

All India Coordinated Research Project on Agrometeorology

CRIDA, Santoshnagar, Hyderabad – 500 059

Daily Crop Weather Information as on 16 January 2020

Attention: Rajiv Maheshwari, OSD, ICAR

Significant Weather Features (IMD)

- The Western Disturbance as a cyclonic circulation lies over central Pakistan & neighbourhood and extends upto 5.8 km above mean sea level with a trough aloft with its axis at 7.6 km above mean sea level runs roughly along longitude 71°E to the north of latitude 23°N. Under its influence, scattered to fairly widespread rain/snow over Jammu & Kashmir & Himachal Pradesh and fairly widespread to widespread rain/snow with isolated thunderstorm accompanied with lightning & hail over Uttarakhand during next 48 hours. Isolated heavy falls also likely over Uttarakhand during next 24 hours.
- Scattered to fairly widespread rain/thunderstorm very likely over Haryana, Chandigarh & Delhi, Uttar Pradesh and isolated to scattered over Punjab & Madhya Pradesh during next 48 hours and over Rajasthan during next 24 hours. Isolated thunderstorm accompanied with lightning & hail also very likely over Haryana, Chandigarh, Uttar Pradesh & East Rajasthan during next 24 hours.
- A fresh Western Disturbance likely to affect Western Himalayan Region and plains of northwest India from 17th night and another one from 20th January.
- The images showing the latest satellite picture in figure. 1.

Main Weather Observations (IMD)

- Rain/Thunder showers observed (from 0830 hours IST of yesterday to 0830 hours IST of today): at most places over Jammu & Kashmir and West Uttar Pradesh; at many places over ; at a few places over West Madhya Pradesh and East Uttar Pradesh and at isolated places over East Rajasthan, East Uttar Pradesh, Delhi and Lakshadweep.
- Dense to Very Dense Fog observed in many pockets over Punjab; in isolated pockets over North Rajasthan and Coastal Odisha; Dense fog in isolated pockets over Jammu & Kashmir, Himachal Pradesh, Haryana and West Madhya Pradesh; Moderate to Dense Fog in isolated pockets over East Uttar Pradesh and Interior Odisha at 0830 hour IST of today.
- Visibility recorded at 0830 hours IST of today (200 m or less): Amritsar, Ludhiana, Ganganagar and Chandbali-25m; Chandigarh, Ambala, Patiala, Karnal, Bhopal

and Paradip-50 each; Shajapur, Sultanpur, Angul, Bhubaneswar and Puri-200 each.

- Yesterday, Cold Day conditions were observed in some pockets over West Rajasthan.
- Maximum Temperature Departures as on 15-01-2020: Maximum temperatures were appreciably above normal (3.1°C to 5.0°C) at a few places over East Madhya Pradesh, Jharkhand and Assam & Meghalaya; at isolated places over Himachal Pradesh, Vidarbha and Odisha; above normal (1.6°C to 3.0°C) at many places over Lakshadweep; at a few places over Kerala & Mahe and Tamil Nadu, Puducherry & Karaikal; at isolated places over Madhya Maharashtra and South Interior Karnataka. They were markedly below normal (- 5.1°C or less) at many places over West Rajasthan; appreciably below normal (-3.1°C to -5.0°C) at most places over Punjab and Saurashtra & Kutch; at many places over Haryana, Chandigarh, Jammu & Kashmir and Gujarat Region; at a few places over West Madhya Pradesh; at isolated places over West Uttar Pradesh, Bihar and Gangetic West Bengal; below normal (-1.6°C to -3.0°C) at most places over East Rajasthan; at many places over East Uttar Pradesh and Konkan & Goa; at isolated places over Sub-Himalayan West Bengal & Sikkim and near normal over rest parts of the country. Yesterday, The highest maximum temperature of 34.9°C was recorded at Cannur (Kerala).
- Minimum Temperature Departures as on 16-01-2020: Minimum temperatures are markedly above normal (5.1°C or more) at many places over West Madhya Pradesh; at a few places over East Rajasthan and at isolated places over East Madhya Pradesh; appreciably above normal (3.6°C TO 5.0°C) at many places over Andaman, Nicobar Islands; at a few places over Himachal Pradesh and Uttar Pradesh; above normal (1.6°C to 3.0°C) at most places over Jammu & Kashmir and Uttarakhand; at a few places over Haryana, Chandigarh & Delhi, Bihar and Jharkhand and at isolated places over West Rajasthan Sub-Himalayan West Bengal & Sikkim, Madhya Maharashtra, Telangana and Coastal Andhra Pradesh & Yanam. They are appreciably below normal (-3.1°C to -5.0°C) at many places over Saurashtra & Kutch and at isolated places Odisha; below normal (-1.6°C to -3.0°C) at many places over Gujarat Region and at isolated places over Gangetic West Bengal, South Interior Karnataka and Tamilnadu, Puducherry & Karaikal and near normal over rest parts of the country. Yesterday, The lowest minimum temperature of 1.5°C recorded at Pilani (East Rajasthan) over plains of the country.

Weather Warning during next 5 days (IMD)

- 16 January (Day 1): Heavy rain/snow very likely at isolated places over Uttarakhand. Thunderstorm accompanied with hail & lightning very likely at isolated places over Uttarakhand, Haryana, Chandigarh, Uttar Pradesh and East Rajasthan; with lightning at isolated places over Madhya Pradesh, Dense to very dense fog very likely in isolated pockets over Punjab and Odisha; dense fog in isolated pockets over Haryana, Chandigarh & Delhi, Rajasthan, north Madhya Pradesh, south Assam & Meghalaya and Mizoram & Tripura. Cold day conditions very likely in some pockets over West Rajasthan. Cold wave conditions very likely in isolated pockets over Saurashtra & Kutch.
- 17 January (Day 2): Thunderstorm accompanied with hail & lightning very likely at isolated places over Uttarakhand, with lightning at isolated places over Uttar Pradesh, East Madhya Pradesh and Chhattisgarh. Dense to very dense fog very likely in some pockets over Punjab and Haryana, Chandigarh & Delhi; in isolated pockets over Odisha and dense fog in isolated pockets over Uttar Pradesh, Rajasthan, north Madhya Pradesh, Gangetic West Bengal, south Assam & Meghalaya and Mizoram & Tripura. Cold day conditions very likely in isolated pockets over Uttarakhand and West Rajasthan. Cold wave conditions very likely in isolated pockets over Saurashtra & Kutch.
- 18 January (Day 3): Dense to very dense fog very likely in some pockets over Punjab and Haryana, Chandigarh & Delhi; dense fog in isolated pockets over Uttar Pradesh, Rajasthan and north Madhya Pradesh. Cold day conditions very likely in isolated pockets over Uttarakhand. Cold wave conditions very likely in isolated pockets over Saurashtra & Kutch.
- 19 January (Day 4): Heavy rain/snow very likely at isolated places over Arunachal Pradesh. Thunderstorm accompanied with lightning likely at isolated places over Arunachal Pradesh and Assam & Meghalaya. Dense to very dense fog likely in some pockets over Uttar Pradesh; dense fog in isolated pockets over Punjab, Haryana, Chandigarh & Delhi, Rajasthan, north Madhya Pradesh and Bihar. Cold wave conditions likely in isolated pockets over Saurashtra & Kutch.
- 20 January (Day 5): Dense to very dense fog likely in some pockets over Uttar Pradesh; dense fog in isolated pockets over north Madhya Pradesh and Bihar
- The weather outlook for the period of seven days i.e., 16 to 24 Jan 2020 forecasted (Provided by Real-Time Weather Forecasts from NOAA/NCEP collected from <http://monsoondata.org/wx2/>) rain/thundershower may occur over Some parts of Extreme northern parts of India. (Fig. 2).

Agricultural activities (AICRPAM-CRIDA)

Uttar Pradesh

Weather condition:

Weather will be mainly cloudy during these days and 8.0 mm rainfall forecast on 17 January, 2020. Maximum temperature may be expected 1-2 °C lower than its normal, while minimum temperature may be also 1-2 °C higher than normal. Wind velocity range may be expected 6.4 to 15.0 kmph prevailing NW/ NE which may be 4 to 5 kmph above from the normal during the coming week as per fore cast.

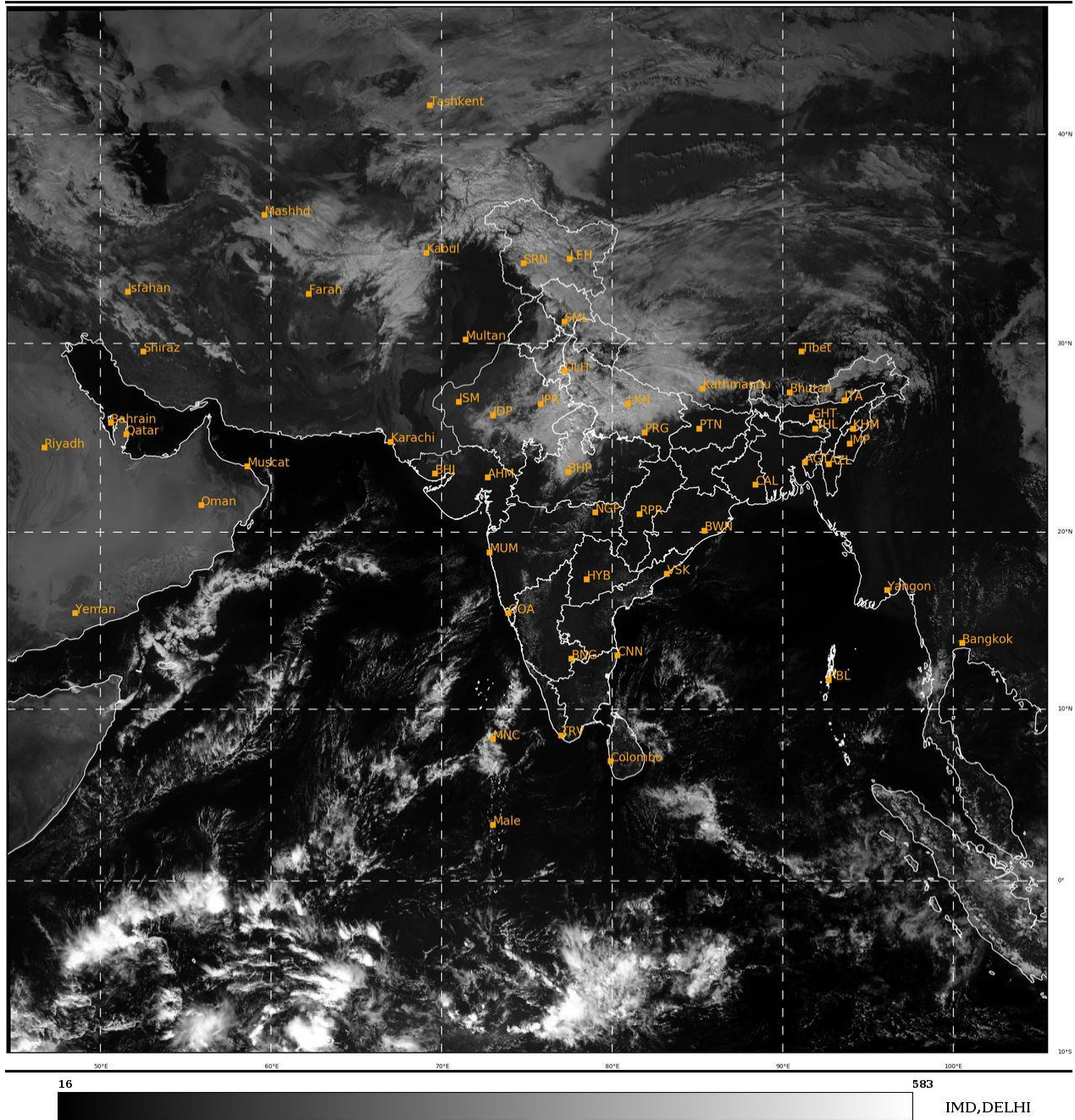
Contingency measure:

- Wheat: Rainfall forecast on 17 January 2020 farmers are advise to stop irrigation up to 17 January. Top dressed $\frac{1}{4}$ Urea at optimum moisture during CRI stage. Used 4.0 g/ha Metsulfuron or 2,4-D 500g/ha or Corpentrazan 20 g/ha with 600 lt. water spray after first irrigation at optimum moisture for control of broad leaf weeds.
- Barley: Top dressed 60 kg/ha Urea after first irrigation at optimum moisture.
- Rabi maize: Top dressed remaining dose of Urea.
- Pigeon pea: Spray 2% Potash solution for the prevention of the crop from the frost. Pea :Spray 2.0 g Mancozeb with 1.0 lt. water solution to protect from Powdery mildew as per need.
- Gram: Spray 2% Potash solution for the prevention from the frost. Nipping must be taken up after 45 DOS.
- Lentil: Spray 2% potash solution for the prevention of the frost crop.
- Mustard: Top dressed $\frac{1}{4}$ Urea at optimum moisture.
- Linseed: Weeding should be taken up.
- Brinjal / Chilies: Pick up mature fruits in standing crop, watching insect & pests. If seen spray 0.5% Neem oil.
- Leafy Vegetable: Cutting , marketing.
- Potato: Dig out early sown crop. Take precaution from late blight, spray 2.0 g Mancozeb or 1.5 to 2.5 g Metalexil with 1.0 lt. water solution as per present weather conditions.
- Barseem: Second cutting should be taken up and moisture should be added after second cutting. Top dressed 40 kg/ha Urea.
- Animal: Balanced diet should be given for milch animal. To protect from the cold of cow/ buffalo calf and used paddy straw or ash as litter in animal houses. The routine immunization of animals becomes necessary since disease decrease milk

production capacity among milch animals if need concerned near Veterinary hospital.

SAT : INSAT-3D IMG
Visible Count 0.65 um
L1C Mercator

16-01-2020/(0800 to 0826) GMT
16-01-2020/(1330 to 1356) IST



**Figure: 1. Latest available satellite picture as on 16 January 2020 at 1356 Hrs (IST).
(Source: IMD).**

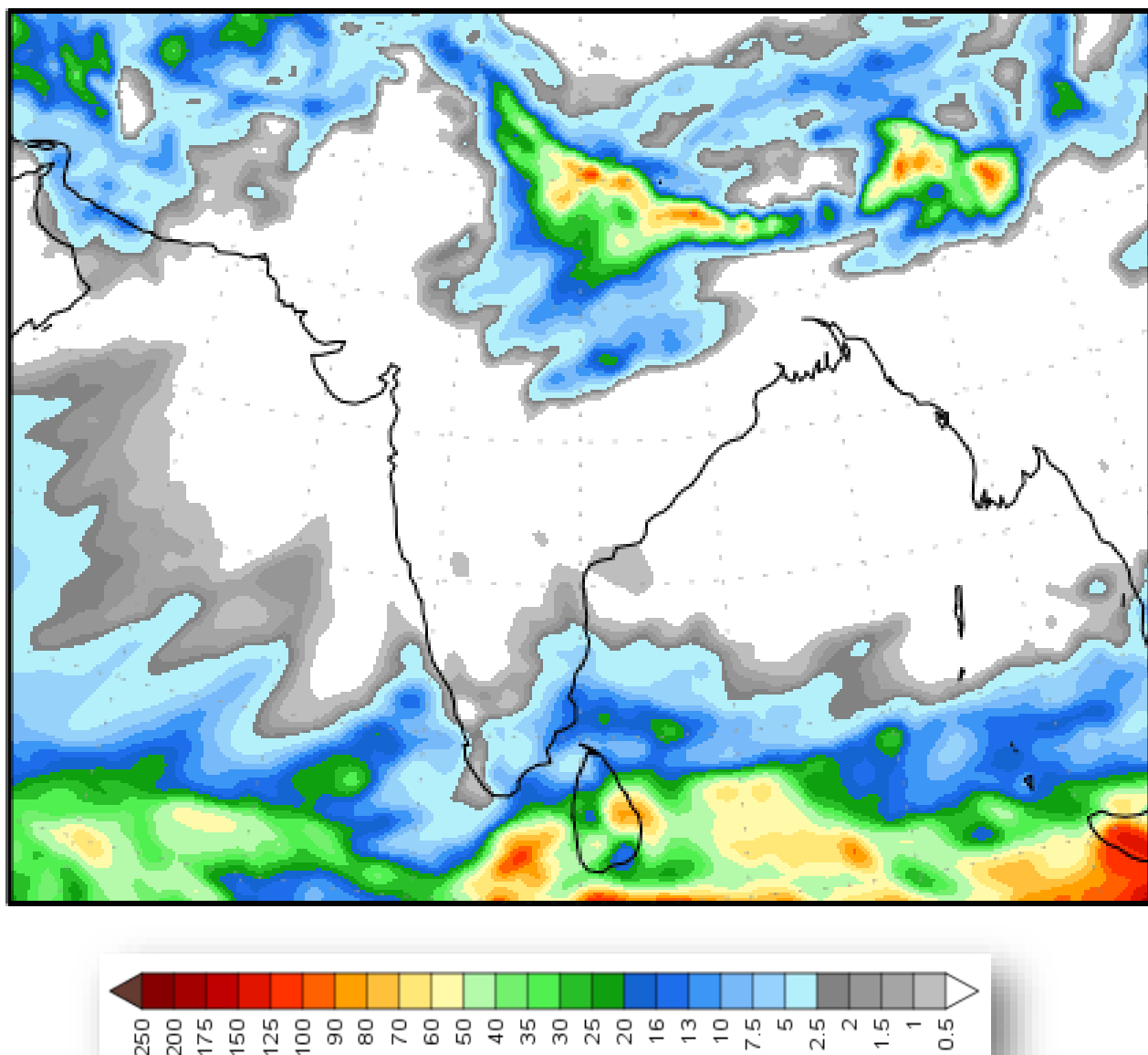


Figure:2. Precipitation forecast for 16 Jan to 24 Jan 2020 (Source: NOAA NCEP).

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