

Monthly Report on Short-term Transactions of Electricity in India

May, 2020



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Abbreviations

Abbreviation	Expanded Version
ABSP_ANTP	Acme Bhiwadi Solar Power Private Limited, Anantpur
ACBIL	ACB (India) Limited
ACP	Area Clearing Price
ACV	Area Clearing Volume
ACME_SLR	ACME Solar Power Project
ACME_RUMS	Acme Rewa Ultra Mega Solar Project
ADY1_PVGD	Adyah Solar Energy Pvt Ltd., Block 1 Pavagada Solar Park
ADY2_PVGD	Adyah Solar Energy Pvt Ltd., Block 2 Pavagada Solar Park
ADY3_PVGD	Adyah Solar Energy Pvt Ltd., Block 3 Pavagada Solar Park
ADY6_PVGD	Adyah Solar Energy Pvt Ltd., Block 6 Pavagada Solar Park
ADY10_PVGD	Adyah Solar Energy Pvt Ltd., Block 10 Pavagada Solar Park
ADY13_PVGD	Adyah Solar Energy Pvt Ltd., Block 13 Pavagada Solar Park
AGEMPL BHUJ	Adani Green Energy (MP) Ltd., Bhuj
AHSP_ANTP	Acme Hisar Solar Power Private Limited, Anantpur
AKS_PVGD	ACME Kurukshetra Solar Energy Pvt. Ltd
AKSP_ANTP	Acme Karnal Solar Power Private Limited, Anantpur
AMPS Hazira	Arcelor Mittal Nippon Steel, Hazira
ARERJL_SLR	Adani Renewable Energy Park Rajasthan Ltd.
ARINSUM_RUMS	Solenergi Rewa Ultra Mega Solar Project
ARS_PVGD	ACME REWARI Solar Power Pvt Ltd.
AVAADA1_PVGD	Avaada Solar Energy Private Ltd., Pavagada Project 1
AVAADA2_PVGD	Avaada Solar Energy Private Ltd., Pavagada Project 2
AZURE_ANTP	Azure Power, Anantpur
AZURE_PVGD	Azure Power, Pavagada
AZURE_SLR	Azure Power Solar Power Project
AZURE34_SLR	Azure Power 34 Pvt. Ltd. Solar Power Project
BALCO	Bharat Aluminum Company Limited
BARC	Bhabha Atomic Research Centre
BBMB	Bhakra Beas Management Board
BETAM_TCN	Betam Wind Energy Private Limited, Tuticorin
BHADRAVATHI HVDC	Bhadravathi High Voltage Direct Current Link
BRBCL	Bhartiya Rail Bijlee Company Limited
CEA	Central Electricity Authority
CERC	Central Electricity Regulatory Commission
CGPL	Coastal Gujarat Power Limited
CHUKHA HEP	Chhukha Hydroelectric Project, Bhutan
CHUZACHEN HEP	Chuzachen Hydro Electric Power Project
CLEAN_SLR	Clean Solar Power Pvt. Ltd
COASTGEN	Coastal Energen Private Limited
DAGACHU	Dagachhu Hydro Power Corporation
DB POWER	Diligent Power Pvt. Ltd.
DCPP	Donga Mahua Captive Power Plant
DGEN MEGA POWER	DGEN Mega Power Project
DHARIWAL POWER	Dhariwal Power Station
DIKCHU HEP	Dikchu Hydro-electric Project, Sikkim
DOYANG HEP	Doyang Hydro Electric Project
DSM	Deviation Settlement Mechanism
DVC	Damodar Valley Corporation

EMCO	EMCO Energy Limited
ESSAR POWER	Essar Power Limited
ESSAR STEEL	Essar Steel Ltd
FORTUM1_PVGD	Fortum Finnsurya Energy Private Ltd, Pavagada Project 1
FORTUM2_PVGD	Fortum Finnsurya Energy Private Ltd, Pavagada Project 2
FRV_ANTP	Fotowatio Renewable Ventures, Anantapur
FRV_NPK	Fotowatio Renewable Ventures,N P Kunta
GIWEL_BHUJ	Green infra wind energy Limited, Bhuj
GIWEL_TCN	Green Infra Wind Energy Limited,Tuticorin
GMR CHHATTISGARH	GMR Chhattisgarh Energy Limited
GMR KAMALANGA	GMR Kamalanga Energy Ltd.
HVDC ALPD	Alipurduar High Voltage Direct Current Link
HVDC CHAMPA	Champa-Kurukshetra High Voltage Direct Current Link
HVDC PUS	Pasauli High Voltage Direct Current Link
HVDC RAIGARH	Raigarh-Pugalur High Voltage Direct Current Link
IEX	Indian Energy Exchange Limited
IGSTPS	Indira Gandhi Super Thermal Power Station Jhajjar
IL&FS	Infrastructure Leasing & Financial Services Limited
INOX_BHUJ	INOX Wind Limited, Bhuj, Gujarat
J&K	Jammu & Kashmir
JAYPEE NIGRIE	Jaypee Nigrie Super Thermal Power Project
JHABUA POWER MP	Jhabua Thermal Power Project
JINDAL POWER	Jindal Power Limited
JINDAL STAGE-II	Jindal Power Ltd Stage II
JITPL	Jindal India Thermal Power Ltd.
JORETHANG	Jorethang Loop Hydroelectric Power Project
KAPP 3&4	Kakrapar Atomic Power Station Unit 3 & 4
KARCHAM WANGTOO	Karcham Wangtoo H.E. Project
KORBA WEST POWER	Korba West Power Company Limited
KOTESHWAR	Koteshwar Hydro Power project
KREDL_PVGD	Karnataka Renewable Energy Developement Ltd, Pavagada
KSK MAHANADI	KSK Mahanadi Power Ltd
KSMPL_SLR	Kilaj Solar (Maharashtra) Private Limited
KURICHU HEP	Kurichhu Hydro-electric Power Station, Bhutan
LANKO_AMK	Lanco Amarkantak Power Private Limited
LANKO BUDHIL	Lanco Budhil Hydro Power Private Limited
LANKO KONDAPALLY	Lanco Kondapally Power Private Limited
LOKTAK	Loktak Power Project
MAHINDRA_RUMS	Mahindra Rewa Ultra Mega Solar Project
MAHOBASLR	Mahoba Solar Power Project
MALANA	Malana Hydroelectric Plant
MANGDECHU HEP	Mangdechhu Hydroelectric Project, Mangdechhu River, Bhutan
Maruti Coal	Maruti Clean Coal and Power Limited
MB POWER	MB Power Ltd
MEENAKSHI	Meenakshi Energy Private Limited
MP	Madhya Pradesh
MTPS II	Muzaffarpur Thermal Power Station – Stage II
MYTRAH_TCN	Mytrah Energy (India) Private Limited, Tuticorin
Mus	Million Units
NAPP	Narora Atomic Power Plant

NEEPCO	North Eastern Electric Power Corporation Limited
NEP	Nepal
NFL	National Fertilisers Limited
NHPC STATIONS	National Hydro Electric Power Corporation Ltd. Stations
NJPC	Nathpa Jhakri Hydroelectric Power Station
NLC	Neyveli Lignite Corporation Limited
NLDC	National Load Dispatch Centre
NPGC	Nabinagar Power Generating Company (Pvt.) Limited
NSPCL	NTPC - SAIL Power Company Private Limited
NTECL Vallur	NTPC Tamil Nadu Energy Company Limited Vallur
NTPC_ANTP	NTPC Anantapur
NTPC STATIONS	National Thermal Power Corporation Ltd. Stations
NTPL	NLC Tamil Nadu Power Limited
NVVN	NTPC Vidyut Vyapar Nigam Limited
ONGC Platana	ONGC Tripura Power Company
OPGC	Odisha Power Generation Corporation
ORANGE_TCN	Orange Renewable Power Pvt. Ltd, Tuticorin
OSTRO	Ostro Energy Private Limited
OTC	Over The Counter
PARAM_PVGD	Parampujya Solar Energy Private Ltd
PARE HEP	Pare hydroelectric project, Arunachal Pradesh
PX	Power Exchange
PXIL	Power Exchange India Limited
RAIL	Indian Railways
RAMPUR HEP	Rampur Hydro Electric Power Project
RANGIT HEP	Rangit Hydroelectric power project
RANGANADI HEP	Ranganadi Hydro Electric Power Project, Arunachal Pradesh
RAP-B	Rajasthan Atomic Power Plant-B
RAP-C	Rajasthan Atomic Power Plant-C
REC	Renewable Energy Certificate
REGL	Raigarh Energy Generation Limited
RENEW_BHACHAU	ReNew Power Limited, Bhachau
RENEW_PVGD	ReNew Wind Energy (TN2) Private Limited
RENEW_SLR	Renew Solar
RENEW_SLR_BKN	Renew Solar Bikaner
RGPPL	Ratnagiri Gas and Power Private Limited
RLDC	Regional Load Dispatch Centre
RPREL	Raipur Energen Limited
RTC	Round The Clock
Sasan UMPP	Sasan Ultra Mega Power Project
SB_SLR	Soft Bank Solar
SBG CLEANTECH_SLR	SBG Cleantech Ltd
SBG_NPK	SB Energy Solar Private Limited, NP Kunta
SBG_PVGD	SB Energy Solar Private Limited, Pavagada
SEMBCORP	Sembcorp Gayatri Power Ltd
SHREE CEMENT	Shree Cement Limited
SIMHAPURI	Simhapuri Energy Private Limited
SKS Power	SKS Power Generation Chhattisgarh Limited
SPECTRUM	Spectrum Power Generation Ltd
TALA HEP	Tala Hydroelectric Project, Bhutan

TASHIDENG HEP	Tashiding Hydro Electric Project, Sikkim
TATA_ANTP	TATA Power Anantapur
TATA_PVGD	Tata Power Renewable Energy Ltd
TATA_SLR	Tata Solar
TEESTA STG3	Teesta Stage 3 Hydro Power Project
TEHRI	Tehri Hydro Electric Power Project
THERMAL POWERTECH	Thermal Powertech Corporation India Limited
URI-II	Uri-II Hydropower Project
VINDHYACHAL HVDC	Vindhyachal High Voltage Direct Current Link
YARROW_PVGD	Yarrow Infra Structure Private Ltd

Introduction

A well-functioning electricity market requires an effective market monitoring process. As part of the market monitoring process, the monthly report on short-term transactions of electricity, is being prepared and posted on the website of CERC since August 2008. Here, “short-term transactions of electricity” refers to the contracts of less than one year period, for electricity transacted (inter-State) through inter-State Trading Licensees and directly by the Distribution Licensees, Power Exchanges (Indian Energy Exchange Ltd (IEX) and Power Exchange India Ltd (PXIL), and Deviation Settlement Mechanism (DSM). The objectives of the report are: (i) to observe the trends in volume and price of the short-term transactions of electricity; (ii) to analyse competition among the market players; (iii) to analyse effect of congestion on volume of electricity transacted through power exchanges; (iv) to provide information on volume and price of Renewable Energy Certificates (RECs) transacted through power exchanges; and (v) to disclose/disseminate all relevant market information. The details of the report for the month of **May, 2020** are as under:

I: Volume of Short-term Transactions of Electricity

During May 2020, total electricity generation excluding generation from renewable and captive power plants in India was 96501.42 MUs (Table-1).

Of the total electricity generation, 11075.12 MUs (11.48%) was transacted through short-term, comprising of 5595.97 MUs (5.80%) through day ahead collective transactions on power exchanges, followed by 3517.76 MUs (3.65%) through bilateral (through traders and term-ahead contracts on power exchanges and directly between distribution companies) and 1961.39 MUs (2.03%) through DSM (Table-1 & Figure-2).

Of the total short-term transactions, day ahead collective transactions on power exchanges constitutes 50.53%, followed by 31.76% through bilateral (21.22% through traders and term-ahead contracts on power exchanges and 10.54% directly between distribution companies) and 17.71% through DSM (Table-1 & Figure-1). Daily volume of short-term transactions is shown in Table-17 & Figure-3.

The percentage share of electricity traded by each trading licensee in the total volume of electricity traded by all the trading licensees is provided in Table-2 & Figure-4. The volume of electricity transacted by the trading licensees includes bilateral transactions and the transactions undertaken through power exchanges. There were 35 trading licensees as on May 2020. In May 2020, 24 trading licensees were engaged in short term trading. Top 5 trading licensees had a share of 78.66% in the total volume traded by all the licensees. These are PTC India Ltd., Adani Enterprises Ltd., NTPC Vidyut Vyapar Nigam Ltd., Tata Power Trading Company (P) Ltd. and Manikaran Power Ltd.

Herfindahl-Hirschman Index (HHI) has been used for measuring the competition among the trading licensees. Increase in the HHI generally indicates decrease in competition and increase of market concentration, and vice versa. The HHI below 0.15 indicates non-concentration, HHI between 0.15 and 0.25 indicates moderate concentration and HHI above 0.25 indicates high concentration. The HHI has been computed based on the volume of electricity traded (inter-State & intra-State) by inter-State trading licensees, and it was 0.2552 for the month of May 2020, which indicates high concentration of market power (Table-2).

The volume of electricity transacted through IEX and PXIL in the day ahead market was 5573.73 MUs and 22.24 MUs respectively. The volume of total buy bids and sell bids was 6136.57 MUs and 10579.69 MUs respectively in IEX, while the same was 37.49 MUs and 71.41 MUs respectively in PXIL. The variation in the volume of buy bids and sell bids placed through power exchanges shows variation in the demand and supply position.

The volume of electricity transacted through IEX and PXIL in the term-ahead market was 431.37 MUs and 284.38 MUs respectively (Table-6 & Table-7).

II: Price of Short-term Transactions of Electricity

(i) **Price of electricity transacted through Traders:** The minimum, maximum and weighted average sale prices have been computed for the electricity transacted through traders and the sale prices were ₹3.30/kWh, ₹5.12/kWh and ₹4.10/kWh respectively (Table-3). The weighted average sale prices were also computed for the transactions during

Round the Clock (RTC), Peak and Off-peak periods separately, and the sale prices were ₹4.20/kWh, ₹4.04/kWh and ₹4.01/kWh respectively (Table-4).

(ii) Price of electricity transacted through Power Exchanges: The minimum, maximum and weighted average prices have been computed for the electricity transacted through IEX and PXIL. The minimum, maximum and weighted average prices were ₹1.10/kWh, ₹5.00/kWh and ₹2.62/kWh respectively in IEX and it were ₹1.30/kWh, ₹5.50/kWh and ₹2.72/kWh respectively in PXIL (Table-5).

The price of electricity transacted through IEX and PXIL in the term-ahead market was ₹2.96/kWh and ₹2.62/kWh respectively (Table-6 and Table-7).

(iii) Price of electricity transacted through DSM: The average deviation settlement price was ₹2.47/kWh. The minimum and maximum deviation settlement prices were ₹0.00/kWh and ₹8.00/kWh respectively (Table-8).

The prices of electricity transacted through trading licensees, power exchanges and DSM and their comparison is shown in Table-18, Figure-5 & 6.

III: Trading Margin

As per the CERC (Procedure, Terms and Conditions for grant of trading licence and other related matters) Regulations 2020, the trading licensees are allowed to charge trading margin of not less than 0 paise/kWh and upto 7 paise/kWh. The weighted average trading margin charged by the trading licensees for bilateral transactions during the month was ₹0.027/kWh.

IV: Volume of Short-term Transactions of Electricity (Regional Entity¹-Wise)

Of the total bilateral transactions, top 5 regional entities sold 47.06% of the volume, and these were Madhya Pradesh, Raipur Energen Ltd., Himachal Pradesh, Sembcorp Gayatri

¹ In case of a state, the entities which are “selling” also include generators connected to state grid and the entities which are “buying” also include open access consumers.

Power Ltd. and Gujarat. Top 5 regional entities purchased 70.48% of the volume, and these were Andhra Pradesh, Tamil Nadu, Uttar Pradesh, Delhi and Chhattisgarh (Table-9 & 10).

Of the total power exchange transactions, top 5 regional entities sold 38.24% of the volume, and these were Odisha, Teesta Stage 3 Hydro Power Project, Jammu & Kashmir, Himachal Pradesh and Gujarat. Top 5 regional entities purchased 78.39% of the volume, and these were Maharashtra, Andhra Pradesh, Gujarat, Punjab and Telangana (Table-11 & 12).

Of the total DSM transactions, top 5 regional entities under drew 22.46% of the volume, and these were Chhukha Hydroelectric Project-Bhutan, NHPC Stations, Rajasthan, Madhya Pradesh and Uttar Pradesh (Table-13). Top 5 regional entities overdrew 25.55% of the volume, and these were Uttar Pradesh, Tala Hydroelectric Project-Bhutan, Rajasthan, Maharashtra and West Bengal (Table-14).

Regional entity-wise total volume of net short-term transactions of electricity i.e. volume of net transactions through bilateral, power exchanges and DSM is shown in Table-15 & 19. Top 5 electricity selling regional entities were Himachal Pradesh, Odisha, Raipur Energen Ltd., Sembcorp Gayatri Power Ltd., and Teesta Stage 3 Hydro Power Project. Top 5 electricity purchasing regional entities were Andhra Pradesh, Maharashtra, Tamil Nadu, Punjab and Uttar Pradesh.

V: Congestion² on Inter-State Transmission Corridor for Day-Ahead Market on Power Exchanges

Power Exchanges use a price discovery mechanism in which the aggregate demand and supply are matched to arrive at an unconstrained market price and volume. This step assumes that there is no congestion in the inter-State transmission system between different regions. However, in reality, the system operator (NLDC) in coordination with RLDCs limits the flow (due to congestion) in the inter-State transmission system. In such a situation, power exchanges adopt a mechanism called “Market Splitting”³.

² “Congestion” means a situation where the demand for transmission capacity exceeds the available transfer capability

³ “Market Splitting” is a mechanism adopted by Power Exchange where the market is split in the event of transmission congestion, into predetermined (by NLDC) bid areas or zones, which are cleared individually at their respective area prices such that the energy balance in every bid area is

In the month of May 2020, congestion did not occur in IEX and PXIL. The details of congestion are shown in Table-16. The volume of electricity that could not be cleared due to congestion & other reasons and could not be transacted through power exchanges is the difference between unconstrained cleared volume and actual cleared volume.

VI: Volume and Price of Renewable Energy Certificates (RECs)

The concept of Renewable Energy Certificates (RECs) seeks to address mismatch between availability of renewable energy and the requirement of the obligated entities to meet their renewable purchase obligation by purchasing green attributes of renewable energy remotely located in the form of RECs. The REC mechanism is a market based instrument, to promote renewable sources of energy and development of electricity market.

One REC is equivalent to 1 MWh electricity injected into the grid from renewable energy sources. The REC is exchanged only in the power exchanges approved by CERC within the band of a floor price and forbearance (ceiling) price as notified by CERC from time to time. The first REC trading was held on power exchanges in May, 2011.

The details of REC transactions for the month of May, 2020 are shown in Table-20. The market clearing volume of solar RECs transacted on IEX and PXIL were 35793 and 5676 respectively and the weighted average market clearing price of these RECs was ₹ 2000/MWh in IEX and ₹ 1800/MWh in PXIL. Market clearing volume of non-solar RECs transacted on IEX and PXIL were 242714 and 49587 respectively and the weighted average market clearing price of these RECs was ₹ 1000/MWh in IEX and ₹ 1000/MWh in PXIL.

The gap between the volume of buy and sell bids of RECs placed through power exchanges shows about the variation in demand for both solar and non-solar RECs. For Solar

*reached based upon the demand and supply in individual bid areas and using the available transmission corridor capacity between various bid areas simultaneously”
As a result of this market splitting the price of electricity in the importing region, where demand for electricity is more than supply, becomes relatively higher than the price of electricity in the exporting region.*

RECs, the ratio of buy bids to sell bids was 0.44 and 0.25 in IEX and PXIL respectively. For non-solar RECs, the ratio of buy bids to sell bids was 0.08 and 0.03 in IEX and PXIL respectively.

VII: Inferences:

- The percentage of short-term transactions of electricity to total electricity generation was 11.48%.
- Of the total short-term transactions, day ahead collective transactions on power exchanges constitutes 50.53%, followed by 31.76% through bilateral (21.22% through traders and term-ahead contracts on power exchanges and 10.54% directly between distribution companies) and 17.71% through DSM
- Top 5 trading licensees had a share of 78.66% in the total volume traded by all the trading licensees.
- The Herfindahl Hirschman Index computed for the volume of electricity traded by trading licensees was 0.2552, indicating high concentration of market power.
- The weighted average price of electricity transacted through trading licensees was ₹4.10/kWh. The weighted average price of electricity transacted through IEX and PXIL were ₹2.62/kWh and ₹2.72/kWh respectively.
- The average price of electricity transacted through DSM was ₹2.47/kWh.
- The weighted average trading margin charged by the trading licensees for bilateral transactions during the month was ₹0.027/kWh. The trading margin charged during the month was in line with the Trading Margin regulations.
- Top 5 electricity selling regional entities were Himachal Pradesh, Odisha, Raipur Energen Ltd., Sembcorp Gayatri Power Ltd., and Teesta Stage 3 Hydro Power Project. Top 5 electricity purchasing regional entities were Andhra Pradesh, Maharashtra, Tamil Nadu, Punjab and Uttar Pradesh.
- During the month of May 2020, both IEX and PXIL did not witness any congestion.
- The market clearing volume of solar RECs transacted on IEX and PXIL were 35793 and 5676 respectively and the weighted average market clearing price of these RECs

was ₹2000/MWh in IEX and ₹1800/MWh in PXIL. Market clearing volume of non-solar RECs transacted on IEX and PXIL were 242714 and 49587 respectively and the weighted average market clearing price of these RECs was ₹ 1000/MWh in IEX and ₹1000/MWh in PXIL.

Table-1: VOLUME OF SHORT-TERM TRANSACTIONS OF ELECTRICITY (ALL INDIA), MAY 2020				
Sr. No	Short-term transactions	Volume (MUs)	% to Volume of short-term transactions	% to Total Generation
1	Bilateral	3517.76	31.76	3.65
	(i) Through Traders and PXs	2350.17	21.22	2.44
	(ii) Direct	1167.59	10.54	1.21
2	Through Power Exchanges	5595.97	50.53	5.80
	(i) IEX	5573.73	50.33	5.78
	(ii) PXIL	22.24	0.20	0.02
3	Through DSM	1961.39	17.71	2.03
	Total	11075.12	-	11.48
	Total Generation	96501.42	-	-

Source: NLDC & CEA Monthly Actual Generation Report- All India Summary, May 2020

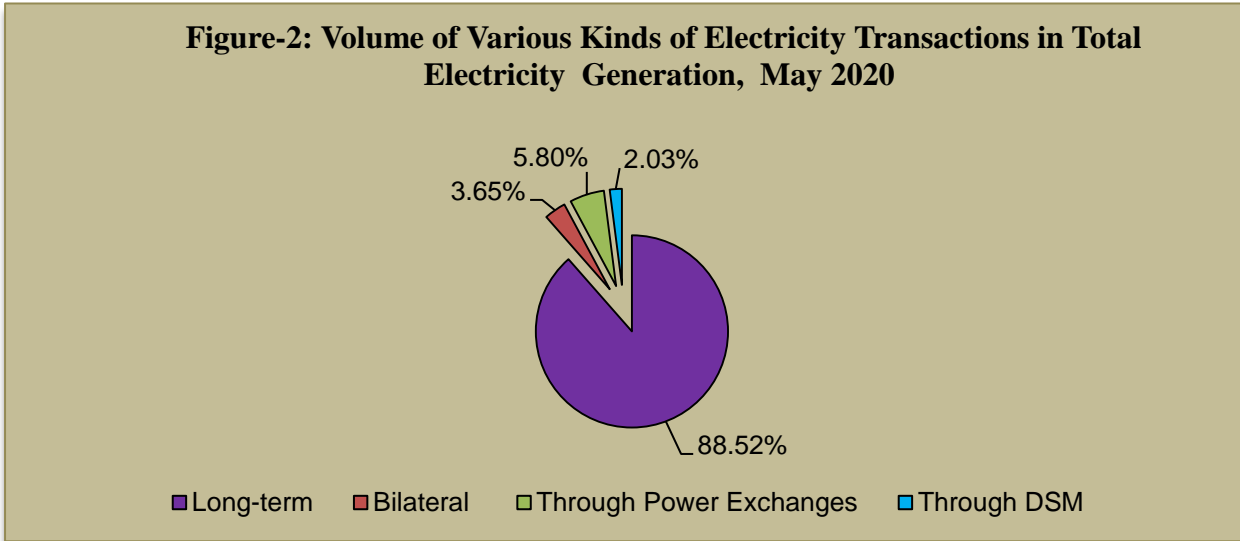
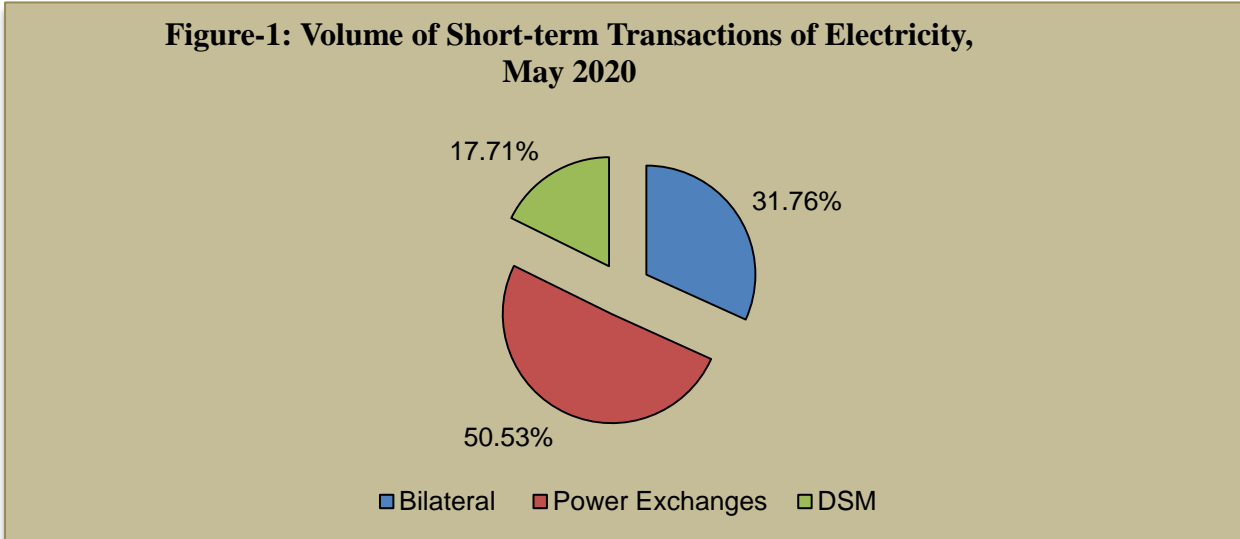


Figure-3: Volume of Short-term Transactions of Electricity, May 2020 (Day-wise)

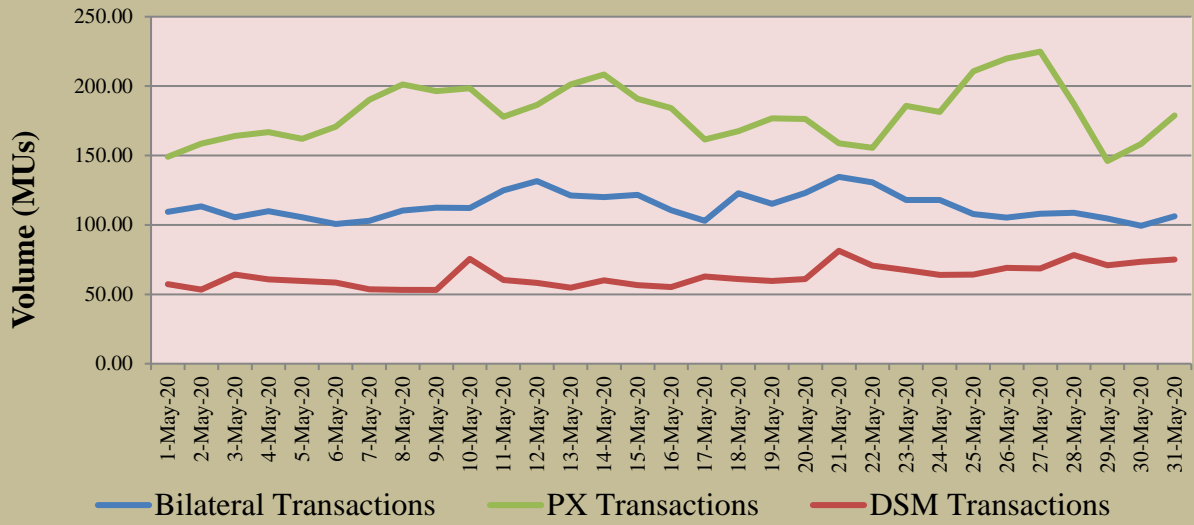


Table-2: PERCENTAGE SHARE OF ELECTRICITY TRANSACTED BY TRADING LICENSEES, MAY 2020			
Sr.No	Name of the Trading Licensee	% Share in total Volume transacted by Trading Licensees	Herfindahl-Hirschman Index
1	PTC India Ltd.	46.94	0.2204
2	Adani Enterprises Ltd.	13.13	0.0172
3	NTPC Vidyut Vyapar Nigam Ltd.	7.08	0.0050
4	Tata Power Trading Company (P) Ltd.	6.35	0.0040
5	Manikaran Power Ltd.	5.15	0.0027
6	Kreate Energy (I) Pvt. Ltd.	5.08	0.0026
7	Essar Electric Power Development Corp. Ltd.	3.20	0.0010
8	Arunachal Pradesh Power Corporation (P) Ltd	3.09	0.0010
9	GMR Energy Trading Ltd.	2.20	0.0005
10	NHPC Limited	2.01	0.0004
11	Knowledge Infrastructure Systems (P) Ltd	1.50	0.0002
12	National Energy Trading & Services Ltd.	0.89	0.0001
13	Statkraft Markets Pvt. Ltd.	0.78	0.0001
14	RPG Power Trading Company Ltd.	0.56	0.0000
15	Instinct Infra & Power Ltd.	0.55	0.0000
16	IPCL Power Trading Pvt. Ltd.	0.46	0.0000
17	JSW Power Trading Company Ltd	0.28	0.0000
18	Jaiprakash Associates Ltd.	0.26	0.0000
19	Gita Power & Infrastructure Private Limited	0.21	0.0000
20	Customized Energy Solutions India (P) Ltd.	0.11	0.0000
21	Abja Power Private Limited	0.07	0.0000
22	Phillip Commodities India (P) Ltd.	0.03	0.0000
23	Shree Cement Ltd.	0.03	0.0000
24	NLC India Ltd.	0.01	0.0000
TOTAL		100.00%	0.2552
Top 5 trading licensees		78.66%	
<i>Note 1: Volume of electricity transacted by the trading licensees includes bilateral transactions (inter-state & intra-state) and the transactions undertaken through power exchanges.</i>			
<i>Note 2: Volume of electricity transacted by Global Energy Ltd is not included.</i>			
<i>Source: Information submitted by trading licensees</i>			

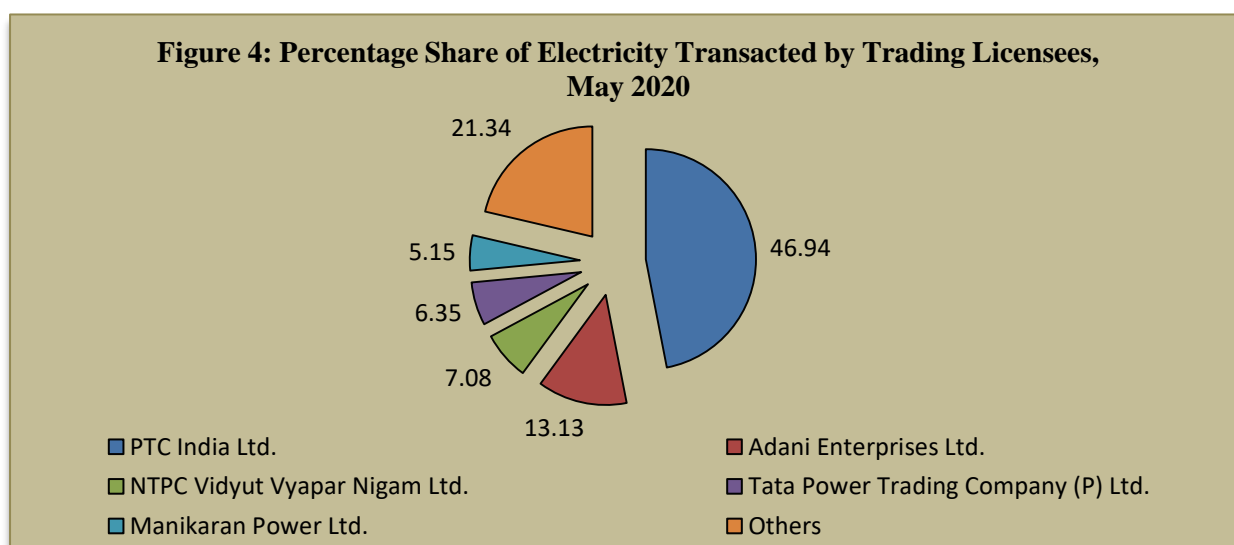


Table-3: PRICE OF ELECTRICITY TRANSACTED THROUGH TRADERS, MAY 2020		
Sr.No	Item	Sale Price of Traders (₹/kWh)
1	Minimum	3.30
2	Maximum	5.12
3	Weighted Average	4.10

Source: Information submitted by trading licensees

Table-4: PRICE OF ELECTRICITY TRANSACTED THROUGH TRADERS (TIME-WISE), MAY 2020		
Sr.No	Period of Trade	Sale Price of Traders (₹/kWh)
1	RTC	4.20
2	PEAK	4.04
3	OFF PEAK	4.01

Source: Information submitted by trading licensees

Table-5: PRICE OF ELECTRICITY TRANSACTED THROUGH POWER EXCHANGES, MAY 2020			
Sr.No	ACP	Price in IEX (₹/kWh)	Price in PXIL (₹/kWh)
1	Minimum	1.10	1.30
2	Maximum	5.00	5.50
3	Weighted Average	2.62	2.72

Source: Information submitted by IEX and PXIL

Table-6: VOLUME AND PRICE OF ELECTRICITY IN TERM AHEAD MARKET OF IEX, MAY 2020			
Sr.No	Term ahead contracts	Actual Scheduled Volume (MUs)	Weighted Average Price (₹/kWh)
1	Intra-Day Contracts	56.65	3.00
2	Day Ahead Contingency Contracts	27.32	2.79
3	Daily Contracts	204.64	3.27
4	Weekly Contracts	142.77	2.54
	Total	431.37	2.96

Source: IEX

Table-7: VOLUME AND PRICE OF ELECTRICITY IN TERM AHEAD MARKET OF PXIL, MAY 2020			
Sr.No	Term ahead contracts	Actual Scheduled Volume (MUs)	Weighted Average Price (₹/kWh)
1	Intra-Day Contracts	35.74	2.96
2	Day Ahead Contingency Contracts	0.14	2.66
3	Any Day(s) Contracts	248.50	2.57
	Total	284.38	2.62

Source: PXIL

Table-8: PRICE OF ELECTRICITY TRANSACTED THROUGH DSM, MAY 2020		
Sr.No	Item	Price in All India Grid (₹/kWh)
1	Minimum	0.00
2	Maximum	8.00
3	Average	2.47

Source: NLDC

Figure-5: Price of Short-term Transactions of Electricity, May 2020

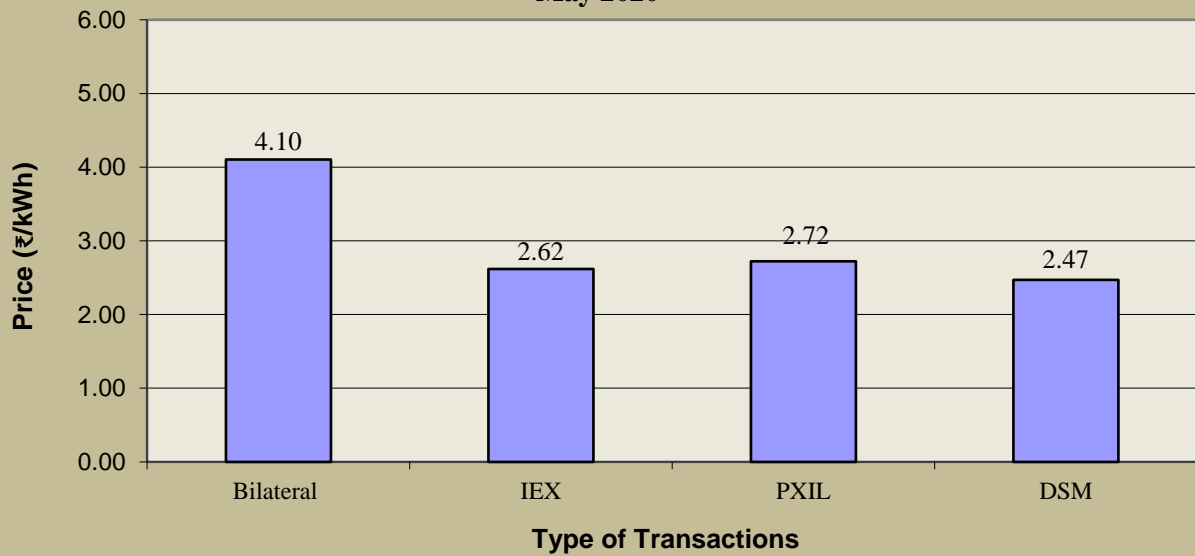
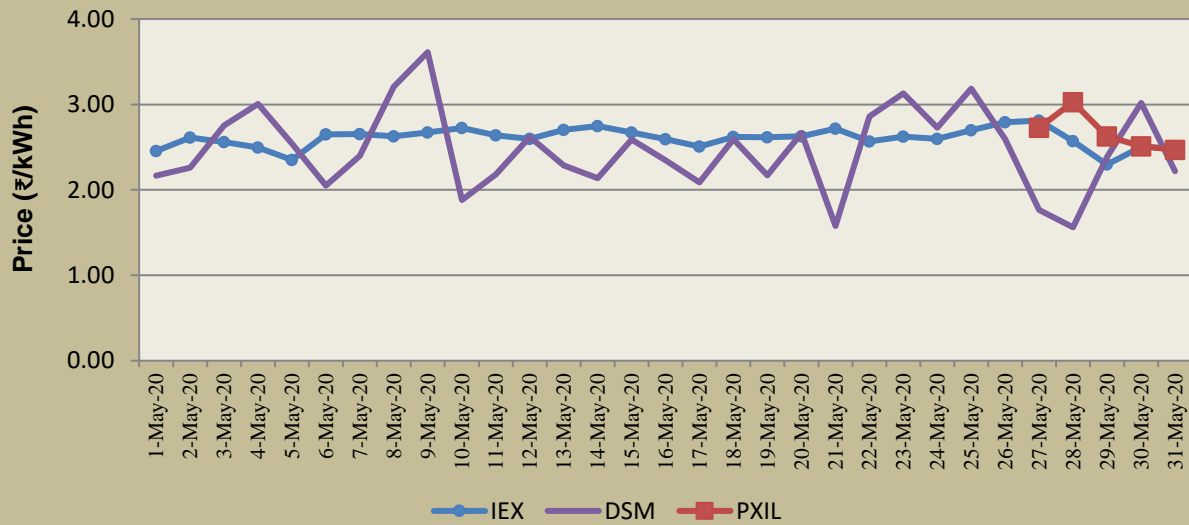


Figure-6: Price of Short-term Transactions of Electricity, May 2020 (Day-wise)



Note: In PXIL, transactions were recorded only on 27th -31st May 2020.

Table-9: VOLUME OF ELECTRICITY SOLD THROUGH BILATERAL, MAY 2020		
Name of the Entity	Volume of Sale (MUs)	% of Volume
MP	380.98	10.79
RPREL	347.69	9.85
HIMACHAL PRADESH	342.06	9.69
SEMBCORP	336.96	9.54
GUJARAT	253.87	7.19
DB POWER	175.81	4.98
ESSAR POWER	172.24	4.88
PUNJAB	151.34	4.29
ADHUNIK POWER LTD	121.88	3.45
JITPL	118.08	3.34
DGEN MEGA POWER	112.72	3.19
RAJASTHAN	108.90	3.08
IL&FS	94.71	2.68
KARNATAKA	93.99	2.66
JAYPEE NIGRIE	86.33	2.45
REGL	83.63	2.37
KSK MAHANADI	74.21	2.10
ONGC PALATANA	59.52	1.69
TAMIL NADU	51.00	1.44
J & K	50.93	1.44
DVC	36.88	1.04
WEST BENGAL	35.18	1.00
CHUZACHEN HEP	33.61	0.95
DAGACHU	33.03	0.94
SKS POWER	27.84	0.79
UTTARAKHAND	23.52	0.67
AD HYDRO	17.60	0.50
BALCO	15.81	0.45
MANIPUR	15.64	0.44
MAHARASHTRA	12.19	0.35
ODISHA	10.66	0.30
LANKO_AMK	8.73	0.25
ANDHRA PRADESH	8.67	0.25
MEGHALAYA	8.40	0.24
JINDAL POWER	6.83	0.19
SIKKIM	2.93	0.08
DIKCHU HEP	2.52	0.07
MIZORAM	2.43	0.07
NAGALAND	1.86	0.05
TEESTA STG3	1.41	0.04
TELANGANA	1.40	0.04
UTTAR PRADESH	1.35	0.04
BIHAR	1.22	0.03
ASSAM	0.89	0.03
ACBIL	0.76	0.02
NTPC STATIONS-NR	0.38	0.01
TASHIDENG HEP	0.37	0.01
JHABUA POWER_MP	0.36	0.01
JHARKHAND	0.35	0.01
NTPC STATIONS-NER	0.30	0.01
THERMAL POWERTECH	0.25	0.01
NTPC STATIONS-ER	0.13	0.004
DELHI	0.12	0.003
JORETHANG	0.08	0.002
KORBA WEST POWER	0.06	0.002
KARCHAM WANGTOO	0.04	0.001
Total	3530.64	100.00
Volume Sold by top 5 Regional Entities	1661.56	47.06

Table-10: VOLUME OF ELECTRICITY PURCHASED THROUGH BILATERAL, MAY 2020

Name of the Entity	Volume of Purchase (MUs)	% of Volume
ANDHRA PRADESH	690.28	19.65
TAMIL NADU	626.05	17.82
UTTAR PRADESH	526.96	15.00
DELHI	358.80	10.22
CHHATTISGARH	273.30	7.78
BIHAR	170.93	4.87
PUNJAB	129.01	3.67
JHARKHAND	125.18	3.56
KERALA	103.33	2.94
WEST BENGAL	94.68	2.70
HARYANA	89.65	2.55
BANGLADESH	80.63	2.30
MP	70.61	2.01
ASSAM	64.90	1.85
GOA	45.95	1.31
RAJASTHAN	18.28	0.52
MAHARASHTRA	11.03	0.31
TELANGANA	10.67	0.30
ODISHA	8.42	0.24
NEPAL(NVVN)	7.99	0.23
DVC	2.11	0.06
KARNATAKA	1.34	0.04
GUJARAT	1.13	0.03
DADRA & NAGAR HAVELI	0.67	0.02
UTTARAKHAND	0.35	0.01
MANIPUR	0.09	0.002
TOTAL	3512.33	100.00
Volume Purchased by top 5 Regional Entities	2475.39	70.48

Table-11: VOLUME OF ELECTRICITY SOLD THROUGH POWER EXCHANGES, MAY 2020

Name of the Entity	Volume of Sale (MUs)	% of Volume
ODISHA	651.27	11.64
TEESTA STG3	469.01	8.38
J & K	386.05	6.90
HIMACHAL PRADESH	382.29	6.83
GUJARAT	251.21	4.49
JAYPEE NIGRIE	249.53	4.46
CHHATTISGARH	243.13	4.34
UTTAR PRADESH	238.16	4.26
RPREL	235.58	4.21
JITPL	234.18	4.18
SEMBCORP	159.17	2.84
ASSAM	158.81	2.84
ESSAR POWER	140.06	2.50
DGEN MEGA POWER	116.95	2.09
REGL	105.86	1.89
DB POWER	99.83	1.78
UTTARAKHAND	95.50	1.71
DELHI	92.78	1.66
JINDAL STAGE-II	71.23	1.27
MB POWER	66.66	1.19
JINDAL POWER	65.60	1.17
THERMAL POWERTECH	56.68	1.01
NLC	56.48	1.01
JHARKHAND	54.71	0.98
SPECTRUM	51.83	0.93
JHABUA POWER_MP	51.11	0.91
ACBIL	50.01	0.89
KARCHAM WANGTOO	45.65	0.82
WEST BENGAL	45.32	0.81
AD HYDRO	43.09	0.77
MP	41.80	0.75
KARNATAKA	41.04	0.73
SIKKIM	39.81	0.71
BIHAR	39.42	0.70
CHANDIGARH	38.28	0.68
SAINJ HEP	36.37	0.65
MARUTI COAL	34.61	0.62
MEGHALAYA	33.24	0.59
TELANGANA	33.24	0.59
DIKCHU HEP	32.60	0.58
JORETHANG	29.07	0.52
TASHIDENG HEP	25.57	0.46
SKS POWER	24.86	0.44
GOA	19.84	0.35
ARUNACHAL PRADESH	17.39	0.31
RAJASTHAN	17.21	0.31
NTPC STATIONS-WR	16.94	0.30
TRIPURA	16.12	0.29
HARYANA	12.03	0.22

TAMIL NADU	10.43	0.19
KSMPL_SLR	10.03	0.18
ANDHRA PRADESH	9.73	0.17
DVC	7.11	0.13
DADRA & NAGAR HAVELI	6.29	0.11
CHUZACHEN HEP	5.44	0.10
KERALA	4.51	0.08
ONGC PALATANA	4.36	0.08
LANCO BUDHIL	3.51	0.06
MIZORAM	3.21	0.06
IL&FS	3.16	0.06
MANIPUR	2.06	0.04
NTPC STATIONS-ER	1.71	0.03
ADHUNIK POWER LTD	1.49	0.03
MAHARASHTRA	1.21	0.02
NTPC STATIONS-SR	1.17	0.02
BALCO	1.10	0.02
NJPC	0.69	0.01
NAGALAND	0.63	0.01
RAMPUR HEP	0.44	0.01
NTPC STATIONS-NER	0.41	0.01
DHARIWAL POWER	0.10	0.002
NTPL	0.001	0.00001
Total	5595.97	100.00
Volume sold by top 5 Regional Entities	2139.84	38.24

Table-12: VOLUME OF ELECTRICITY PURCHASED THROUGH POWER EXCHANGES, MAY 2020		
Name of the Entity	Volume of Purchase (MUs)	% of Volume
MAHARASHTRA	1366.23	24.41
ANDHRA PRADESH	1118.53	19.99
GUJARAT	818.80	14.63
PUNJAB	788.69	14.09
TELANGANA	294.50	5.26
TAMIL NADU	197.93	3.54
BIHAR	154.64	2.76
HARYANA	136.88	2.45
UTTAR PRADESH	134.26	2.40
RAJASTHAN	117.00	2.09
AMPS Hazira	89.32	1.60
DELHI	73.24	1.31
KARNATAKA	68.32	1.22
ASSAM	36.07	0.64
WEST BENGAL	35.43	0.63
KERALA	33.84	0.60
MP	25.47	0.46
ODISHA	24.45	0.44
UTTARAKHAND	23.51	0.42
HIMACHAL PRADESH	19.37	0.35
MANIPUR	12.56	0.22
MEGHALAYA	11.91	0.21
GOA	5.78	0.10
CHHATTISGARH	3.00	0.05
JHARKHAND	2.46	0.04
J & K	2.20	0.04
DADRA & NAGAR HAVELI	0.97	0.02
CHANDIGARH	0.53	0.01
DAMAN AND DIU	0.06	0.001
TOTAL	5595.97	100.00
Volume purchased by top 5 Regional Entities	4386.74	78.39

Table-13: VOLUME OF ELECTRICITY UNDER DRAWAL (EXPORTED) THROUGH DSM, MAY 2020

Name of the Entity	Volume of Under drawal (MUs)	% of Volume
CHUKHA HEP	103.24	5.35
NHPC STATIONS	99.37	5.15
RAJASTHAN	79.57	4.13
MP	76.40	3.96
UTTAR PRADESH	74.55	3.87
NTPC STATIONS-WR	74.33	3.85
PUNJAB	72.67	3.77
GUJARAT	72.02	3.73
BIHAR	59.11	3.07
TELANGANA	54.13	2.81
TAMIL NADU	53.61	2.78
WEST BENGAL	53.00	2.75
MAHARASHTRA	52.17	2.71
HARYANA	47.51	2.46
J & K	44.08	2.29
NTPC STATIONS-NR	43.99	2.28
ANDHRA PRADESH	43.18	2.24
NLC	41.76	2.17
KARNATAKA	38.90	2.02
SASAN UMPP	36.19	1.88
CHHATTISGARH	32.68	1.69
DELHI	29.08	1.51
HIMACHAL PRADESH	28.60	1.48
ODISHA	27.66	1.43
JHARKHAND	24.91	1.29
NTPC STATIONS-ER	22.15	1.15
UTTARAKHAND	21.60	1.12
KURICHU HEP	20.37	1.06
NTPC STATIONS-SR	19.64	1.02
DVC	17.69	0.92
TRIPURA	16.64	0.86
GIWEL_BHUJ	14.93	0.77
BBMB	14.74	0.76
AMPS Hazira	12.49	0.65
MANGDECHU HEP	12.03	0.62
NEEPCO STATIONS	11.58	0.60
BANGLADESH	10.27	0.53
KERALA	10.06	0.52
OSTRO	9.54	0.49
ASSAM	9.16	0.47
MEGHALAYA	8.62	0.45
NJPC	8.35	0.43
GIWEL_TCN	8.01	0.42
PONDICHERRY	7.87	0.41
MB POWER	7.69	0.40
RENEW_BHACHAU	7.64	0.40
CLEAN_SLR	7.27	0.38
RAMPUR HEP	7.17	0.37
TEESTA STG3	6.83	0.35
TEESTA HEP	6.61	0.34
GOA	6.41	0.33
ORANGE_TCN	6.37	0.33
TATA_PVGD	6.36	0.33
KARCHAM WANGTOO	6.33	0.33
ARUNACHAL PRADESH	6.14	0.32
MYTRAH_TCN	5.96	0.31

CHANDIGARH	5.84	0.30
MAITHON POWER LTD	5.65	0.29
SIKKIM	5.65	0.29
JINDAL STAGE-II	5.60	0.29
CGPL	5.45	0.28
AGEMPL BHUJ	5.11	0.27
KSK MAHANADI	5.08	0.26
INOX_BHUJ	4.94	0.26
SEMBCORP	4.65	0.24
DIKCHU HEP	4.23	0.22
ACME_SLR	3.88	0.20
BARC	3.86	0.20
RENEW_SLR_BKN	3.84	0.20
NTPC_ANTP	3.71	0.19
BRBCL,NABINAGAR	3.61	0.19
RPREL	3.54	0.18
NEPAL(NVVN)	3.42	0.18
SAINJ HEP	3.39	0.18
DGEN MEGA POWER	3.37	0.17
AZURE_SLR	3.35	0.17
TASHIDENG HEP	3.26	0.17
FORTUM2_PVGD	3.19	0.17
ESSAR POWER	3.18	0.17
THERMAL POWERTECH	3.13	0.16
LANKO_AMK	3.13	0.16
RANGANADI HEP	3.13	0.16
ACBIL	3.12	0.16
JINDAL POWER	3.00	0.16
NTPC STATIONS-NER	3.00	0.16
NAGALAND	2.97	0.15
AZURE34_SLR	2.93	0.15
TATA_SLR	2.91	0.15
MAHINDRA_RUMS	2.90	0.15
MIZORAM	2.83	0.15
MANIPUR	2.82	0.15
PARAM_PVGD	2.70	0.14
DAGACHU	2.66	0.14
ACME_RUMS	2.65	0.14
DADRA & NAGAR HAVELI	2.55	0.13
RAIL	2.47	0.13
JORETHANG	2.46	0.13
AVAADA1_PVGD	2.28	0.12
TEHRI	2.27	0.12
CHUZACHEN HEP	2.22	0.12
KOTESHWAR	2.20	0.11
ARERJL_SLR	2.09	0.11
ARINSUM_RUMS	2.08	0.11
SBG_NPK	2.07	0.11
AD HYDRO	2.06	0.11
NTPL	2.06	0.11
NAPP	2.04	0.11
JAYPEE NIGRIE	2.02	0.10
BETAM_TCN	2.00	0.10
SBG_PVGD	1.99	0.10
REGL	1.92	0.10
TATA_ANTP	1.87	0.10
SB_SLR	1.86	0.10
FORTUM1_PVGD	1.85	0.10
SKS POWER	1.83	0.09
TALA HEP	1.79	0.09
TRN ENERGY	1.70	0.09

RAP B	1.68	0.09
DB POWER	1.62	0.08
NPGC	1.54	0.08
EMCO	1.53	0.08
HVDC CHAMPA	1.48	0.08
RKM POWER	1.41	0.07
ADHUNIK POWER LTD	1.41	0.07
AZURE_PVGD	1.34	0.07
COASTGEN	1.22	0.06
ONGC PALATANA	1.19	0.06
RENEW_PVGD	1.17	0.06
JITPL	1.13	0.06
DHARIWAL POWER	1.04	0.05
FRV_NPK	0.98	0.05
AVAADA2_PVGD	0.96	0.05
AZURE_ANTP	0.95	0.05
RENEW_SLR	0.95	0.05
LANCO BUDHIL	0.90	0.05
AHSP_ANTP	0.89	0.05
ADY2_PVGD	0.89	0.05
NSPCL	0.87	0.04
ADY6_PVGD	0.80	0.04
ABSP_ANTP	0.79	0.04
MTPS II	0.79	0.04
FRV_ANTP	0.78	0.04
AKSP_ANTP	0.78	0.04
ADY1_PVGD	0.76	0.04
ADY3_PVGD	0.75	0.04
GMR KAMALANGA	0.73	0.04
RANGIT HEP	0.72	0.04
ADY13_PVGD	0.66	0.03
AKS_PVGD	0.60	0.03
KSMPL_SLR	0.54	0.03
ARS_PVGD	0.48	0.03
LOKTAK	0.47	0.02
DAMAN AND DIU	0.47	0.02
YARROW_PVGD	0.45	0.02
PARE HEP	0.44	0.02
NEP	0.41	0.02
BALCO	0.39	0.02
JHABUA POWER_MP	0.38	0.02
NETCL VALLUR	0.32	0.02
ADY10_PVGD	0.30	0.02
IL&FS	0.27	0.01
VINDHYACHAL HVDC	0.26	0.01
KREDL_PVGD	0.22	0.01
DOYANG HEP	0.21	0.01
NFF	0.18	0.01
RGPPL (DABHOL)	0.17	0.01
HVDC ALPD	0.13	0.01
HVDC PUS	0.11	0.01
HVDC RAIGARH	0.09	0.005
RAP C	0.09	0.004
BHADRAVATHI HVDC	0.07	0.004
DCPP	0.01	0.001
SHREE CEMENT	0.01	0.0004
Total	1928.40	100.00
Volume Exported by top 5 Regional Entities	433.12	22.46

Table-14: VOLUME OF ELECTRICITY OVER DRAWAL (IMPORTED) THROUGH DSM, MAY 2020		
Name of the Entity	Volume of Over drawal (MUs)	% of Volume
UTTAR PRADESH	131.70	6.60
TALA HEP	127.02	6.37
RAJASTHAN	102.01	5.12
MAHARASHTRA	75.47	3.78
WEST BENGAL	73.42	3.68
KARNATAKA	67.62	3.39
NTPC STATIONS-ER	64.11	3.21
NTPC STATIONS-WR	61.81	3.10
HARYANA	59.67	2.99
TAMIL NADU	58.15	2.92
ANDHRA PRADESH	56.22	2.82
GUJARAT	53.51	2.68
NTPC STATIONS-NR	48.42	2.43
CGPL	42.36	2.12
DVC	40.94	2.05
BIHAR	38.86	1.95
MP	32.36	1.62
NTPC STATIONS-SR	30.96	1.55
PUNJAB	30.85	1.55
TELANGANA	30.50	1.53
J & K	27.58	1.38
RPREL	25.70	1.29
HIMACHAL PRADESH	25.40	1.27
KERALA	24.47	1.23
NLC	23.69	1.19
ODISHA	23.31	1.17
JHABUA POWER_MP	21.16	1.06
ASSAM	20.27	1.02
AMPS Hazira	19.99	1.00
DELHI	18.06	0.91
GIWEL_BHUJ	17.59	0.88
UTTARAKHAND	16.66	0.84
BALCO	16.49	0.83
RGPPL (DABHOL)	15.19	0.76
JHARKHAND	13.88	0.70
GIWEL_TCN	12.82	0.64
CHHATTISGARH	12.73	0.64
TEESTA STG3	12.53	0.63
MANGDECHU HEP	12.37	0.62
NHPC STATIONS	11.88	0.60
ORANGE_TCN	11.53	0.58
REGL	11.47	0.58
RAP C	10.79	0.54
MYTRAH_TCN	10.47	0.53
NETCL VALLUR	10.05	0.50
ADHUNIK POWER LTD	9.02	0.45
NPGC	9.02	0.45
MB POWER	8.34	0.42
BANGLADESH	8.24	0.41
OSTRO	8.20	0.41
DB POWER	8.19	0.41
NAPP	8.03	0.40
THERMAL POWERTECH	8.01	0.40
RENEW_BHACHAU	7.20	0.36
NJPC	7.04	0.35
DAMAN AND DIU	7.02	0.35
DAGACHU	6.64	0.33

ESSAR POWER	6.10	0.31
JAYPEE NIGRIE	5.98	0.30
SKS POWER	5.97	0.30
AGEMPL BHUJ	5.76	0.29
IL&FS	5.62	0.28
JORETHANG	5.55	0.28
ARINSUM_RUMS	5.08	0.25
MAHINDRA_RUMS	5.05	0.25
GOA	4.85	0.24
MAITHON POWER LTD	4.77	0.24
BBMB	4.70	0.24
IGSTPS	4.68	0.23
TATA_PVGD	4.61	0.23
DADRA & NAGAR HAVELI	4.35	0.22
CHANDIGARH	4.24	0.21
AD HYDRO	4.15	0.21
KAPP 3&4	4.14	0.21
NTPL	4.14	0.21
SBG_NPK	4.03	0.20
KARCHAM WANGTOO	3.82	0.19
ACBIL	3.77	0.19
INOX_BHUJ	3.73	0.19
TRIPURA	3.72	0.19
NEPAL(NVVN)	3.68	0.18
DIKCHU HEP	3.63	0.18
ARUNACHAL PRADESH	3.61	0.18
TASHIDENG HEP	3.59	0.18
BRBCL,NABINAGAR	3.53	0.18
SBG_PVGD	3.52	0.18
BETAM_TCN	3.37	0.17
PONDICHERRY	3.35	0.17
JINDAL STAGE-II	3.32	0.17
ACME_RUMS	3.19	0.16
JITPL	3.17	0.16
SASAN UMPP	3.12	0.16
MTPS II	3.07	0.15
CLEAN_SLR	2.93	0.15
COASTGEN	2.90	0.15
NTPC STATIONS-NER	2.89	0.14
RENEW_SLR_BKN	2.71	0.14
TEHRI	2.59	0.13
MEGHALAYA	2.53	0.13
AVAADA1_PVGD	2.51	0.13
RAIL	2.50	0.13
SB_SLR	2.40	0.12
ARERJL_SLR	2.39	0.12
SEBFCORP	2.38	0.12
KSK MAHANADI	2.24	0.11
MANIPUR	2.24	0.11
SIKKIM	2.14	0.11
NSPCL	2.08	0.10
RKM POWER	2.04	0.10
AVAADA2_PVGD	1.90	0.10
EMCO	1.86	0.09
NTPC_ANTP	1.84	0.09
KOTESHWAR	1.81	0.09
FORTUM1_PVGD	1.75	0.09
DGEN MEGA POWER	1.66	0.08
CHUZACHEN HEP	1.66	0.08
PARAM_PVGD	1.64	0.08
GMR KAMALANGA	1.54	0.08

FORTUM2_PVGD	1.49	0.07
MIZORAM	1.42	0.07
ACME_SLR	1.33	0.07
AZURE_PVGD	1.28	0.06
RAP B	1.25	0.06
KURICHU HEP	1.25	0.06
JINDAL POWER	1.22	0.06
ADY2_PVGD	1.22	0.06
NEEPCO STATIONS	1.21	0.06
RAMPUR HEP	1.19	0.06
TATA_SLR	1.17	0.06
AZURE_SLR	1.16	0.06
ADY1_PVGD	1.13	0.06
YARROW_PVGD	1.12	0.06
ADY13_PVGD	1.09	0.05
ADY10_PVGD	1.04	0.05
RENEW_PVGD	1.02	0.05
KREDL_PVGD	0.99	0.05
TATA_ANTP	0.94	0.05
AKS_PVGD	0.80	0.04
AZURE34_SLR	0.79	0.04
TRN ENERGY	0.78	0.04
NEP	0.76	0.04
ARS_PVGD	0.75	0.04
RANGANADI HEP	0.75	0.04
NAGALAND	0.74	0.04
ONGC PALATANA	0.68	0.03
LANKO KONDAPALLI	0.67	0.03
SAINJ HEP	0.65	0.03
FRV_NPK	0.65	0.03
ABSP_ANTP	0.62	0.03
MEENAKSHI	0.59	0.03
FRV_ANTP	0.56	0.03
AKSP_ANTP	0.55	0.03
ADY3_PVGD	0.54	0.03
DHARIWAL POWER	0.50	0.03
AHSP_ANTP	0.50	0.03
ADY6_PVGD	0.50	0.02
RENEW_SLR	0.49	0.02
KSMPL_SLR	0.47	0.02
SIMHAPURI	0.46	0.02
LANCO BUDHIL	0.45	0.02
AZURE_ANTP	0.42	0.02
RANGIT HEP	0.41	0.02
LANKO_AMK	0.40	0.02
DOYANG HEP	0.24	0.01
LOKTAK	0.23	0.01
TEESTA HEP	0.22	0.01
PARE HEP	0.20	0.01
NFF	0.17	0.01
BHADRAVATHI HVDC	0.04	0.00
HVDC ALPD	0.04	0.00
DCPP	0.03	0.002
HVDC RAIGARH	0.03	0.001
SHREE CEMENT	0.02	0.001
HVDC PUS	0.02	0.001
CHUKHA HEP	0.001	0.00003
TOTAL	1994.39	100.00
Volume Imported by top 5 Regional Entities	509.62	25.55

Table-15: TOTAL VOLUME OF NET SHORT-TERM TRANSACTIONS OF ELECTRICITY (REGIONAL ENTITY-WISE), MAY 2020		
S. No.	Name of the Entity	Total volume of net short-term transactions of electricity*
1	ANDHRA PRADESH	1803.44
2	MAHARASHTRA	1387.15
3	TAMIL NADU	767.09
4	PUNJAB	724.54
5	UTTAR PRADESH	478.86
6	DELHI	328.13
7	GUJARAT	296.35
8	BIHAR	264.69
9	TELANGANA	246.90
10	HARYANA	226.66
11	KERALA	147.07
12	TALA HEP	125.23
13	AMPS Hazira	96.82
14	BANGLADESH	78.60
15	WEST BENGAL	70.02
16	JHARKHAND	61.55
17	NTPC STATIONS-ER	40.12
18	CGPL	36.91
19	RAJASTHAN	31.61
20	GOA	30.32
21	RGPPL (DABHOL)	15.02
22	CHHATTISGARH	13.22
23	RAP C	10.71
24	NTPC STATIONS-SR	10.15
25	NETCL VALLUR	9.72
26	NEPAL(NVVN)	8.26
27	NPGC	7.48
28	DAMAN AND DIU	6.62
29	NAPP	6.00
30	ORANGE_TCN	5.15
31	GIWEL_TCN	4.81
32	IGSTPS	4.68
33	MYTRAH_TCN	4.51
34	KAPP 3&4	4.14
35	NTPC STATIONS-NR	4.06
36	ARINSUM_RUMS	3.00
37	GIWEL_BHUJ	2.66
38	MTPS II	2.28
39	MAHINDRA_RUMS	2.15
40	NTPL	2.08
41	SBG_NPK	1.96
42	COASTGEN	1.69
43	SBG_PVGD	1.53
44	BETAM_TCN	1.37
45	NSPCL	1.22
46	AVAADA2_PVGD	0.94
47	GMR KAMALANGA	0.80
48	KREDL_PVGD	0.78
49	ADY10_PVGD	0.75
50	YARROW_PVGD	0.67
51	LANKO KONDAPALLI	0.67
52	AGEMPL BHUJ	0.65
53	RKM POWER	0.62
54	MEENAKSHI	0.59
55	ACME_RUMS	0.55
56	SB_SLR	0.53
57	SIMHAPURI	0.46
58	ADY13_PVGD	0.44

59	ADY1_PVGD	0.37
60	NEP	0.36
61	EMCO	0.33
62	ADY2_PVGD	0.33
63	MANGDECHU HEP	0.33
64	TEHRI	0.32
65	ARERJL_SLR	0.30
66	ARS_PVGD	0.27
67	AVAADA1_PVGD	0.234
68	AKS_PVGD	0.20
69	DOYANG HEP	0.03
70	RAIL	0.03
71	DCPP	0.02
72	SHREE CEMENT	0.01
73	NFF	-0.01
74	BHADRAVATHI HVDC	-0.03
75	KORBA WEST POWER	-0.06
76	AZURE_PVGD	-0.06
77	HVDC RAIGARH	-0.06
78	BRBCL,NABINAGAR	-0.09
79	HVDC ALPD	-0.09
80	HVDC PUS	-0.09
81	FORTUM1_PVGD	-0.10
82	RENEW_PVGD	-0.15
83	ABSP_ANTP	-0.17
84	ADY3_PVGD	-0.21
85	FRV_ANTP	-0.22
86	AKSP_ANTP	-0.22
87	LOKTAK	-0.23
88	PARE HEP	-0.24
89	VINDHYACHAL HVDC	-0.26
90	ADY6_PVGD	-0.30
91	RANGIT HEP	-0.31
92	FRV_NPK	-0.33
93	AHSP_ANTP	-0.39
94	KOTESHWAR	-0.39
95	RAP B	-0.43
96	RENEW_BHACHAU	-0.44
97	RENEW_SLR	-0.46
98	AZURE_ANTP	-0.53
99	DHARIWAL POWER	-0.63
100	BALCO	-0.82
101	NTPC STATIONS-NER	-0.82
102	MAITHON POWER LTD	-0.88
103	TATA_ANTP	-0.92
104	TRN ENERGY	-0.93
105	PARAM_PVGD	-1.06
106	RENEW_SLR_BKN	-1.13
107	INOX_BHUJ	-1.21
108	OSTRO	-1.33
109	HVDC CHAMPA	-1.48
110	FORTUM2_PVGD	-1.70
111	TATA_SLR	-1.74
112	TATA_PVGD	-1.75
113	NTPC_ANTP	-1.87
114	NJPC	-2.00
115	AZURE34_SLR	-2.15
116	AZURE_SLR	-2.19
117	RANGANADI HEP	-2.38
118	ACME_SLR	-2.56
119	DADRA & NAGAR HAVELI	-2.84
120	BARC	-3.86
121	LANCO BUDHIL	-3.96

122	CLEAN_SLR	-4.34
123	PONDICHERRY	-4.52
124	NAGALAND	-4.72
125	MANIPUR	-5.63
126	TEESTA HEP	-6.39
127	RAMPUR HEP	-6.43
128	MIZORAM	-7.04
129	BBMB	-10.04
130	KSMPL_SLR	-10.10
131	NEEPCO STATIONS	-10.37
132	LANKO_AMK	-11.46
133	DVC	-18.64
134	KURICHU HEP	-19.12
135	ARUNACHAL PRADESH	-19.93
136	TASHIDENG HEP	-25.60
137	JORETHANG	-26.06
138	TRIPURA	-29.03
139	DAGACHU	-29.06
140	NTPC STATIONS-WR	-29.46
141	JHABUA POWER_MP	-30.70
142	SASAN UMPP	-33.07
143	MARUTI COAL	-34.61
144	DIKCHU HEP	-35.71
145	MEGHALAYA	-35.82
146	KARNATAKA	-36.66
147	SAINJ HEP	-39.10
148	CHANDIGARH	-39.35
149	CHUZACHEN HEP	-39.61
150	SIKKIM	-46.26
151	ASSAM	-47.62
152	KARCHAM WANGTOO	-48.19
153	SKS POWER	-48.56
154	ACBIL	-50.12
155	SPECTRUM	-51.83
156	THERMAL POWERTECH	-52.06
157	AD HYDRO	-58.60
158	ONGC PALATANA	-64.39
159	MB POWER	-66.01
160	JINDAL STAGE-II	-73.52
161	JINDAL POWER	-74.21
162	NLC	-74.54
163	KSK MAHANADI	-77.05
164	NHPC STATIONS	-87.49
165	IL&FS	-92.52
166	UTTARAKHAND	-100.09
167	CHUKHA HEP	-103.24
168	ADHUNIK POWER LTD	-115.75
169	REGL	-179.94
170	DGEN MEGA POWER	-231.38
171	DB POWER	-269.06
172	ESSAR POWER	-309.38
173	JAYPEE NIGRIE	-331.90
174	JITPL	-350.21
175	MP	-370.73
176	J & K	-451.29
177	TEESTA STG3	-464.72
178	SEMBCORP	-498.41
179	RPREL	-561.11
180	ODISHA	-633.42
181	HIMACHAL PRADESH	-708.18

* Total volume of net short-term transactions of electricity includes net of transactions of electricity through bilateral, power exchange and UI

(-) indicates sale and (+) indicates purchase

Table-16: DETAILS OF CONGESTION IN POWER EXCHANGES, MAY 2020			
	Details of Congestion	IEX	PXIL
A	Unconstrained Cleared Volume (MUs)	5579.55	22.24
B	Actual Cleared Volume and hence scheduled (MUs)	5573.73	22.24
C	Volume of electricity that could not be cleared and hence not scheduled because of congestion (MUs)	0.00	0.00
D	Volume of electricity that could not be cleared and hence not scheduled because of reasons other than congestion (MUs) *	5.82	0.00
E	Volume of electricity that could not be cleared as % to Unconstrained Cleared Volume	0.10%	0.00%
F	Percentage of the time congestion occurred during the month (Number of hours congestion occurred/Total number of hours in the month)	0.00%	0.00%
G	Congestion occurrence (%) time block wise		
	0.00 - 6.00 hours	0.00%	0.00%
	6.00 - 12.00 hours	0.00%	0.00%
	12.00 - 18.00 hours	0.00%	0.00%
	18.00 - 24.00 hours	0.00%	0.00%
* This power could not be cleared due to rejection of some buy bids in Punjab bid area on 26th and 27th May 2020			
Source: IEX & PXIL & NLDC			

Table-17: VOLUME OF SHORT-TERM TRANSACTIONS OF ELECTRICITY IN INDIA (DAY-WISE) (MUs), MAY 2020

Date	Bilateral		Power Exchange (Area Clearing Volume [#] of Day Ahead Market)		Deviation Settlement (Over Drawl + Under Generation)	Total Electricity Generation (MU) as given at CEA Website*
	Through Traders and PXs**	Direct	IEX	PXIL		
1-May-20	73.02	36.36	149.11	0.00	57.18	NA
2-May-20	73.79	39.54	158.55	0.00	53.41	NA
3-May-20	66.01	39.58	164.18	0.00	64.21	NA
4-May-20	71.43	38.45	166.82	0.00	60.70	NA
5-May-20	68.15	37.38	162.05	0.00	59.61	NA
6-May-20	63.44	37.29	170.78	0.00	58.56	NA
7-May-20	66.15	36.73	190.17	0.00	53.71	NA
8-May-20	72.79	37.51	201.23	0.00	53.19	NA
9-May-20	75.06	37.47	196.33	0.00	53.24	NA
10-May-20	74.68	37.40	198.55	0.00	75.49	NA
11-May-20	87.83	37.09	177.90	0.00	60.28	NA
12-May-20	94.27	37.35	186.39	0.00	58.22	NA
13-May-20	82.40	38.77	201.31	0.00	54.81	NA
14-May-20	81.08	39.05	208.38	0.00	59.97	NA
15-May-20	82.95	38.77	190.82	0.00	56.59	NA
16-May-20	70.99	39.59	184.13	0.00	55.19	NA
17-May-20	66.44	36.59	161.58	0.00	62.83	NA
18-May-20	84.68	38.21	167.51	0.00	61.04	NA
19-May-20	78.83	36.36	176.69	0.00	59.60	NA
20-May-20	84.88	38.13	176.42	0.00	61.01	NA
21-May-20	95.14	39.47	158.83	0.00	81.37	NA
22-May-20	92.99	37.56	155.66	0.00	70.63	NA
23-May-20	81.66	36.41	185.81	0.00	67.34	NA
24-May-20	80.98	37.05	181.28	0.00	63.94	NA
25-May-20	68.57	39.32	210.68	0.00	64.13	NA
26-May-20	68.67	36.69	219.79	0.00	69.05	NA
27-May-20	70.21	37.87	220.37	4.46	68.50	NA
28-May-20	70.43	38.25	180.87	6.21	78.26	NA
29-May-20	68.03	36.50	140.41	5.63	70.84	NA
30-May-20	64.04	35.32	154.95	3.32	73.36	NA
31-May-20	70.61	35.54	176.17	2.61	75.13	NA
Total	2350.17	1167.59	5573.73	22.24	1961.39	96501.42^{\$}

Source: NLDC & CEA Monthly Actual Generation Report- All India Summary, May 2020

* Gross Electricity Generation excluding electricity generation from renewables and captive power plants.

** The volume of bilateral through PXs represents the volume through term-ahead contracts.

Area Clearing Volume represents the scheduled volume of all the bid areas.

NA – Not Available

^{\$} Actual Total Generation for the month of May 2020 as per CEA Monthly Actual Generation Report. Data of Daily Generation not available for May2020.

Table-18: PRICE OF SHORT-TERM TRANSACTIONS OF ELECTRICITY (DAY-WISE)(₹/kWh), MAY 2020									
Market Segment	Day ahead market of IEX			Day ahead market of PXIL			Under Drawl/Over Drawl from the Grid (DSM)		
Date	Mini mum ACP	Maxi mum ACP	Weighted Average Price*	Mini mum ACP	Maxi mum ACP	Weighted Average Price*	All India Grid		
							Minimu m Price	Maxi mum Price	Average Price**
1-May-20	1.10	3.18	2.45	-	-	-	0.00	5.89	2.17
2-May-20	1.80	3.25	2.61	-	-	-	0.00	5.27	2.26
3-May-20	1.99	3.50	2.56	-	-	-	0.00	7.31	2.75
4-May-20	2.00	3.16	2.50	-	-	-	0.00	8.00	3.00
5-May-20	2.06	3.10	2.35	-	-	-	0.00	8.00	2.54
6-May-20	2.08	3.50	2.65	-	-	-	0.00	7.66	2.05
7-May-20	2.10	3.47	2.65	-	-	-	0.00	5.99	2.40
8-May-20	2.12	3.43	2.63	-	-	-	0.00	7.66	3.21
9-May-20	2.11	3.50	2.67	-	-	-	0.00	8.00	3.61
10-May-20	2.10	3.50	2.72	-	-	-	0.00	8.00	1.88
11-May-20	2.12	3.45	2.64	-	-	-	0.00	5.65	2.18
12-May-20	2.00	3.20	2.60	-	-	-	0.00	7.32	2.62
13-May-20	2.08	3.50	2.70	-	-	-	0.00	5.34	2.29
14-May-20	2.06	3.58	2.75	-	-	-	0.00	5.69	2.14
15-May-20	2.00	3.51	2.67	-	-	-	0.00	8.00	2.59
16-May-20	1.60	3.00	2.59	-	-	-	0.00	5.63	2.35
17-May-20	1.10	3.01	2.51	-	-	-	0.00	8.00	2.09
18-May-20	2.00	3.45	2.62	-	-	-	0.00	6.65	2.59
19-May-20	2.00	3.65	2.62	-	-	-	0.00	6.64	2.17
20-May-20	2.00	4.00	2.63	-	-	-	0.00	6.99	2.66
21-May-20	2.30	4.16	2.72	-	-	-	0.00	6.67	1.58
22-May-20	1.50	4.11	2.57	-	-	-	0.00	8.00	2.86
23-May-20	2.00	4.11	2.62	-	-	-	0.00	8.00	3.13
24-May-20	1.31	4.43	2.60	-	-	-	0.00	5.61	2.73
25-May-20	1.60	4.75	2.70	-	-	-	0.00	8.00	3.19
26-May-20	1.50	4.69	2.79	-	-	-	0.00	8.00	2.59
27-May-20	1.50	5.00	2.81	1.30	4.00	2.73	0.00	6.36	1.77
28-May-20	1.50	3.47	2.57	2.16	5.50	3.03	0.00	6.97	1.56
29-May-20	1.50	2.74	2.30	2.00	3.75	2.63	0.00	8.00	2.38
30-May-20	1.50	3.20	2.51	1.85	2.85	2.51	0.00	8.00	3.02
31-May-20	1.20	3.00	2.49	2.17	2.66	2.47	0.00	7.31	2.22
	1.10#	5.00#	2.62	1.30#	5.50#	2.72	0.00#	8.00#	2.47

Source: Data on price of PX transactions from IEX and PXIL and data on DSM Price from NLDC.

** Weighted average price computed based on Area Clearing Volume (ACV) and Area Clearing Price (ACP) for each hour of the day. Here, ACV and ACP represent the scheduled volume and weighted average price of all the bid areas of power exchanges.*

*** Simple average price of DSM of 96 time blocks of 15 minutes each in a day. DSM price includes Ceiling DSM Rate +40% additional DSM charge.*

Maximum/Minimum in the month

Table-19: VOLUME OF SHORT-TERM TRANSACTIONS OF ELECTRICITY (REGIONAL ENTITY*-WISE) (MUs), MAY 2020

Name of the Entity	Through Bilateral			Through Power Exchange			Through DSM with Regional Grid			Total Net***
	Sale	Purchase	Net**	Sale	Purchase	Net**	Import (Over Draw)	Export (Under Draw)	Net**	
PUNJAB	151.34	129.01	-22.33	0.00	788.69	788.69	30.85	72.67	-41.82	724.54
HARYANA	0.00	89.65	89.65	12.03	136.88	124.85	59.67	47.51	12.16	226.66
RAJASTHAN	108.90	18.28	-90.62	17.21	117.00	99.79	102.01	79.57	22.44	31.61
DELHI	0.12	358.80	358.68	92.78	73.24	-19.54	18.06	29.08	-11.02	328.13
U P	1.35	526.96	525.61	238.16	134.26	-103.90	131.70	74.55	57.15	478.86
UTTARAKHAND	23.52	0.35	-23.17	95.50	23.51	-71.98	16.66	21.60	-4.94	-100.09
HIMACHAL P	342.06	0.00	-342.06	382.29	19.37	-362.92	25.40	28.60	-3.19	-708.18
J & K	50.93	0.00	-50.93	386.05	2.20	-383.85	27.58	44.08	-16.51	-451.29
CHANDIGARH	0.00	0.00	0.00	38.28	0.53	-37.75	4.24	5.84	-1.60	-39.35
MP	380.98	70.61	-310.37	41.80	25.47	-16.33	32.36	76.40	-44.04	-370.73
MAHARASHTRA	12.19	11.03	-1.16	1.21	1366.23	1365.02	75.47	52.17	23.30	1387.15
GUJARAT	253.87	1.13	-252.74	251.21	818.80	567.59	53.51	72.02	-18.50	296.35
CHHATTISGARH	0.00	273.30	273.30	243.13	3.00	-240.13	12.73	32.68	-19.95	13.22
GOA	0.00	45.95	45.95	19.84	5.78	-14.07	4.85	6.41	-1.56	30.32
DAMAN AND DIU	0.00	0.00	0.00	0.00	0.06	0.06	7.02	0.47	6.56	6.62
DADRA & NAGAR H	0.00	0.67	0.67	6.29	0.97	-5.31	4.35	2.55	1.81	-2.84
ANDHRA P	8.67	690.28	681.61	9.73	1118.53	1108.80	56.22	43.18	13.04	1803.44
KARNATAKA	93.99	1.34	-92.65	41.04	68.32	27.28	67.62	38.90	28.72	-36.66
KERALA	0.00	103.33	103.33	4.51	33.84	29.33	24.47	10.06	14.41	147.07
TAMIL NADU	51.00	626.05	575.05	10.43	197.93	187.50	58.15	53.61	4.54	767.09
PONDICHERY	0.00	0.00	0.00	0.00	0.00	0.00	3.35	7.87	-4.52	-4.52
TELANGANA	1.40	10.67	9.27	33.24	294.50	261.26	30.50	54.13	-23.63	246.90
WEST BENGAL	35.18	94.68	59.50	45.32	35.43	-9.90	73.42	53.00	20.42	70.02
ODISHA	10.66	8.42	-2.24	651.27	24.45	-626.83	23.31	27.66	-4.36	-633.42
BIHAR	1.22	170.93	169.72	39.42	154.64	115.22	38.86	59.11	-20.25	264.69
JHARKHAND	0.35	125.18	124.83	54.71	2.46	-52.25	13.88	24.91	-11.04	61.55
SIKKIM	2.93	0.00	-2.93	39.81	0.00	-39.81	2.14	5.65	-3.52	-46.26
DVC	36.88	2.11	-34.77	7.11	0.00	-7.11	40.94	17.69	23.24	-18.64
ARUNACHAL P	0.00	0.00	0.00	17.39	0.00	-17.39	3.61	6.14	-2.53	-19.93
ASSAM	0.89	64.90	64.01	158.81	36.07	-122.74	20.27	9.16	11.11	-47.62
MANIPUR	15.64	0.09	-15.55	2.06	12.56	10.50	2.24	2.82	-0.58	-5.63
MEGHALAYA	8.40	0.00	-8.40	33.24	11.91	-21.33	2.53	8.62	-6.10	-35.82
MIZORAM	2.43	0.00	-2.43	3.21	0.00	-3.21	1.42	2.83	-1.41	-7.04
NAGALAND	1.86	0.00	-1.86	0.63	0.00	-0.63	0.74	2.97	-2.23	-4.72
TRIPURA	0.00	0.00	0.00	16.12	0.00	-16.12	3.72	16.64	-12.92	-29.03
NTPC STNS-NR	0.38	0.00	-0.38	0.00	0.00	0.00	48.42	43.99	4.44	4.06
NHPC STNS	0.00	0.00	0.00	0.00	0.00	0.00	11.88	99.37	-87.49	-87.49
NFF	0.00	0.00	0.00	0.00	0.00	0.00	0.17	0.18	-0.01	-0.01
RAIL	0.00	0.00	0.00	0.00	0.00	0.00	2.50	2.47	0.03	0.03
NEP	0.00	0.00	0.00	0.00	0.00	0.00	0.76	0.41	0.36	0.36
NAPP	0.00	0.00	0.00	0.00	0.00	0.00	8.03	2.04	6.00	6.00
RAP B	0.00	0.00	0.00	0.00	0.00	0.00	1.25	1.68	-0.43	-0.43
NJPC	0.00	0.00	0.00	0.69	0.00	-0.69	7.04	8.35	-1.31	-2.00
TEHRI	0.00	0.00	0.00	0.00	0.00	0.00	2.59	2.27	0.32	0.32
BBMB	0.00	0.00	0.00	0.00	0.00	0.00	4.70	14.74	-10.04	-10.04
RAP C	0.00	0.00	0.00	0.00	0.00	0.00	10.79	0.09	10.71	10.71
AD HYDRO	17.60	0.00	-17.60	43.09	0.00	-43.09	4.15	2.06	2.09	-58.60
IGSTPS	0.00	0.00	0.00	0.00	0.00	0.00	4.68	0.00	4.68	4.68
KOTESHWAR	0.00	0.00	0.00	0.00	0.00	0.00	1.81	2.20	-0.39	-0.39
KARCHAM WANGT	0.04	0.00	-0.04	45.65	0.00	-45.65	3.82	6.33	-2.51	-48.19
SHREE CEMENT	0.00	0.00	0.00	0.00	0.00	0.00	0.02	0.01	0.01	0.01
LANCO BUDHIL	0.00	0.00	0.00	3.51	0.00	-3.51	0.45	0.90	-0.45	-3.96
RAMPUR HEP	0.00	0.00	0.00	0.44	0.00	-0.44	1.19	7.17	-5.99	-6.43
SAINJ HEP	0.00	0.00	0.00	36.37	0.00	-36.37	0.65	3.39	-2.74	-39.10
RENEW_SLR	0.00	0.00	0.00	0.00	0.00	0.00	0.49	0.95	-0.46	-0.46
AZURE_SLR	0.00	0.00	0.00	0.00	0.00	0.00	1.16	3.35	-2.19	-2.19
SB_SLR	0.00	0.00	0.00	0.00	0.00	0.00	2.40	1.86	0.53	0.53

ACME_SLR	0.00	0.00	0.00	0.00	0.00	0.00	1.33	3.88	-2.56	-2.56
AZURE34_SLR	0.00	0.00	0.00	0.00	0.00	0.00	0.79	2.93	-2.15	-2.15
TATA_SLR	0.00	0.00	0.00	0.00	0.00	0.00	1.17	2.91	-1.74	-1.74
RENEW_SLR_BKN	0.00	0.00	0.00	0.00	0.00	0.00	2.71	3.84	-1.13	-1.13
CLEAN_SLR	0.00	0.00	0.00	0.00	0.00	0.00	2.93	7.27	-4.34	-4.34
ARERJL_SLR	0.00	0.00	0.00	0.00	0.00	0.00	2.39	2.09	0.30	0.30
KSMPL_SLR	0.00	0.00	0.00	10.03	0.00	-10.03	0.47	0.54	-0.07	-10.10
NTPC STNS-WR	0.00	0.00	0.00	16.94	0.00	-16.94	61.81	74.33	-12.52	-29.46
BHADRAVATHI HVI	0.00	0.00	0.00	0.00	0.00	0.00	0.04	0.07	-0.03	-0.03
VINDHYACHAL HVI	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.26	-0.26	-0.26
JINDAL POWER	6.83	0.00	-6.83	65.60	0.00	-65.60	1.22	3.00	-1.78	-74.21
LANKO_AMK	8.73	0.00	-8.73	0.00	0.00	0.00	0.40	3.13	-2.73	-11.46
NSPCL	0.00	0.00	0.00	0.00	0.00	0.00	2.08	0.87	1.22	1.22
ACBIL	0.76	0.00	-0.76	50.01	0.00	-50.01	3.77	3.12	0.65	-50.12
BALCO	15.81	0.00	-15.81	1.10	0.00	-1.10	16.49	0.39	16.10	-0.82
RGPL (DABHOL)	0.00	0.00	0.00	0.00	0.00	0.00	15.19	0.17	15.02	15.02
CGPL	0.00	0.00	0.00	0.00	0.00	0.00	42.36	5.45	36.91	36.91
DCPP	0.00	0.00	0.00	0.00	0.00	0.00	0.03	0.01	0.02	0.02
EMCO	0.00	0.00	0.00	0.00	0.00	0.00	1.86	1.53	0.33	0.33
KSK MAHANADI	74.21	0.00	-74.21	0.00	0.00	0.00	2.24	5.08	-2.83	-77.05
ESSAR POWER	172.24	0.00	-172.24	140.06	0.00	-140.06	6.10	3.18	2.92	-309.38
JINDAL STAGE-II	0.00	0.00	0.00	71.23	0.00	-71.23	3.32	5.60	-2.28	-73.52
DB POWER	175.81	0.00	-175.81	99.83	0.00	-99.83	8.19	1.62	6.58	-269.06
DHARIWAL POWER	0.00	0.00	0.00	0.10	0.00	-0.10	0.50	1.04	-0.54	-0.63
JAYPEE NIGRIE	86.33	0.00	-86.33	249.53	0.00	-249.53	5.98	2.02	3.96	-331.90
DGEN MEGA POWER	112.72	0.00	-112.72	116.95	0.00	-116.95	1.66	3.37	-1.71	-231.38
KORBA WEST POWER	0.06	0.00	-0.06	0.00	0.00	0.00	0.00	0.00	0.00	-0.06
MB POWER	0.00	0.00	0.00	66.66	0.00	-66.66	8.34	7.69	0.65	-66.01
MARUTI COAL	0.00	0.00	0.00	34.61	0.00	-34.61	0.00	0.00	0.00	-34.61
SPECTRUM	0.00	0.00	0.00	51.83	0.00	-51.83	0.00	0.00	0.00	-51.83
JHABUA POWER_M	0.36	0.00	-0.36	51.11	0.00	-51.11	21.16	0.38	20.77	-30.70
SASAN UMPP	0.00	0.00	0.00	0.00	0.00	0.00	3.12	36.19	-33.07	-33.07
TRN ENERGY	0.00	0.00	0.00	0.00	0.00	0.00	0.78	1.70	-0.93	-0.93
RKM POWER	0.00	0.00	0.00	0.00	0.00	0.00	2.04	1.41	0.62	0.62
SKS POWER	27.84	0.00	-27.84	24.86	0.00	-24.86	5.97	1.83	4.14	-48.56
BARC	0.00	0.00	0.00	0.00	0.00	0.00	0.00	3.86	-3.86	-3.86
KAPP 3&4	0.00	0.00	0.00	0.00	0.00	0.00	4.14	0.00	4.14	4.14
HVDC CHAMPA	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.48	-1.48	-1.48
MAHINDRA_RUMS	0.00	0.00	0.00	0.00	0.00	0.00	5.05	2.90	2.15	2.15
ARINSUM_RUMS	0.00	0.00	0.00	0.00	0.00	0.00	5.08	2.08	3.00	3.00
OSTRO	0.00	0.00	0.00	0.00	0.00	0.00	8.20	9.54	-1.33	-1.33
ACME_RUMS	0.00	0.00	0.00	0.00	0.00	0.00	3.19	2.65	0.55	0.55
RENEW_BHACHAU	0.00	0.00	0.00	0.00	0.00	0.00	7.20	7.64	-0.44	-0.44
GIWEL_BHUJ	0.00	0.00	0.00	0.00	0.00	0.00	17.59	14.93	2.66	2.66
INOX_BHUJ	0.00	0.00	0.00	0.00	0.00	0.00	3.73	4.94	-1.21	-1.21
AGEMPL BHUJ	0.00	0.00	0.00	0.00	0.00	0.00	5.76	5.11	0.65	0.65
REGL	83.63	0.00	-83.63	105.86	0.00	-105.86	11.47	1.92	9.55	-179.94
RPREL	347.69	0.00	-347.69	235.58	0.00	-235.58	25.70	3.54	22.16	-561.11
AMPS Hazira	0.00	0.00	0.00	0.00	89.32	89.32	19.99	12.49	7.50	96.82
HVDC RAIGARH	0.00	0.00	0.00	0.00	0.00	0.00	0.03	0.09	-0.06	-0.06
NTPC STNS-SR	0.00	0.00	0.00	1.17	0.00	-1.17	30.96	19.64	11.32	10.15
LANKO KONDAPALI	0.00	0.00	0.00	0.00	0.00	0.00	0.67	0.00	0.67	0.67
SIMHAPURI	0.00	0.00	0.00	0.00	0.00	0.00	0.46	0.00	0.46	0.46
MEENAKSHI	0.00	0.00	0.00	0.00	0.00	0.00	0.59	0.00	0.59	0.59
COASTGEN	0.00	0.00	0.00	0.00	0.00	0.00	2.90	1.22	1.69	1.69
THERMAL POWERTE	0.25	0.00	-0.25	56.68	0.00	-56.68	8.01	3.13	4.87	-52.06
IL&FS	94.71	0.00	-94.71	3.16	0.00	-3.16	5.62	0.27	5.36	-92.52
NLC	0.00	0.00	0.00	56.48	0.00	-56.48	23.69	41.76	-18.07	-74.54
SEMBCORP	336.96	0.00	-336.96	159.17	0.00	-159.17	2.38	4.65	-2.28	-498.41
NETCL VALLUR	0.00	0.00	0.00	0.00	0.00	0.00	10.05	0.32	9.72	9.72
NTPL	0.00	0.00	0.00	0.00	0.00	0.00	4.14	2.06	2.08	2.08
AHSP_ANTP	0.00	0.00	0.00	0.00	0.00	0.00	0.50	0.89	-0.39	-0.39
AKSP_ANTP	0.00	0.00	0.00	0.00	0.00	0.00	0.55	0.78	-0.22	-0.22
ABSP_ANTP	0.00	0.00	0.00	0.00	0.00	0.00	0.62	0.79	-0.17	-0.17
AZURE_ANTP	0.00	0.00	0.00	0.00	0.00	0.00	0.42	0.95	-0.53	-0.53

TATA_ANTP	0.00	0.00	0.00	0.00	0.00	0.00	0.94	1.87	-0.92	-0.92
FRV_ANTP	0.00	0.00	0.00	0.00	0.00	0.00	0.56	0.78	-0.22	-0.22
NTPC_ANTP	0.00	0.00	0.00	0.00	0.00	0.00	1.84	3.71	-1.87	-1.87
GIWEL_TCN	0.00	0.00	0.00	0.00	0.00	0.00	12.82	8.01	4.81	4.81
MYTRAH_TCN	0.00	0.00	0.00	0.00	0.00	0.00	10.47	5.96	4.51	4.51
FRV_NPK	0.00	0.00	0.00	0.00	0.00	0.00	0.65	0.98	-0.333	-0.333
ORANGE_TCN	0.00	0.00	0.00	0.00	0.00	0.00	11.53	6.37	5.15	5.15
BETAM_TCN	0.00	0.00	0.00	0.00	0.00	0.00	3.37	2.00	1.37	1.37
SBG_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	3.52	1.99	1.53	1.53
SBG_NPK	0.00	0.00	0.00	0.00	0.00	0.00	4.03	2.07	1.96	1.96
FORTUM1_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	1.75	1.85	-0.10	-0.10
PARAM_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	1.64	2.70	-1.06	-1.06
YARROW_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	1.12	0.45	0.67	0.67
TATA_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	4.61	6.36	-1.75	-1.75
RENEW_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	1.02	1.17	-0.15	-0.15
AKS_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	0.80	0.60	0.20	0.20
ARS_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	0.75	0.48	0.27	0.27
AVAADA1_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	2.51	2.28	0.23	0.23
ADY1_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	1.13	0.76	0.37	0.37
ADY2_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	1.22	0.89	0.33	0.33
ADY13_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	1.09	0.66	0.44	0.44
ADY3_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	0.54	0.75	-0.21	-0.21
ADY6_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	0.50	0.80	-0.30	-0.30
ADY10_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	1.04	0.30	0.75	0.75
AZURE_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	1.28	1.34	-0.06	-0.06
FORTUM2_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	1.49	3.19	-1.70	-1.70
AVAADA2_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	1.90	0.96	0.94	0.94
KREDL_PVGD	0.00	0.00	0.00	0.00	0.00	0.00	0.99	0.22	0.78	0.78
NTPC STNS-ER	0.13	0.00	-0.13	1.71	0.00	-1.71	64.11	22.15	41.96	40.12
MAITHON POWER I	0.00	0.00	0.00	0.00	0.00	0.00	4.77	5.65	-0.88	-0.88
NPGC	0.00	0.00	0.00	0.00	0.00	0.00	9.02	1.54	7.48	7.48
ADHUNIK POWER I	121.88	0.00	-121.88	1.49	0.00	-1.49	9.02	1.41	7.62	-115.75
CHUZACHEN HEP	33.61	0.00	-33.61	5.44	0.00	-5.44	1.66	2.22	-0.56	-39.61
RANGIT HEP	0.00	0.00	0.00	0.00	0.00	0.00	0.41	0.72	-0.31	-0.31
GMR KAMALANGA	0.00	0.00	0.00	0.00	0.00	0.00	1.54	0.73	0.80	0.80
JITPL	118.08	0.00	-118.08	234.18	0.00	-234.18	3.17	1.13	2.04	-350.21
TEESTA HEP	0.00	0.00	0.00	0.00	0.00	0.00	0.22	6.61	-6.39	-6.39
DAGACHU	33.03	0.00	-33.03	0.00	0.00	0.00	6.64	2.66	3.97	-29.06
JORETHANG	0.08	0.00	-0.08	29.07	0.00	-29.07	5.55	2.46	3.10	-26.06
NEPAL(NVVN)	0.00	7.99	7.99	0.00	0.00	0.00	3.68	3.42	0.26	8.26
BANGLADESH	0.00	80.63	80.63	0.00	0.00	0.00	8.24	10.27	-2.03	78.60
HVDC PUS	0.00	0.00	0.00	0.00	0.00	0.00	0.02	0.11	-0.09	-0.09
TEESTA STG3	1.41	0.00	-1.41	469.01	0.00	-469.01	12.53	6.83	5.70	-464.72
DIKCHU HEP	2.52	0.00	-2.52	32.60	0.00	-32.60	3.63	4.23	-0.60	-35.71
HVDC ALPD	0.00	0.00	0.00	0.00	0.00	0.00	0.04	0.13	-0.09	-0.09
TASHIDENG HEP	0.37	0.00	-0.37	25.57	0.00	-25.57	3.59	3.26	0.33	-25.60
BRBCL,NABINAGA	0.00	0.00	0.00	0.00	0.00	0.00	3.53	3.61	-0.09	-0.09
MTPS II	0.00	0.00	0.00	0.00	0.00	0.00	3.07	0.79	2.28	2.28
TALA HEP	0.00	0.00	0.00	0.00	0.00	0.00	127.02	1.79	125.23	125.23
CHUKHA HEP	0.00	0.00	0.00	0.00	0.00	0.00	0.00	103.24	-103.24	-103.24
KURICHU HEP	0.00	0.00	0.00	0.00	0.00	0.00	1.25	20.37	-19.12	-19.12
MANGDECHU HEP	0.00	0.00	0.00	0.00	0.00	0.00	12.37	12.03	0.33	0.33
NTPC STNS-NER	0.30	0.00	-0.30	0.41	0.00	-0.41	2.89	3.00	-0.12	-0.82
NEEPCO STNS	0.00	0.00	0.00	0.00	0.00	0.00	1.21	11.58	-10.37	-10.37
RANGANADI HEP	0.00	0.00	0.00	0.00	0.00	0.00	0.75	3.13	-2.38	-2.38
DOYANG HEP	0.00	0.00	0.00	0.00	0.00	0.00	0.24	0.21	0.03	0.03
ONGC PALATANA	59.52	0.00	-59.52	4.36	0.00	-4.36	0.68	1.19	-0.51	-64.39
LOKTAK	0.00	0.00	0.00	0.00	0.00	0.00	0.23	0.47	-0.23	-0.23
PARE HEP	0.00	0.00	0.00	0.00	0.00	0.00	0.20	0.44	-0.24	-0.24
Source: NLDC										
* in case of a state, the entities which are "selling" also include generators connected to state grid and the entities which are "buying" also include open access consumers.										
** (-) indicates sale and (+) indicates purchase.										
*** Total net includes net of transactions through bilateral, power exchange and DSM										

Table-20 : VOLUME AND PRICE OF RENEWABLE ENERGY CERTIFICATES (RECs) TRANSACTED THROUGH POWER EXCHANGES, MAY 2020					
Sr. No.	Details of REC Transactions	IEX		PXIL	
		Solar	Non-Solar	Solar	Non Solar
A	Volume of Buy Bid	41415	242714	5676	49587
B	Volume of Sell Bid	93298	3017326	22622	1588256
C	Ratio of Buy Bid to Sell Bid Volume	0.44	0.08	0.25	0.03
D	Market Clearing Volume (MWh)	35793	242714	5676	49587
E	Weighted average Market Clearing Price (₹/MWh)	2000	1000	1800	1000

Source: IEX and PXIL

Note 1: 1 REC = 1 MWh

Note 2:

<i>Forbearance and Floor Price w.e.f 1st April 2017</i>		
Type of REC	Floor Price (₹/MWh)	Forbearance Price (₹/MWh)
<i>Solar</i>	<i>1000.00</i>	<i>2400.00</i>
<i>Non-Solar</i>	<i>1000.00</i>	<i>3000.00</i>