

All India Coordinated Research Project on Agrometeorology

CRIDA, Santoshnagar, Hyderabad – 500 059

Daily Crop Weather Information as on 08 January 2021

Attention: Rajiv Maheshwari, OSD, ICAR

Significant Weather Features (IMD)

- Under the influence of cyclonic circulation over Southeast Arabian Sea and another cyclonic circulation over south Sri Lanka & neighbourhood in lower tropospheric levels; Fairly widespread to widespread rainfall with moderate thunderstorm & lightning very likely over southern peninsular India during next 3-4 days. Isolated heavy rainfall also likely over Tamil Nadu, Puducherry & Karaikal during 8th-11th; over Kerala & Mahe on 8th, 10th & 11th and over Coastal & South Interior Karnataka on 8th & 9th, January, 2021.
- Under the influence of a trough in low level easterlies from Southeast Arabian Sea to Gujarat region in lower tropospheric levels; isolated to scattered rainfall with isolated thunderstorm & lightning very likely over Maharashtra & Goa during next 2 days. Isolated heavy rainfall also very likely over Goa today, i.e, 08th January, 2021.
- Under the influence of a Western Disturbance as a cyclonic circulation over north Pakistan & neighbourhood in mid & upper tropospheric levels, scattered rain/snow very likely over Jammu & Kashmir, Ladakh, Gilgit-Baltistan, Muzaffarabad and isolated rain/thundershower over Haryana, Northeast Rajasthan and West Uttar Pradesh today, i.e, 08th January, 2021.
- Due to the prevailing of dry north/northwesterly winds over most parts of Northwest India, minimum temperature will fall gradually by 3-5°C during next 4-5 days causing Cold wave conditions over Uttarakhand, Punjab, Haryana and north Rajasthan during 11th-12th January, 2021.
- Due to abundant moisture available in lower tropospheric levels and other favourable meteorological features, dense to very dense fog at isolated pockets very likely over Punjab, Haryana, Chandigarh and West Uttar Pradesh and dense fog over Delhi, East Uttar Pradesh, Rajasthan and north West Madhya Pradesh in the morning hours of 09th & 10th January, 2021.
- The images showing the latest satellite picture in the figure. 1.

Main Weather Observations (IMD)

- Rain/Thundershowers observed (from 0830 hours IST of yesterday to 0830 hours IST of today): at many places over Rayalaseema, Coastal Karnataka and Kerala & Mahe; at a few places over Andaman & Nicobar Islands, Tamil Nadu, Puducherry & Karaikal, South Interior Karnataka and Lakshadweep; at isolated places over Sub-Himalayan West Bengal & Sikkim, Jammu, Kashmir, Ladakh, Gilgistan, Baltistan & Muzaffarabad, East Rajasthan, Madhya Pradesh, Gujarat region, Maharashtra, Goa, Chhattisgarh, Telangana, North Interior Karnataka and Coastal Andhra Pradesh & Yanam.
- Heavy rainfall observed at isolated places over South Interior Karnataka and Kerala.
- Fog observed (during 0530 to 0830 hours IST of today): Dense to Very dense fog in isolated pockets over Punjab, Haryana, Rajasthan and Uttar Pradesh; Moderate fog in isolated pockets in Jammu & Kashmir, Uttarakhand, Madhya Pradesh and Sub-Himalayan West Bengal & Sikkim.
- Maximum Temperature Departures as on 07-01-2021: Maximum temperatures were appreciably above normal (3.1°C to 5.0°C) at most places over Jharkhand; at many places over East Madhya Pradesh and Odisha; at a few places over Himachal Pradesh; above normal (1.6°C to 3.0°C) at most places over Uttarakhand, east Uttar Pradesh, Nagaland, Manipur, Mizoram & Tripura, Assam & Meghalaya, Bihar, Gangetic West Bengal and Chhattisgarh; at many places over Sub Himalayan West Bengal & Sikkim and Vidarbha; at a few places over Andaman & Nicobar and Coastal Andhra Pradesh & Yanam and at isolated places over Jammu, Kashmir, Ladakh, Gilgistan, Baltistan & Muzaffarabad, West Madhya Pradesh, Konkan & Goa and Tamil Nadu, Puducherry & Karaikal. They were appreciably below normal (-3.1°C to -5.0°C) at most places over West Rajasthan; at a few places over Haryana, Chandigarh & Delhi, east Rajasthan and West Uttar Pradesh; below normal (-1.6°C to -3.0°C) at most places over North Interior Karnataka; at many places over Rayalaseema; at a few places over Gujarat State, Madhya Maharashtra, Telangana and South Interior Karnataka. Yesterday, the highest maximum temperature of 34.6°C was reported at Karwar (Coastal Karnataka) and Cochin Airport (Kerala) over the country.
- Minimum Temperature Departures as on 08-01-2021: Minimum temperatures are markedly above normal (5.1°C or more) at most places over Jharkhand, Chhattisgarh, Madhya Maharashtra, Marathwada and Vidarbha; at many places over Madhya Pradesh; at a few places over Bihar, Odisha and Telangana; at isolated places over East Uttar Pradesh; appreciably above normal (3.1°C to 5.0°C)

at most places over Konkan & Goa, Karnataka and Rayalaseema; at many places over Punjab, West Bengal & Sikkim, Nagaland, Manipur, Mizoram & Tripura, Tamilnadu, Puducherry & Karaikal and Coastal Andhra Pradesh & Yanam; at a few places over Jammu & Kashmir, Ladakh, Gilgit-Baltistan & Muzaffarabad, Himachal Pradesh, Gujarat region and Assam & Meghalaya and at isolated places over West Uttar Pradesh, Uttarakhand and Kerala & Mahe and above normal (1.6°C to 3.0°C) at most places over Arunachal Pradesh; at a few places over Saurashtra & Kutch, Andaman & Nicobar Islands and Lakshadweep. They are below normal (-1.6°C to -3.0°C) at isolated places over West Rajasthan and near normal over rest parts of the country. The lowest minimum temperature of 4.4°C reported at Hissar (Haryana) over the plains of the country.

Weather Warning during the next 5 days (IMD)

- 08 January (Day 1): Heavy rainfall at isolated places very likely over Konkan & Goa, Coastal & South Interior Karnataka, Kerala & Mahe, Lakshadweep and Tamil Nadu, Puducherry & Karaikal. Thunderstorm accompanied with hail & lightning at isolated places very likely over East Rajasthan and thunderstorm accompanied with lightning at isolated places over Jammu & Kashmir, Ladakh, Gilgit-Baltistan, Muzaffarabad, north West Madhya Pradesh, Konkan & Goa, Madhya Maharashtra, Karnataka, Tamil Nadu, Puducherry & Karaikal, Kerala & Mahe and Lakshadweep. Dense to very dense fog in isolated pockets very likely over Punjab, Haryana, Chandigarh & Delhi and West Uttar Pradesh and dense fog in isolated pockets over East Uttar Pradesh, north Rajasthan and West Madhya Pradesh. Cold Day conditions in isolated pockets very likely over Punjab, Haryana, Chandigarh & Delhi, West Uttar Pradesh and Rajasthan. Squally weather (wind speed reaching 45-55 kmph) very likely over Northwest Arabian Sea. Fishermen are advised not to venture into this area.
- 09 January (Day 2): Heavy rainfall at isolated places very likely over Coastal & South Interior Karnataka and Tamil Nadu, Puducherry & Karaikal. Thunderstorm accompanied with lightning at isolated places very likely over Konkan & Goa, Madhya Maharashtra, Karnataka, Tamil Nadu, Puducherry & Karaikal, Kerala & Mahe and Lakshadweep. Dense fog in isolated pockets very likely over Punjab, Haryana, Chandigarh & Delhi, Uttar Pradesh, north Rajasthan and Odisha. Cold Day conditions in isolated pockets very likely over Punjab, Haryana, Chandigarh & Delhi, West Uttar Pradesh and Rajasthan. Squally weather (wind speed reaching 40-50 kmph) very likely over Northeast Arabian Sea along & off Gujarat coast. Fishermen are advised not to venture into this area.

- 10 January (Day 3): Heavy to very heavy rainfall at isolated places very likely over Tamil Nadu, Puducherry & Karaikal and heavy rainfall at isolated places over Kerala & Mahe. Thunderstorm accompanied with lightning at isolated places very likely over Tamil Nadu, Puducherry & Karaikal, Kerala & Mahe and Lakshadweep. Dense fog in isolated pockets very likely over Odisha. Squally weather (wind speed reaching 40-50 kmph) very likely over Northeast Arabian Sea along & off Gujarat coast. Fishermen are advised not to venture into this area.
- 11 January (Day 4): Heavy to very heavy rainfall at isolated places likely over Tamil Nadu, Puducherry & Karaikal and heavy rainfall at isolated places over Kerala & Mahe. Thunderstorm accompanied with lightning at isolated places likely over Tamil Nadu, Puducherry & Karaikal, Kerala & Mahe and Lakshadweep. Cold Wave conditions in isolated pockets likely over Uttarakhand, Punjab, Haryana, Chandigarh & Delhi and north Rajasthan.
- 12 January (Day 5): Thunderstorm accompanied with lightning at isolated places likely over Tamil Nadu, Puducherry & Karaikal, Kerala & Mahe and Lakshadweep. Cold Wave conditions in isolated pockets likely over Uttarakhand, Punjab, Haryana, Chandigarh & Delhi and north Rajasthan.
- The weather outlook for seven days i.e., 08 to 16 January 2021 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)

Madhya Pradesh

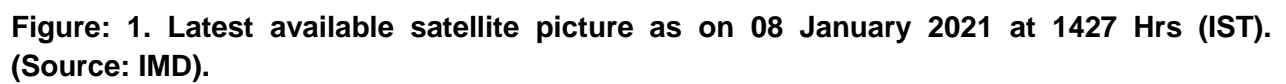
Weather condition:

High Tmax.: 33 C at Khargone district - Low TMin: 5 C at Gwalior and Datia district - Rainfall: Max. rainfall of 30 mm at Sheopurkalan district. Rainfall occurred in north (Gird zone) and NW parts of the state - Day Temp.: 2 C above normal over the state - Night Temp.: 3 C above normal over the state. More cloud cover rise the temperature thereby create environment for insect-pest and disease infestation. Monitoring of crop field and apply measures for its control.

Contingency measure:

- If sufficient moisture is available in wheat field, then broadcast urea in the field. Care should be taken that leaves should not be wet, and urea should not get stick to it.

- Chickpea: Farmers are advised to monitor the chickpea crop and when pest reaches at ETL level (2 or more than two caterpillar per meter row length) the spray of quinalphos 20E.C @ 2.0 ml. per liter of water is recommended. It is also advised that farmers may use bird percher at the distance of 20 ft all over the field.
- Mustard: Apply second irrigation before flowering. Incorporate remaining nitrogenous fertilizer after irrigation.
- Arhar : Control measure should apply if infestation of insect pest occurred. For control leaf roller capsule borer, gram pod borer and pod fly insect seen in the field apply 2 ml chlorpyrifos or imidaclopride per lit. Water.
- Vegetables: Due to low temperature it is advisable to apply irrigation to chilli, brinjal, and tomato vegetables to save the quality of produce. Earthening is required in late sown potato crops. Irrigation of fertilizer recommended for cauliflower, cabbage, carrot, brinjal radish and onion.
- Fruits: Irrigation required Citrus, Guava and Aonla etc because of cold wave and frost. Mature fruit Citrus, Guava and Aonla for harvesting therefore to be market.
- Animal Husbandry: Humid weather condition is prevailed hence keep cattle in dry and clean place. Create neem leaves smoke in night to save them from mosquitoes and bees. Save calves from cold (night temperature) use heater, curtains to save them.
- Late wheat should be planted after cultivating the pea field. → Apply chemical weed control in 25 days wheat crop.
- General Advice General advice: Forecast of weather with no clouds and rainfall, hence possible to irrigate wheat along with top dressing of urea in the field and dry leaves conditions. Weather will be medium cloudy
- Wheat & Irrigate early planted Barseem crop after each cutting. Sowing of green fodder like berseem and lucern crops for the cattle feed.
- Poultry :Protect poultry birds from cold by using electric bulb (300W for 100 ft.2) to prevent Coryza disease.



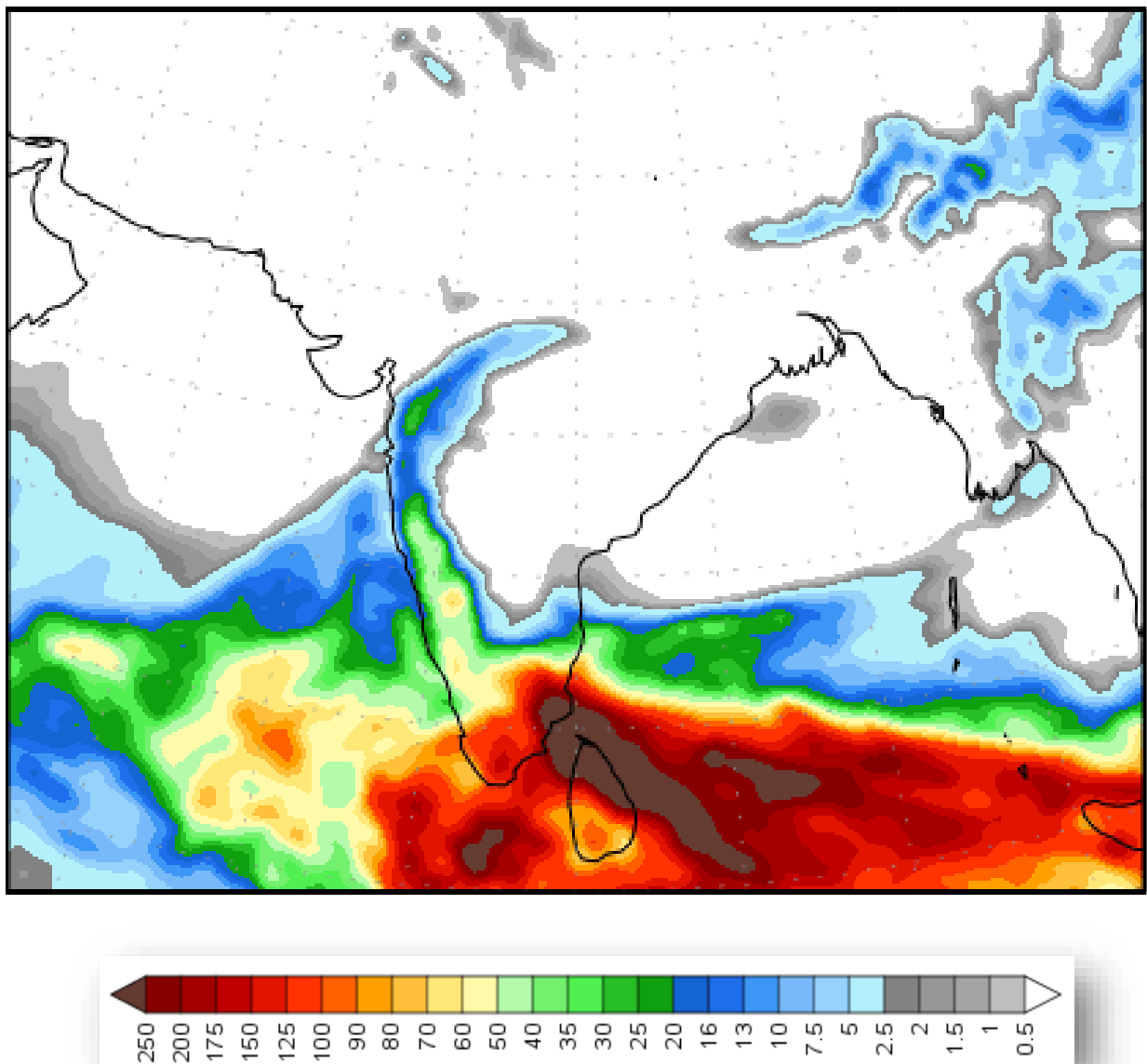


Figure:2. Precipitation forecast for 08 to 16 January 2021 (Source: NOAA NCEP).

Disclaimer: The predictability of weather depends on many dynamic factors. The success of Agromet advisories provided here depends on the accuracy of the forecasts. In no event will India Meteorological Department (IMD) and Indian Council of Agricultural Research (ICAR) be liable to the user or any third party for any direct, indirect, incidental, consequential, special or exemplary damages or lost profit resulting from any use or misuse of the information on this bulletin.