

# National Load Despatch Centre राष्ट्रीय भार प्रेषण केंद्र

## POWER SYSTEM OPERATION CORPORATION LIMITED पॉवर सिस्टम ऑपरेशन कारपोरेशन लिमिटेड

(Government of India Enterprise/ भारत सरकार का उद्यम) B-9, QUTUB INSTITUTIONAL AREA, KATWARIA SARAI, NEW DELHI -110016 बी-9, कृतुब इन्स्टीट्यूशनल एरिया, कटवारिया सराये, न्यू दिल्ली-110016

Ref: POSOCO/NLDC/SO/Daily PSP Report

दिनांक: 29<sup>th</sup> August 2018

To,

- कार्यकारी निदेशक, पू.क्षे.भा.प्रे.के.,14, गोल्फ क्लब रोड, कोलकाता 700033
   Executive Director, ERLDC, 14 Golf Club Road, Tolleygunge, Kolkata, 700033
- कार्यकारी निदेशक, ऊ. क्षे. भा. प्रे. के., 18/ ए, शहीद जीत सिंह सनसनवाल मार्ग, नई दिल्ली 110016
   Executive Director, NRLDC, 18-A, Shaheed Jeet Singh Marg, Katwaria Sarai, New Delhi 110016
- 3. कार्यकारी निदेशक, प .क्षे .भा .प्रे .के., एफ3-, एम आई डी सी क्षेत्र , अंधेरी, मुंबई -400093 Executive Director, WRLDC, F-3, M.I.D.C. Area, Marol, Andheri (East), Mumbai-400093
- 4. कार्यकारी निदेशक, ऊ. पू. क्षे. भा. प्रे. के., डोंगतिएह, लोअर नोंग्रह , लापलंग, शिलोंग 793006 Executive Director, NERLDC, Dongteih, Lower Nongrah, Lapalang, Shillong - 793006, Meghalaya
- 5. कार्यकारी निदेशक , द .क्षे .भा .प्रे .के.,29 , रेस कोर्स क्रॉस रोड, बंगलुरु -560009 Executive Director, SRLDC, 29, Race Course Cross Road, Bangalore-560009

Sub: Daily PSP Report for the date 28.08.2018.

महोदय/Dear Sir,

आई॰ई॰जी॰सी॰-2010 की धारा स.-5.5.1 के प्रावधान के अनुसार, दिनांक 28-अगस्त-2018 की अखिल भारतीय प्रणाली की दैनिक ग्रिड निष्पादन रिपोर्ट रा॰भा॰प्रे॰के॰ की वेबसाइट पर उप्लब्ध है |

As per article 5.5.1 of the Indian Electricity Grid Code, the daily report pertaining power supply position of All India Power System for the date 28<sup>th</sup> August 2018, is available at the NLDC website.

धन्यवाद,

#### पॉवर सिस्टम ऑपरेशन कारपोरेशन लिमिटेड राष्ट्रीय भार प्रेषण केंद्र, नई दिल्ली

Report for previous day **Date of Reporting** 29-Aug-18

#### A. Maximum Demand

|   | NR    | WR    | SR    | ER    | NER   | Total  |
|---|-------|-------|-------|-------|-------|--------|
| Demand Met during Evening Peak hrs(MW)<br>(at 2000 hrs; from RLDCs) | 52931 | 43998 | 39848 | 20770 | 2705  | 160252 |
| Peak Shortage (MW)  | 831   | 0     | 0     | 434   | 149   | 1414   |
| Energy Met (MU)   | 1209  | 998   | 903   | 447   | 52    | 3610   |
| Hydro Gen (MU)  | 354   | 44    | 174   | 120   | 27    | 720    |
| Wind Gen (MU)   | 10    | 49    | 149   |       |       | 208    |
| Solar Gen (MU)*   | 17.25 | 11.41 | 51.76 | 0.55  | 0.02  | 81     |
| Energy Shortage (MU)  | 11.0  | 0.0   | 0.0   | 1.3   | 1.5   | 13.8   |
| Maximum Demand Met during the day                                   | 54402 | 45717 | 40672 | 21637 | 2717  | 163042 |
| (MW) & time (from NLDC SCADA)                                       | 00.00 | 19.34 | 19:04 | 20.20 | 19-26 | 19-25  |

B. Frequency Profile (%) Region All India FVI <49.7 49.7-49.8 49.8-49.9 <49.9 49.9-50.05 > 50.05 0.87 2.16 13.28 16.31 0.067 78.11

| Region | States            | Max. Demand<br>Met during the<br>day (MW) | Shortage during<br>maximum Demand<br>(MW) | Energy Met (MU) | Drawal<br>Schedule (MU) | OD(+)/UD(-)<br>(MU) | Max OD<br>(MW) | Energy<br>Shortage (MU |
|--------|-------------------|---|---|-----------------|-------------------------|---------------------|----------------|------------------------|
|        | Punjab            | 11183                                     | 0   | 254.1           | 145.8                   | -0.5                | 113            | 0.0                    |
|        | Haryana           | 8000                                      | 0   | 171.0           | 138.9                   | -1.1                | 213            | 0.0                    |
| NR     | Rajasthan         | 9791                                      | 0   | 222.4           | 76.9                    | 0.6                 | 262            | 0.0                    |
|        | Delhi             | 5152                                      | 0   | 107.6           | 88.3                    | -1.0                | 107            | 0.2                    |
|        | UP                | 16212                                     | 0   | 335.8           | 180.4                   | 0.3                 | 275            | 0.0                    |
|        | Uttarakhand       | 1796                                      | 0   | 38.7            | 16.8                    | 0.0                 | 149            | 0.0                    |
|        | HP                | 1404                                      | 0   | 30.5            | -0.5                    | 2.8                 | 230            | 0.0                    |
|        | J&K               | 2174                                      | 544                                       | 42.6            | 20.5                    | -2.6                | 161            | 10.8                   |
|        | Chandigarh        | 299                                       | 0   | 5.9             | 6.5                     | -0.6                | 9              | 0.0                    |
|        | Chhattisgarh      | 3272                                      | 0   | 73.5            | 21.2                    | 0.4                 | 719            | 0.0                    |
|        | Gujarat           | 14115                                     | 0   | 314.8           | 92.5                    | 4.6                 | 533            | 0.0                    |
|        | MP                | 7265                                      | 0   | 163.2           | 70.8                    | 0.7                 | 817            | 0.0                    |
| WR     | Maharashtra       | 18215                                     | 0   | 401.2           | 122.1                   | 0.9                 | 568            | 0.0                    |
| WK     | Goa               | 403                                       | 0   | 8.6             | 8.8                     | -0.8                | 36             | 0.0                    |
|        | DD                | 345                                       | 0   | 7.7             | 6.9                     | 0.9                 | 103            | 0.0                    |
|        | DNH               | 788                                       | 0   | 18.3            | 17.1                    | 1.1                 | 140            | 0.0                    |
|        | Essar steel       | 548                                       | 0   | 11.1            | 10.8                    | 0.3                 | 292            | 0.0                    |
|        | Andhra Pradesh    | 7963                                      | 0   | 169.3           | 22.1                    | -1.4                | 495            | 0.0                    |
|        | Telangana         | 8795                                      | 0   | 188.0           | 66.9                    | -1.2                | 492            | 0.0                    |
| SR     | Karnataka         | 8453                                      | 0   | 176.1           | 51.6                    | -2.8                | 292            | 0.0                    |
| SK     | Kerala            | 3103                                      | 0   | 60.8            | 27.1                    | -0.2                | 147            | 0.0                    |
|        | Tamil Nadu        | 14135                                     | 0   | 302.0           | 93.9                    | -2.1                | 420            | 0.0                    |
|        | Pondy             | 349                                       | 0   | 7.3             | 7.5                     | -0.2                | 33             | 0.0                    |
|        | Bihar             | 4844                                      | 0   | 92.9            | 91.7                    | 1.2                 | 200            | 0.0                    |
|        | DVC               | 2877                                      | 0   | 64.1            | -26.9                   | 4.3                 | 300            | 0.4                    |
| ER     | Jharkhand         | 1037                                      | 0   | 22.5            | 16.3                    | -1.6                | 80             | 0.3                    |
| EN     | Odisha            | 4566                                      | 0   | 90.3            | 27.6                    | 2.7                 | 250            | 0.6                    |
|        | West Bengal       | 8732                                      | 0   | 176.4           | 53.6                    | 3.2                 | 220            | 0.0                    |
|        | Sikkim            | 94  | 0   | 1.1             | 1.3                     | -0.2                | 12             | 0.0                    |
|        | Arunachal Pradesh | 127                                       | 1   | 2.4             | 3.0                     | -0.6                | 6              | 0.0                    |
|        | Assam             | 1717                                      | 133                                       | 32.7            | 27.6                    | 1.2                 | 209            | 1.4                    |
|        | Manipur           | 184                                       | 2   | 2.5             | 2.7                     | -0.2                | 34             | 0.0                    |
| NER    | Meghalaya         | 290                                       | 0   | 5.6             | 0.4                     | 0.0                 | 8              | 0.0                    |
|        | Mizoram           | 78  | 0   | 1.4             | 1.2                     | -0.1                | 4              | 0.0                    |
|        | Nagaland          | 114                                       | 2   | 2.3             | 2.0                     | -0.2                | 24             | 0.0                    |
|        | Tripura           | 280                                       | 3   | 5.0             | 4.0                     | 0.4                 | 61             | 0.0                    |

 $\textbf{D. Transnational Exchanges} \ \ (\textbf{MU}) \textbf{-} \textbf{Import} (+\textbf{ve}) / \textbf{Export} (-\textbf{ve})$ 

|               | Bhutan | Nepal  | Bangladesh |
|---------------|--------|--------|------------|
| Actual(MU)    | 33.4   | -5.9   | -14.9      |
| Day peak (MW) | 1568.1 | -308.0 | -652.2     |

### E. Import/export By Regions(in MU) - Import(+ve)/Export(-ve); OD(+)/UD(-)

|              | NR    | WR     | SR   | ER    | NER  | TOTAL |
|--------------|-------|--------|------|-------|------|-------|
| Schedule(MU) | 264.3 | -253.2 | 32.3 | -50.2 | 6.3  | -0.5  |
| Actual(MU)   | 256.7 | -253.2 | 25.2 | -36.3 | 3.5  | -4.0  |
| O/D/U/D(MU)  | -7.6  | 0.0    | -7.1 | 13.9  | -2.8 | -3.6  |

F. Generation Outage(MW)

|                | NR    | WR    | SR    | ER   | NER | Total |
|----------------|-------|-------|-------|------|-----|-------|
| Central Sector | 4321  | 14135 | 10262 | 2130 | 470 | 31319 |
| State Sector   | 9770  | 19264 | 10383 | 5985 | 50  | 45452 |
| Total          | 14091 | 33399 | 20645 | 8115 | 520 | 76770 |

G. Sourcewise generation (MU)

|                                     | NR  | WR   | SR  | ER  | NER | All India |
|-------------------------------------|-----|------|-----|-----|-----|-----------|
| Thermal (Coal & Lignite)            | 544 | 1095 | 432 | 385 | 8   | 2464      |
| Hydro                               | 354 | 44   | 174 | 120 | 27  | 720       |
| Nuclear                             | 28  | 27   | 24  | 0   | 0   | 80        |
| Gas, Naptha & Diesel                | 16  | 41   | 22  | 0   | 17  | 97        |
| RES (Wind, Solar, Biomass & Others) | 41  | 61   | 243 | 1   | 0   | 346       |
| Total                               | 984 | 1268 | 896 | 506 | 52  | 3706      |

| Share of RES in total generation (%)         | 4.17  | 4.78  | 27.16 | 0.11  | 0.07  | 9.32  |
|--|-------|-------|-------|-------|-------|-------|
| Share of Non-fossil fuel (Hydro, Nuclear and | 43.06 | 10.37 | 49.31 | 23.92 | 52.25 | 30.90 |
| RES) in total generation (%)                 | 45.00 | 10.57 | 49.51 | 23.92 | 54.35 | 30.90 |

H. Diversity Factor
All India Demand Diversity Factor
1.013
Diversity factor = Sum of regional maximum demands / All India maximum demand

 $<sup>\</sup>textbf{*Source:} \ RLDCs \ for \ solar \ connected \ to \ ISTS; \ SLDCs \ for \ embedded \ solar. \ Limited \ visibility \ of \ embedded \ solar \ data.$ 

|  |   |   |   |   |   | Date of I   | Reporting :   | 29-Aug-   |
|--|---|---|---|---|---|---|---|---|
|  |   |   |   |   |   |   |   | Import=(+ve)<br>/Export =(-ve)<br>for NET (MU)  |
| Sl No  | Voltage<br>Level  | Line Details  | Circuit   | Max<br>Import<br>(MW)   | Max Export (MW)   | Import (MU)   | Export<br>(MU)  | NET<br>(MU)   |
|  | Export of   | ER (With NR)  | D/C   | 0   | 200   | 0.0   | 2.2   | 2.2   |
| 2  | 765kV   | GAYA-VARANASI<br>SASARAM-FATEHPUR   | D/C<br>S/C  | 331   | 289   | 0.0<br>4.7  | 0.0   | -3.3<br>4.7   |
| 3  | 70011   | GAYA-BALIA  | S/C   | 0   | 372   | 0.0   | 6.0   | -6.0  |
| 4  | HVDC  | ALIPURDUAR-AGRA   | -   | 0   | 624   | 0.0   | 5.9   | -5.9  |
| 5  | 11,50   | PUSAULI B/B   | S/C   | 0   | 149   | 0.0   | 3.7   | -3.7  |
| 7  |   | PUSAULI-VARANASI  | S/C<br>S/C  | 0   | 153<br>54   | 0.0   | 0.0   | 0.0   |
| 8  | _   | PUSAULI -ALLAHABAD<br>MUZAFFARPUR-GORAKHPUR   | D/C   | 0   | 422   | 0.0   | 7.0   | -7.0  |
| 9  | 400 kV  | PATNA-BALIA   | Q/C   | 15  | 706   | 0.0   | 11.9  | -11.9   |
| 10   |   | BIHARSHARIFF-BALIA  | D/C   | 0   | 219   | 0.0   | 3.4   | -3.4  |
| 11   | _   | MOTIHARI-GORAKHPUR  | D/C   | 119   | 0   | 5.6   | 0.0   | 5.6   |
| 12   |   | BIHARSHARIFF-VARANASI   | D/C   | 208   | 0   | 1.7   | 0.0   | 1.7   |
| 13   | 220 kV  | PUSAULI-SAHUPURI  | S/C   | 0   | 158   | 0.0   | 3.3   | -3.3  |
| 14   | 4   | SONE NAGAR-RIHAND   | S/C   | 0   | 0   | 0.0   | 0.0   | 0.0   |
| 15   | 132 kV  | GARWAH-RIHAND   | S/C   | 35  | 0   | 0.6   | 0.0   | 0.6   |
| 16<br>17   | 4   | KARMANASA-SAHUPURI  | S/C   | 0   | 0   | 0.0   | 0.0   | 0.0   |
| 1 /  | <u> </u>  | KARMANASA-CHANDAULI   | S/C   | 0   | 0<br>ER-NR  | 0.0<br>12.6   | 0.0<br>44.3   | 0.0<br>-31.7  |
| port/F   | Export of   | ER (With WR)  |   |   | ER-IK   | 12.0  | 44.3  | -31./   |
| 18   | 765 kV  | JHARSUGUDA-DHARAMJAIGARH S/C  | D/C   | 1014  | 3   | 18.0  | 0.0   | 18.0  |
| 19   |   | NEW RANCHI-DHARAMJAIGARH  | D/C   | 1039  | 0   | 18.3  | 0.0   | 18.3  |
| 20   | 400 kV  | JHARSUGUDA-RAIGARH  | Q/C   | 1143  | 0   | 21.3  | 0.0   | 21.3  |
| 21   |   | RANCHI-SIPAT  | D/C   | 472   | 0   | 8.1   | 0.0   | 8.1   |
| 22   | 220 kV  | BUDHIPADAR-RAIGARH<br>BUDHIPADAR-KORBA  | S/C<br>D/C  | 0<br>291  | 0   | 2.5   | 0.0   | 2.5   |
| 23   |   | DUDHIPADAR-KOKBA  | D/C   | 291   | ER-WR   | 70.5  | 0.0   | 70.5  |
| port/F   | Export of   | ER (With SR)  |   |   |   |   |   |   |
| 24   | 765 kV  | ANGUL-SRIKAKULAM  | D/C   | 0.0   | 950.9   | 0.0   | 10.8  | -10.8   |
| 25   | HVDC  | JEYPORE-GAZUWAKA B/B  | D/C   | 0.0   | 463.2   | 0.0   | 11.0  | -11.0   |
| 26   | LINK  | TALCHER-KOLAR BIPOLE  | D/C   | 0.0   | 1485.4  | 0.0   | 33.0  | -33.0   |
| 27   | 400 kV<br>220 kV  | TALCHER-I/C<br>BALIMELA-UPPER-SILERRU   | D/C<br>S/C  | 2395.2  | 0.6   | 0.0   | 46.6<br>0.0   | -46.6<br>0.0  |
|  | 220 11 1  |   |   | 0.0   | ER-SR   | 0.0   | 54.8  | -54.8   |
| 1port/F  | Export of   | ER (With NER)   |   | 1   |   |   |   |   |
| 29   | 400 kV  | BINAGURI-BONGAIGAON   | D/C   | 0   | 1018  | 0.0   | 19.3  | -19   |
| 30   | 220 kV  | ALIPURDUAR-BONGAIGAON   | D/C<br>D/C  | 0   | 1078<br>241   | 0.0   | 19.8  | -20<br>-5   |
| 31   | 220 KV  | ALIPURDUAR-SALAKATI   | D/C   | 0   | ER-NER  | 0.0   | 43.8  | -43.8   |
| iport/E  | Export of   | NER (With NR)   |   |   |   |   |   | I   |
| 32   | HVDC  | BISWANATH CHARIALI-AGRA   | -   | 0   | 2002  | 0.0   | 42.5  | -42.5   |
|  |   |   |   |   |   | 0.0   | 42.5  | -42.5   |
|  | P   | MD (MM) ND)   |   |   | NER-NR  |   |   |   |
|  | Export of   | WR (With NR)  | D/C   | 0   | 1   | 0.0   | 21.4  | 24.4  |
| 33   |   | CHAMPA-KURUKSHETRA  | D/C   | 0   | 0   | 0.0   | 34.4  | -34.4<br>6.0  |
| -  | Export of HVDC  | CHAMPA-KURUKSHETRA<br>V'CHAL B/B  | D/C<br>D/C<br>D/C   | 0 0 0   | 1   | 0.0<br>6.0<br>0.0   | 34.4<br>0.0<br>48.4   | -34.4<br>6.0<br>-48.4   |
| 33<br>34   |   | CHAMPA-KURUKSHETRA  | D/C   | 0   | 0   | 6.0   | 0.0   | 6.0   |
| 33<br>34<br>35   |   | CHAMPA-KURUKSHETRA<br>V'CHAL B/B<br>APL -MHG  | D/C<br>D/C  | 0   | 0 0 0   | 6.0<br>0.0  | 0.0<br>48.4   | 6.0<br>-48.4  |
| 33<br>34<br>35<br>36   |   | CHAMPA-KURUKSHETRA<br>V'CHAL B/B<br>APL-MHG<br>GWALIOR-AGRA   | D/C<br>D/C<br>D/C   | 0 0   | 0<br>0<br>0   | 6.0<br>0.0<br>0.0   | 0.0<br>48.4<br>48.9   | 6.0<br>-48.4<br>-48.9   |
| 33<br>34<br>35<br>36<br>37<br>38<br>39   | HVDC  | CHAMPA-KURUKSHETRA V'CHAL B/B APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI   | D/C D/C D/C D/C D/C S/C   | 0<br>0<br>0<br>0<br>0   | 0<br>0<br>0<br>0<br>0<br>0  | 6.0<br>0.0<br>0.0<br>0.0<br>0.0<br>0.0<br>8.0   | 0.0<br>48.4<br>48.9<br>26.9<br>21.1<br>0.0  | 6.0<br>-48.4<br>-48.9<br>-26.9<br>-21.1<br>8.0  |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40   | HVDC  | CHAMPA-KURUKSHETRA VCHAL B/B APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI   | D/C D/C D/C D/C D/C S/C S/C   | 0<br>0<br>0<br>0<br>0   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0  | 6.0<br>0.0<br>0.0<br>0.0<br>0.0<br>0.0<br>8.0   | 0.0<br>48.4<br>48.9<br>26.9<br>21.1<br>0.0<br>42.1  | 6.0<br>-48.4<br>-48.9<br>-26.9<br>-21.1<br>8.0<br>-42.1   |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41   | HVDC  | CHAMPA-KURUKSHETRA VCHAL B/B APL -MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI   | D/C D/C D/C D/C D/C S/C S/C S/C   | 0<br>0<br>0<br>0<br>0<br>0  | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0  | 6.0<br>0.0<br>0.0<br>0.0<br>0.0<br>8.0<br>0.0<br>3.1  | 0.0<br>48.4<br>48.9<br>26.9<br>21.1<br>0.0<br>42.1  | 6.0<br>-48.4<br>-48.9<br>-26.9<br>-21.1<br>8.0<br>-42.1<br>3.1  |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42   | HVDC  | CHAMPA-KURUKSHETRA VCHAL B/B APL -MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA -BHINMAL  | D/C D/C D/C D/C D/C S/C S/C S/C S/C   | 0<br>0<br>0<br>0<br>0<br>0<br>0   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0   | 6.0<br>0.0<br>0.0<br>0.0<br>0.0<br>8.0<br>0.0<br>3.1<br>0.5   | 0.0<br>48.4<br>48.9<br>26.9<br>21.1<br>0.0<br>42.1<br>0.0   | 6.0<br>-48.4<br>-48.9<br>-26.9<br>-21.1<br>8.0<br>-42.1<br>3.1<br>0.5   |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42<br>43   | HVDC 765 kV   | CHAMPA-KURUKSHETRA VCHAL B/B APL -MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA -BHINMAL VCHAL -RIHAND  | D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0  | 6.0<br>0.0<br>0.0<br>0.0<br>0.0<br>8.0<br>0.0<br>3.1<br>0.5<br>22.0   | 0.0<br>48.4<br>48.9<br>26.9<br>21.1<br>0.0<br>42.1<br>0.0<br>0.0  | 6.0<br>-48.4<br>-48.9<br>-26.9<br>-21.1<br>8.0<br>-42.1<br>3.1<br>0.5<br>22.0   |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42   | HVDC 765 kV   | CHAMPA-KURUKSHETRA VCHAL B/B APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA -BHINMAL VCHAL -RIHAND RAPP-SHUJALPUR  | D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C D/C   | 0<br>0<br>0<br>0<br>0<br>0<br>0   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0   | 6.0<br>0.0<br>0.0<br>0.0<br>0.0<br>8.0<br>0.0<br>3.1<br>0.5   | 0.0<br>48.4<br>48.9<br>26.9<br>21.1<br>0.0<br>42.1<br>0.0   | 6.0<br>-48.4<br>-48.9<br>-26.9<br>-21.1<br>8.0<br>-42.1<br>3.1<br>0.5   |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42<br>43<br>44   | HVDC 765 kV 400 kV  | CHAMPA-KURUKSHETRA VCHAL B/B APL -MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA -BHINMAL VCHAL -RIHAND  | D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0                                    | 6.0<br>0.0<br>0.0<br>0.0<br>0.0<br>0.0<br>8.0<br>0.0<br>3.1<br>0.5<br>22.0  | 0.0<br>48.4<br>48.9<br>26.9<br>21.1<br>0.0<br>42.1<br>0.0<br>0.0<br>0.0   | 6.0<br>-48.4<br>-48.9<br>-26.9<br>-21.1<br>8.0<br>-42.1<br>3.1<br>0.5<br>22.0<br>-3                                       |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42<br>43<br>44<br>45   | HVDC 765 kV   | CHAMPA-KURUKSHETRA VCHAL B/B APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA-BHINMAL VCHAL -RIHAND RAPP-SHUJALPUR BADOD-KOTA  | D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C S/C S/C S/C S   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0                               | 6.0<br>0.0<br>0.0<br>0.0<br>0.0<br>0.0<br>8.0<br>0.0<br>3.1<br>0.5<br>22.0<br>0   | 0.0<br>48.4<br>48.9<br>26.9<br>21.1<br>0.0<br>42.1<br>0.0<br>0.0<br>0.0<br>3<br>0.3   | 6.0<br>-48.4<br>-48.9<br>-26.9<br>-21.1<br>8.0<br>-42.1<br>0.5<br>22.0<br>-3<br>-0.3                                      |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42<br>43<br>44<br>45<br>46   | HVDC 765 kV 400 kV  | CHAMPA-KURUKSHETRA V'CHAL B/B APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA-BHINMAL V'CHAL-RIHAND RAPP-SHUJALPUR BADOD-KOTA BADOD-MORAK   | D/C D/C D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C S/C S/C S/C S   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0                                    | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0                               | 6.0<br>0.0<br>0.0<br>0.0<br>0.0<br>8.0<br>0.0<br>3.1<br>0.5<br>22.0<br>0<br>0.1   | 0.0<br>48.4<br>48.9<br>26.9<br>21.1<br>0.0<br>42.1<br>0.0<br>0.0<br>0.0<br>3<br>0.3<br>0.8  | 6.0<br>-48.4<br>-48.9<br>-26.9<br>-21.1<br>8.0<br>-42.1<br>0.5<br>22.0<br>-3<br>-0.3<br>-0.8                              |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42<br>43<br>44<br>45<br>46<br>47   | HVDC 765 kV 400 kV  | CHAMPA-KURUKSHETRA V'CHAL B/B APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA-BHINMAL V'CHAL-RIHAND RAPP-SHUJALPUR BADOD-KOTA BADOD-MORAK MEHGAON-AURAIYA   | D/C D/C D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C S/C S/C S/C S   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0                          | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 6.0<br>0.0<br>0.0<br>0.0<br>0.0<br>8.0<br>0.0<br>3.1<br>0.5<br>22.0<br>0<br>0.1<br>0.0<br>0.2<br>0.0  | 0.0<br>48.4<br>48.9<br>26.9<br>21.1<br>0.0<br>42.1<br>0.0<br>0.0<br>3<br>0.3<br>0.8<br>0.1<br>0.5<br>0.0  | 6.0<br>-48.4<br>-48.9<br>-26.9<br>-21.1<br>8.0<br>-42.1<br>3.1<br>0.5<br>22.0<br>-3<br>-0.3<br>-0.8<br>0.1<br>-0.5<br>0.0 |
| 33<br>33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42<br>42<br>43<br>44<br>45<br>46<br>47<br>48<br>49   | HVDC 765 kV 400 kV 220 kV 132kV   | CHAMPA-KURUKSHETRA V'CHAL B/B  APL -MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA -BHINMAL V'CHAL -RIHAND RAPP-SHUJALPUR BADOD-KOTA BADOD-MORAK MEHGAON-AURAIYA MALANPUR-AURAIYA GWALIOR-SAWAI MADHOPUR   | D/C D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C S/C S/C S/C S   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 6.0<br>0.0<br>0.0<br>0.0<br>0.0<br>8.0<br>0.0<br>3.1<br>0.5<br>22.0<br>0<br>0.1<br>0.0<br>0.2   | 0.0<br>48.4<br>48.9<br>26.9<br>21.1<br>0.0<br>42.1<br>0.0<br>0.0<br>0.0<br>3<br>0.3<br>0.8<br>0.1<br>0.5  | 6.0<br>-48.4<br>-48.9<br>-26.9<br>-21.1<br>8.0<br>-42.1<br>3.1<br>0.5<br>22.0<br>-3<br>-0.3<br>-0.8<br>0.1                |
| 33<br>33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42<br>42<br>44<br>44<br>45<br>46<br>47<br>48<br>49   | HVDC  765 kV  400 kV  220 kV  132kV                                     | CHAMPA-KURUKSHETRA V'CHAL B/B  APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA-BHINMAL V'CHAL-RIHAND RAPP-SHUJALPUR BADOD-KOTA BADOD-MORAK MEHGAON-AURAIYA MALANPUR-AURAIYA   | D/C D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C S/C S/C S/C S   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 6.0<br>0.0<br>0.0<br>0.0<br>0.0<br>8.0<br>0.0<br>3.1<br>0.5<br>22.0<br>0<br>0.1<br>0.0<br>0.2<br>0.0  | 0.0<br>48.4<br>48.9<br>26.9<br>21.1<br>0.0<br>42.1<br>0.0<br>0.0<br>3<br>0.3<br>0.8<br>0.1<br>0.5<br>0.0  | 6.0<br>-48.4<br>-48.9<br>-26.9<br>-21.1<br>8.0<br>-42.1<br>3.1<br>0.5<br>22.0<br>-3<br>-0.3<br>-0.8<br>0.1<br>-0.5<br>0.0 |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42<br>43<br>44<br>45<br>46<br>47<br>48<br>49   | HVDC  765 kV  400 kV  220 kV  132kV                                     | CHAMPA-KURUKSHETRA VCHAL B/B APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA-BHINMAL VCHAL-RIHAND RAPP-SHUJALPUR BADOD-KOTA BADOD-MORAK MEHGAON-AURAIYA MALANPUR-AURAIYA GWALIOR-SAWAI MADHOPUR  WR (With SR)   | D/C D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C S/C S/C S/C S   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 6.0<br>0.0<br>0.0<br>0.0<br>0.0<br>8.0<br>0.0<br>3.1<br>0.5<br>22.0<br>0<br>0.1<br>0.0<br>0.2<br>0.0<br>0.0<br>3.7  | 0.0<br>48.4<br>48.9<br>26.9<br>21.1<br>0.0<br>42.1<br>0.0<br>0.0<br>0.0<br>3<br>0.3<br>0.8<br>0.1<br>0.5<br>0.0<br>226.0                        | 6.0  -48.4  -48.9  -26.9  -21.1  8.0  -42.1  3.1  0.5  22.0  -0.3  -0.8  0.1  -0.5  0.0  -186.3                           |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42<br>43<br>44<br>45<br>46<br>47<br>48<br>49   | HVDC  765 kV  400 kV  220 kV  132kV  Export of HVDC LINK                | CHAMPA-KURUKSHETRA VCHAL B/B APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI ZERDA-KANKROLI ZERDA-KANKROLI ZERDA-BHINMAL VCHAL-RIHAND RAPP-SHUJALPUR BADOD-KOTA BADOD-MORAK MEHGAON-AURAIYA MALANPUR-AURAIYA GWALIOR-SAWAI MADHOPUR  WR (With SR) BHADRAWATI B/B BARSUR-L.SILERU SOLAPUR-RAICHUR  | D/C D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C S/C S/C S/C S   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 6.0<br>0.0<br>0.0<br>0.0<br>0.0<br>0.0<br>8.0<br>0.0<br>3.1<br>0.5<br>22.0<br>0<br>0.1<br>0.0<br>0.2<br>0.0<br>0.0<br>3.7<br>0.0<br>0.0<br>0.0<br>0.0<br>0.0<br>0.0<br>0.0<br>0 | 0.0<br>48.4<br>48.9<br>26.9<br>21.1<br>0.0<br>42.1<br>0.0<br>0.0<br>0.0<br>3<br>0.3<br>0.8<br>0.1<br>0.5<br>0.0<br>226.0                        | 6.0  -48.4  -48.9  -26.9  -21.1  8.0  -42.1  0.5  22.0  -3  -0.3  -0.8  0.1  -0.5  0.0  -186.3                            |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>40<br>41<br>42<br>43<br>44<br>45<br>46<br>47<br>48<br>49<br>49<br>50<br>51<br>52<br>53                                     | HVDC  765 kV  400 kV  220 kV  132kV  Export of HVDC LINK  765 kV        | CHAMPA-KURUKSHETRA VCHAL B/B APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI ZERDA-KANKROLI ZERDA-KANKROLI ZERDA-BHINMAL VCHAL-RIHAND RAPP-SHUJALPUR BADOD-KOTA BADOD-MORAK MEHGAON-AURAIYA MALANPUR-AURAIYA GWALIOR-SAWAI MADHOPUR  WR (With SR) BHADRAWATI B/B BARSUR-L.SILERU SOLAPUR-RAICHUR WARDHA-NIZAMABAD   | D/C D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C S/C S/C S/C S   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0   | 6.0 0.0 0.0 0.0 0.0 0.0 8.0 0.0 3.1 0.5 22.0 0 0.1 0.0 0.2 0.0 0.0 39.7   | 0.0<br>48.4<br>48.9<br>26.9<br>21.1<br>0.0<br>42.1<br>0.0<br>0.0<br>0.0<br>0.3<br>0.3<br>0.8<br>0.1<br>0.5<br>0.0<br>226.0<br>7.2<br>0.0<br>0.0 | 6.0  -48.4  -48.9  -26.9  -21.1  8.0  -42.1  0.5  22.0  -3  -0.3  -0.8  0.1  -0.5  0.0  -186.3                            |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>40<br>41<br>42<br>43<br>44<br>45<br>46<br>47<br>48<br>49<br>50<br>51<br>52<br>53<br>54                                     | HVDC  765 kV  400 kV  220 kV  132kV  Export of HVDC LINK                | CHAMPA-KURUKSHETRA VCHAL B/B APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA-KANKROLI ZERDA-BHINMAL VCHAL-RIHAND RAPP-SHUJALPUR BADOD-KOTA BADOD-MORAK MEHGAON-AURAIYA MALANPUR-AURAIYA GWALIOR-SAWAI MADHOPUR  WR (With SR) BHADRAWATI B/B BARSUR-L-SILERU SOLAPUR-RAICHUR WARDHA-NIZAMABAD KOLHAPUR-KUDGI                       | D/C D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C S/C S/C S/C S   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0   | 6.0 0.0 0.0 0.0 0.0 0.0 8.0 0.0 3.1 0.5 22.0 0 0.1 0.0 0.2 0.0 0.0 39.7   | 0.0 48.4 48.9 26.9 21.1 0.0 42.1 0.0 0.0 0.0 3 0.3 0.8 0.1 0.5 0.0 226.0 7.2 0.0 0.0 10.3 0.0   | 6.0  -48.4  -48.9  -26.9  -21.1  8.0  -42.1  0.5  22.0  -3  -0.3  -0.8  0.1  -0.5  0.0  -186.3                            |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42<br>43<br>44<br>45<br>46<br>47<br>48<br>49<br>49<br>51<br>52<br>53<br>54<br>55                                     | HVDC  765 kV  400 kV  220 kV  132kV  Export of HVDC LINK 765 kV  400 kV | CHAMPA-KURUKSHETRA V'CHAL B/B  APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA-KANKROLI ZERDA-BHINMAL V'CHAL-RIHAND RAPP-SHUJALPUR BADOD-KOTA BADOD-MORAK MEHGAON-AURAIYA MALANPUR-AURAIYA GWALIOR-SAWAI MADHOPUR  WR (With SR) BHADRAWATI B/B BARSUR-L.SILERU SOLAPUR-RAICHUR WARDHA-NIZAMABAD KOLHAPUR-KUDGI                    | D/C D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C S/C S/C S/C S   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0   | 6.0 0.0 0.0 0.0 0.0 0.0 8.0 0.0 3.1 0.5 22.0 0 0.1 0.0 0.2 0.0 0.0 39.7   | 0.0 48.4 48.9 26.9 21.1 0.0 42.1 0.0 0.0 3 0.3 0.8 0.1 0.5 0.0 226.0 7.2 0.0 0.0 10.3 0.0 0.0   | 6.0  -48.4  -48.9  -26.9  -21.1  8.0  -42.1  3.1  0.5  22.0  -3  -0.3  -0.8  0.1  -0.5  0.0  -186.3                       |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42<br>43<br>44<br>45<br>46<br>47<br>48<br>49<br>49<br>49<br>50<br>51<br>51<br>52<br>53<br>54<br>55<br>56             | HVDC  765 kV  400 kV  220 kV  132kV  Export of HVDC LINK 765 kV  400 kV | CHAMPA-KURUKSHETRA V'CHAL B/B  APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA-KANKROLI ZERDA-BHINMAL V'CHAL-RIHAND RAPP-SHUJALPUR BADOD-KOTA BADOD-MORAK MEHGAON-AURAIYA MALANPUR-AURAIYA GWALIOR-SAWAI MADHOPUR  WR (With SR) BHADRAWATI B/B BARSUR-L.SILERU SOLAPUR-RAICHUR WARDHA-NIZAMABAD KOLHAPUR-KUDGI KOLHAPUR-CHIKODI PONDA-AMBEWADI | D/C D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C S/C D/C S/C S/C D/C S/C S/C S/C S/C S/C S/C S/C S/C S/C S | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0   | 6.0 0.0 0.0 0.0 0.0 0.0 8.0 0.0 3.1 0.5 22.0 0 0.1 0.0 0.2 0.0 0.0 39.7   | 0.0 48.4 48.9 26.9 21.1 0.0 42.1 0.0 0.0 3 0.3 0.8 0.1 0.5 0.0 226.0 7.2 0.0 0.0 10.3 0.0 0.0   | 6.0  -48.4  -48.9  -26.9  -21.1  8.0  -42.1  3.1  0.5  22.0  -3  -0.3  -0.8  0.1  -0.5  0.0  -186.3                       |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42<br>43<br>44<br>45<br>46<br>47<br>48<br>49<br>49<br>49<br>50<br>51<br>52<br>53<br>54<br>55                         | HVDC  765 kV  400 kV  220 kV  132kV  Export of HVDC LINK 765 kV  400 kV | CHAMPA-KURUKSHETRA V'CHAL B/B  APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA-KANKROLI ZERDA-BHINMAL V'CHAL-RIHAND RAPP-SHUJALPUR BADOD-KOTA BADOD-MORAK MEHGAON-AURAIYA MALANPUR-AURAIYA GWALIOR-SAWAI MADHOPUR  WR (With SR) BHADRAWATI B/B BARSUR-L.SILERU SOLAPUR-RAICHUR WARDHA-NIZAMABAD KOLHAPUR-KUDGI                    | D/C D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C S/C S/C S/C S   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0   | 6.0 0.0 0.0 0.0 0.0 0.0 8.0 0.0 3.1 0.5 22.0 0 0.1 0.0 0.2 0.0 0.0 39.7   | 0.0 48.4 48.9 26.9 21.1 0.0 42.1 0.0 0.0 3 0.3 0.8 0.1 0.5 0.0 226.0 7.2 0.0 0.0 10.3 0.0 0.0 0.0 0.0 0.0                                       | 6.0  -48.4  -48.9  -26.9  -21.1  8.0  -42.1  3.1  0.5  22.0  -3  -0.3  -0.8  0.1  -0.5  0.0  -186.3                       |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42<br>43<br>44<br>45<br>46<br>47<br>48<br>49<br>49<br>49<br>49<br>50<br>51<br>51<br>52<br>53<br>54<br>55<br>56<br>56 | HVDC  765 kV  400 kV  220 kV  132kV  Export of HVDC LINK 765 kV  400 kV | CHAMPA-KURUKSHETRA V'CHAL B/B  APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA-BHINMAL V'CHAL-RIHAND RAPP-SHUJALPUR BADOD-KOTA BADOD-MORAK MEHGAON-AURAIYA MALANPUR-AURAIYA GWALIOR-SAWAI MADHOPUR  WR (With SR) BHADRAWATI B/B BARSUR-L.SILERU SOLAPUR-RAICHUR WARDHA-NIZAMABAD KOLHAPUR-KUDGI KOLHAPUR-AMBEWADI XELDEM-AMBEWADI | D/C D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C S/C S/C S/C S   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0   | 6.0 0.0 0.0 0.0 0.0 0.0 8.0 0.0 3.1 0.5 22.0 0 0.1 0.0 0.2 0.0 0.0 39.7   | 0.0 48.4 48.9 26.9 21.1 0.0 42.1 0.0 0.0 3 0.3 0.8 0.1 0.5 0.0 226.0 7.2 0.0 0.0 10.3 0.0 0.0   | 6.0  -48.4  -48.9  -26.9  -21.1  8.0  -42.1  3.1  0.5  22.0  -3  -0.3  -0.8  0.1  -0.5  0.0  -186.3                       |
| 33<br>34<br>35<br>36<br>37<br>38<br>39<br>40<br>41<br>42<br>43<br>44<br>45<br>46<br>47<br>48<br>49<br>49<br>49<br>49<br>55<br>51<br>55<br>55<br>56                         | HVDC  765 kV  400 kV  220 kV  132kV  Export of HVDC LINK 765 kV  400 kV | CHAMPA-KURUKSHETRA V'CHAL B/B  APL-MHG GWALIOR-AGRA PHAGI-GWALIOR JABALPUR-ORAI GWALIOR-ORAI SATNA-ORAI ZERDA-KANKROLI ZERDA-BHINMAL V'CHAL-RIHAND RAPP-SHUJALPUR BADOD-KOTA BADOD-MORAK MEHGAON-AURAIYA MALANPUR-AURAIYA GWALIOR-SAWAI MADHOPUR  WR (With SR) BHADRAWATI B/B BARSUR-L.SILERU SOLAPUR-RAICHUR WARDHA-NIZAMABAD KOLHAPUR-KUDGI KOLHAPUR-AMBEWADI XELDEM-AMBEWADI | D/C D/C D/C D/C D/C D/C S/C S/C S/C S/C S/C S/C S/C S/C S/C S   | 0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0<br>0 | 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0   | 6.0 0.0 0.0 0.0 0.0 0.0 8.0 0.0 3.1 0.5 22.0 0 0.1 0.0 0.2 0.0 0.0 39.7   | 0.0 48.4 48.9 26.9 21.1 0.0 42.1 0.0 0.0 3 0.3 0.8 0.1 0.5 0.0 226.0 7.2 0.0 0.0 10.3 0.0 0.0 0.0 0.0 0.0                                       | 6.0  -48.4  -48.9  -26.9  -21.1  8.0  -42.1  3.1  0.5  22.0  -3  -0.3  -0.8  0.1  -0.5  0.0  -186.3                       |