

Current Temperature Status and Heat Wave Warning

Dated: 30th April, 2024

Time of Issue: 1630 Hrs IST

♦ Observed Temperature Scenario:-

Maximum Temperature & its departure (Yesterday) (Annexure 1):-

- Yesterday, maximum temperatures were in the range of 43-45°C over in some parts of Gangetic West Bengal, Odisha, southwest Uttar Pradesh, south Gujarat, Telangana and south coastal Andhra Pradesh, Rayalaseema; in the range of 40-43°C in some parts of Madhya Pradesh, remaining parts of Uttar Pradesh, Bihar, Jharkhand, south Chhattisgarh, north Tamil Nadu, north coastal Andhra Pradesh, Maharashtra, interior Karnataka and remaining parts of Gujarat. These were above normal by 4-8°C over in many parts of Gangetic West Bengal and Bihar; in some parts of Sub Himalayan West Bengal, north Odisha and in isolated pockets of Jharkhand, Andhra Pradesh, Telangana, Maharashtra, Saurashtra & Kutch, Kerala and Karnataka.
- **Yesterday's Highest Maximum Temperature on Plains:** 45.6°C at Nandyal (Rayalaseema).
- **Markedly above normal (5.1°C or more):-** At most places over Gangetic West Bengal; at a few places over Odisha, Bihar and Sub-Himalayan West Bengal; at isolated places over Konkan & Goa.
- **Appreciably above normal (3.1°C to 5.0°C):-** At most places over Kerala & Mahe; at a few places over East Uttar Pradesh, Nagaland, Manipur, Mizoram & Tripura, Saurashtra & Kutch and Tamil Nadu, Puducherry & Karaikal.
- **Above normal (1.6°C to 3.0°C):-** At many places over Coastal Andhra Pradesh & Yanam, Rayalaseema and Lakshadweep; at a few places over Karnataka and Telangana; at isolated places over West Uttar Pradesh, Chhattisgarh, Jharkhand, Assam & Meghalaya, Madhya Maharashtra and Andaman & Nicobar Islands.

Minimum Temperature & its departure (Today) (Annexure 2):-

- **Markedly above normal (5.1°C or more):-** NIL.
- **Appreciably above normal (3.1°C to 5.0°C):-** At a few places over Gangetic West Bengal; at isolated places over Bihar, Jharkhand, Madhya Maharashtra and Nagaland, Manipur, Mizoram & Tripura.
- **Above normal (1.6°C to 3.0°C):-** At most places over Vidarbha, Karnataka and Kerala & Mahe; at many places over Sub-Himalayan West Bengal & Sikkim, Odisha, Chhattisgarh and Konkan & Goa; at a few places over East Uttar Pradesh, Assam & Meghalaya, Telangana and Tamil Nadu, Puducherry & Karaikal; at isolated places over East Madhya Pradesh, Saurashtra & Kutch and Rayalaseema.

♦ **Heat wave conditions:-** Yesterday, Heat Wave to severe heat wave conditions prevailed in most parts over Gangetic West Bengal; in some parts over Saurashtra, Bihar, Sub-Himalayan West Bengal and Odisha and Heat wave conditions in isolated pockets over Jharkhand, Telangana, Interior Karnataka, north Kerala, Konkan and Rayalaseema. Heat wave to severe heat wave conditions have been prevailing over Odisha since 15th, Gangetic West Bengal since 17th April 2024.

♦ **Warm night conditions:-** Severe warm night prevailed in isolated places over Odisha; Warm Night prevailed in isolated places over Bihar, Gangetic West Bengal, Madhya Maharashtra, Marathwada and North Interior Karnataka.

♦ **Hot & Humid prevailed** in isolated places over Kerala, Tamil Nadu, Puducherry & Karaikal and Coastal Karnataka.

♦ **Percentile Temperature (Annexure 3) :-**

♦ **Temperatures Recorded at 1430 Hours IST of Today, the 30th April, 2024 (Annexure 4) :-**

- Jamshedpur (Jharkhand) recorded the highest temperature of 45.0°C.

♦ **Wind Speed & Relative Humidity Recorded at 1430 Hours IST of Today (Annexure 5) :-**

♦ **Maximum Temperatures Forecast :-**

- Fall in maximum temperatures by 2-3°C very likely over Northwest India during next 2 days and rise by 2-3°C thereafter.
- Rise in maximum temperatures by 2-3 °C very likely over Central India during next 5 days.
- Rise in maximum temperatures by 2-3°C very likely over Gujarat state during next 3 days and no significant change thereafter.
- No significant change in maximum temperatures very likely over rest parts of the country.

Hot Weather Warnings for Next 5 Days

DAY-1:-

- ❖ **Hot and humid weather** very likely to prevail over west Assam & Meghalaya, Tripura, Saurashtra & Kutch, Karnataka, Tamil Nadu, Puducherry & Karaikal, Kerala & Mahe.
- ❖ **Heat wave to severe heat wave conditions** very likely to prevail at many places over Gangetic West Bengal; at a few places over Bihar, Odisha; in isolated pockets over Sub-Himalayan West Bengal, Jharkhand, Saurashtra & Kutch; heat wave conditions in isolated pockets over Konkan, Marathwada, Madhya Maharashtra, Kerala & Mahe, Coastal Andhra Pradesh & Yanam, Rayalaseema, Telangana and Interior Karnataka.
- ❖ **Warm night conditions** very likely to prevail in isolated pockets over East Madhya Pradesh, Bihar, Gangetic West Bengal, Odisha and North Interior Karnataka.

DAY-2:-

- ❖ **Hot and humid weather** very likely to prevail over west Assam & Meghalaya, Tripura, Saurashtra & Kutch, Karnataka, Tamil Nadu, Puducherry & Karaikal, Kerala & Mahe.
- ❖ **Heat wave to severe heat wave conditions** very likely to prevail at many places over Gangetic West Bengal; at a few places over Bihar, Odisha; in isolated pockets over Jharkhand, Saurashtra & Kutch; **heat wave conditions** in isolated pockets over Sub-Himalayan West Bengal, Konkan, Marathwada, Madhya Maharashtra, Kerala & Mahe, Coastal Andhra Pradesh & Yanam, Rayalaseema, Telangana, Interior Karnataka and Tamil Nadu, Puducherry & Karaikal.
- ❖ **Warm night conditions** very likely to prevail in isolated pockets over East Madhya Pradesh, Bihar, Gangetic West Bengal, Odisha and North Interior Karnataka.

DAY-3:-

- ❖ **Hot and humid weather** very likely to prevail over Konkan, Saurashtra & Kutch, Karnataka, Tamil Nadu, Puducherry & Karaikal, Kerala & Mahe.
- ❖ **Heat wave to severe heat wave conditions** very likely to prevail at many places over Gangetic West Bengal; at a few places over Bihar, Odisha; in isolated pockets over Rayalaseema and Saurashtra & Kutch; **heat wave conditions** in isolated pockets over Jharkhand, Sub-Himalayan West Bengal, Kerala & Mahe, Coastal Andhra Pradesh & Yanam, Telangana, Interior Karnataka and Tamil Nadu, Puducherry & Karaikal.
- ❖ **Warm night conditions** very likely to prevail in isolated pockets over East Madhya Pradesh, Bihar, Odisha and North Interior Karnataka.

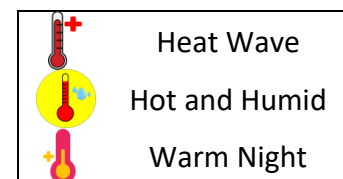
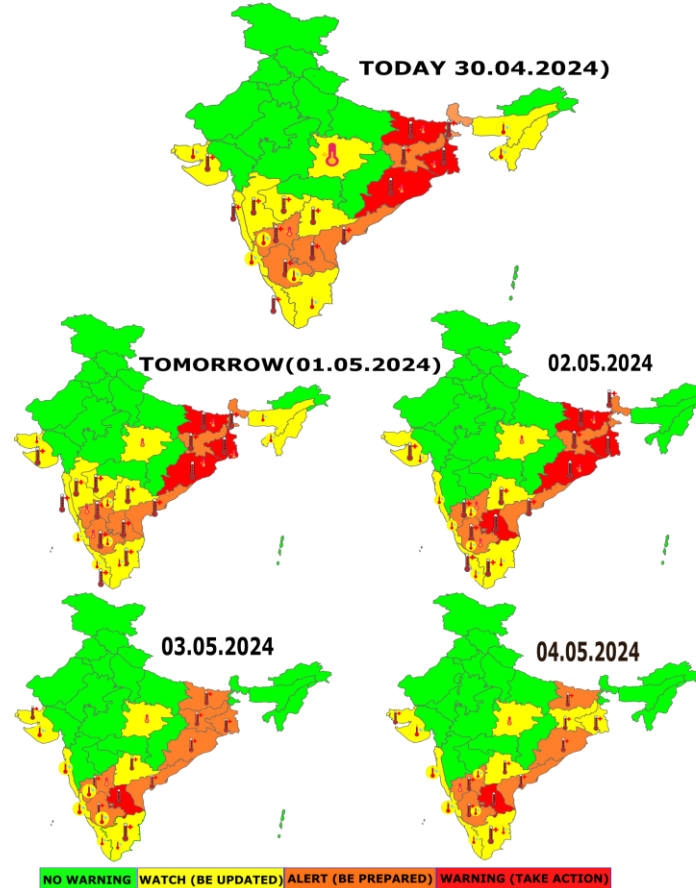
DAY-4:-

- ❖ **Hot and humid weather** very likely to prevail over Konkan, Saurashtra & Kutch, Karnataka, Tamil Nadu, Puducherry & Karaikal, Kerala & Mahe.
- ❖ **Heat wave to severe heat wave conditions** likely to prevail in isolated pockets over Saurashtra & Kutch and Rayalaseema; **heat wave conditions** in some parts over Gangetic West Bengal; in isolated pockets over Bihar, Jharkhand, Odisha, Coastal Andhra Pradesh & Yanam, Telangana, Tamil Nadu, Puducherry & Karaikal and Interior Karnataka.
- ❖ **Warm night conditions likely** to prevail in isolated pockets over East Madhya Pradesh and North Interior Karnataka.

DAY-5:-

- ❖ **Hot and humid weather** very likely to prevail over Konkan, Saurashtra & Kutch, Karnataka, Tamil Nadu, Puducherry & Karaikal, Kerala & Mahe.
- ❖ **Heat wave to severe heat wave conditions** likely to prevail in isolated pockets over Saurashtra & Kutch and Rayalaseema; heat wave conditions in isolated pockets over Gangetic West Bengal, Bihar, Jharkhand, Odisha, Coastal Andhra Pradesh & Yanam, Telangana, Tamil Nadu, Puducherry & Karaikal and Interior Karnataka.
- ❖ **Warm night conditions likely** to prevail in isolated pockets over East Madhya Pradesh and North Interior Karnataka.

5 DAYS HOT WEATHER WARNING MAP



IMPACT & ACTION SUGGESTED:

Yellow alert Areas:

1. Moderate temperature, Heat is tolerable for general public but moderate health concern for vulnerable people e.g. infants, elderly, people with chronic diseases.
2. Avoid heat exposure, Wear light weight, light coloured, loose, cotton clothes, Cover your head, Use a cloth, hat or umbrella.

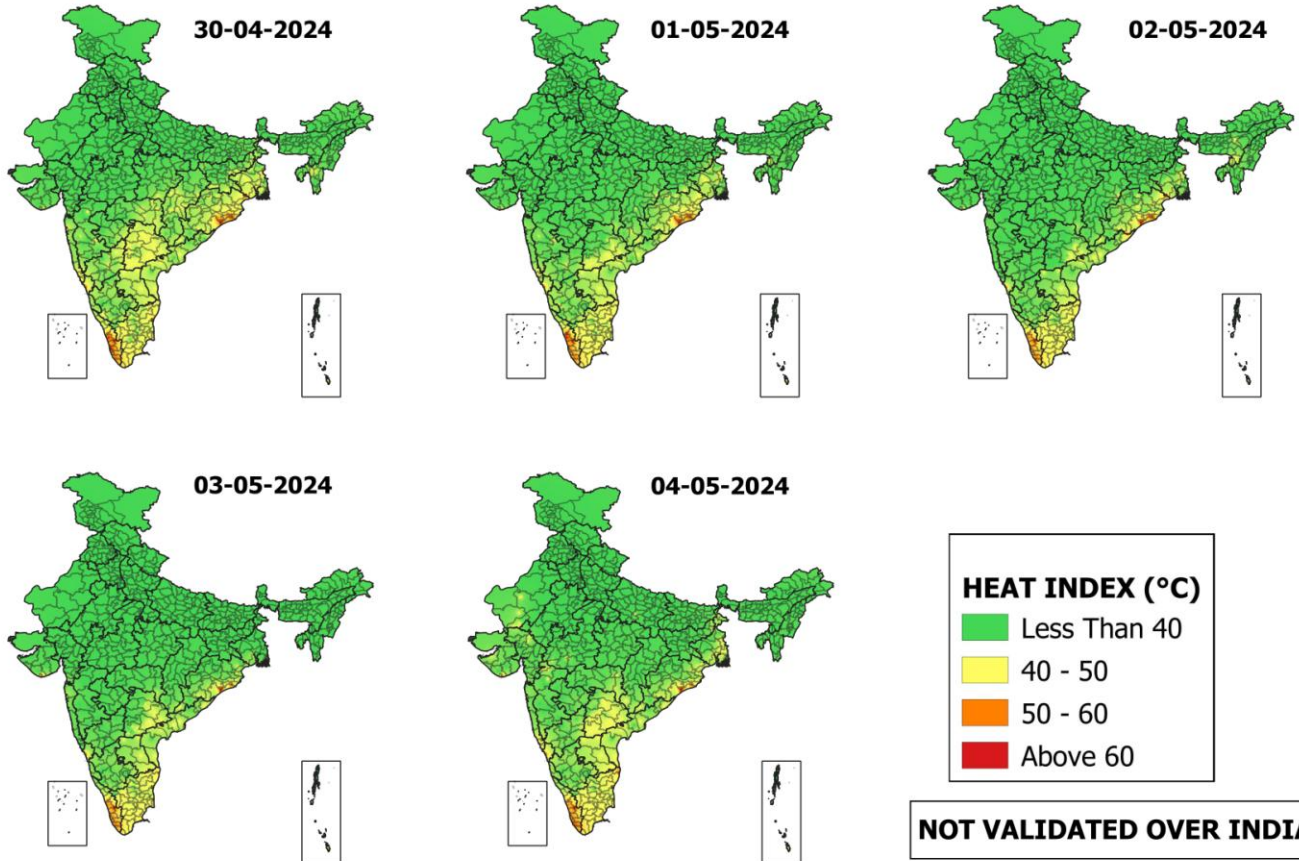
Orange alert Areas:

1. High temperature, Increased likelihood of heat illness symptoms in people who are either exposed to sun for a prolonged period or doing heavy work. High health concern for vulnerable people e.g. infants, elderly, people with chronic diseases.
2. Drink sufficient water- even if not thirsty, Use ORS, homemade drinks like lassi, torani (rice water), lemon water, buttermilk, etc. to keep yourself hydrated.

Red alert Areas:

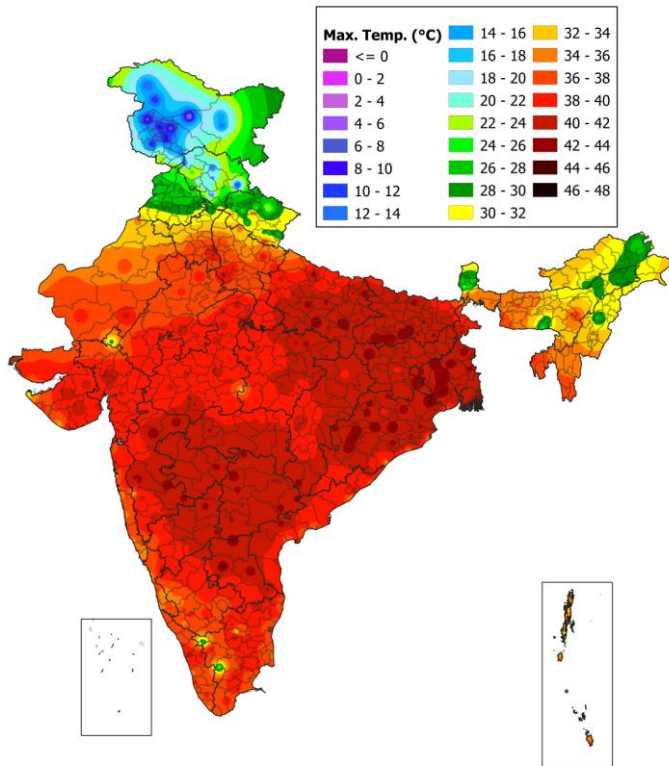
1. Very high likelihood of developing heat illness and heat stroke in all ages.
2. Extreme care needed for vulnerable people.

HEAT INDEX (EXPERIMENTAL FORECAST) DATED 30-04-2024

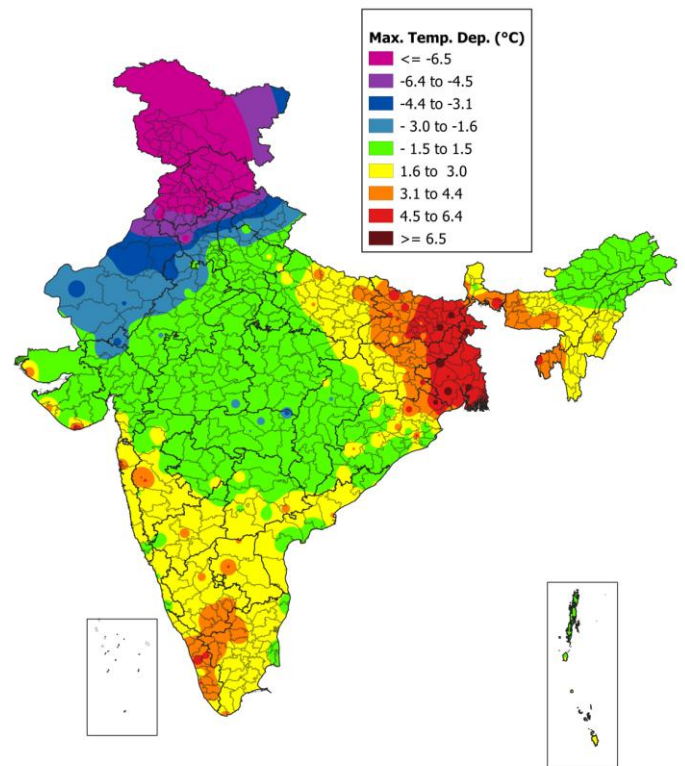


Annexure 1

Maximum Temperature Dated 29/04/2024

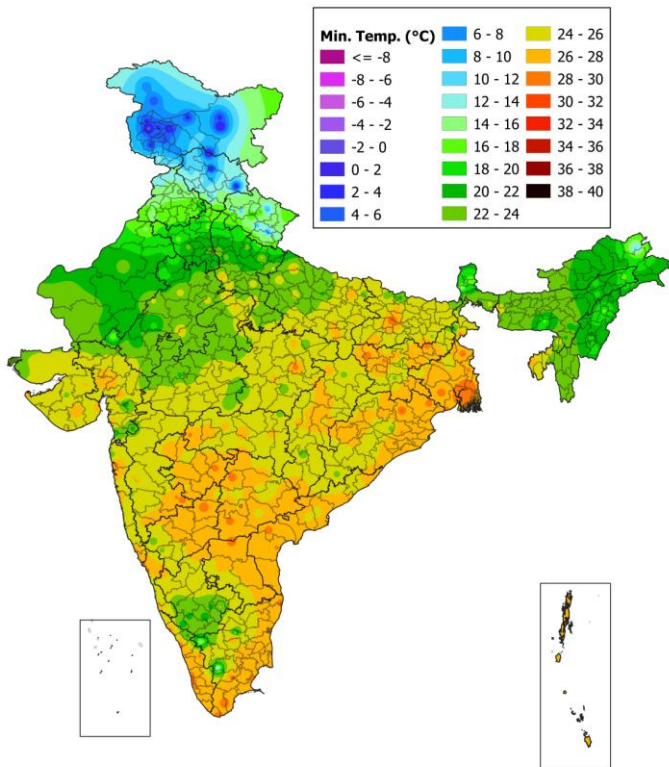


Max Temperature Departure Dated 29/04/2024

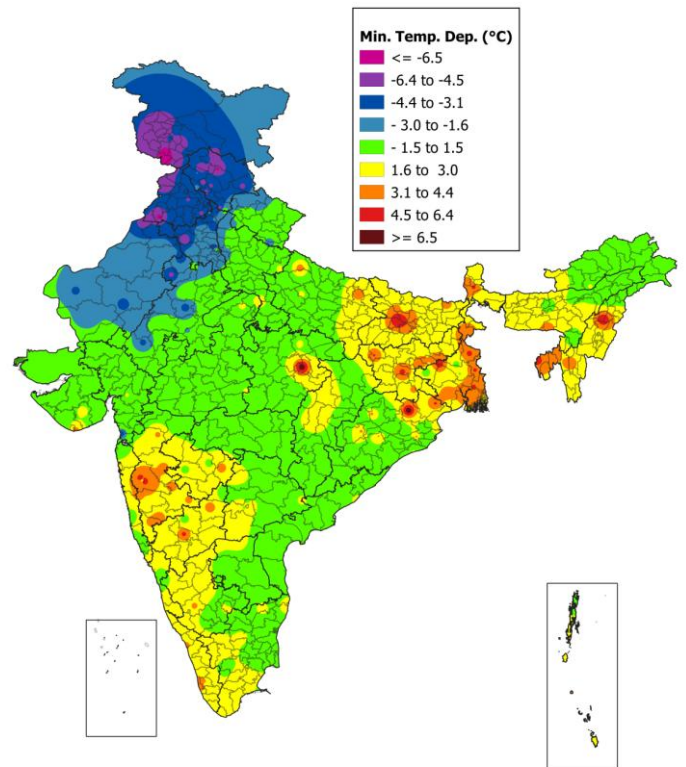


Annexure 2

Minimum Temperature Dated 30/04/2024

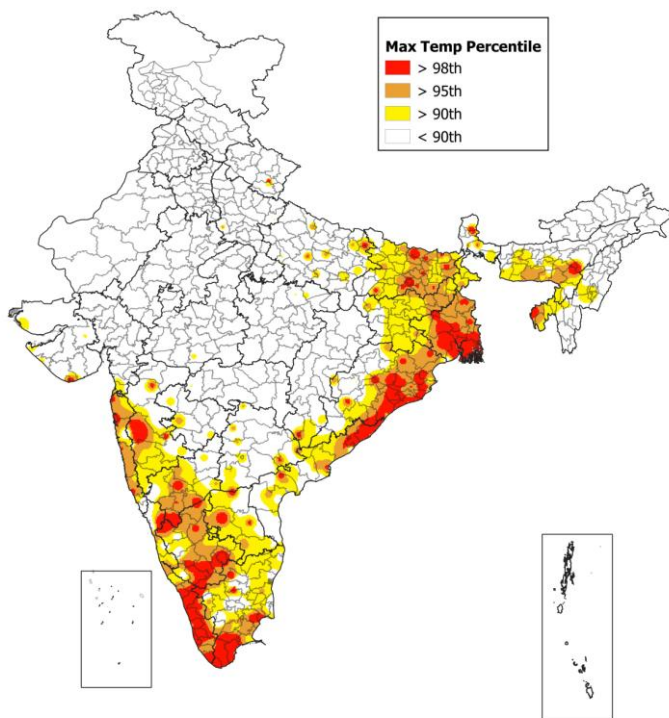


Min Temperature Departure Dated 30/04/2024

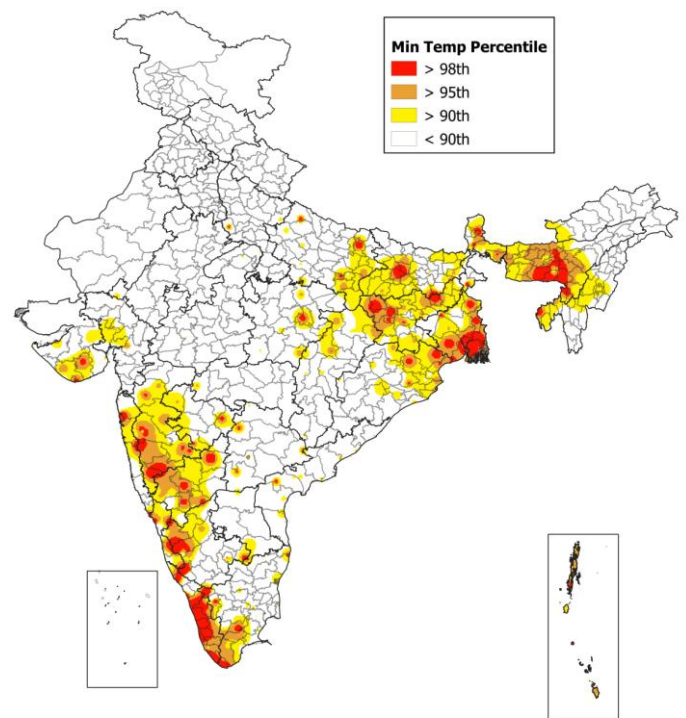


Annexure 3

Max Temp Percentile Dated 29/04/2024

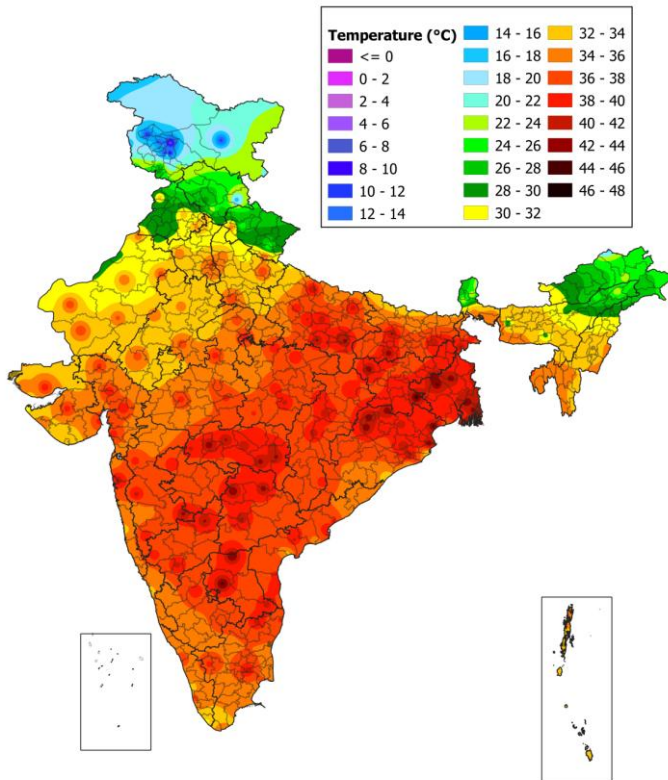


Min Temp Percentile Dated 30/04/2024

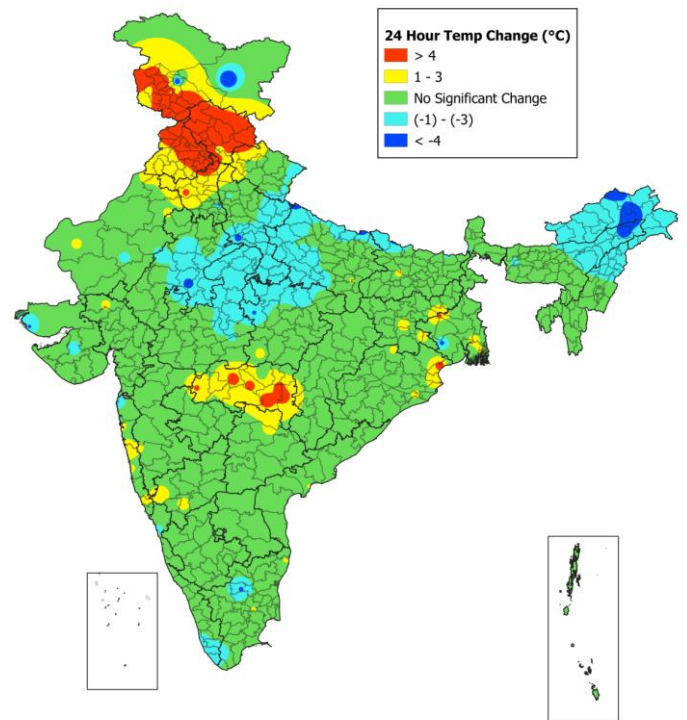


Annexure 4

Observed Temperature at 1430 hrs IST Dated 30/04/2024

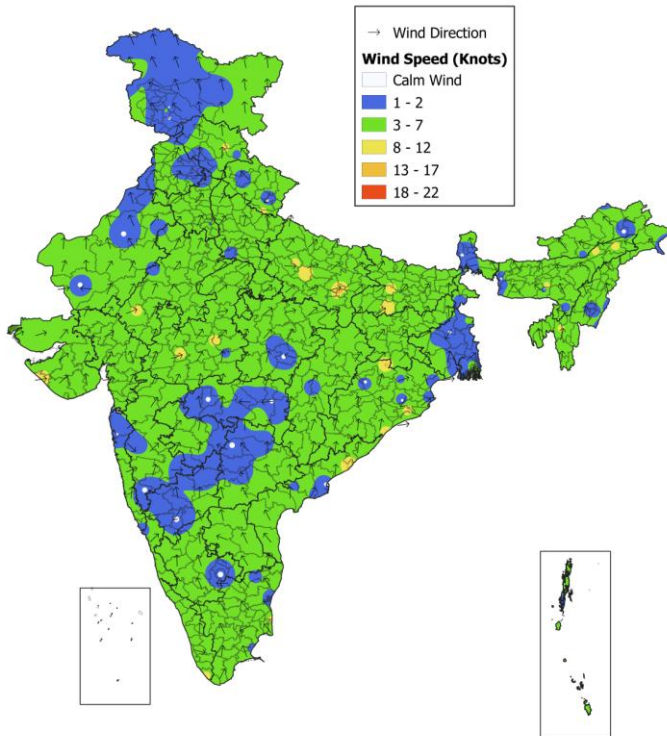


24 hrs Temperature Change at 1430 hrs IST Dated 30/04/2024

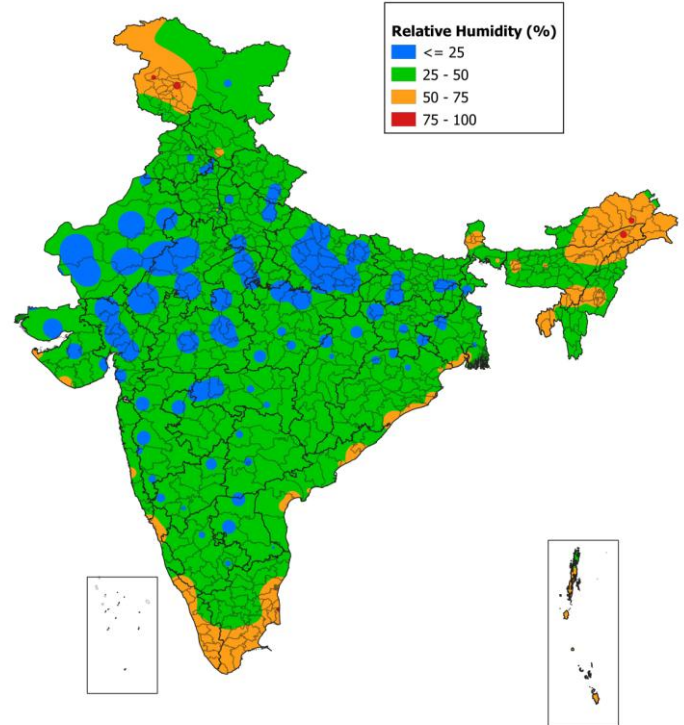


Annexure 5

Wind Map at 1430 hrs IST Dated 30/04/2024



Relative Humidity at 1430 Hrs IST Dated 30/04/2024



For Districtwise heat wave warning visit:

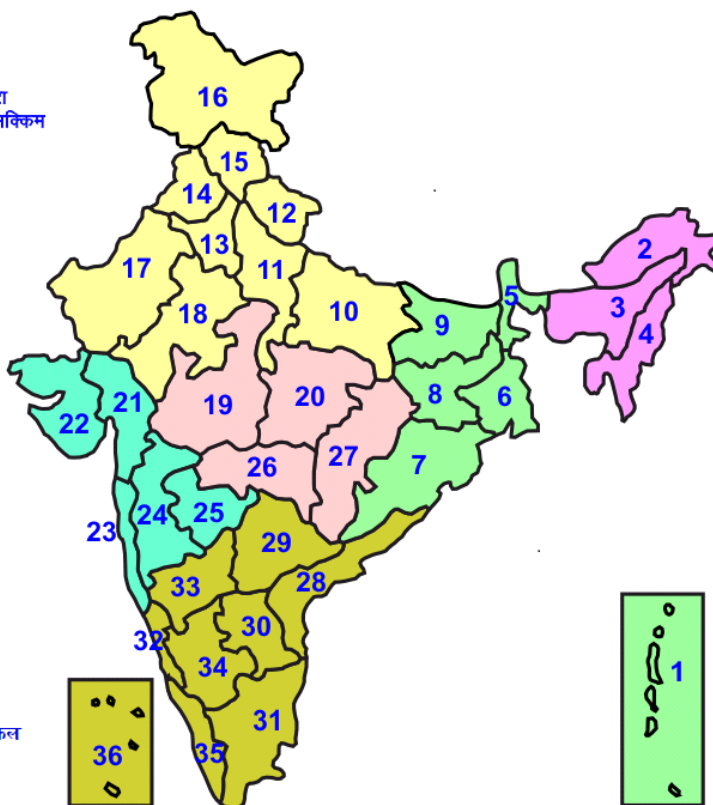
<https://mausam.imd.gov.in/responsive/districtWiseHeatwaveWarning.php>

For GIS Based Heat Wave Warning visit:

http://103.215.208.18/dwr_img/GIS/heatwave.html

LEGENDS

- 1 अंडमान और निकोबार द्वीप समुह
- 2 अरुणाचल प्रदेश
- 3 असम और मेघालय
- 4 नागालैंड मनीपुर मीजोरम और त्रिपुरा
- 5 उप हिमालय पश्चिम बंगाल एवं सिक्किम
- 6 पश्चिम गंगेय बंगाल
- 7 ओडिसा
- 8 झारखंड
- 9 बिहार
- 10 पूर्वी उत्तर प्रदेश
- 11 पश्चिम उत्तर प्रदेश
- 12 उत्तराखंड
- 13 हरियाणा चंडिगढ़ एवं दिल्ली
- 14 पंजाब
- 15 हिमाचल प्रदेश
- 16 जम्मू एवं कश्मीर एवं लद्दाख
- 17 पश्चिम राजस्थान
- 18 पूर्वी राजस्थान
- 19 पश्चिम मध्य प्रदेश
- 20 पूर्वी मध्य प्रदेश
- 21 गुजरात क्षेत्र
- 22 सौराष्ट्र एवं कच्छ
- 23 कोंकण एवं गोवा
- 24 मध्य महाराष्ट्र
- 25 मराठावाडा
- 26 विदर्भ
- 27 छत्तीसगढ़
- 28 तटीय आंध्र प्रदेश एवं यनम
- 29 तेलंगाना
- 30 रायलसीमा
- 31 तमिलनाडु, पुदुचेरी एवं कराईकल
- 32 तटिय कर्नाटक
- 33 आंतरिक उत्तरी कर्नाटक
- 34 आंतरिक दक्षिणी कर्नाटक
- 35 केरल एवं माहे
- 36 लक्षद्वीप



1. Andaman & Nicobar Islands
2. Arunachal Pradesh
3. Assam & Meghalaya
4. Nagaland, Manipur, Mizoram & Tripura
5. Sub-Himalayan West Bengal & Sikkim
6. Gangetic West Bengal
7. Orissa
8. Jharkhand
9. Bihar
10. East Uttar Pradesh
11. West Uttar Pradesh
12. Uttarakhand
13. Haryana, Chd & Delhi
14. Punjab
15. Himachal Pradesh
16. Jammu & Kashmir and Ladakh
17. West Rajasthan
18. East Rajasthan
19. West Madhya Pradesh
20. East Madhya Pradesh
21. Gujarat
22. Saurashtra
23. Konkan & Goa
24. Madhya Maharashtra
25. Marathawada
26. Vidharbha
27. Chhattisgarh
28. Coastal Andhra Pradesh & Yanam
29. Telangana
30. Rayalaseema
31. Tamilnadu, Puducherry & Karaikal
32. Coastal Karnataka
33. North Interior Karnataka
34. South Interior Karnataka
35. Kerala & Mahe
36. Lakshadweep

WARNING

WARNING (TAKE ACTION)
ALERT (BE PREPARED)
WATCH (BE UPDATED)
NO WARNING (NO ACTION)

Probabilistic Forecast

Terms	Probability of Occurrence (%)
Unlikely	< 25
Likely	25 - 50
Very Likely	50 - 75
Most Likely	> 75

When maximum temperature of a station reaches $\geq 40^\circ \text{C}$ for plains and $\geq 30^\circ \text{C}$ for hilly regions
(a) Based on Departure from normal

Heat Wave: Maximum Temperature Departure from normal 4.5°C to 6.4°C .

Severe Heat Wave: Maximum Temperature Departure from normal $\geq 6.5^\circ \text{C}$

(b). Based on Actual maximum temperature

Heat Wave: When actual maximum temperature $\geq 45^\circ \text{C}$.

Severe Heat Wave: When actual maximum temperature $\geq 47^\circ \text{C}$

(c). Criteria for heat wave for coastal stations

When maximum temperature departure is $> 4.5^\circ \text{C}$ from normal. Heat Wave may be described provided maximum temperature $\geq 37^\circ \text{C}$

When maximum temperature remains 40°C

Warm Night: When minimum temperature departure 4.5°C to 6.4°C .

Severe Warm Night: When minimum temperature departure $> 6.4^\circ \text{C}$.

Hot and Humid: When maximum temperatures remains 3°C above normal along with the above normal relative humidity.