

**LOAD-GENERATION BALANCE REPORT**

Maximum Load/Demand till Date

Date:	November 4, 2019
Hours:	19:00 Hours

Date	Time	Load(MW)
27-Dec-18	18:18hrs	399.35MW

Sl. No.	Hydropower Plant	Unit	MW	Name of Feeders	Load (MW)	Sign	Remarks
1	1020MW THP	Unit- I	119.36	400kV THP - Siliguri Fdr- I	0.00		Unit II & V under shutdown. Unit-III at standby 400kV THP_SILI 1 line under anti theft charge.
		Unit- II	0.00	400kV THP - Siliguri Fdr- II	127.30	+	
		Unit- III	0.00	400kV THP - Siliguri Fdr- IV	121.33	+	
		Unit- IV	140.61	400kV THP - Malbase Fdr- III	174.00	+	
		Unit- V	0.00	400kV Malbase - Siliguri	107.38	+	
		Unit- VI	169.37	-	-	-	
		<b>Total</b>	<b>429.34</b>	<b>Error at Station/Auxiliary Consumption/Losses</b>	<b>6.71</b>		
2	720MW MHP	Unit-I	83.00	400kV MHP - Jigmeling Fdr - I	112.70	+	Unit II under break down & Unit III under shutdown
		Unit-II	0.00	400kV MHP - Jigmeling Fdr - II	112.70	+	
		Unit-III	0.00	400kV MHP - Jigmeling Fdr - III	0.00		
		Unit-IV	143.00	400kV MHP - Jigmeling Fdr - IV	0.00		
		-	-	200MVA, 400/132kV ICT	0.00		
		-	-	(Local Load)	0.00		
		<b>Total</b>	<b>226.00</b>	<b>Error at Station/Auxiliary Consumption/Losses</b>	<b>0.60</b>		
2	336MW CHP	Unit- I	0.00	220kV CHP - Birpara Fdr- I	40.49	+	Unit-I under shutdown
		Unit- II	75.26	220kV CHP - Birpara Fdr- II	40.55	+	
		Unit- III	71.05	220kV CHP - Malbase Fdr- III	99.14	+	
		Unit- IV	72.89	220kV CHP - Semtokha Fdr- IV	19.52	+	
		-	-	220kV Malbase - Birpara Fdr.	-9.28	-	
		-	-	66kV CHP - Chumdo Fdr.	12.37	+	
		-	-	66kV CHP - Gedu Fdr.	5.34	+	
		-	-	3x3MVA, 66/11kV TFR	1.55	+	
		<b>Total</b>	<b>219.20</b>	<b>Error at Station/Auxiliary Consumption/Losses</b>	<b>0.24</b>		
3	24MW BHP (U/S)	Unit- I	7.50	220kV BHP - Semtokha Fdr.	30.86	+	
		Unit- II	7.50	66kV BHP - Lobeysa Fdr.	17.15	+	
		<b>Total</b>	<b>15.00</b>	220kV BHP - Tsirang Fdr.	-4.15	+	
	40MW BHP (L/S)	Unit- I	15.15	5MVA, 66/11kV TFR	0.64	+	
		Unit- II	14.57	30MVA ICT, 220/66kV			
<b>Total</b>	<b>29.72</b>	<b>Error at Station/Auxiliary Consumption/Losses</b>	<b>0.22</b>				
4	126MW DHPC	Unit-I	43.36	220kV DHPC - Tsirang Fdr.	43.12	+	Unit II Standby
		Unit-II	0.00	220kV Jigmeling - Dagapela Fdr.			
		-	-	5MVA, 220/33kV TFR			
		<b>Total</b>	<b>43.36</b>	<b>Error at Station/Auxiliary Consumption/Losses</b>	<b>0.24</b>		
5	60MW KHP	Unit- I	13.46	132kV KHP - Nangkhor Fdr- I	33.83	+	Unit-IV Standby
		Unit-II	13.43	132kV KHP - Kilikhar Fdr- II	7.67	+	
		Unit- III	15.27	5MVA, 132/11kV TFR	0.50	+	
		Unit- IV	0.00	132kV Gelephu - Salakati Fdr.	0.70	+	
		-	-	132kV Motanga - Rangia Fdr.	16.00	+	
		-	-	220kV Tsirang - Jigmeling	36.67	+	
		<b>Total</b>	<b>42.16</b>	<b>Error at Station/Auxiliary Consumption/Losses</b>	<b>0.16</b>		

Note: Load summary on November 04, 2019 at 19:00hrs.

Sl. No	Region	Total Generation (MW)	Total Load [Generation - Export (MW)]	Total Load [Feeder Summation (MW)]	Total Export/Import	Load Balance
1	Western Grid	736.62	272.18	264.77	427.77	7.41
2	Eastern Grid	268.16	62.73	61.97	242.10	0.76
	<b>Total</b>	1,004.78	334.91	326.74	669.87	8.17

Note: Load Summary on November 04, 2018 at 19:00hrs

Sl. No	Region	19:00Hrs Load (MW)	Day Peak Load (MW)	Month Peak Load (MW)
1	Western Grid	259.17	259.17	281.60
2	Eastern Grid	40.98	42.93	62.24
	<b>National</b>	<b>300.15</b>	<b>302.10</b>	<b>343.84</b>

**NOTES:**

- The Instantaneous load balance is calculated as (Total generation - (Total export-Import) - Total domestic load) do not tend towards zero. This could be due to the following reasons:
  - Not all the meters are digital and nor are all the meter at all locations can be read at same time (say 9:00hrs) due to many meter to be read manually.
  - The clocks of all the locations are not synchronized.
- This report is generated to give an idea of the generation & load flow for the system at a particular instant.

**LOAD-GENERATION BALANCE REPORT**

Maximum Load/Demand till Date

Date:	November 5, 2019
Hours:	09:00 Hours

Date	Time	Load(MW)
27-Dec-18	18:18hrs	399.35MW

Sl. No.	Hydropower Plant	Unit	MW	Name of Feeders	Load (MW)	Sign	Remarks
1	1020MW THP	Unit- I	119.73	400kV THP - Siliguri Fdr- I	0.00	+	Unit-II & V under shutdown. Unit-III at standby. 400kV THP_SILI I under ideal charge.
		Unit- II	0.00	400kV THP - Siliguri Fdr- II	112.45	+	
		Unit- III	0.00	400kV THP - Siliguri Fdr- IV	106.57	+	
		Unit- IV	140.51	400kV THP - Malbase Fdr- III	143.34	+	
		Unit- V	0.00	400kV Malbase - Siliguri	97.87	+	
		Unit- VI	110.13	-	-	-	
		<b>Total</b>	<b>370.37</b>	<b>Error at Station/Auxiliary Consumption/Losses</b>	<b>8.01</b>		
2	720MW MHP	Unit-I	85.07	400kV MHP - Jigmeling Fdr - I	115.27	+	Unit II under break down & Unit III under shutdown
		Unit-II	0.00	400kV MHP - Jigmeling Fdr - II	74.90	+	
		Unit-III	0.00	400kV MHP - Jigmeling Fdr - III	0.00		
		Unit-IV	146.48	400kV MHP - Jigmeling Fdr - IV	0.00		
		-	-	200MVA, 400/132kV ICT	0.00		
		-	-	(Local Load)			
		<b>Total</b>	<b>231.55</b>	<b>Error at Station/Auxiliary Consumption/Losses</b>	<b>41.38</b>		
3	336MW CHP	Unit- I	0.00	220kV CHP - Birpara Fdr- I	37.14	+	CHP Unit-I under shutdownn.
		Unit- II	62.99	220kV CHP - Birpara Fdr- II	37.14	+	
		Unit- III	61.22	220kV CHP - Malbase Fdr- III	104.18	+	
		Unit- IV	60.16	220kV CHP - Semtokha Fdr- IV	-8.09	-	
		-	-	220kV Malbase - Birpara Fdr.	-18.55	-	
		-	-	66kV CHP - Chumdo Fdr.	7.22	+	
		-	-	66kV CHP - Gedu Fdr.	5.00	+	
		<b>Total</b>	<b>184.37</b>	<b>Error at Station/Auxiliary Consumption/Losses</b>	<b>0.74</b>		
4	24MW BHP (U/S)	Unit- I	6.93	220kV BHP - Semtokha Fdr.	43.69	+	
		Unit- II	6.93	66kV BHP - Lobeyasa Fdr.	14.24	+	
		<b>Total</b>	<b>13.86</b>	220kV BHP - Tsirang Fdr.	-16.14	-	
	40MW BHP (L/S)	Unit- I	14.41	5MVA, 66/11kV TFR	0.44	+	
		Unit- II	13.83	30MVA ICT, 220/66kV			
<b>Total</b>	<b>28.24</b>	<b>Error at Station/Auxiliary Consumption/Losses</b>	<b>-0.13</b>				
5	126MW DHPC	Unit-I	44.38	220kV DHPC - Tsirang Fdr.	44.17	+	Unit-II at Standby
		Unit-II	0.00	220kV Jigmeling - Dagapela Fdr.			
		-	-	5MVA, 220/33kV TFR			
		<b>Total</b>	<b>44.38</b>	<b>Error at Station/Auxiliary Consumption/Losses</b>	<b>0.21</b>		
6	60MW KHP	Unit- I	13.27	132kV KHP - Nangkhor Fdr- I	35.98	+	Unit-IV at Standby
		Unit-II	12.18	132kV KHP - Kilikhar Fdr- II	4.15	+	
		Unit- III	15.14	5MVA, 132/11kV TFR	0.40	+	
		Unit- IV	0.00	132kV Gelephu - Salakati Fdr.	5.45	+	
		-	-	132kV Motanga - Rangia Fdr.	14.85	+	
		-	-	220kV Tsirang - Jigmeling	26.75	+	
		<b>Total</b>	<b>40.59</b>	<b>Error at Station/Auxiliary Consumption/Losses</b>	<b>0.06</b>		

Note: Load summary on November 05, 2019 at 09:00hrs.

Sl. No	Region	Total Generation (MW)	Total Load [Generation - Export (MW)]	Total Load [Feeder Summation (MW)]	Total Export/Import	Load Balance
1	Western Grid	641.22	241.85	233.02	372.62	8.83
2	Eastern Grid	272.14	88.42	46.98	210.47	41.44
	<b>Total</b>	<b>913.36</b>	<b>330.27</b>	<b>280.00</b>	<b>583.09</b>	<b>50.27</b>

Note: Load Summary on November 05, 2018 at 09:00hrs

Sl. No	Region	09:00Hrs Load (MW)	Day Peak Load (MW)	Month Peak Load (MW)
1	Western Grid	221.08	266.97	293.93
2	Eastern Grid	37.02	40.81	62.30
	<b>National</b>	<b>258.10</b>	<b>307.78</b>	<b>356.23</b>

**NOTES:**

- The Instantaneous load balance is calculated as (Total generation - (Total export-Import) - Total domestic load) do not tend towards zero. This could be due to the following reasons:
  - Not all the meters are digital and nor are all the meter at all locations can be read at same time (say 9:00hrs) due to many meter to be read manually.
  - The clocks of all the locations are not synchronized.
- This report is generated to give an idea of the generation & load flow for the system at a particular instant.