchange in MU ::** | | | |
| | NER ----> ER | | 1.981 | 0.015 |
| | ER ----> NER | | 166.714 | 172.923 |
| | Net Import | | 164.733 | -172.91 |
| 8 | **Frequency profile ::** | | | |
| | Average frequency ( Hz ) | | 49.88 | 49.82 |
| | Average Frequency Variation Index | | 0.602 | 0.820 |
| 9 | Load Factor ( in % ) | | 62.96 | 55.89 |

## ENERGY GENERATION IN THE REGION FOR THE MONTH OF Feb-11

*All figures in MU*

| Constituents | Hydro | | Coal / Oil fired | | Gas Based(OpenCycle) | | Gas Based(Com Cycle) | | Total(gen) | Total(gen) |
|---|---|---|---|---|---|---|---|---|---|---|
| | Gross | Net | Gross | Net | Gross | Net | Gross | Net | Gross | Net |
| | A | B | C | D | E | F | G | H | I | J |
| State Sector : | | | | | | | | | | |
| Assam | 14.580 | 14.434 | 0.000 | 0.000 | 65.800 | 65.142 | 49.450 | 47.967 | 129.830 | 127.543 |
| Meghalaya | 24.830 | 24.582 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 24.830 | 24.582 |
| Mizoram | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 |
| Tripura | 4.969 | 4.919 | 0.000 | 0.000 | 61.208 | 60.596 | 0.000 | 0.000 | 66.177 | 65.515 |
| Nagaland | 2.500 | 2.475 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 2.500 | 2.475 |
| Total ( State Sector ) | | | | | | | | | **223.337** | **220.114** |
| Central Sector : | | | | | | | | | | |
| NEEPCO : | | | | | | | | | | |
| Khd+Kop+Kop-II | 46.350 | 45.887 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 46.350 | 45.887 |
| K'guri | 0 | 0 | 0.000 | 0.000 | 0 | 0 | 176.830 | 171.525 | 176.830 | 171.525 |
| RCNagar | 0 | 0 | 0 | 0 | 52.150 | 51.629 | 0 | 0 | 52.150 | 51.629 |
| Doyang | 4.450 | 4.406 | 0 | 0 | 0 | 0 | 0 | 0 | 4.450 | 4.406 |
| Ranganadi | 33.390 | 33.056 | 0 | 0 | 0 | 0 | 0 | 0 | 33.390 | 33.056 |
| NHPC : | | | | | | | | | | |
| Loktak | 33.270 | 32.937 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 33.270 | 32.937 |
| Total ( Central Sector ) | | | | | | | | | 346.440 | 339.439 |
| Total NER | 164.339 | 162.695 | 0.000 | 0.000 | 179.158 | 177.366 | 226.280 | 219.492 | **569.777** | **559.553** |

## REQUIREMENT Vs AVAILABILITY IN THE REGION

| STATES | ENERGY requirement (MU) at 50 Hz | | | | POWER requirement (MW) at 50 Hz | | | |
|---|---|---|---|---|---|---|---|---|
| | *Availability & L/S at prevailing freq.* | | | | *Availability & L/S at prevailing freq.* | | | |
| | Requirt. | Availy. | Shortfall | %Shortfall | Requirt. | Availy.** | Shortfall | %Shortfall |
| Ar.Pr. | 39.51 | 36.06 | 3.45 | 8.73% | 83 | 81 | 2 | 2.00% |
| Assam | 391.69 | 377.44 | 14.25 | 3.64% | 910 | 880 | 30 | 3.30% |
| Manipur | 45.30 | 39.33 | 5.97 | 13.18% | 109 | 104 | 5 | 4.18% |
| M'laya | 129.20 | 120.77 | 8.43 | 6.53% | 294 | 284 | 10 | 3.53% |
| Mizoram | 33.04 | 29.42 | 3.62 | 10.95% | 75 | 70 | 5 | 6.12% |
| Nagaland | 44.19 | 38.60 | 5.60 | 12.67% | 105 | 93 | 12 | 11.53% |
| Tripura | 65.29 | 62.82 | 2.47 | 3.78% | 168 | 164 | 4 | 2.53% |
| REGION | 748.22 | 704.43 | 43.79 | 5.85% | 1665 | 1551 | 114 | 6.85% |

**ESTIMATION OF PEAK DEMAND (in MW)**

| Constituents | Peak Demand Met | Date | Freq. (Hz) | Freq. Corr.** | L/S | Estimated Peak demand at 50 Hz |
|---|---|---|---|---|---|---|
| Arunachal Pradesh | 81.00 | 11/02/2011 | 49.73 | 0.66 | 1 | 82.66 |
| Assam | 880.00 | 19/02/2011 | 50.19 | -5.02 | 35 | 909.98 |
| Manipur | 104.00 | 06/02/2011 | 50.15 | -0.47 | 5 | 108.53 |
| Meghalaya | 284.00 | 14/02/2011 | 50.07 | -0.60 | 11 | 294.40 |
| Mizoram | 70.00 | 11/02/2011 | 49.73 | 0.57 | 4 | 74.57 |
| Nagaland | 93.00 | 01/02/2011 | 49.60 | 1.12 | 11 | 105.12 |
| Tripura | 164.00 | 02/02/2011 | 49.54 | 2.26 | 2 | 168.26 |
| REGION | 1551.00 | 24/02/2011 | 50.32 | -14.89 | 129 | 1665.11 |

** Freq.Correction = Demand met x 0.03 x ( 50 - Av. Freq.)

**ESTIMATION OF ENERGY REQUIREMENT ( in MU)**

Average Frequency 49.88 Hz

| Constituents | Generation | Energy drawal from grid | | | Over(+) / Under(-) Drawal | Energy Availability* | Freq. Corr.** | L / S | Actual Requirement |
|---|---|---|---|---|---|---|---|---|---|
| | | Entitlement frm ISGS of NER | Entitlement frm ISGS of ER | Drawal | | | | | |
| Ar.Pr. | 0.000 | 23.191 | 5.581 | 36.055 | 7.283 | 36.055 | 0.130 | 3.32 | 39.505 |
| Assam | 127.543 | 170.815 | 95.873 | 249.898 | -16.790 | 377.441 | 1.359 | 12.89 | 391.689 |
| Manipur | 0.000 | 34.339 | 0.000 | 39.329 | 4.990 | 39.329 | 0.142 | 5.83 | 45.301 |
| M'laya | 24.582 | 41.758 | 21.461 | 96.188 | 32.969 | 120.770 | 0.435 | 8.00 | 129.204 |
| Mizoram | 0.000 | 18.385 | 3.385 | 29.420 | 7.650 | 29.420 | 0.106 | 3.51 | 33.036 |
| Nagaland | 2.475 | 20.302 | 4.090 | 36.121 | 11.729 | 38.596 | 0.139 | 5.46 | 44.195 |
| Tripura | 65.515 | 30.244 | 0.000 | -2.694 | -32.937 | 62.821 | 0.226 | 2.24 | 65.287 |
| REGION | 220.114 | 339.034 | 130.390 | 484.318 | 14.893 | 704.432 | 2.536 | 41.25 | 748.218 |

*Energy availability means energy consumed by constituents

** Freq.Correction = Demand met x 0.03 x ( 50 - Av.Freq.)

**ENERGY GENERATED (MU) AND PEAK GENERATION (MW) FROM GENERATING STATIONS/UNITS:**

| Sl. No. | Power Sations / Units | Installed Capacity(MW) | Peak Generation(MW) | Energy Generation (MU) | |
|---|---|---|---|---|---|
| | | | | Feb-11 | Feb-10 |
| | **STATE SECTOR : HYDRO** | | | | |
| | **ASSAM** :: HYDRO | | | | |
| 1 | KARBI HEP U - 1 | 50.00 | 50.00 | 8.350 | 4.990 |
| 2 | KARBI HEP U - 2 | 50.00 | 50.00 | 6.230 | 4.960 |
| | TOTAL | 100.00 | | 14.580 | 9.950 |
| | **MEGHALAYA** :: HYDRO | | | | |
| 1 | STAGE - 1 | 36.00 | 27.00 | 3.640 | 5.400 |
| 2 | STAGE - 2 | 18.00 | 12.50 | 8.380 | 2.970 |
| 3 | STAGE - 3 | 60.00 | 30.00 | 9.750 | 7.320 |
| 4 | STAGE - 4 | 60.00 | 48.80 | 2.630 | 5.890 |
| 5 | UMTRU | 11.20 | 5.40 | 0.430 | 1.650 |
| | TOTAL | 185.20 | | 24.830 | 23.230 |
| | **NAGALAND** :: HYDRO | | | | |
| 6<br>7<br>8 | LIKIMRO - 1<br>LIKIMRO - 2<br>LIKIMRO - 3 | 24.00 | 10.00 | 2.730 | 3.300 |
| | TOTAL | 24.00 | | 2.730 | 3.300 |
| | **TRIPURA** :: HYDRO | | | | |
| 9 | GUMTI - 1 | 5.00 | Gumti Stn. Peak =8 MW | 0.000 | 2.100 |
| 10 | GUMTI - 2 | 5.00 | | 2.554 | 0.000 |
| 11 | GUMTI - 3 | 5.00 | | 2.415 | 0.258 |
| | TOTAL | 15.00 | | 4.969 | 2.358 |
| | **TOTAL STATE (HYDRO) :** | 324.20 | | 47.109 | 38.838 |

**ENERGY GENERATED (MU) AND PEAK GENERATION (MW) FROM GENERATING STATIONS/UNITS:**

| Sl. No. | Power Sations / Units | Installed Capacity(MW) | Peak Generation(MW) | Energy Generation (MU) | |
|---|---|---|---|---|---|
| | | | | Feb-11 | Feb-10 |
| | **STATE SECTOR : THERMAL/GAS** | | | | |
| | **MIZORAM ::Thermal** | | | | |
| 1 | Bairabi | 22.92 | 0.00 | 0.000 | 0.000 |
| | **TRIPURA :: THERMAL** | | | | |
| 1 | BARAMURA - 1 | 5.00 | Baramura Stn. Peak = 42 MW | 0.000 | 0.000 |
| 2 | BARAMURA - 2 | 5.00 | | 0.000 | 0.000 |
| 3 | BARAMURA - 3 | 6.50 | | 0.000 | 0.000 |
| 4 | BARAMURA - 4 | 21.00 | | 13.835 | 13.840 |
| 5 | BARAMURA - 5 | 21.00 | | 12.313 | 0.000 |
| 6 | ROKHIA - 1 | 8.00 | Rokhia Stn. Peak = 57.6MW | 0.000 | 0.000 |
| 7 | ROKHIA - 2 | 8.00 | | 0.000 | 0.000 |
| 8 | ROKHIA - 3 | 8.00 | | 4.175 | 3.240 |
| 9 | ROKHIA - 4 | 8.00 | | 3.906 | 4.120 |
| 10 | ROKHIA - 5 | 8.00 | | 0.000 | 0.000 |
| 11 | ROKHIA - 6 | 8.00 | | 0.000 | 0.000 |
| 12 | ROKHIA - 7 | 21.00 | | 13.494 | 14.410 |
| 13 | ROKHIA - 8 | 21.00 | | 13.485 | 14.750 |
| | TOTAL | 148.50 | | 61.208 | 50.360 |
| | **ASSAM :: THERMAL** | | | | |
| 1 | LTPS - 1 | 15.00 | LTPS Stn. Peak = 105.8 MW | 0.420 | 9.770 |
| 2 | LTPS - 2 | 15.00 | | 7.580 | 3.980 |
| 3 | LTPS - 3 | 15.00 | | 7.620 | 9.900 |
| 4 | LTPS - 4 | 15.00 | | 5.750 | 7.400 |
| 5 | LTPS - 5 | 20.00 | | 13.170 | 11.450 |
| 6 | LTPS - 6 | 20.00 | | 13.590 | 12.200 |
| 7 | LTPS - 7 | 20.00 | | 11.220 | 10.500 |
| 8 | NTPS - 1 | 20.00 | NTPS Stn. Peak = 80.5 MW | 12.900 | 11.310 |
| 9 | NTPS - 2 | 21.00 | | 13.260 | 11.730 |
| 10 | NTPS - 3 | 21.00 | | 8.160 | 9.400 |
| 11 | NTPS - 4 | 11.00 | | 6.900 | 5.290 |
| 12 | NTPS - 5 | 22.00 | | 0.000 | 0.000 |
| 13 | NTPS - 6 | 22.00 | | 8.230 | 7.050 |
| 14 | DLF | 24.50 | | 6.450 | 5.710 |
| | TOTAL | 261.50 | | 115.250 | 115.690 |
| TOTAL STATE THERMAL/GAS : | | 432.92 | | 176.458 | 166.050 |
| **TOTAL SC GEN(HY+TH/GAS)** | | **757.12** | | **223.567** | **204.888** |

**ENERGY GENERATED (MU) AND PEAK GENERATION (MW) FROM GENERATING STATIONS/UNITS:**

| Sl. No. | Power Sations / Units | Installed Capacity(MW) | Peak Generation(MW) | Energy Generation (MU) | |
|---|---|---|---|---|---|
| | | | | Feb-11 | Feb-10 |
| | **CENTRAL SECTOR : HYDRO** | | | | |
| 1 | KHANDONG - 1 | 25.00 | 25.00 | 0.890 | 0.170 |
| 2 | KHANDONG - 2 | 25.00 | 25.00 | 2.530 | 0.000 |
| 3 | KOPILI Stg - II | 25.00 | 25.00 | 1.830 | 0.000 |
| 4 | KOPILI - 1 | 50.00 | 0.00 | 0.000 | 0.000 |
| 5 | KOPILI - 2 | 50.00 | 50.00 | 11.090 | 4.730 |
| 6 | KOPILI - 3 | 50.00 | 50.00 | 15.150 | 5.180 |
| 7 | KOPILI - 4 | 50.00 | 50.00 | 14.860 | 0.000 |
| 8 | DOYANG -1 | 25.00 | Doyang Stn. Peak = 58.6 MW | 2.140 | 0.830 |
| 9 | DOYANG -2 | 25.00 | | 1.280 | 1.680 |
| 10 | DOYANG -3 | 25.00 | | 1.030 | 2.800 |
| 11 | LOKTAK - 1 | 35.00 | Loktak Stn. Peak = 73 MW | 0.000 | 7.880 |
| 12 | LOKTAK - 2 | 35.00 | | 11.640 | 0.000 |
| 13 | LOKTAK - 3 | 35.00 | | 21.630 | 17.660 |
| 14 | RANGANADI - 1 | 135.00 | Ranganadi Stn. Peak =270 MW | 18.620 | 7.760 |
| 15 | RANGANADI - 2 | 135.00 | | 14.770 | 7.380 |
| 16 | RANGANADI - 3 | 135.00 | | 0.000 | 8.610 |
| | **TOTAL HYDRO :** | **860.00** | | **117.460** | **64.680** |
| | **CENTRAL SECTOR : THERMAL/GAS** | | | | |
| 1 | KATHALGURI - 1 | 33.50 | Kathalguri Stn. Peak = 282 MW | 21.430 | 18.860 |
| 2 | KATHALGURI - 2 | 33.50 | | 21.020 | 18.240 |
| 3 | KATHALGURI - 3 | 33.50 | | 21.300 | 17.050 |
| 4 | KATHALGURI - 4 | 33.50 | | 21.030 | 15.200 |
| 5 | KATHALGURI - 5 | 33.50 | | 20.830 | 19.700 |
| 6 | KATHALGURI - 6 | 33.50 | | 20.890 | 19.280 |
| 7 | KATHALGURI - 7 | 30.00 | | 15.930 | 13.630 |
| 8 | KATHALGURI - 8 | 30.00 | | 17.660 | 12.840 |
| 9 | KATHALGURI - 9 | 30.00 | | 16.740 | 16.310 |
| 10 | R.C.NAGAR - 1 | 21.00 | RC Nagar Stn. Peak = 85 MW | 13.370 | 13.130 |
| 11 | R.C.NAGAR - 2 | 21.00 | | 13.160 | 13.120 |
| 12 | R.C.NAGAR - 3 | 21.00 | | 12.740 | 13.010 |
| 13 | R.C.NAGAR - 4 | 21.00 | | 12.880 | 13.290 |
| **TOTAL THERMAL/GAS :** | | 375.00 | | 228.980 | 203.660 |
| TOTAL CS ( HY + TH/GAS ) : | | 1235.000 | | 346.440 | 268.340 |
| **TOTAL NER GEN(HY+TH/GAS) :** | | **1992.120** | | **570.007** | **473.228** |

## Plant Load Factor (PLF) and Voltage Profile : Feb-11

**PLANT LOAD FACTOR OF THE THERMAL/ GAS STATIONS IN NER**

| Sl. No. | Power Station | State/ Constituent | Installed Capacity (MW) | Generation (in MU) | Stationwise PLF (%) |
|---|---|---|---|---|---|
| 1 | LTPS* | AEGCL | 120.00 | 59.350 | 73.60 |
| 2 | NTPS* | AEGCL | 117.00 | 49.450 | 62.89 |
| 3 | Baramura | Tripura | 58.50 | 26.148 | 66.51 |
| 4 | Rokhia | Tripura | 90.00 | 35.060 | 57.97 |
| 5 | AGBPP | NEEPCO | 291.00 | 176.830 | **90.43** |
| 6 | AGTPP | NEEPCO | 84.00 | 52.150 | 92.39 |

*LTPS-- Lakwa Thermal Power Station, NTPS-- Namrup Thermal Power Station

**VOLTAGE PROFILE :**

**A. MAXIMUM AND MINIMUM VOLTAGE (kV ) OF IMPORTANT SUB - STATIONS :**

| Sl. No. | NAME OF S/S | MAXIMUM ( kV ) | MINIMUM ( kV ) |
|---|---|---|---|
| 1 | BALIPARA 400 kV | 425 | 390 |
| 2 | MISA 400 kV | 427 | 391 |
| 3 | MISA 220 kV | 232 | 210 |
| 4 | SALAKATI 220 kV | 236 | 213 |
| 5 | HAFLONG 132 kV | 139 | 125 |
| 6 | AIZAWL 132kV | 138 | 120 |
| 7 | KUMARGHAT 132kV | 137 | 127 |

**Voltage Range in kV as percentage of time for the block**

| SUB-STATION | kV < 360 | 360<kV<380 | 380<kV<420 | kV>420 |
|---|---|---|---|---|
| MISA | 0.00 | 0.05 | 82.82 | 17.13 |
| BALIPARA | 0.00 | 0.66 | 97.46 | 1.88 |

1 **INTER - REGIONAL EXCHANGE :**

**All Fig in MU**

| | |
|---|---|
| NER to ER | 1.981 |
| ER to NER | 166.714 |
| NET IMPORT | 164.733 |

| | | |
|---|---|---|
| 2 | **Major Grid Disturbances during this month** | **Nil** |

| | | |
|---|---|---|
| 3 | **MEETING HELD BY NERPC DURING THIS MONTH** | 1. 59th OCC Meeting was held on 15.02.11 at NERTS, conference hall, Shillong. |
| | | 2. 10th TCC & 10th NERPC Meetings were held on 08.02.11 & 09.02.11 at Aizawl, Mizoram |

**PROGRESS OF GENERATION PROJECTS IN NER**

| Name of the Generation Scheme | No. of Units | Capacity (MW) | Commissioning Schedule | REMARKS |
|---|---|---|---|---|
| **[A] NEEPCO** | | | | |
| 1. Monarchak TGBPP | | 104 | 2013 | Activities in progress |
| 2. Tuirial HEP Mizoram | 2 | 2 X 30 | WORKS HELD-UP | Being reviewed by PIB |
| 3. Kameng HEP A. Pradesh | 4 | 4X150 | 2012-13 | Activities in progress |
| 4. Tuival H.E. Proj. Mizoram | 3 | 3X70 | 2015 | Status not available |
| 5. Tipaimukh HEP | | 1500 | 2015 | Activities in progress |
| 6. Mawphu HEP | 2 | 90 | 2014 | UNDER CCEA |
| 7. Pare HEP, Ar. Pradesh | | 110 | 2015 | UNDER CCEA |
| **[B] NHPC** | | | | |
| a). Loktak Downstream HEP | 2 | 66 | 2014 | Activities in progress |
| b) Subansiri Lower HEP | | 2000 | 2013 | Activities in progress |
| c) Siang Middle HEP | | 2000 | 2016 | Activities in progress |
| d) Subansiri Upper HEP | | 2000 | DPR Under prep | |
| e) Subansiri Middle HEP | | 1000 | DPR Under prep | |
| f) Dibang Multipurpose Project | | 3000 | Under TEC | |
| **[C] NTPC** | | | | |
| a). Bongaigaon TPS | 3 | 3X250 | 2012 | Activities in progress |
| **[D] JV PROJECT** | | | | |
| a). Palatana CCPP | 2 | 2X323.3 | 2012 | Activities in progress |
| **[E] ASSAM** | | | | |
| (a) Lakwa WHRP | | 37.2 | 2012 | Activities in progress |
| (b) Namrup CCPP | 2 | 2X40 | 2012 | |
| **[F] MIZORAM** | | | | |
| (a) Tuivai Hydel Project | 2 | 51 | 2012 | Activities in progress |
| (b) Bairabi Dam Project | 2 | 2 X 40 | 2012 | Activities in progress |
| **(G) MeSEB** | | | | |
| (a) Myntdu - Leishka HEP | 2 | 3x42 | 2011 | Activities in progress |
| (b) New Umtru HEP | 2 | 2X20 | 2013 | Activities in progress |
| **(H) Tripura** | | | | |
| (a) Baramura GT # U-V | 1 | 21 | 2010 | Commissioned on 03.08.10 |

## PROGRESS OF TRANSMISSION LINES IN NE REGION

| | Name of the line | Length (ckt kms) | Commi'ng Sch Ann.pl | Commi'ng Sch Ant/revd | Total no. of locs . | Stubs com - pleted(nos) | Tower Erected | Stringing complt-ckm | Remarks |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | | | |
| | **A : Lines under ASEB.** | | | | | | | | |
| 1 | 132 kV Nazira - Lakwa 2nd Ckt | 21 | | | | | | Completed | Work in progress |
| 2 | 132 kV, S/C Rangia - Sipajhar - Rowta- Depota | 147 | | | | | | | Work in progress |
| 3 | 132 kV, S/C Sarusajai - Kahilipara | 8 | | | | | | | Work in progress |
| 4 | LILO of 132 kV Mariani - Dimapur S/C at Bokajan | 6 | | | | | completed | | Rly Clearance awaited |
| 5 | 132 kV Nazira- Garmur (Mariani) S/C | 63 | | | | | | | Tender is in progress |
| 6 | 220 kV Kathalguri - Tinsukia 2nd Ckt | 50 | 2006-07 | | | | | | Work in progress |
| | | | | | | | | | |
| | | | | | | | | | |
| | **D : Lines under Meghalaya :** | | | | | | | | |
| 1 | Myntdu Leshka-Khlieriat 132 KV D/C | 53 | | Dec-10 | | | | | Commissioned |
| 2 | 220 kV Misa-Byrinahat D/C | 226 | | Jun-10 | | | | | Completed |
| 3 | 132 kV Agia - Nangalbibra | 110 | | Mar-11 | | | | | Work in progress |
| | | | | | | | | | |
| | **E : Lines under Mizoram :** | | | | | | | | |
| 1 | 132 kV Khawzawl-E Lungdar S/C | 48 | | | 100 | 100 | 76 | 0 | Work in progress |
| 2 | 132 kV Khawzawl-Ngopa S/C | 57 | | | 117 | 117 | 117 | 57 | Work in progress |
| 3 | 132 kV Kolasib-Tuirial S/C | 41 | | | 114 | 114 | 114 | 41(Conducto | Work in progress |
| 4 | Kolasib-Sairul B D/C | 25 | | | | | | | Work in progress |
| 5 | 132 kV Kolasib-Melriat S/C | 90 | | | 369 | Nil | Nil | Nil | Work in progress |
| 6 | 132 kV Bairabi-Bawktlang S/C | 30 | | | 93 | 91 | 85 | 14 | Work in progress |
| 7 | 132 kV Khawzawl-Champhai S/C | 30 | | | 90 | Nil | Nil | Nil | Work in progress |
| | | | | | | | | | |
| | | | | | | | | | |
| | **G : CTU Lines:** | | | | | | | | |
| 1 | `+/- 800 kV HVDC Bipol Bis'nath Chariali-Agra | 1971 | 08/2013 | 08/2013 | 2293 | 1016 | 210 | | All tower packages award |
| 2 | 400 kV Balipara - Biswanath Chariali D/C | 130 | 08/2013 | 08/2013 | 167 | 98 | 40 | | |
| 3 | LILO of 400 kV R'nadi-Balipara D/C at Bis Chariali | 54 | 08/2013 | 08/2013 | 68 | 5 | | | |
| 4 | 400 kV Kameng - Balipara D/C | 110 | 02/2013 | 02/2013 | 142 | 9 | | | |
| 5 | 400 kV Balipara - Bongaigaon D/C | 596 | 02/2013 | 03/2012 | 838 | 445 | 137 | | |
| 6 | 400 kV Lower Subansiri - Biswanath Chariali line-I | 334 | 02/2013 | 03/2012 | 432 | 198 | 85 | | |
| 7 | 400 kV Lower Subansiri - Biswanath Chariali line-II | 340 | 02/2013 | 03/2012 | 442 | 192 | 55 | | |
| 8 | LILO of 132 kV Dimapur-Kohima at Dimapur (PG) | 2 | 09/2009 | 03/2011 | 3 | | | | ROW problem |
| 9 | 132 kV Kopili-Khandong | 12 | 09/2009 | 12/2010 | 43 | 37 | 37 | 10 | ROW problem |
| 10 | 132 kV D/C Biswanath Chariyali- B. Chariyali (AEGCL) | 32 | 08/2013 | 08/2013 | 55 | | | | Engg.&survey under prog. |
| 11 | 400 kV D/C Bongaigaon TPS-Bongaigaon | | | | | | | | |
| 12 | 400 kV Palatana - Silchar | 248 | | | | | | | |
| 13 | 400 kV Silchar - Bongaigaon | 405 | | | | | | | |

| Name of the line | Length | Commi'ng Sch | | Total no. | Stubs com - | Tower | Stringing | Remarks |
|---|---|---|---|---|---|---|---|---|
| | (ckt kms) | Ann.pl | Ant/revd | of locs . | pleted(nos.) | Erected | complt-ckm | |
| | | | | | | | | |
| **H : Lines under Arunachal Pradesh** | | | | | | | | |
| **i) Transmission Lines Plan works completed & on going** | | | | | | | | |
| 1. 132 kV Nirjuli - Itanagar S/C (Under NLCPR | | 2007-12 | | | | Completed | in progress | Work is in progress |
| 2. 132 kV Along - Pasighat (Under NLCPR) | | 2007-12 | | | | | | Work is in progress |
| 3. 132 kV Ranganadi - Itanagar S/C | | 2007-12 | | | | | | Work is in progress |
| **ii) Proposed for XIth Five Years Plan (State)** | | | | | | | | |
| 1. 132 kV Khupi - Seppa | | 2007-12 | | | | | | Work is in progress |
| 2. 132 kV Line LILO at Bhalukpong | | 2007-12 | | | | | | Work is in progress |
| 3. 132 kV Nirjuli - Banderdewa | | 2007-12 | | | | | | Work is in progress |
| 4. 132 kV Along - Yingkiong | | 2007-12 | | | | | | Work is in progress |
| 5. 132 kV Naharlagun - Seppa | | 2007-12 | | | | | | Work is in progress |
| 6. 132 kV Roing - Anini | | 2007-12 | | | | | | Work is in progress |
| 7. 132 kV Along - Reying | | 2007-12 | | | | | | Work is in progress |
| 8. 132 kV Tezu - Roing | | 2007-12 | | | | | | Work is in progress |
| 9. 132 kV Namsai - Tezu | | 2007-12 | | | | | | Work is in progress |
| 10. 132 kV Ziro - Sangram | | 2007-12 | | | | | | Work is in progress |
| **iii) Proposed for XIth Five Years Plan (N** | | | | | | | | |
| 1. 132 kV Pasighat - Roing | | 2007-12 | | | | | | Work is in progress |
| 2. 132 kV Likabali - Gerukamukh | | 2007-12 | | | | | | Work is in progress |
| 3. 132 kV Pasighat - Niglok | | 2007-12 | | | | | | Work is in progress |
| 4. 132 kV Deomali - Khonsa | | 2007-12 | | | | | | Work is in progress |
| 5. 132 kV Khupi - Banderdawa | | 2007-12 | | | | | | Work is in progress |
| 6. 132 kV Banderdawa - Tawang | | 2007-12 | | | | | | Work is in progress |
| 7. 132 kV Khonsa - Changlang | | 2007-12 | | | | | | Work is in progress |
| 8. 132 kV Changlang - Jairampur | | 2007-12 | | | | | | Work is in progress |
| 9. 132 kV Jairampur - Miao | | 2007-12 | | | | | | Work is in progress |
| 10 132 kV Itanagar - Seijusa | | 2007-12 | | | | | | Work is in progress |
| 11. 132 kV Seijusa - Balipara | | 2007-12 | | | | | | Work is in progress |
| **iv) Proposed for XIth Five Years Plan (NEC)** | | | | | | | | |
| 1. 132 kV Niglok - Likabali | | 2007-12 | | | | | | Work is in progress |
| 2. 132 kV Itanagar - Gohpur | | 2007-12 | | | | | | Work is in progress |

## UI Receivable/ Payable for the month of Feb-11

| Organisation | Actual (MU) | Schedule (MU) | UI Energy (MU) | UI Receivable (Rs. in Lakhs) | UI Payable (Rs. in Lakhs) |
|---|---|---|---|---|---|
| Arunachal Pradesh | 36.055 | 32.125 | 3.930 | 5.431 | 102.873 |
| ASEB | 249.898 | 274.922 | -25.024 | 699.290 | 4.552 |
| Manipur | 39.329 | 36.371 | 2.958 | 3.001 | 79.572 |
| MeSEB | 96.188 | 71.928 | 24.260 | 0.000 | 482.291 |
| Mizoram | 29.420 | 24.470 | 4.949 | 0.940 | 117.063 |
| Nagaland | 36.121 | 23.455 | 12.666 | 0.000 | 275.160 |
| Tripura | -2.694 | -3.792 | 1.098 | 29.884 | 35.319 |

## Entitlement, Schedule, Drawal and UI Charges Feb-11

| | Entitlement from CGSs (MU) | Drawal Schedule from CGSs (MU) | Net Schedule from Grid (MU) | Actual Drawal from Grid (MU) | Over Drawal (+) / Under Drawal (-) (MU) | UI Payable (-)/ Receivable (+) (Rs. In Cr) |
|---|---|---|---|---|---|---|
| Arunachal Pradesh | 23.191 | 23.467 | 32.125 | 36.055 | 3.930 | -0.974 |
| ASEB | 170.815 | 169.607 | 274.922 | 249.898 | -25.024 | 6.947 |
| Manipur | 34.339 | 34.540 | 36.371 | 39.329 | 2.958 | -0.766 |
| MeSEB | 41.758 | 42.651 | 71.928 | 96.188 | 24.260 | -4.823 |
| Mizoram | 18.385 | 18.316 | 24.470 | 29.420 | 4.949 | -1.161 |
| Nagaland | 20.302 | 20.091 | 23.455 | 36.121 | 12.666 | -2.752 |
| Tripura | 30.244 | 30.390 | -3.792 | -2.694 | 1.098 | -0.054 |

( Source : UI A/c, NERPC )

## Schedule for ISGS's Generation and State's Drawl for the month of Feb-11

| States | Schedule From ISGS(MWH) | Bilateral Schedule from Outside NER ( MWH ) | Total Schedule ( MWH ) | Ex.PP. Drawal ( MWH ) | Tr. Energy ( MWH ) |
|---|---|---|---|---|---|
| Arunachal Pradesh | 23186.21 | 5792.43 | 28978.63 | 37503.23 | 37503.23 |
| ASEB | 170768.85 | 99509.38 | 270278.22 | 259932.87 | 270278.22 |
| Manipur | 34331.93 | | 34331.93 | 40908.49 | 40908.49 |
| MeSEB | 41748.10 | 22276.05 | 64024.15 | 100050.38 | 100050.38 |
| Mizoram | 18379.97 | | 18379.97 | 30601.34 | 30601.34 |
| Nagaland | 20297.26 | 4243.05 | 24540.31 | 37571.50 | 37571.50 |
| Tripura | 30235.74 | | 30235.74 | -2801.86 | 30235.74 |
| Total | 338948.07 | 131820.90 | 470768.97 | 503765.94 | 547148.90 |

| ISGS | Schedule ( MWH ) | Injection ( MWH ) |
|---|---|---|
| LOKTAK | 32252.14 | 32458.64 |
| KHANDONG | 3681.40 | 3629.93 |
| KOPILI-I | 41296.81 | 41183.19 |
| KOPILI-II | 1760.16 | 1779.93 |
| DHEP | 4112.01 | 4063.37 |
| RHEP | 32018.50 | 32084.75 |
| AGTPP | 50865.62 | 51281.49 |
| AGBPP | 172961.44 | 172551.81 |
| Total | 338948.07 | 339033.11 |

Source : Provisional REA for the month: Feb-11

## Cumulative wt. Average Share Allocation (%) ( Up to this month) in CS Stations

| States | KOPILI (200 MW) | KOPILI-II (25 MW) | KHANDONG ( 50 MW) | RHEP (405 MW) | DHEP (75 MW) | AGBPP (291 MW) | AGTPP ( 84 MW) | Loktak HEP ( 90 MW) |
|---|---|---|---|---|---|---|---|---|
| Arunachal Pradesh | 5.193 | 6.193 | 4.192 | 18.462 | 6.882 | 5.693 | 6.180 | 4.942 |
| Assam | 53.455 | 46.615 | 56.277 | 43.328 | 43.742 | 56.465 | 45.178 | 29.415 |
| Manipur | 7.385 | 7.225 | 6.565 | 8.373 | 7.893 | 8.125 | 8.143 | 30.115 |
| Meghalaya | 17.150 | 18.650 | 16.650 | 11.250 | 11.230 | 11.550 | 11.340 | 12.140 |
| Mizoram | 4.619 | 6.278 | 3.940 | 5.710 | 5.240 | 5.429 | 6.190 | 5.068 |
| Nagaland | 6.155 | 5.656 | 6.653 | 5.335 | 17.935 | 5.805 | 5.607 | 6.427 |
| Tripura | 6.043 | 9.383 | 5.723 | 7.542 | 7.078 | 6.933 | 17.362 | 11.893 |
| Total | 100.00 | 100.00 | 100.00 | 100.00 | 100.00 | 100.00 | 100.00 | 100.00 |

## Details of Fixed and Energy Charges of CS Stations for FY 2009-10

| Projects | Installed Capacity ( MW ) | Design Energy (GWh ) | Annual Fixed Charge ( Rs. Crore) | Reference |
|---|---|---|---|---|
| KOPILI HEP | 200 | 1186.14* | 57.6738 * | *As per CERC order dated 19.02.08 in petition No 76/2007. |
| KOPILI -II | 25 | 86.3* | 12.9511 ** | * Provisional, ** As per CERC order dated 01.01.08 in pet. No 70/2006 |
| KHANDONG HEP | 50 | 277.61* | 19.6328 * | *As per CERC order dated 14.01.08 in petition No 26/2007. |
| RHEP | 405 | 1509.69 | 203.4081 | *As per CERC order dated 30.04.08 in petition No 89/2007. |
| DHEP | 75 | 227.24 | 58.5 * | *As per CERC order dated 03.10.07 in petition No 88/2007. |
| AGBPP | 291 | NA | 233.59 * | *As per CERC order dated 22.02.08 in Pet.No150/ /2005, ^ Base Rate of energy Charge as per CERC Order |
| AGTPP | 84 | NA | 52.71 * | *As per CERC order dated 20.02.08 in Pet.No 135/2005,^Base Engy. charge as per CERC order |
| LOKTAK HEP | 105 | 448.00 | 50.0353 * | *As per CERC order dated 05.09.07 in Pet.No 171/2004 |

# HOURLY DATA ON PEAK DEMAND MET DAY

**DATE:- 24.02.2011**

**All figures in MW**

| HRS. | Total ISGS Injection (MW) | STATE SECTOR | | | | | | | | | | | | | ER | Total N.E.R GEN | Total Demand Met | Gross Demand met | Actual Loss | Total Drawal by States |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | ASEB | | | MeSEB | | | Tripura | | | Manipur | Mizoram | Nagaland | ArPr | | | | | | |
| | | GEN | Drawal | Demand Met | GEN | Demand Met | Drawal | GEN | Demand Met | Drawal | DM | DM | DM | DM | IMPORT(+)/ EXPORT(-) | | | | | |
| 1 | 342.44 | 164 | 308.37 | 472.1 | 12 | 202.9 | 191.43 | 102 | 70.5 | -31.74 | 23.00 | 30.99 | 45.05 | 42.63 | 287.26 | 619.85 | 887.15 | 907.10 | 19.9 | 322.49 |
| 2 | 338.99 | 154 | 307.54 | 461.3 | 0 | 194.9 | 194.87 | 102 | 67.5 | -34.73 | 18.70 | 30.53 | 44.74 | 41.31 | 290.71 | 594.96 | 858.92 | 885.66 | 26.7 | 312.25 |
| 3 | 338.79 | 157 | 289.60 | 446.8 | 0 | 192.8 | 192.75 | 102 | 66.4 | -35.79 | 18.61 | 29.75 | 44.86 | 41.81 | 269.90 | 598.24 | 841.05 | 868.12 | 27.1 | 311.72 |
| 4 | 340.96 | 159 | 291.29 | 450.3 | 0 | 198.0 | 198.02 | 102 | 65.5 | -36.75 | 16.83 | 29.42 | 47.08 | 42.95 | 275.01 | 602.14 | 850.03 | 877.14 | 27.1 | 313.85 |
| 5 | 341.88 | 158 | 312.23 | 470.2 | 0 | 198.0 | 198.00 | 102 | 68.1 | -34.14 | 29.51 | 31.52 | 53.06 | 45.01 | 326.48 | 602.03 | 895.33 | 928.49 | 33.2 | 308.73 |
| 6 | 493.55 | 160 | 350.85 | 510.4 | 0 | 176.2 | 176.18 | 102 | 75.9 | -26.32 | 58.53 | 43.37 | 67.13 | 54.15 | 271.88 | 755.26 | 985.60 | 1027.13 | 41.5 | 452.02 |
| 7 | 508.89 | 166 | 410.24 | 576.3 | 75 | 229.6 | 154.86 | 102 | 88.8 | -13.42 | 62.42 | 59.08 | 59.55 | 63.66 | 316.69 | 851.99 | 1139.49 | 1168.67 | 29.2 | 479.71 |
| 8 | 506.32 | 165 | 378.40 | 543.8 | 74 | 198.3 | 123.96 | 102 | 92.0 | -10.21 | 60.17 | 56.64 | 54.78 | 60.65 | 238.61 | 848.29 | 1066.35 | 1086.89 | 20.5 | 485.78 |
| 9 | 400.71 | 218 | 349.18 | 567.7 | 81 | 187.5 | 106.81 | 102 | 89.2 | -13.02 | 56.72 | 43.91 | 47.56 | 47.48 | 287.47 | 802.09 | 1040.00 | 1089.54 | 49.5 | 351.18 |
| 10 | 353.49 | 175 | 360.18 | 535.2 | 81 | 175.1 | 94.36 | 102 | 85.4 | -16.84 | 61.03 | 40.28 | 42.62 | 42.88 | 297.37 | 711.43 | 982.45 | 1008.79 | 26.3 | 327.15 |
| 11 | 317.15 | 155 | 418.10 | 573.4 | 74 | 197.4 | 123.15 | 102 | 79.5 | -22.75 | 59.79 | 38.40 | 38.99 | 43.16 | 355.76 | 648.86 | 1030.56 | 1004.61 | -25.9 | 343.10 |
| 12 | 316.63 | 128 | 333.75 | 461.5 | 42 | 155.2 | 113.56 | 102 | 77.3 | -24.88 | 61.20 | 39.04 | 43.80 | 42.08 | 331.46 | 588.17 | 880.09 | 919.62 | 39.5 | 277.10 |
| 13 | 312.18 | 115 | 337.42 | 452.3 | 42 | 163.3 | 121.49 | 102 | 71.5 | -30.68 | 59.49 | 41.89 | 43.30 | 43.83 | 328.32 | 571.05 | 875.60 | 899.35 | 23.8 | 288.43 |
| 14 | 313.39 | 117 | 331.00 | 448.3 | 12 | 136.2 | 124.23 | 102 | 71.2 | -31.05 | 50.76 | 42.91 | 50.34 | 42.74 | 330.29 | 544.91 | 842.45 | 875.19 | 32.7 | 280.65 |
| 15 | 315.02 | 115 | 313.05 | 428.3 | 12 | 141.1 | 129.11 | 102 | 74.1 | -28.11 | 61.90 | 49.88 | 50.74 | 39.52 | 326.93 | 544.49 | 845.57 | 871.41 | 25.8 | 289.17 |
| 16 | 394.74 | 111 | 294.66 | 405.8 | 27 | 170.2 | 143.20 | 102 | 77.7 | -24.48 | 66.68 | 56.26 | 53.39 | 42.55 | 252.74 | 635.11 | 872.64 | 887.83 | 15.2 | 379.55 |
| 17 | 483.58 | 176 | 353.62 | 529.2 | 27 | 134.7 | 107.68 | 102 | 86.2 | -16.01 | 61.84 | 53.24 | 59.64 | 58.66 | 224.39 | 788.32 | 983.41 | 1012.69 | 29.3 | 454.30 |
| 18 | 630.21 | 176 | 597.64 | 774.1 | 75 | 196.1 | 121.21 | 102 | 146.9 | 44.74 | 79.44 | 62.11 | 65.12 | 77.07 | 440.36 | 983.81 | 1400.91 | 1424.14 | 23.2 | 606.99 |
| 19 | 793.80 | 223 | 597.69 | 820.5 | 76 | 195.5 | 119.61 | 102 | 156.0 | 53.74 | 82.83 | 64.44 | 67.05 | 76.87 | 300.29 | 1194.75 | 1463.18 | 1495.01 | 31.8 | 761.98 |
| 20 | 792.16 | 260 | 616.94 | 877.1 | 94 | 219.1 | 124.90 | 103 | 153.2 | 50.42 | 85.28 | 62.83 | 65.87 | 77.54 | 314.37 | 1249.27 | 1540.88 | 1563.61 | 22.7 | 769.43 |
| 21 | 669.26 | 230 | 568.49 | 798.8 | 108 | 238.4 | 130.69 | 103 | 144.8 | 41.47 | 89.46 | 57.43 | 63.96 | 73.32 | 387.73 | 1110.64 | 1466.20 | 1498.34 | 32.1 | 637.12 |
| 22 | 575.12 | 264 | 487.62 | 751.2 | 87 | 217.3 | 130.62 | 103 | 124.7 | 21.56 | 90.34 | 48.08 | 54.93 | 64.32 | 349.24 | 1028.58 | 1350.94 | 1377.79 | 26.9 | 548.26 |
| 23 | 417.40 | 278 | 416.09 | 694.0 | 86 | 233.0 | 146.56 | 103 | 94.2 | -9.08 | 84.12 | 39.76 | 47.02 | 48.84 | 368.11 | 884.98 | 1240.88 | 1253.07 | 12.2 | 405.21 |
| 24 | 323.80 | 221 | 341.52 | 562.1 | 15 | 192.7 | 178.16 | 103 | 75.7 | -27.61 | 72.53 | 33.06 | 46.17 | 42.25 | 383.60 | 662.19 | 1024.46 | 1045.78 | 21.3 | 302.48 |
| | | | | | | | | | | | | | | | | | | | | |
| **Max** | 793.80 | 278 | 616.94 | 877.10 | 108 | 238.4 | 198.02 | 103 | 156.0 | 53.74 | 90.34 | 64.44 | 67.13 | 77.54 | 440.36 | 1249.27 | 1540.88 | 1563.61 | 49.5 | 769.43 |
| **Min** | 312.18 | 111 | 289.60 | 405.82 | 0 | 134.7 | 94.36 | 102 | 65.5 | -36.75 | 16.83 | 29.42 | 38.99 | 39.52 | 224.39 | 544.49 | 841.05 | 868.12 | -25.9 | 277.10 |

# HOURLY DATA ON MINIMUM DEMAND MET DAY

**DATE: 17.02.2011**

**All figures in MW**

| HRS. | Total ISGS Injection (MW) | STATE SECTOR | | | | | | | | | | | | | ER | Total N.E.R GEN | Total Demand Met | Gross Demand met = Sum of demand met of all the states+loss | Actual Loss | Total Drawal by States |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | ASEB | | | MeSEB | | | Tripura | | | Manipur | Mizoram | Nagaland | ArPr | | | | | | |
| | | GEN | Demand Met | Drawal | GEN | Demand Met | Drawal | GEN | drawal | Demand Met | DM | DM | DM | DM | IMPORT(+)/ EXPORT(-) | | | | | |
| 1 | 369.99 | 171 | 337.6 | 166.63 | 0 | 141.1 | 141.10 | 102 | -29.55 | 72.66 | 32.10 | 31.91 | 43.02 | 35.69 | 73.47 | 643.2 | 694.1 | 716.68 | 22.5 | 347.45 |
| 2 | 375.63 | 167 | 328.3 | 161.62 | 0 | 140.2 | 140.19 | 102 | -32.14 | 70.07 | 27.36 | 31.72 | 42.28 | 38.60 | 59.10 | 644.5 | 678.5 | 703.56 | 25.1 | 350.54 |
| 3 | 378.00 | 133 | 273.4 | 140.36 | 0 | 151.9 | 151.88 | 102 | -32.76 | 69.46 | 25.17 | 29.95 | 34.35 | 33.93 | 29.02 | 613.2 | 618.1 | 642.23 | 24.1 | 353.88 |
| 4 | 379.13 | 135 | 270.3 | 135.35 | 0 | 150.7 | 150.74 | 102 | -32.95 | 69.26 | 25.14 | 29.23 | 36.05 | 34.38 | 24.25 | 616.3 | 615.1 | 640.55 | 25.4 | 353.71 |
| 5 | 381.63 | 134 | 281.7 | 147.50 | 0 | 151.1 | 151.09 | 102 | -31.10 | 71.11 | 35.14 | 31.84 | 38.59 | 36.60 | 70.28 | 618.0 | 646.0 | 688.29 | 42.2 | 339.39 |
| 6 | 547.23 | 124 | 307.8 | 184.07 | 0 | 151.1 | 151.09 | 102 | -23.19 | 79.02 | 58.87 | 40.49 | 52.47 | 45.46 | -6.74 | 773.1 | 735.2 | 783.61 | 48.5 | 498.77 |
| 7 | 543.82 | 131 | 373.3 | 241.85 | 36 | 172.9 | 136.79 | 102 | -12.27 | 89.94 | 68.87 | 59.31 | 63.24 | 48.53 | 112.65 | 813.6 | 876.1 | 926.21 | 50.1 | 493.69 |
| 8 | 534.21 | 155 | 437.3 | 282.23 | 36 | 177.7 | 141.67 | 102 | -3.69 | 98.52 | 63.04 | 49.59 | 60.31 | 53.80 | 147.24 | 827.5 | 940.2 | 974.73 | 34.5 | 499.72 |
| 9 | 416.23 | 160 | 428.4 | 268.78 | 36 | 197.0 | 160.56 | 102 | -4.95 | 97.26 | 57.89 | 39.72 | 49.91 | 45.94 | 214.98 | 714.4 | 916.1 | 929.40 | 13.4 | 402.88 |
| 10 | 352.83 | 166 | 448.3 | 281.85 | 36 | 169.2 | 132.92 | 102 | -10.79 | 91.42 | 63.70 | 40.42 | 32.65 | 42.24 | 257.81 | 657.8 | 888.0 | 915.60 | 27.6 | 325.19 |
| 11 | 376.92 | 134 | 400.3 | 265.83 | 24 | 177.0 | 153.52 | 102 | -19.03 | 83.18 | 54.36 | 41.10 | 37.37 | 41.59 | 235.09 | 637.1 | 834.9 | 872.20 | 37.2 | 339.67 |
| 12 | 347.48 | 162 | 446.8 | 284.39 | 0 | 140.5 | 140.52 | 102 | -25.79 | 76.43 | 53.11 | 40.33 | 37.30 | 39.10 | 249.21 | 612.1 | 833.6 | 861.31 | 27.7 | 319.78 |
| 13 | 352.40 | 140 | 425.9 | 285.40 | 0 | 161.4 | 161.42 | 102 | -24.44 | 77.77 | 53.55 | 39.83 | 37.17 | 40.47 | 270.93 | 595.1 | 836.1 | 866.00 | 29.9 | 322.50 |
| 14 | 346.41 | 149 | 427.7 | 278.94 | 0 | 167.6 | 167.57 | 102 | -26.25 | 75.96 | 46.71 | 40.71 | 45.46 | 35.85 | 269.69 | 597.4 | 840.0 | 867.09 | 27.1 | 319.32 |
| 15 | 355.54 | 160 | 417.4 | 257.92 | 0 | 160.7 | 160.67 | 102 | -21.35 | 80.86 | 62.09 | 49.26 | 48.84 | 31.84 | 243.08 | 617.3 | 851.0 | 860.35 | 9.3 | 346.20 |
| 16 | 424.09 | 112 | 375.0 | 263.15 | 27 | 144.6 | 117.56 | 102 | -15.76 | 86.45 | 59.19 | 55.20 | 56.73 | 35.93 | 168.16 | 665.1 | 813.0 | 833.26 | 20.2 | 403.84 |
| 17 | 626.94 | 121 | 464.8 | 344.25 | 51 | 164.2 | 113.59 | 102 | 1.73 | 103.94 | 62.97 | 57.43 | 32.13 | 51.55 | 64.20 | 900.3 | 937.0 | 964.43 | 27.5 | 599.47 |
| 18 | 779.55 | 114 | 599.4 | 485.21 | 75 | 198.1 | 123.57 | 102 | 31.78 | 133.99 | 73.09 | 67.58 | 54.08 | 62.77 | 159.01 | 1070.6 | 1189.1 | 1229.53 | 40.5 | 739.09 |
| 19 | 802.72 | 178 | 738.4 | 559.94 | 87 | 213.6 | 127.06 | 102 | 34.12 | 136.33 | 62.82 | 64.12 | 55.04 | 72.49 | 206.95 | 1169.9 | 1342.8 | 1376.81 | 34.0 | 768.67 |
| 20 | 857.91 | 66 | 638.4 | 572.28 | 83 | 209.9 | 127.13 | 102 | 40.05 | 142.26 | 86.07 | 59.54 | 64.77 | 68.16 | 192.08 | 1109.1 | 1269.2 | 1301.11 | 32.0 | 825.96 |
| 21 | 822.01 | 69 | 604.7 | 535.19 | 83 | 207.6 | 124.76 | 102 | 31.18 | 133.39 | 42.22 | 53.71 | 58.63 | 57.06 | 140.47 | 1076.5 | 1157.3 | 1216.97 | 59.7 | 762.31 |
| 22 | 637.23 | 69 | 518.7 | 449.22 | 83 | 205.9 | 123.16 | 102 | 13.02 | 115.23 | 78.06 | 43.79 | 49.68 | 53.09 | 198.84 | 891.7 | 1064.5 | 1090.51 | 26.0 | 611.22 |
| 23 | 449.47 | 69 | 428.2 | 358.70 | 72 | 190.0 | 118.43 | 102 | -11.14 | 91.07 | 76.41 | 36.60 | 32.89 | 41.05 | 205.76 | 692.8 | 896.2 | 898.52 | 2.3 | 447.21 |
| 24 | 409.61 | 118 | 387.7 | 269.24 | 60 | 240.6 | 180.83 | 102 | -31.93 | 70.28 | 63.20 | 29.43 | 41.65 | 36.16 | 222.94 | 690.1 | 869.1 | 913.01 | 44.0 | 365.65 |
| | | | | | | | | | | | | | | | | | | | | |
| **Max** | 857.91 | 178 | 738.4 | 572.28 | 87 | 240.6 | 180.83 | 102 | 40.05 | 142.26 | 86.07 | 67.58 | 64.77 | 72.49 | 270.93 | 1169.9 | 1342.8 | 1376.81 | 59.7 | 825.96 |
| **Min** | 346.41 | 66 | 270.3 | 135.35 | 0 | 140.2 | 113.59 | 102 | -32.95 | 69.26 | 25.14 | 29.23 | 32.13 | 31.84 | -6.74 | 595.1 | 615.1 | 640.55 | 2.3 | 319.32 |

# *ANNEXURES*
# *&*
# *EXHIBITS*

**Annexure-I**

**RESERVOIR PARTICULARS OF THE MONTH :** **Feb-11**

| Name of the Reservoirs | FRL | MDDL | Beginning of the month | | End of the month | |
|---|---|---|---|---|---|---|
| | | | Level | Energy content(MU) | Level | Energy content(MU) |
| KHANDONG | 719.3 M | 704 M | 713.65 | 12.50 | 712.30 | 10.50 |
| KOPILI | 609.5 M | 592.83 M | 604.30 | 60.00 | 602.17 | 44.00 |
| LOKTAK | 768.5 M | 766.2 M | 768.10 | 140.00 | 767.76 | 80.00 |
| BARAPANI | 3220 Ft | 3150 Ft | 3195.60 | 25.70 | 3188.39 | 19.70 |
| GUMTI | 93.55 M | 83.6 M | 88.55 | 10.50 | 87.25 | 6.70 |
| DOYANG | 333 M | 306 M | 317.22 | 17.50 | 315.35 | 14.00 |

**Annexure-II**

**FREQUENCY ANALYSIS FOR THE MONTH OF :** **Feb-11**

| Frequency | ( Freq.in Hz ) | ( Time: H:M ) | ( Date:D.M.Y ) |
|---|---|---|---|
| 1. Maximum frequency | 50.67 | 5:04 | 21.02.11 |
| 2. Minimum frequency | 49.08 | 20:03 | 02.02.11 |
| 3. Monthly average | 49.88 | | |

**Frequency in Hz as %age of time for the blocks :**

| f < 49.5 | 49.5 < f < 50.2 | f >50.2 |
|---|---|---|
| 4.42 | 88.91 | 6.67 |

**Daily Frequency Variation Index :**

| DATE | FVI | DATE | FVI |
|---|---|---|---|
| 01-Feb-11 | 1.070 | 17-Feb-11 | 0.350 |
| 02-Feb-11 | 1.070 | 18-Feb-11 | 0.480 |
| 03-Feb-11 | **1.940** | 19-Feb-11 | 0.380 |
| 04-Feb-11 | 1.060 | 20-Feb-11 | 0.380 |
| 05-Feb-11 | 1.350 | 21-Feb-11 | 0.440 |
| 06-Feb-11 | 0.630 | 22-Feb-11 | 0.350 |
| 07-Feb-11 | 0.320 | 23-Feb-11 | 0.500 |
| 08-Feb-11 | 0.370 | 24-Feb-11 | 0.290 |
| 09-Feb-11 | 0.840 | 25-Feb-11 | 0.300 |
| 10-Feb-11 | 1.110 | 26-Feb-11 | 0.340 |
| 11-Feb-11 | 0.780 | 27-Feb-11 | **0.250** |
| 12-Feb-11 | 0.570 | 28-Feb-11 | 0.330 |
| 13-Feb-11 | 0.250 | | |
| 14-Feb-11 | 0.310 | | |
| 15-Feb-11 | 0.450 | | |
| 16-Feb-11 | 0.340 | **Average FVI** | **0.602** |

**Annexure-III**

**Details of Scheduled Bilateral Exchanges within the Region in** **Feb-11**

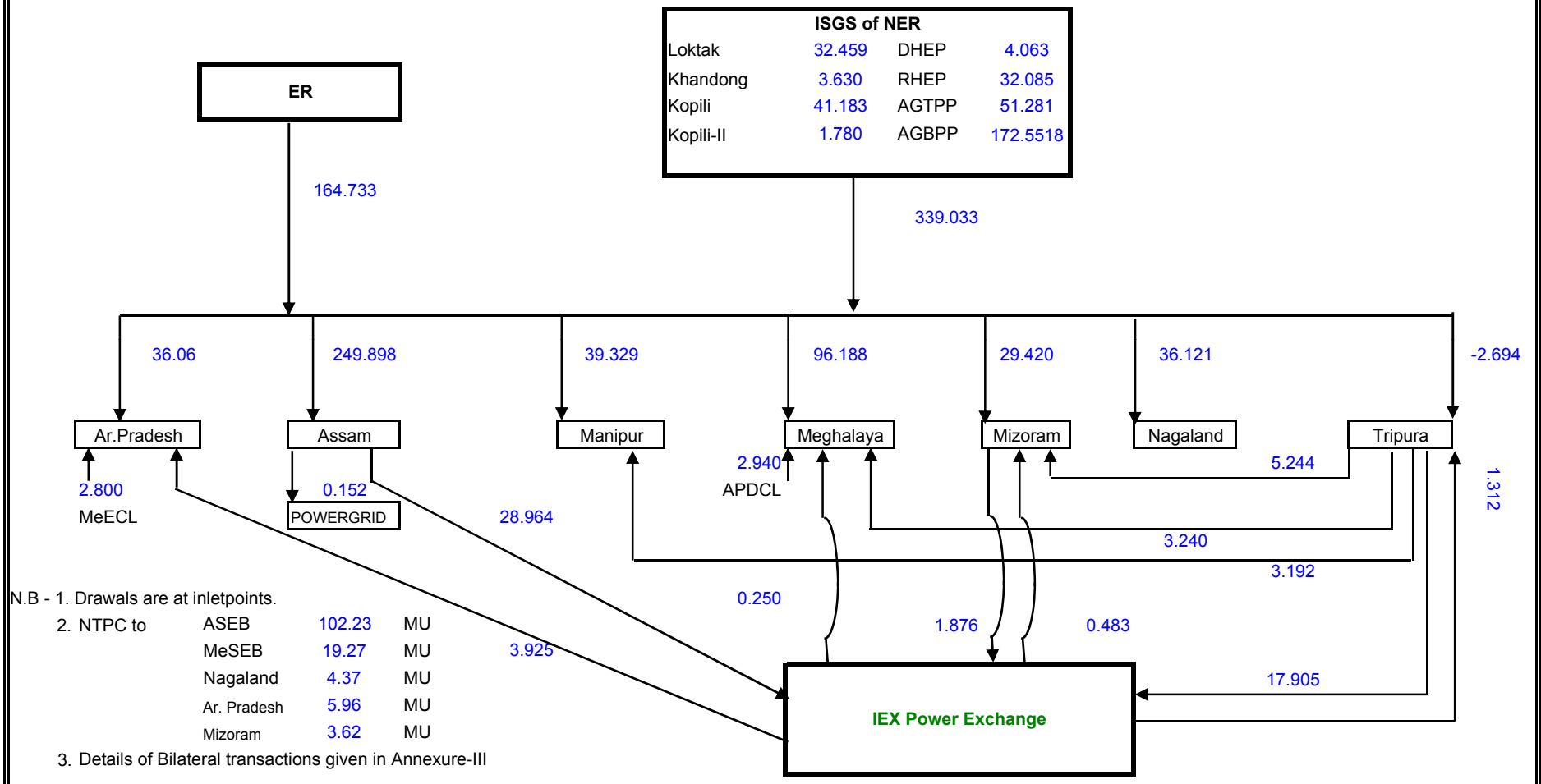
| Sl.No. | From | To | Energy ( At Seller Injn. Point) (MWH) | | Energy ( At State Periphery) (MWH) |
|---|---|---|---|---|---|
| 1 | Tripura(Baramura) | Manipur | 3192.000000 | | 3076.176000 |
| 2 | Tripura(Baramura) | Mizoram | 5244.000000 | | 5055.554438 |
| 3 | APDCL | MeECL (NVVN) | 2940.000000 | | 2834.820000 |
| 4 | MeECL | APDCL (NVVN) | 2800.000000 | | 2698.400000 |
| 5 | TSECL | MeECL (NVVN) | 3240.000000 | | 3122.160000 |
| 6 | ASEB | POWERGRID^ | 152.171250 | ^ The actual energy consumed by POWERGRID | |

**Scheduled Bilateral Exchange with SEBs / Organisations in other Regions**

| Sl.No. | From | To | Energy ( At Seller Periphery) (MWH) | Energy ( At NER-ER Periphery) (MWH) | Energy ( At Buyer Periphery) (MWH) |
|---|---|---|---|---|---|
| 1 | WBSEDCL | APDCL (NVVN) | 1215.000000 | 1181.400000 | 1140.9 |
| 2 | WBSEDCL | APDCL (NVVN) | 5665.120000 | 5507.570000 | 5319.1 |
| 3 | HPPC | APDCL (NVVN) | 325.060000 | 304.260000 | 292.350000 |
| 4 | HPPC | APDCL (NVVN) | 9210.470000 | 8590.310000 | 8276.070000 |
| 5 | MIEL | APDCL (NVVN) | 4200.000000 | 3750.720000 | 3603.120000 |
| 6 | NBVL | APDCL (KISPL) | 29040.000000 | 27129.600000 | 26150.880000 |
| 7 | NDPL | MeECL (NVVN) | 6720.000000 | 6173.600000 | 5948.960000 |
| 8 | TSECL | MSEDCL (NVVN) | 3360.000000 | 3238.080000 | |
| 9 | TSECL | TNEB (NVVN) | 1456.000000 | 1403.200000 | |
| 10 | Farakka* | Ar. Pradesh | 3166.886875 | 3085.475000 | 2972.801350 |
| 11 | Kahalgaon 1* | Ar. Pradesh | 1054.125625 | 1014.650000 | 977.182700 |
| 12 | Talcher* | Ar. Pradesh | 1740.081500 | 1692.300000 | 1631.098350 |
| 13 | Farakka* | Assam | 40365.528625 | 39295.800000 | 37862.788050 |
| 14 | Kahalgaon 1* | Assam | 8650.730000 | 8427.200000 | 8116.776650 |
| 15 | Kahalgaon 2* | Assam | 37134.555700 | 36132.900000 | 34804.897675 |
| 16 | Talcher* | Assam | 16083.372875 | 15653.475000 | 15088.224925 |
| 17 | Farakka* | MeECL | 5901.402000 | 5742.400000 | 5533.119775 |
| 18 | Kahalgaon 1* | MeECL | 1990.642850 | 1946.525000 | 1874.825000 |
| 19 | Kahalgaon 2* | MeECL | 11742.152000 | 11433.575000 | 11013.350150 |
| 20 | Talcher* | MeECL | 3241.618125 | 3153.550000 | 3039.703950 |
| 21 | Farakka* | Nagaland | 2299.582375 | 2242.150000 | 2161.266575 |
| 22 | Kahalgaon 1* | Nagaland | 802.608600 | 770.075000 | 742.142450 |
| 23 | Talcher* | Nagaland | 1267.085000 | 1230.825000 | 1186.783475 |
| 24 | Farakka* | Mizoram | 1931.218250 | 1884.300000 | 1815.583000 |
| 25 | Kahalgaon 1* | Mizoram | 598.584000 | 572.800000 | 551.575000 |
| 26 | Talcher* | Mizoram | 1087.439000 | 1056.375000 | 1018.265000 |
| | Bilateral exchange through IEX Power Exchange (-ve means injection, +ve means drawal) | | | | |
| 27 | Arunachal Pradesh | | | 4073.200000 | 3925.040000 |
| 28 | Assam | | -28963.550000 | -27908.520000 | |
| 29 | MeECL | | | 260.000000 | 250.380000 |
| 30 | Mizoram | | -1875.950000 | -1808.000000 | |
| 31 | Mizoram | | | 500.000000 | 483.000000 |
| 32 | Tripura | | -17904.710000 | -17258.000000 | |
| 33 | Tripura | | | 1362.100000 | 1312.200000 |

**Annexure-IV**

## ENERGY EXCHANGE( in MU ) IN NER DURING February, 2011




N.B - 1. Drawals are at inletpoints.

2. NTPC to

| | | |
|---|---|---|
| ASEB | 102.23 | MU |
| MeSEB | 19.27 | MU |
| Nagaland | 4.37 | MU |
| Ar. Pradesh | 5.96 | MU |
| Mizoram | 3.62 | MU |

3. Details of Bilateral transactions given in Annexure-III

**Exhibit-I**

## Frequency Duration for February, 2011

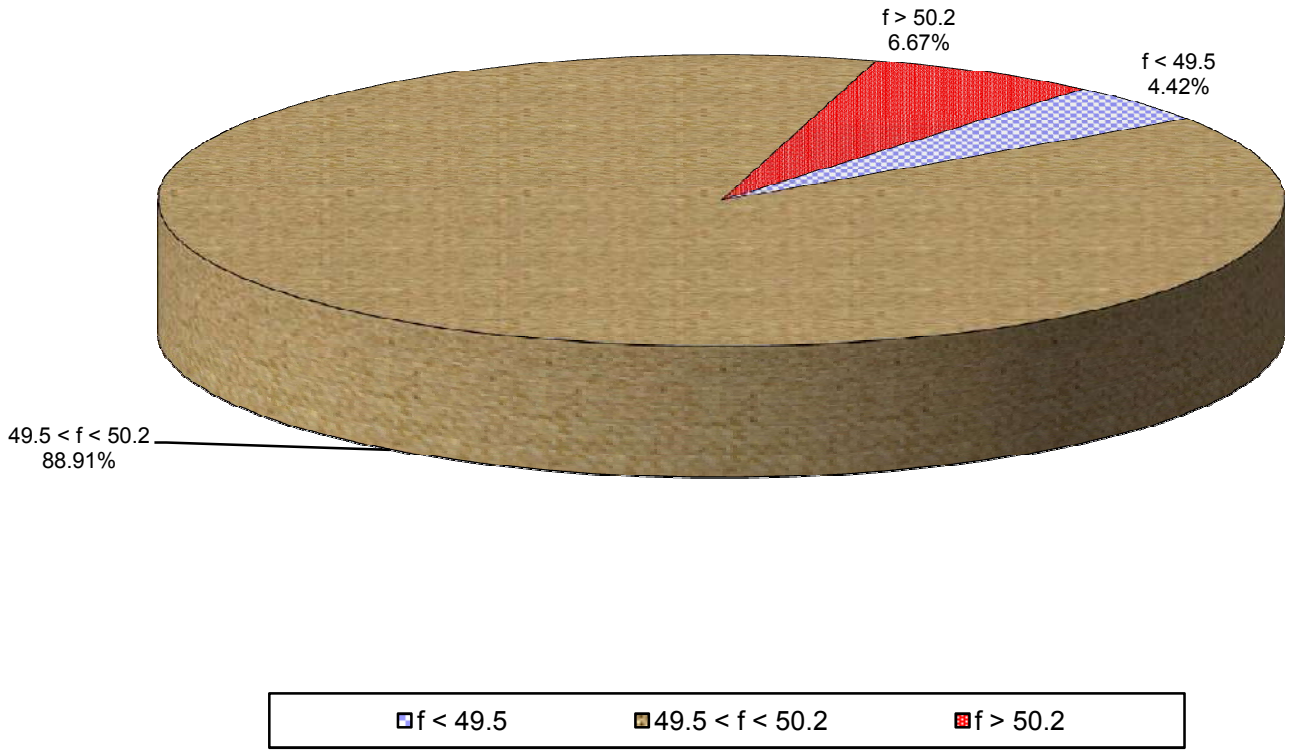


**Exhibit-II**

## FVI Characteristics for February, 2011

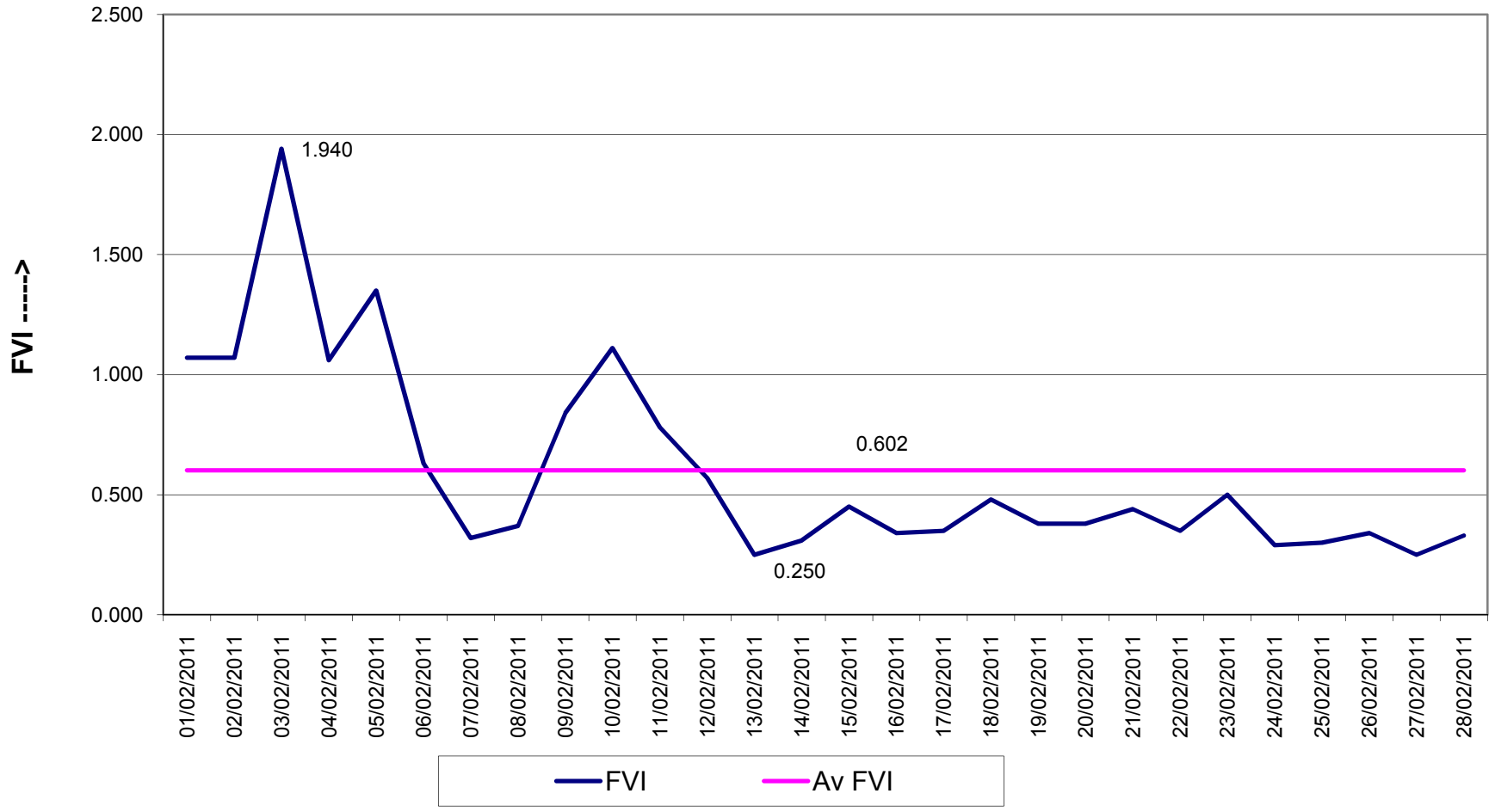


**Exhibit-III**

**Maximum & Minimum Voltage Levels of Important Substations in NER during February, 2011**

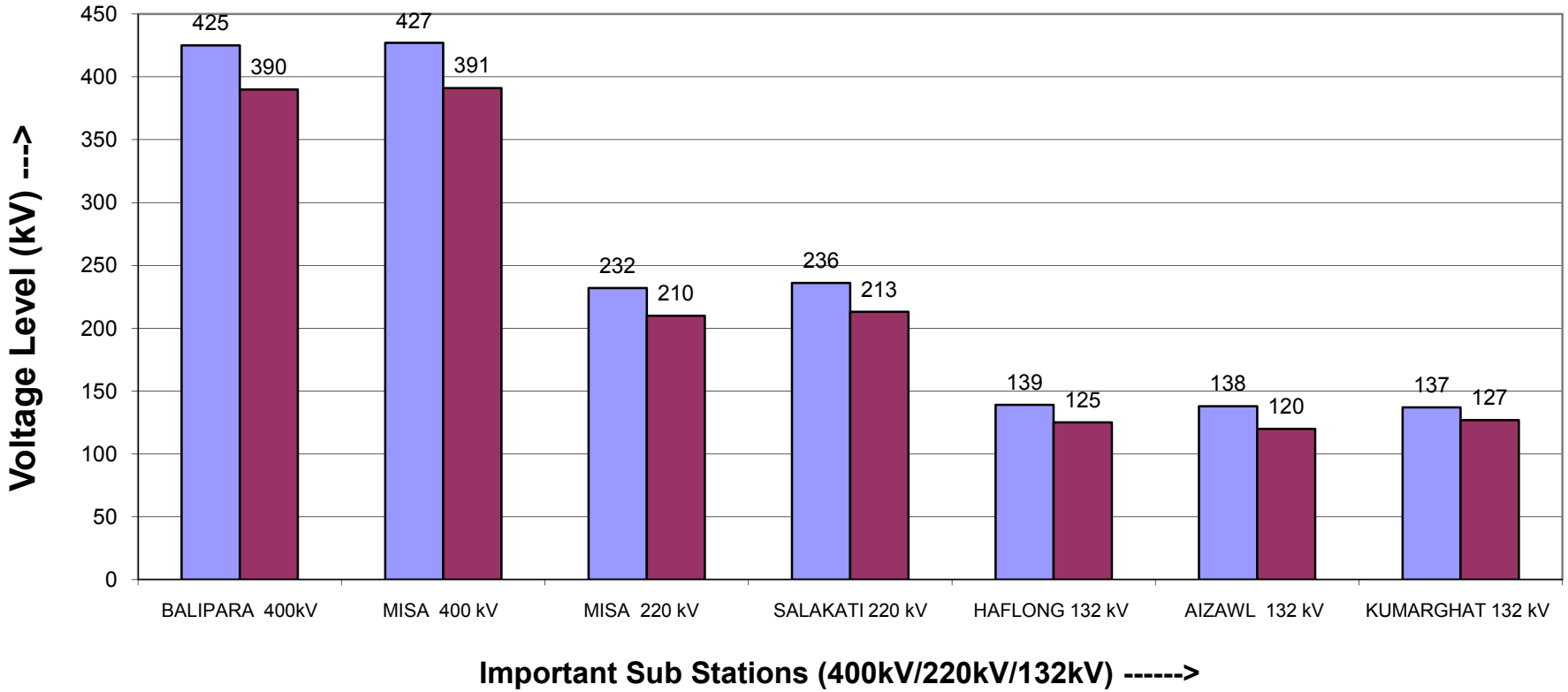


**Exhibit-IV**

## State and Central Sector Generation (MU) in NER in February, 2011

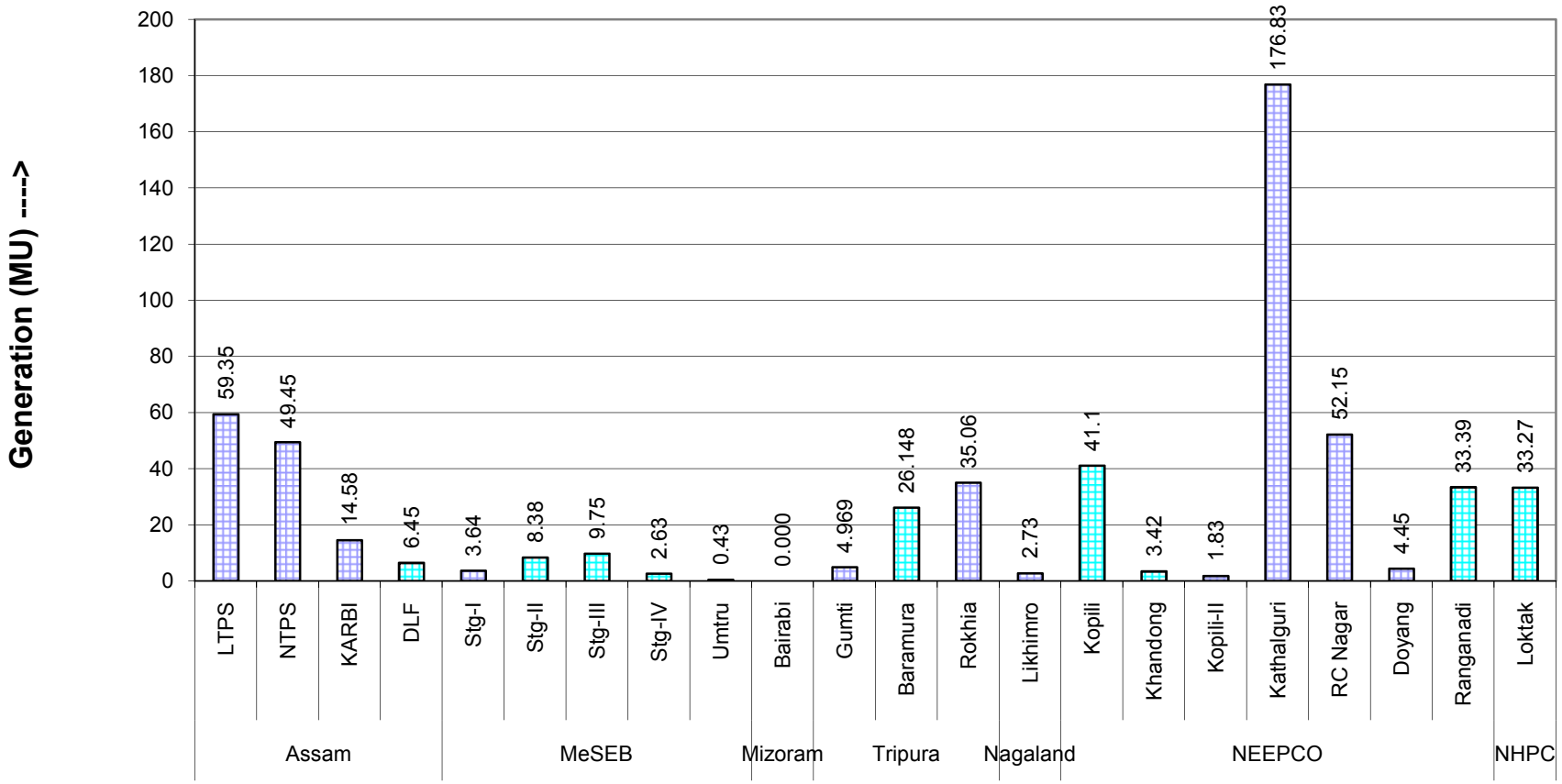


**Exhibit-V**

## NER States Energy Scenario in February, 2011

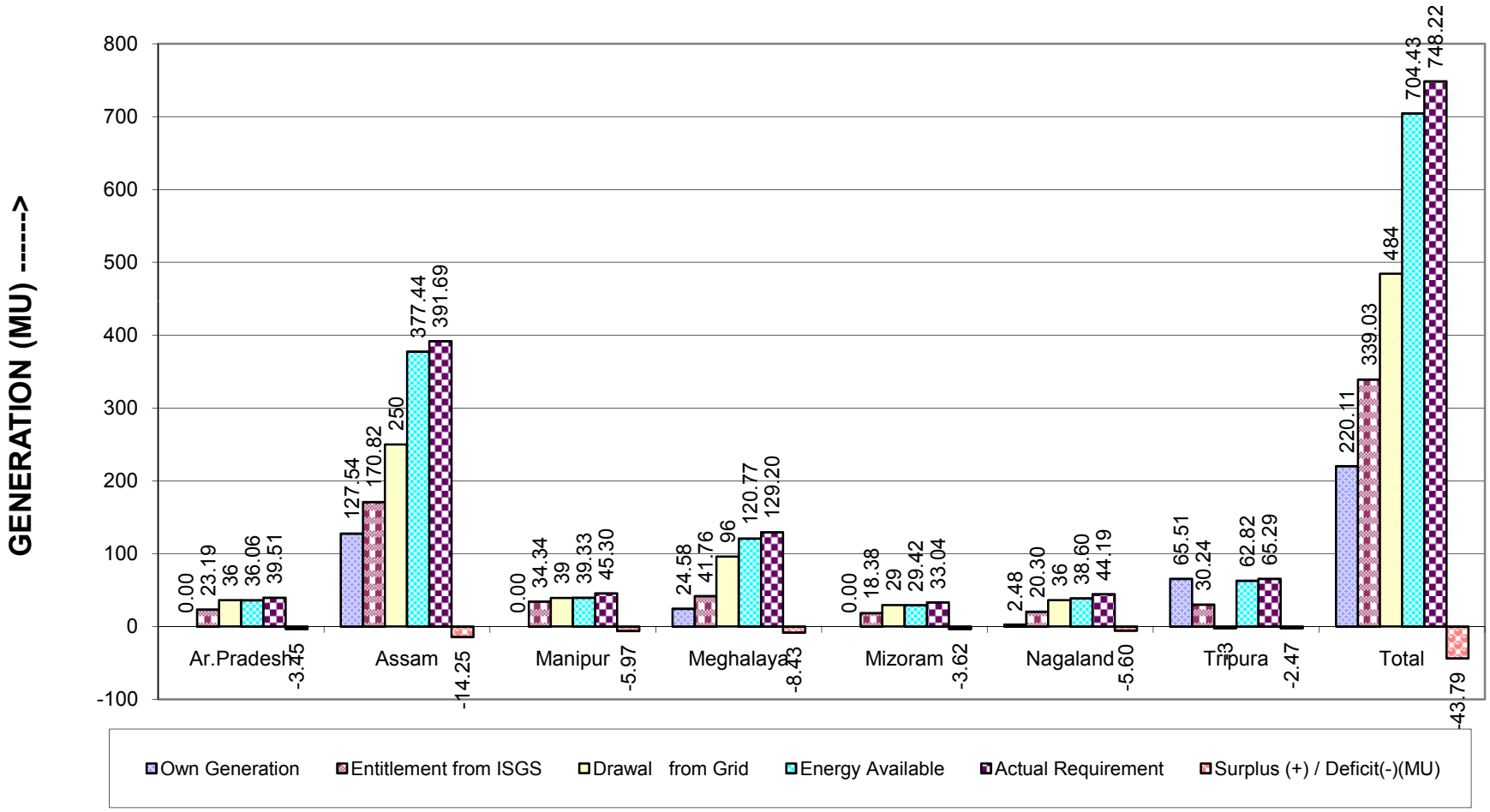


**Exhibit-VI**

## Reservoir Statistics of NER in February, 2011