

**F. No. 3-1/ 2018-19-CFCC-ES**  
**GOVERNMENT OF INDIA**  
**MINISTRY OF AGRICULTURE AND FARMERS WELFARE**  
**DEPARTMENT OF AGRICULTURE, COOPERATION AND FARMERS WELFARE**  
**(CROP FORECAST COORDINATION CENTRE)**

Room No. 443  
Krishi Bhawan, New Delhi  
Dated: 04.06.2019

**SUBJECT: MINUTES OF THE MEETING OF THE CROP WEATHER WATCH GROUP HELD ON 31.05.2019.**

The weekly meeting of the Crop Weather Watch Group (CWWG) was held on 31.05.2019 under the Chairmanship of Principal Adviser, DAC&FW. The agenda included discussion on weather conditions, progress in crop sowing, availability of inputs, pest situation, prices and procurement position. Salient aspects covered in the meeting are given below.

**Summary observations of the Group on Agenda Items**

- *In the pre monsoon season, at All-India level, the rainfall during the week i.e. 23<sup>rd</sup> May, 2019 – 29<sup>th</sup> May, 2019 has been 24% lower than Long Period Average (LPA). Rainfall in the four broad geographical divisions of the country during the above period have been lower than LPA by 63% in Central India, by 39% in South Peninsula, by 13% in East & North East India and by 1% in North West India.*
- *The cumulative rainfall in the country during the pre monsoon season i.e. 01<sup>st</sup> March, 2019 to 29<sup>th</sup> May, 2019 has been 24% lower than Long Period Average (LPA). Rainfall in the four broad geographical divisions of the country during the above period have been lower than LPA by 48% in South Peninsula, 29% in North West India, 17% in Central India and 12% in East & North East India.*
- *For pre monsoon season 01.03.2019 to 29.05.2019 out of 36 met sub-divisions, 4 met sub-divisions constituting 15% of the total area of the country has received large excess/excess rainfall, 8 met sub-divisions constituting 24% of the total area of the country has received normal rainfall, 24 met sub-divisions constituting 61% of the total area of the country has received deficient/large deficient rainfall.*
- *Central Water Commission monitors 91 major reservoirs in the country which have total live capacity of 161.99 Billion Cubic Meter (BCM) at Full Reservoir Level (FRL). Out of these, 76 reservoirs with FRL capacity of 120.44 BCM have irrigation potential. Live storage in the 91 major reservoirs as on 30<sup>th</sup> May, 2019 has been 31.65 BCM as against 27.78 BCM on 30.05.2018 (last year) and 30.74 BCM of normal (average of the last 10 years) storage. Current year's storage is 114% of last year's storage and nearly 103% of average of last 10 year's storage.*
- *All-India progressive procurement of Rice as on 31.05.2019 for 2018-19 was at 421.98 lakh tonnes against the procurement of 352.74 lakh tonnes in the corresponding period of last year. The procurement of wheat for the Rabi Marketing Season (RMS) 2019-20 was 335.36 lakh tonnes against the procurement of 338.36 lakh tonnes in the corresponding period of RMS 2018-19.*

# 1. Pre Monsoon Season (March – May) during the week ending 29<sup>th</sup> May, 2019

## ➤ Sub-Division wise Weekly Rainfall Forecast is shown in Table-1.1

- **Rainfall during the week (23<sup>rd</sup> May, 2019 to 29<sup>th</sup> May, 2019)** Rainfall was large excess/excess in 3 met sub-divisions, normal in 4 met sub-divisions, deficient/large deficient in 25 sub-divisions and no rain in 4 met sub-divisions out of 36 meteorological sub-divisions.
- **Cumulative rainfall (01<sup>st</sup> March, 2019 to 29<sup>th</sup> May, 2019)** Rainfall was large excess/excess in 4 met sub-divisions, normal in 8 met sub-divisions, deficient/large deficient in 24 sub-divisions out of 36 meteorological sub-divisions.

**Table - 1.2: Weekly and Cumulative Rainfall in four regions of the country<sup>1</sup>**

Region	Week Ending (29.05.2019)				Cumulative (01.03.19 to 29.05.19)			
	(in mm)		Devi- ation (%)	Cate- gory	(in mm)		Devi- ation (%)	Cate- gory
	Actual	Normal			Actual	Normal		
North-West India	6.9	7.0	-1	N	78.0	109.5	-29	D
Central India	2.2	5.8	-63	LD	31.7	38.0	-17	N
South Peninsular India	12.3	20.2	-39	D	61.8	118.3	-48	D
East & North-East India	41.4	47.6	-13	N	312.5	356.4	-12	N
Country as a whole	11.9	15.7	-24	D	96.6	126.6	-24	D

LE: Large Excess, E: Excess, N: Normal, D: Deficient, LD: Large Deficient, NR: No Rain.

Source: India Meteorological Department, New Delhi

**Table -1.3: Category wise comparative distribution of Sub-division (cumulative rainfall) and All-India Percentage Rainfall Departure for the last five years since: 1<sup>st</sup> March, 2019 to 29<sup>th</sup> May, 2019**

No. of Sub-Divisions with rainfall	For the period from 1 <sup>st</sup> March to					
	28 MAY 2014	27 MAY 2015	31 MAY 2016	31 MAY 2017	30 MAY 2018	29 MAY 2019
Large Excess	-	-	-	02	03	01
Excess	16	28	08	03	03	03
Normal	11	06	16	13	13	08
<b>Total</b>	<b>27</b>	<b>34</b>	<b>24</b>	<b>18</b>	<b>19</b>	<b>12</b>
Deficient	08	02	09	15	12	14
Large Deficient	-	-	-	03	05	10
Scanty	01	00	03	-	-	-
No rain	00	00	00	00	00	00
<b>Total</b>	<b>09</b>	<b>02</b>	<b>12</b>	<b>18</b>	<b>17</b>	<b>24</b>
Data Inadequate	00	00	00	00	00	00
<b>TOTAL</b>	<b>36</b>	<b>36</b>	<b>36</b>	<b>36</b>	<b>36</b>	<b>36</b>
<b>All-India % Rainfall Deviation</b>	<b>0%</b>	<b>42%</b>	<b>0%</b>	<b>(-) 2%</b>	<b>(-) 10%</b>	<b>(-) 24%</b>

Source: IMD

- Sub-division-wise 5 days rainfall forecast from 31<sup>st</sup> May, 2019 to 04<sup>th</sup> June, 2019 is shown in Table 1.4

1. North-west India - Uttar Pradesh, Rajasthan, Haryana, Chandigarh and Delhi, Punjab, Uttarakhand, Himachal Pradesh, and Jammu and Kashmir.

Central India - Madhya Pradesh, Chhattisgarh, Maharashtra, Odisha, Goa and Gujarat.

South Peninsula - Andhra Pradesh & Telangana, Karnataka, Tamil Nadu & Puducherry, Kerala, A & N islands and Lakshadweep.

East & North East India - Bihar, Jharkhand, West Bengal, Sikkim, Assam, Arunachal Pradesh, Meghalaya, Nagaland, Manipur, Mizoram and Tripura.

**Table: 1.1**

Source: IMD

<b>METEOROLOGICAL SUB-DIVISIONWISE WEEKLY RAINFALL FORECAST &amp; Wx. WARNINGS-2019</b>								
<b>Sr. No</b>	<b>MET.SUB-DIVISIONS</b>	<b>30 MAY</b>	<b>31 MAY</b>	<b>01 JUN</b>	<b>02 JUN</b>	<b>03 JUN</b>	<b>04 JUN</b>	<b>05 JUN</b>
1	ANDAMAN & NICO.ISLANDS	WS*	WS*	WS	FWS	FWS	SCT	SCT
2	ARUNACHAL PRADESH	FWS*	SCT	SCT	FWS	FWS	SCT	SCT
3	ASSAM & MEGHALAYA	FWS* <sup>§</sup>	FWS*	FWS*	WS**	WS*	FWS <sup>§</sup>	FWS* <sup>§</sup>
4	NAGA.MANI.MIZO.& TRIPURA	SCT <sup>§</sup>	FWS	FWS*	WS*	WS**	WS* <sup>§</sup>	WS** <sup>§</sup>
5	SUB-HIM.W. BENG. & SIKKIM	FWS*	FWS*	FWS*	SCT	SCT	SCT	SCT
6	GANGETIC WEST BENGAL	ISOL <sup>§</sup>	ISOL <sup>§</sup>	ISOL	SCT <sup>§</sup>	SCT <sup>§</sup>	FWS* <sup>§</sup>	WS* <sup>§</sup>
7	ODISHA	ISOL <sup>§</sup>	ISOL <sup>§</sup>	ISOL <sup>§</sup>	ISOL <sup>§</sup>	ISOL <sup>§</sup>	ISOL	ISOL
8	JHARKHAND	ISOL <sup>§</sup> ⚡	ISOL <sup>§</sup> ⚡	ISOL <sup>§</sup> ⚡	SCT <sup>§</sup>	SCT <sup>§</sup>	SCT	ISOL
9	BIHAR	ISOL ⚡	ISOL ⚡	SCT <sup>§</sup>	SCT <sup>§</sup>	ISOL <sup>§</sup>	ISOL	ISOL
10	EAST UTTAR PRADESH	D ⚡	D ⚡	ISOL <sup>DS/TS</sup> ⚡	ISOL <sup>§</sup> DS/TS	ISOL <sup>§</sup> DS/TS	ISOL	D ⚡
11	WEST UTTAR PRADESH	D ⚡	D ⚡	D <sup>DS/TS</sup> ⚡	ISOL <sup>§</sup> DS/TS	ISOL <sup>§</sup> DS/TS	D ⚡	D ⚡
12	UTTARAKHAND	D ⚡	D ⚡	ISOL	SCT <sup>§</sup> #	FWS <sup>§</sup> #	D	D
13	HARYANA CHD. & DELHI	D ⚡	D ⚡	D ⚡	ISOL <sup>§</sup> DS/TS ⚡	ISOL <sup>§</sup> DS/TS	D	D
14	PUNJAB	D ⚡	D ⚡	D ⚡	D ⚡	ISOL ⚡	D ⚡	D
15	HIMACHAL PRADESH	D ⚡	D ⚡	ISOL	ISOL <sup>§</sup> #	FWS <sup>§</sup> #	ISOL	D
16	JAMMU & KASHMIR	D ⚡	ISOL ⚡	ISOL	SCT <sup>§</sup>	FWS <sup>§</sup>	SCT <sup>§</sup>	ISOL
17	WEST RAJASTHAN	ISOL <sup>§</sup> ⚡	D ⚡	D ⚡	D ⚡	D ⚡	D ⚡	D ⚡
18	EAST RAJASTHAN	ISOL <sup>§</sup> ⚡	ISOL ⚡	D ⚡	D ⚡	D ⚡	D ⚡	D ⚡
19	WEST MADHYA PRADESH	ISOL <sup>§</sup> ⚡	ISOL ⚡	D ⚡	D ⚡	D ⚡	D ⚡	D ⚡
20	EAST MADHYA PRADESH	ISOL ⚡	ISOL ⚡	D ⚡	D ⚡	D ⚡	D ⚡	D ⚡
21	GUJARAT REGION D.D. & N.H.	D ⚡	D	D	D	D	D	D
22	SAURASTRA KUTCH & DIU	D ⚡	D	D	D	D	D	D
23	KONKAN & GOA	D	D	ISOL	ISOL	ISOL	D	D
24	MADHYA MAHARASHTRA	D ⚡	D ⚡	ISOL	ISOL	ISOL	ISOL	D
25	MARATHAWADA	D ⚡	D ⚡	ISOL ⚡	ISOL	ISOL	ISOL ⚡	ISOL
26	VIDARBHA	ISOL <sup>§</sup> ⚡	D ⚡	D ⚡	ISOL ⚡	ISOL <sup>§</sup> ⚡	ISOL ⚡	ISOL ⚡
27	CHHATTISGARH	SCT <sup>§</sup>	ISOL <sup>§</sup>	ISOL <sup>§</sup>	ISOL	ISOL	ISOL <sup>§</sup> ⚡	D ⚡
28	COASTAL ANDHRA PRADESH	SCT <sup>§</sup>	ISOL <sup>§</sup>	ISOL <sup>§</sup>	ISOL	ISOL	ISOL <sup>§</sup>	ISOL <sup>§</sup>
29	TELANGANA	ISOL <sup>§</sup> ⚡	ISOL <sup>§</sup> ⚡	ISOL ⚡	ISOL ⚡	ISOL	ISOL <sup>§</sup> ⚡	SCT <sup>§</sup> ⚡
30	RAYALASEEMA	ISOL <sup>§</sup>	ISOL <sup>§</sup>	SCT* <sup>§</sup>	SCT	ISOL	SCT <sup>§</sup>	ISOL <sup>§</sup>
31	TAMILNADU & PUDUCHERRY	ISOL* <sup>§</sup> ⚡	ISOL <sup>§</sup>	ISOL <sup>§</sup>	ISOL	ISOL	FWS* <sup>§</sup>	SCT <sup>§</sup>
32	COASTAL KARNATAKA	D	D	ISOL	ISOL	ISOL	D	ISOL
33	NORTH INT.KARNATAKA	D ⚡	D ⚡	ISOL	ISOL	ISOL	ISOL <sup>§</sup>	ISOL <sup>§</sup>
34	SOUTH INT.KARNATAKA	SCT <sup>§</sup> ⚡	FWS* <sup>§</sup>	FWS* <sup>§</sup>	SCT	SCT	SCT <sup>§</sup>	ISOL <sup>§</sup>
35	KERALA	SCT* <sup>§</sup>	SCT* <sup>§</sup>	SCT <sup>§</sup>	SCT	SCT	SCT <sup>§</sup>	SCT <sup>§</sup>
36	LAKSHADWEEP	SCT <sup>§</sup>	SCT <sup>§</sup>	SCT	SCT	SCT	WS <sup>§</sup>	WS <sup>§</sup>

<b>LEGENDS:</b>			
<b>WS</b>	WIDE SPREAD / MOST PLACES (76-100%)	<b>FWS</b>	FAIRLY WIDE SPREAD / MANY PLACES (51% to 75%)
<b>SCT</b>	SCATTERED / FEW PLACES (26% to 50%)	<b>ISOL</b>	ISOLATED (up to 25%)
			<b>D/DRY</b> <b>NIL RAINFALL</b>
* Heavy Rainfall (64.5-115.5 mm)		** Heavy to Very Heavy Rainfall (115.6-204.4 mm)	
*** Extremely Heavy Rainfall (204.5 mm or more)			
• FOG	* SNOWFALL	# HAILSTORM	⚡ HEAT WAVE (+4.5°C to +6.4°C)
			⚡ SEVERE HEAT WAVE (> +6.4)
§ THUNDERSTORM WITH SQUALL/GUSTY WIND	DS/TS DUST/THUNDERSTORM	⚡ COLD WAVE (-4.5°C to -6.4°C)	⚡ SEVERE COLD WAVE (< -6.4)

**Table: 1.4**

Met-Sub-Division	31-May Today	01Jun Sat	02Jun Sun	03Jun Mon	04Jun Tue
1. Andaman & Nicobar Islands	WS	WS	FWS	FWS	FWS
2. Arunachal Pradesh	SCT	SCT	FWS	FWS	FWS
3. Assam & Meghalaya	FWS	FWS	WS	WS	WS
4. N. M. M. & T.	FWS	FWS	WS	WS	WS
5. S.H. West Bengal & Sikkim	FWS	FWS	SCT	SCT	SCT
6. Gangetic West Bengal	ISOL	ISOL	SCT	SCT	SCT
7. Odisha	ISOL	ISOL	ISOL	ISOL	DRY
8. Jharkhand	ISOL	ISOL	SCT	SCT	SCT
9. Bihar	ISOL	SCT	SCT	ISOL	ISOL
10. East Uttar Pradesh	DRY	ISOL	ISOL	ISOL	ISOL
11. West Uttar Pradesh	DRY	DRY	ISOL	ISOL	ISOL
12. Uttarakhand	DRY	ISOL	SCT	FWS	SCT
13. Haryana, Chd & Delhi	DRY	DRY	ISOL	ISOL	ISOL
14. Punjab	DRY	DRY	DRY	ISOL	ISOL
15. Himachal Pradesh	DRY	ISOL	ISOL	FWS	SCT
16. Jammu & Kashmir	ISOL	ISOL	SCT	FWS	FWS
17. West Rajasthan	DRY	DRY	DRY	DRY	DRY
18. East Rajasthan	ISOL	DRY	DRY	DRY	DRY
19. West Madhya Pradesh	ISOL	DRY	DRY	DRY	DRY
20. East Madhya Pradesh	ISOL	DRY	DRY	DRY	DRY
21. Gujarat Region	DRY	DRY	DRY	DRY	DRY
22. Saurashtra & Kutch	DRY	DRY	DRY	DRY	DRY
23. Konkan & Goa	DRY	ISOL	ISOL	ISOL	ISOL
24. Madhya Maharashtra	DRY	ISOL	ISOL	ISOL	DRY
25. Marathawada	DRY	ISOL	ISOL	ISOL	DRY
26. Vidharbha	DRY	DRY	ISOL	ISOL	DRY
27. Chhattisgarh	ISOL	ISOL	ISOL	ISOL	DRY
28. Coastal Andhra Pradesh	ISOL	ISOL	ISOL	ISOL	ISOL
29. Telangana	ISOL	ISOL	ISOL	ISOL	ISOL
30. Rayalaseema	ISOL	SCT	SCT	ISOL	ISOL
31. Tamilnadu & Puducherry	ISOL	ISOL	ISOL	ISOL	SCT
32. Coastal Karnataka	DRY	ISOL	ISOL	ISOL	ISOL
33. North Interior Karnataka	DRY	ISOL	ISOL	ISOL	ISOL
34. South Interior Karnataka	FWS	FWS	SCT	SCT	ISOL
35. Kerala	SCT	SCT	SCT	SCT	SCT
36. Lakshadweep	SCT	SCT	SCT	SCT	SCT

% Station Reporting Rainfall			
% Stations	Category	% Stations	Category
76-100	Widespread (WS/Most Places)	26-50	Scattered (SCT/ A Few Places)
51-75	Fairly Widespread (FWS/ Many Places)	1-25	Isolated (ISOL)
No Rain	Dry		

Source: IMD

## 2. Reservoir Status (For the week ending on 30.05.2019)

- **The Central Water Commission** monitors the live storage capacity of **91** important/major reservoirs, having capacity at Full Reservoir Level (FRL) of **161.99** Billion Cubic Meters (BCM), which is about 63% of total reservoir capacity of 257.81 BCM in the country.
- Live Storage in 91 major reservoirs decreased to 31.65 BCM from the previous week's level of 33.56 BCM. Current year's storage position is higher than the last year's storage position of 27.78 BCM and the average of last 10 year's storage position of 30.74 BCM.

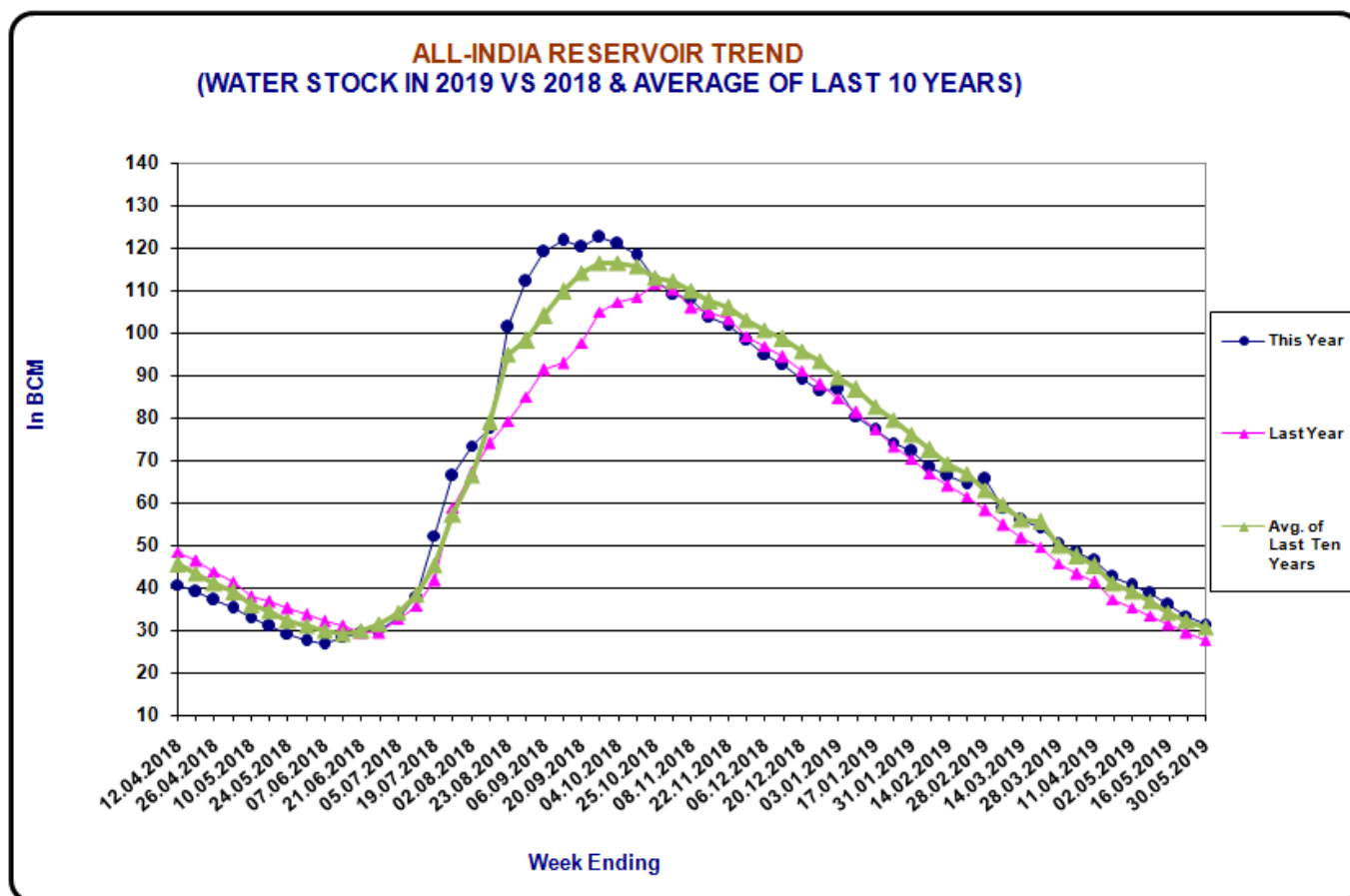
**Table – 2.1 : For 91 major reservoirs of the country**

Period	Storage as % of FRL	Storage as % of last year	Storage as % of 10 year's average level
Current Week	20	114	103
Last Week	21	114	104

The percentage to live capacity at FRL was 17% on 30/05/2018, 21% on 30/05/2017, 17% on 26/05/2016 and 27% on 28/05/2015.

Source: CWC

There were 41 reservoirs having storage more than 80% of normal storage, 23 reservoirs having storage between 51% to 80%, 8 reservoirs having storage between 31% to 50% and 19 reservoirs having storage upto 30% of Normal Storage out of these 7 reservoirs having no live storage.



Source: Central Water Commission

### 3. Fertilizer Position:

**Table – 3.1: Requirement, Receipt, Availability, Sales and Stock position of Major Fertilizers UREA, DAP, MOP, Complex and SSP during Kharif 2018-19 (As on 31.05.2019)**

*(in '000 tonnes)*

Availability/Sale/Closing Stock	Urea	DAP	MOP	Complex	SSP
<b>Opening Stock as on 01.04.2019</b>	<b>613</b>	<b>833</b>	<b>265</b>	<b>1281</b>	<b>128</b>
<b>Requirement for Kharif 2019</b>	<b>15672</b>	<b>5121</b>	<b>2038</b>	<b>5296</b>	<b>2505</b>
Estimated Requirement during May 2019	2300	802	281	650	356
Cumulative Receipt upto 31.05.2019	4000	1770	432	1245	555
Cumulative Availability upto 31.05.2019	4613	2603	697	2526	683
Cumulative Sales upto 31.05.2019	3291	900	267	655	472
Closing Stock as on 31.05.2019	1322	1703	430	1871	211

Source: Fertilizer Division (DAC&FW) / Deptt. of Fertilizer

### 4. Pest & Diseases:

- Incidence of Fall army worm reported at low to moderate intensity on maize crop in Imphal West, Imphal East, Kangpokpi, Thoubal, Bishnupur, Noney, Tamenglong districts of Manipur state, Dimapur, Kohima & Peren districts of Nagaland state and moderate to severe intensity reported in East Garo Hills district of Meghalaya state.
- Overall intensity of pests and diseases remained below Economic Threshold Level (ETL).
- No shortage of Chemical / Bio-pesticides was reported from any State / UT.

### 5. **Availability position of seeds and fertilizers has been found satisfactory.**

## 6. Progressive procurement of Rice as on 31.05.2019

Table: 6.1

(lakh tonnes)

State	Target in marketing season 2018-19 (Oct. – Sept.)	Progressive Procurement as on 31.05.2019	
		In Marketing season 2018-2019	In Marketing season 2017-2018
Andhra Pradesh	52.54	40.51	36.50
Telangana	45.00	50.80	34.71
Bihar	8.00	9.28	7.93
Chhattisgarh	40.00	40.80	32.07
Haryana	39.75	39.41	39.92
Jharkhand	2.50	1.53	1.43
Kerala	3.70	4.56	3.21
Madhya Pradesh	13.00	13.95	11.00
Maharashtra	5.50	4.44	1.64
Odisha	37.00	36.59	28.18
Punjab	114.00	113.34	118.39
Tamil Nadu	14.80	11.65	7.66
Uttar Pradesh	33.00	32.33	28.75
Uttrakhand	5.00	4.62	0.38
West Bengal	31.00	17.11	0.44
All-India	448.04	421.98	352.74