

**All India Coordinated Research Project on Agrometeorology**  
**CRIDA, Santoshnagar, Hyderabad – 500 059**

**Daily Crop Weather Information as on 16 April 2022**

**Attention: Rajiv Maheshwari, OSD, ICAR**

**Significant Weather Features (IMD)**

- Heat wave warning:
- Heat wave conditions in isolated pockets very likely to prevail over Punjab, Haryana-Chandigarh-Delhi & Rajasthan on 16th & 17th and increase to heat wave to severe heat wave conditions in isolated pockets over the same region on 18th & 19th April, 2022.
- Heat wave conditions in isolated pockets also likely to prevail over Himachal Pradesh & Jammu Division during 16th-18th; over Uttar Pradesh & Vidarbha during 18th-20th and over Gangetic West Bengal on 16th & 17th and over Bihar, Jharkhand & Sub-Himalayan West Bengal-Sikkim on 16th April, 2022.
- Heat wave conditions in isolated pockets very likely to prevail over Madhya Pradesh on 17th & 18th and increase spatially to some parts over the same region on 19th & 20th April, 2022.
- Rainfall/thunderstorm Forecast & Warnings:
- Under the influence of strong southwesterly winds from Bay of Bengal to northeastern States at lower tropospheric levels:
  - i) Fairly widespread/widespread rainfall accompanied with thunderstorm/lightning very likely over Arunachal Pradesh, Assam-Meghalaya and Nagaland-Manipur-Mizoram-Tripura during next 5 days.
  - ii) Isolated heavy to very heavy rainfall likely over Arunachal Pradesh & Assam-Meghalaya on 16th April and isolated heavy rainfall also likely over the same region on 17th April, 2022.
- Under the influence of trough/wind discontinuity in lower tropospheric levels from Chhattisgarh to South Interior Karnataka:
  - i) Scattered to fairly widespread rainfall accompanied with thunderstorm/lightning very likely over Kerala-Mahe & Karnataka during next 5 days and isolated to scattered rainfall accompanied with thunderstorm/lightning over Tamilnadu-Puducherry-Karaikal, Andhra Pradesh and Telangana during next 5 days.

ii) Isolated heavy rainfall very likely over Tamil Nadu on 16th; over South Interior Karnataka on 16th & 17th; over Kerala-Mahe during 16th-18th April, 2022.

- A fresh Western Disturbance likely to affect Northwest India from the night of 18th April, 2022. Under its influence, light isolated to scattered rainfall accompanied with isolated thunderstorm/lightning very likely over Western Himalayan Region on 19th & 20th and over Punjab on 20th April, 2022.
- The images showing the latest satellite picture in the figure. 1.

### **Main Weather Observations (IMD)**

- Rainfall/thundershower observed (from 0830 hours IST of yesterday to 0830 hours IST of today): at many places over Assam-Meghalaya and Arunachal Pradesh; at a few places over Nagaland-Manipur-Mizoram-Tripura and Lakshadweep and at isolated places over West Bengal-Sikkim, Odisha, Uttar Pradesh, Uttarakhand, Jammu-Kashmir, Himachal Pradesh, Coastal Andhra Pradesh-Yanam, Telangana, Rayalaseema, Tamilnadu, Puducherry & Karaikal, Karnataka and Kerala-Mahe.
- Heavy to very heavy rainfall observed at isolated places over Assam-Meghalaya and heavy rainfall at isolated places over Arunachal Pradesh and Tamilnadu.
- Thunderstorm observed (from 0830 hours IST of yesterday to 0830 hours IST of today): at isolated places over Jammu Division, Himachal Pradesh, Uttarakhand, Odisha, Telangana, Madhya Maharashtra, Interior Karnataka, Tamilnadu, Puducherry & Karaikal, South Interior Karnataka, Kerala & Mahe, Assam-Meghalaya and Nagaland-Manipur-Mizoram-Tripura.
- Yesterday, Heat wave conditions observed in isolated pockets over West Rajasthan, Himachal Pradesh, Bihar and Gangetic West Bengal.
- Maximum Temperature Departures (as on 15-04-2022): Maximum temperatures were appreciably above normal (3.1°C to 5.0°C) at most places over West Rajasthan, Jharkhand and Bihar; at a few places over Jammu-Kashmir-Ladakh-Gilgit-Baltistan-Muzaffarabad, Himachal Pradesh, East Rajasthan, West Uttar Pradesh, Gangetic West Bengal and East Madhya Pradesh; at isolated places over Saurashtra & Kutch, West Madhya Pradesh, East Uttar Pradesh and Odisha; above normal (1.6°C to 3.0°C) at most places over Uttarakhand and Haryana, Chandigarh & Delhi; at many places over Vidarbha and Sub-Himalayan West Bengal-Sikkim; at a few places over Marathwada and Konkan-Goa; at isolated places over Coastal Andhra Pradesh & Yanam, Assam & Meghalaya and Gujarat Region. They were below normal (-1.6°C to -3.0°C) at a few places over Interior

Karnataka; at isolated places over Madhya Maharashtra and Tamilnadu-Puducherry-Karaikal and near normal over rest parts of the country.

- Yesterday, the highest maximum temperature of 43.7°C was reported at Bankura (Gangetic West Bengal).
- Minimum Temperature Departures (as on 16-04-2022): Minimum temperatures are appreciably above normal (3.1°C to 5.0°C) at many places over Jharkhand; at a few places over Rajasthan; at isolated places over East Uttar Pradesh and West Bengal-Sikkim; above normal (1.6°C to 3.0°C) at many places over Chhattisgarh, Coastal Andhra Pradesh-Yanam, Telangana and North Interior Karnataka; at a few places over Himachal Pradesh, West Uttar Pradesh, Gujarat state, Madhya Maharashtra, Odisha and Rayalaseema; at isolated places over Haryana-Chandigarh-Delhi, West Madhya Pradesh, Vidarbha and Assam-Meghalaya. They are below normal (-1.6°C to -3.0°C) at a few places over East Madhya Pradesh; at isolated places over Tamilnadu, Puducherry & Karaikal and near normal over rest parts of the country.
- Today, the lowest minimum temperature of 17.5°C is reported at Sikar (East Rajasthan) over the plains of the country.

#### **Weather Warning during the next 5 days (IMD)**

- 16 April (Day 1): Heat wave conditions in isolated pockets over Jammu Division, Himachal Pradesh, Punjab, Haryana-Chandigarh-Delhi, Rajasthan, Bihar, West Bengal-Sikkim and Jharkhand. Thunderstorm accompanied with lightning/gusty winds (speed 40-50 kmph) at isolated places very likely over Assam-Meghalaya and Nagaland-Mizoram-Manipur-Tripura; with lightning/gusty winds (speed 30-40 kmph) at isolated places over West Bengal-Sikkim, Coastal Andhra Pradesh-Yanam, Telangana, Rayalaseema and Kerala-Mahe and with lightning over Arunachal Pradesh, Odisha, Jammu-Kashmir, Himachal Pradesh, Uttarakhand, Chhattisgarh, Interior Karnataka and Tamil Nadu-Puducherry-Karaikal. Heavy to very heavy rainfall at isolated places very likely over Assam-Meghalaya and Arunachal Pradesh and heavy rainfall at isolated places over South Interior Karnataka, Kerala-Mahe and Tamil Nadu-Puducherry-Karaikal.
- 17 April (Day 2): Heat wave conditions in isolated pockets very likely over Jammu Division, Himachal Pradesh, Punjab, Haryana-Chandigarh-Delhi, Rajasthan, Gangetic West Bengal and Madhya Pradesh. Thunderstorm accompanied with lightning/gusty winds (speed 30-40 kmph) at isolated places very likely over Assam-Meghalaya, Coastal Andhra Pradesh-Yanam, Telangana and Rayalaseema and with lightning over Arunachal Pradesh, Nagaland-Mizoram-Manipur-Tripura, Jharkhand, Chhattisgarh, Gangetic West Bengal, Odisha, Interior Karnataka, Kerala-Mahe and Tamil Nadu-Puducherry-Karaikal. Heavy rainfall at

isolated places very likely over Assam-Meghalaya, Arunachal Pradesh, Kerala-Mahe and South Interior Karnataka.

- 18 April (Day 3): Heat wave to Severe Heat Wave conditions in isolated pockets very likely over Punjab, Haryana-Chandigarh-Delhi and Rajasthan; Heat wave conditions in isolated pockets over Jammu Division, Himachal Pradesh, Uttar Pradesh, Vidarbha and Madhya Pradesh. Thunderstorm accompanied with lightning at isolated places very likely over Assam-Meghalaya, Odisha, Chhattisgarh, Coastal Andhra Pradesh-Yanam, Telangana, Rayalaseema, South Interior Karnataka, Kerala-Mahe and Tamil Nadu-Puducherry-Karaikal. Heavy rainfall at isolated places very likely over Kerala-Mahe.
- 19 April (Day 4): Heat wave to Severe Heat Wave conditions in isolated pockets likely over Punjab, Haryana-Chandigarh-Delhi, Rajasthan; Heat wave conditions in some pockets over Madhya Pradesh and in isolated pockets over Uttar Pradesh and Vidarbha. Thunderstorm accompanied with lightning at isolated places likely over Assam-Meghalaya, Bihar, Jammu-Kashmir, Himachal Pradesh, Chhattisgarh, Telangana and Kerala-Mahe.
- 20 April (Day 5): Heat wave conditions in some pockets likely over Madhya Pradesh and in isolated pockets over Rajasthan, Punjab, Haryana-Chandigarh-Delhi, Uttar Pradesh and Vidarbha. Thunderstorm accompanied with lightning at isolated places likely over Assam-Meghalaya, Bihar, Jammu-Kashmir, Himachal Pradesh, Uttarakhand, Punjab, Chhattisgarh and Kerala-Mahe.
- The weather outlook for seven days i.e., 16 Apr to 24 Apr 2022 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)

### **Maharashtra-Vidarbha**

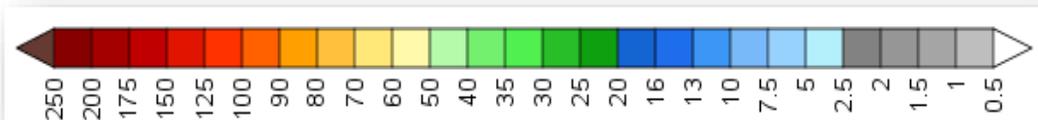
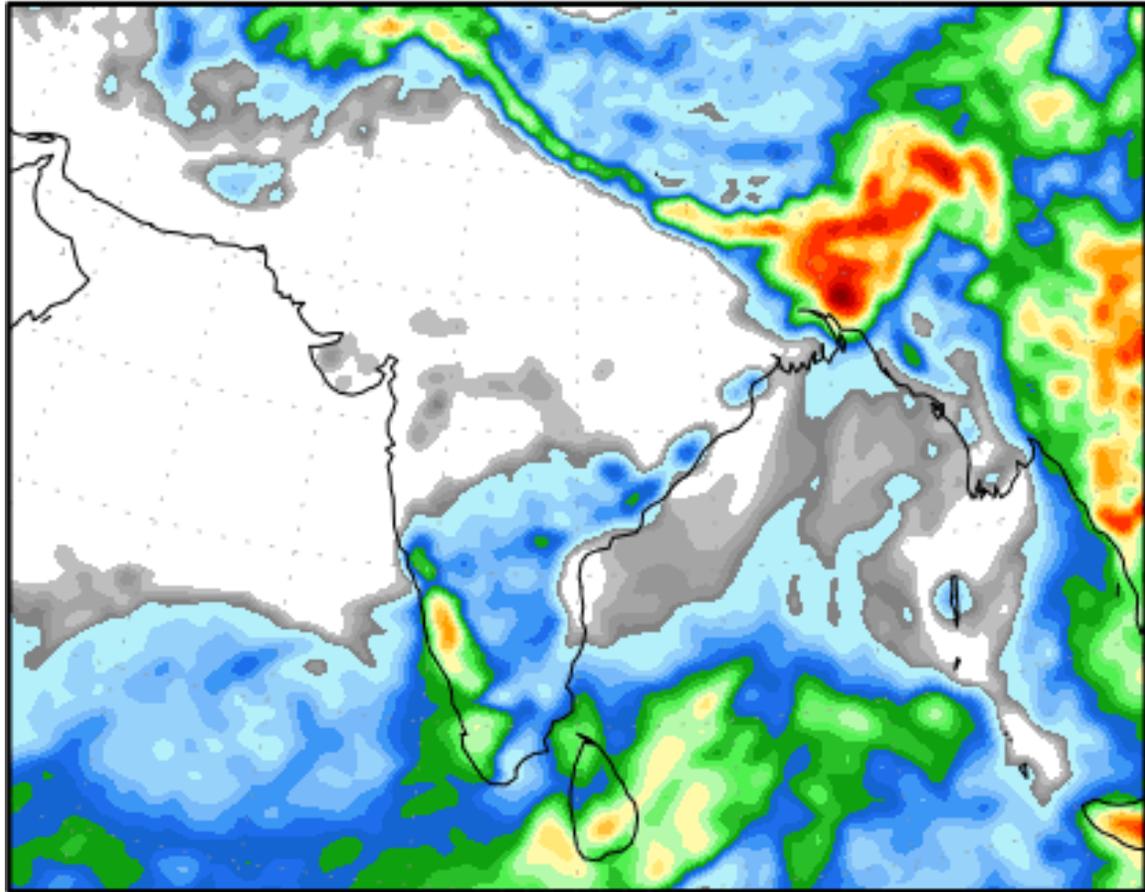
#### **Weather condition:**

Weekly average means (15 MW) at AICRPAM Akola centre: T max 42.2°C (normal 40.5°C), T min 24.8°C (normal 22.9°C). RH I 39 % (normal 38 %), RH II 15 % (normal 16 %). Evaporation rate 10.1 mm (normal 12.3 mm), Wind speed 1.8 km/hr (normal 7.8 km/hr) and BSH 7.8 hrs (normal 9.2 hrs). Maximum temperature across the week was 2.8°C above normal with a deviation of +2.1 to +3.2°C from normal. Minimum temperature across the week 0.8°C above normal with a deviation of -1.5 to +3.4°C from normal.

#### **Contingency measure:**

- In view with continuance of dry/hot weather, maintain adequate moisture in the soil profile in growing summer crops, vegetables and orchards by applying irrigation during early morning or evening hours. Increase the frequency of irrigation in light/shallow soils and at critical growth stages of crop.
- Summer deep ploughing of harvested fields to expose the hibernating insects, larvae/pupa to sun and predator birds is advisable. Prevailing high maximum temperature regime favors infestation of sap sucking pests like aphids and jassids in summer groundnut and sunflower, for control undertake spray of Imidacloprid 17.8 % EC @ 2.0 to 2.5 ml per 10 liters of water.
- To control ambia bahar fruit drop in mandarin orange/sweet orange/acid lime, spraying of gibberlic acid 1.5 g OR NAA 1 g + 1kg urea + carbendazim 0.1% (100 g) per100 litres of water is advisable.
- With prevailing hot weather condition, provide sufficient feed/forage, cold water, shelter from heat and follow proper grazing time (morning/evening) for farm/milch animals. Also give them protein-fat bypass supplement and mineral mixture in diet.





**Figure:2. Precipitation forecast for 16 Apr to 24 Apr 2022 (Source: NOAA NCEP).**

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