

INDIA'S POWER CONSUMPTION INCREASES AS LOCK DOWN EASES

*Prepared by K Asokan (Director, InSDES, Shoranur
&
P Subhash (InSDES, Shoranur)*

The daily average power consumption in India touched 3200 Million Units during the 3rd stage of the lock down which ended on 17th May 2020, compared to 3522 MU prior to the lock down period in the third week of March 2020. The fall in consumption during the third stage is 9% only. The power consumption fell 22% during the 1st stage and 18% during 2nd stage of lock down declared to check the spread of COVID-19 pandemic in our country. The lock down was prevailing with effect from 25/03/2020. The first stage ended on 14th April 2020 and 2nd stage ended on 3rd May 2020. The increase in power consumption during second and third stages of lock down is mainly due to the relaxations of lock down conditions.

REGION WISE CONSUMPTION

A comparison of Region wise and All India level Power Consumption before lock down and during various stages of Lock down are given in the Table below

Table-1

COVID-19 LOCK DOWN : REGION WISE DAILY AVERAGE ELECTRICITY CONSUMPTION IN INDIA BEFORE LOCK DOWN & DURING VARIOUS STAGES OF LOCK DOWN (in MU)							
REGIONS	BEFORE LOCK DOWN	1 st STAGE LOCK DOWN	2 nd STAGE LOCK DOWN	3 rd STAGE LOCK DOWN	% DIFFERENCE IN EACH STAGE		
	15/03/2020 to 21/03/2020	25/03/2020 to 14/04/2020	15/04/2020 to 03/05/2020	04/05/2020 to 17/05/2020	1 st STAGE	2 nd STAGE	3 rd STAGE
NORTHERN REGION	830.3	658.1	773.9	888.9	-20.7	-6.8	+7.1
WESTERN REGION	1156.6	849.0	956.9	1012.2	-26.6	-17.3	-12.5
SOUTHERN REGION	1125	865.9	827.6	894.1	-23.0	-26.4	-20.5
EASTERN REGION	368.4	337.0	302.8	364.6	-8.5	-17.8	-1.0
NORTH-EASTERN REGION	41.8	34.6	32.0	39.9	-17.3	-23.4	-4.6
ALL INDIA	3522.1	2744.6	2892.9	3199.8	-22.1	-17.9	-9.2

Source : InSDES compilation of data available at [https://www.posoco.in/Reports/Daily reports](https://www.posoco.in/Reports/Daily%20reports)

Of the 5 regions in the country, the maximum reduction of 26.6% in power consumption was experienced in Western Region during the 1st Stage of lock down

followed by Southern Region (23%), Northern Region (20.7%), North-Eastern Region (17.3%) and Eastern Region (8.5%). At the end of the 3rd stage of lock down the Power Consumption in Northern Region, which includes the states of Punjab, Rajasthan, Uttar Pradesh, Delhi, Haryana, Himachal Pradesh and Uttarakhand, is up by 7% than the Consumption prior to the lock down period. Power consumption in Southern region fell 20.5% during this period compared to the pre lock down period. The Consumption in other regions, even though lesser than pre lock down period, have improved considerably during the third stage of lock down compared to the other 2 stages.

CONSUMPTION OF 10 TOP ELECTRICITY CONSUMING STATES.

The daily average Electricity Consumption in Uttar Pradesh was higher than the consumption prior to lock down during all three stages of lock down. During the 3rd stage the consumption was 20% higher than the pre lock down period. This may be due to the fact that the total share of consumption of Domestic, Tube wells (Pvt. & Public), Public Water works, Street lights, Lift Irrigation categories that are not affected by lock down is nearly 65% in this state. (Source : InSDES compilation of Data available at uperc.org/orders/tariff orders. Truing up order of FY 2017-18). The increase in ambient temperature in the months of April & May 2020 compared to March 2020 may be another reason. Electricity Consumption in Punjab also increased by 16.4% during the third phase of lock down. Punjab experienced a slump of 29.8% during 1st stage and 12.7% during 2nd stage of lock down in electricity consumption.

Electricity consumption of 10 top consuming states is given in Table below.

Table-2

COVID-19 LOCK DOWN : DAILY AVERAGE ELECTRICITY CONSUMPTION OF 10 TOP CONSUMING STATES IN INDIA BEFORE LOCK DOWN & DURING VARIOUS STAGES OF LOCK DOWN (in MU)							
STATE	BEFORE LOCK DOWN	1 st STAGE LOCK DOWN	2 nd STAGE LOCK DOWN	3 rd STAGE LOCK DOWN	% DIFFERENCE IN EACH STAGE		
	15/03/2020 to 21/03/2020	25/03/2020 to 14/04/2020	15/04/2020 to 03/05/2020	04/05/2020 to 17/05/2020	1 st STAGE	2 nd STAGE	3 rd STAGE
MAHARASHTRA	480.2	368.7	403.0	416.5	-23.2	-16.1	-13.3
GUJRATH	349.9	230.8	278.3	302.0	-34.1	-20.5	-13.7
UTTAR PRADESH	244.8	245.6	275.1	294.1	+0.4	+12.4	+20.1
TAMIL NADU	339.5	240.3	247.2	288.8	-29.2	-27.2	-14.9
RAJASTHAN	210.0	146.3	175.1	203.5	-30.3	-16.6	-3.1
MADHYA PRADESH	199.8	163.7	184.2	190.9	-18.1	-7.8	-4.5
KARNATAKA	251.7	208.7	200.9	203.8	-17.1	-20.2	-19.1
TELENGANA	242.9	186.7	143.5	147.3	-23.1	-40.9	-39.3
ANDHRA PRADESH	199.9	158.3	161.4	176.3	-20.8	-19.3	-11.8
PUNJAB	99.8	70.1	87.1	116.1	-29.8	-12.7	+16.4

Source : InSDES compilation of data available at <https://www.posoco.in/Reports/Daily reports>

Power consumption in all other 8 states are still below the prior lock down consumption.

In Telengana, the power consumption fell 39.3% during third stage. The reduction in consumption during 1st and 2nd stages were 23.1% and 40.9% respectively. This may be due to the fact that the state has not allowed any partial relaxation of lock down that the centre has announced from 20th April 2020. The state had also extended the 2nd stage lock down up to 7th May (instead of 3rd May) and 3rd stage up to 29th May (instead of 17th May). The power consumption in Tamil Nadu, Karnataka and Andhra Pradesh during 3rd stage of lock down were reduced by 14.9%, 19.1% and 11.8% respectively compared to the consumption before lock down.

CONSUMPTION IN KERALA

The daily average power consumption in Kerala during the period from 15th March to 21st March 2020 (Before lock down) was 82.5 Million Units. The average power consumption during the 3rd stage of lock down in Kerala was 70.9 MU which is 14.1% lower compare to the pre-lock down consumption. The details of power consumption in Kerala is given below.

Table-3

COVID-19 LOCK DOWN : DAILY AVERAGE ELECTRICITY CONSUMPTION OF KERALA STATE BEFORE LOCK DOWN & DURING VARIOUS STAGES OF LOCK DOWN (in MU)							
STATE	BEFORE LOCK DOWN	1 st STAGE LOCK DOWN	2 nd STAGE LOCK DOWN	3 rd STAGE LOCK DOWN	% DIFFERENCE IN EACH STAGE		
	15/03/2020 to 21/03/2020	25/03/2020 to 14/04/2020	15/04/2020 to 03/05/2020	04/05/2020 to 17/05/2020	1 st STAGE	2 nd STAGE	3 rd STAGE
KERALA	82.5	67.4	69.1	70.9	-18.3	-16.3	-14.1

Source : InSDES compilation of data available at :[http:// www.sldckerala.com/System Statitics/Generation](http://www.sldckerala.com/System%20Statistics/Generation)
