

Friday, November 1, 2024  
Time of Issue: 1330 hours IST  
(MID-DAY)

## ALL INDIA WEATHER SUMMARY AND FORECAST BULLETIN

### Significant Weather Features:

#### Weather Systems:

- ❖ A **cyclonic circulation** lies over Gulf of Mannar in lower tropospheric levels.

#### Forecast & Warnings (upto 7 days) (Annexure II & III):

- ✓ Light to moderate rainfall at a few places accompanied with isolated thunderstorm and lightning very likely over Tamil Nadu, Puducherry & Karaikal, Karnataka, Kerala & Mahe during 01<sup>st</sup> – 03<sup>rd</sup> November.
- ✓ **Isolated heavy to very heavy rainfall** also very likely over Tamil Nadu, Puducherry & Karaikal and Kerala & Mahe on 01<sup>st</sup> November.
- ✓ **Isolated heavy rainfall** also very likely over Tamil Nadu, Puducherry & Karaikal during 01<sup>st</sup>-03<sup>rd</sup>; Coastal Karnataka and South Interior Karnataka on 01<sup>st</sup> November.

#### ii. Temperature conditions and Forecast

##### Temperature Conditions during past 24 hours till 0830 hours IST of today

There is a fall in both Maximum & Minimum Temperatures over plains of Northwest India by about 2-3°C during past 24 hours. They are above normal by 2-6°C over Northwest India. Minimum Temperatures are above normal by 2-5°C over parts of Central, Western and Eastern India.

##### Forecast of temperature

- ✓ Gradual fall in minimum temperature over North & East India by 2-3°C during 03<sup>rd</sup>-07<sup>th</sup> November.

#### iii. Weather forecast over Delhi/NCR during 31<sup>st</sup> October to 03<sup>rd</sup> November 2024

##### Past Weather:

Currently both Maximum and Minimum temperature over Delhi are at the range of 32-34°C and 15-20°C respectively. These are above normal by 2 - 4°C. Mainly clear sky condition with predominant surface wind from Northwest directions with wind speed reaching 08 - 16 kmph prevailed during daytime and from Southwest directions with wind speed 04 - 10 kmph during night.

##### Weather Forecast:

**01.11.2024:** Mainly clear sky. The predominant surface wind is likely to be from Northwest directions with wind speed 08 - 16 kmph till evening. It would decrease thereafter becoming less than 08 kmph from Northwest directions during night. Smog/ mist is likely in the night.

**02.11.2024:** Mainly clear sky. The predominant surface wind is likely to be calm during morning hours. Smog/ mist in the morning. The wind speed will gradually increase becoming 08 - 12 kmph from Northeast directions during afternoon. It will decrease thereafter becoming less than 10 kmph from East directions during evening and night. Smog/ mist is likely in the night.

**03.11.2024:** Mainly clear sky. The predominant surface wind is likely to be from East directions with wind speed 04 - 08 kmph during morning hours. Shallow fog/ mist in the morning. The wind speed will gradually increase becoming 06 - 10 kmph from East-South-East directions during afternoon. It will be less than 08 kmph from East directions during evening and night. Smog/shallow fog/ mist is likely in the night.

**04.11.2024:** Mainly clear sky. The predominant surface wind is likely to be from East direction with wind speed upto 08 kmph during morning hours. Shallow fog/ mist in the morning. The wind speed will gradually increase becoming upto 10 kmph from Southeast directions during afternoon. It will be less than 08 kmph from East directions during evening and night. Smog/shallow fog/ mist is likely in the night.

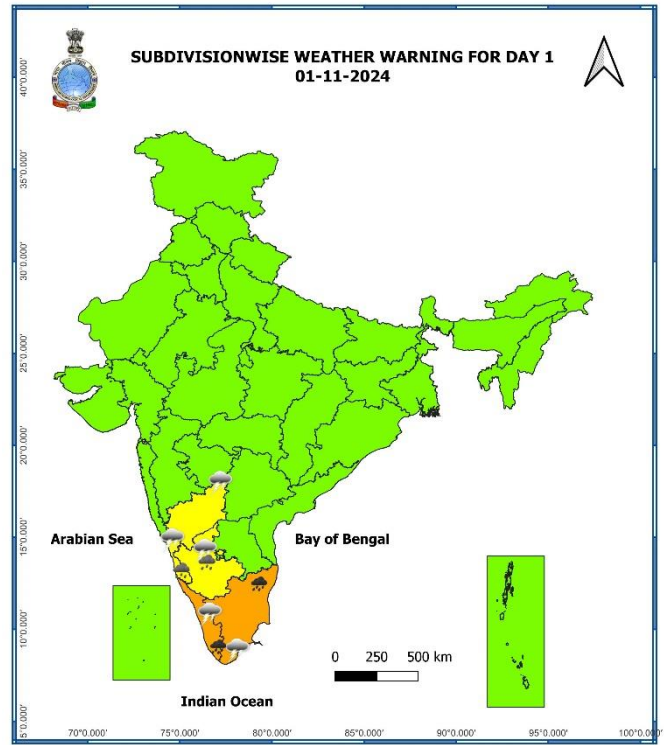
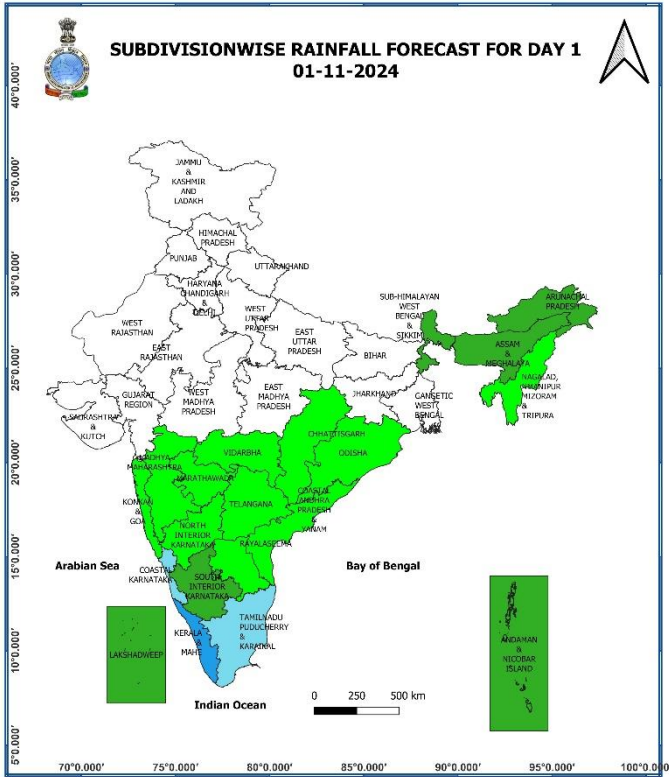
## Main Weather Observations:

- ❖ **Rainfall distribution** (from 0830 hours IST of yesterday to 0830 hours IST of today): **at many places** over Arunachal Pradesh, Sub-Himalayan West Bengal & Sikkim, Konkan & Goa, Kerala & Mahe; at a few places over Assam & Meghalaya, Coastal Karnataka, South Interior Karnataka, Tamil Nadu, Puducherry & Karaikal; **at isolated places** over Vidarbha, Chhattisgarh, Andaman & Nicobar Islands, Gangetic West Bengal, Odisha, Nagaland, Manipur, Mizoram & Tripura, Madhya Maharashtra, Marathwada, North Interior Karnataka, Coastal Andhra Pradesh & Yanam, Telangana, Rayalaseema.
- ❖ **Heavy rainfall recorded** (from 0830 hours IST of yesterday to 0830 hours IST of today): **Heavy rainfall** at isolated places over Konkan & Goa, Tamil Nadu, Puducherry & Karaikal, Kerala & Mahe, Coastal Karnataka.
- ❖ **Significant amount of rainfall** (from 0830 hours IST of yesterday to 0830 hours IST of today) (in cm): **Tamil Nadu:** Kil Kotagiri Estate (dist The Nilgiris) 11, Vint Worth Estate (dist The Nilgiris) 10, Mettupalayam (dist Coimbatore), Periyanaickenpalayam (dist Coimbatore), Thuckalay (dist Kanyakumari) 9 each, Mambzhathuraiyaru (dist Kanyakumari), Anaikedanku (dist Kanyakumari), Attur (dist Salem) 8 each, Rasipuram (dist Namakkal), Usilampatti (dist Madurai), Needamangalam (dist Thiruvurur) 7 each, **Coastal Karnataka:** Shirali Pto (dist Uttara Kannada) 9, **Konkan & Goa:** Devgad (dist Sindhudurg) 9, Ponda (dist North Goa) 9, Mormugao - Pmo Imd (dist South Goa) 7, Mapusa (dist North Goa) 7, **Kerala & Mahe:** Vellanikkara (dist Thrissur) 7.
- ❖ **Minimum Temperature Departures (as on 01-11-2024):** Minimum temperatures are **markedly above normal (5.1°C or more)** at isolated places over East Uttar Pradesh, West Rajasthan, Odisha, Madhya Maharashtra; **appreciably above normal (3.1°C to 5.0°C)** at a few places over East Uttar Pradesh, Konkan & Goa; at isolated places over Jammu-Kashmir-Ladakh-Gilgit-Baltistan-Muzaffarabad, Punjab, East Rajasthan, Madhya Pradesh, Telangana, Bihar, Gangetic West Bengal, Assam & Meghalaya; **above normal (1.6°C to 3.0°C)** at a few places over Coastal Andhra Pradesh & Yanam, Rayalaseema; at isolated places over Himachal Pradesh, Uttarakhand, Chhattisgarh, Sub-Himalayan West Bengal & Sikkim, Gujarat state, Vidarbha, Tamil Nadu, Puducherry & Karaikal, Interior Karnataka, Kerala & Mahe. Today, **the lowest minimum temperature** of **14.9°C** is reported at **Delhi (Ridge)** over the plains of the country. **(Fig.4)**
- ❖ **Maximum Temperature Departures (as on 31-10-2024):** Maximum temperatures were **markedly above normal (5.1°C or more)** at isolated places over East Uttar Pradesh, East Madhya Pradesh, Gangetic West Bengal, Chhattisgarh; **appreciably above normal (3.1°C to 5.0°C)** at many places over Odisha, Jharkhand; at a few places over Gujarat Region, Vidarbha; at isolated places over Jammu-Kashmir-Ladakh-Gilgit-Baltistan-Muzaffarabad, Himachal Pradesh, Punjab, Haryana-Chandigarh-Delhi, West Uttar Pradesh, Rajasthan, West Madhya Pradesh, Saurashtra & Kutch, Marathwada, Tamil Nadu, Puducherry & Karaikal; **above normal (1.6°C to 3.0°C)** at many places over Lakshadweep, Kerala & Mahe, Coastal Andhra Pradesh & Yanam, Rayalaseema, Bihar, Uttarakhand; at a few places over Telangana; at isolated places over Interior Karnataka. These were **markedly below normal (-5.1°C or less)** at isolated places over Arunachal Pradesh and Assam & Meghalaya and near normal over rest parts of the country. Yesterday, **the highest maximum temperature** of **39.6°C** was reported at **Deesa (Gujarat)** over the country. **(Fig. 2)**

## Meteorological Analysis (Based on 0830 hours IST)

- ❖ A **cyclonic circulation** lies over northeast Assam between 3.1 & 4.5 km above mean sea level.
- ❖ A **cyclonic circulation** lies over west Assam and extends upto 1.5 km above mean sea level.
- ❖ A **cyclonic circulation** lies over Gulf of Mannar & neighbourhood and extends upto 3.6 km above mean sea level.
- ❖ The **upper air cyclonic circulation** over southwest Bay of Bengal off south Andhra Pradesh between 3.1 & 5.8 km above mean sea level has become less marked.
- ❖ The **upper air cyclonic circulation** over Southwest Arabian Sea extending upto 1.5 km above mean sea level has become less marked.
- ❖ The **upper air cyclonic circulation** over northeast Assam at 1.5 km above mean sea level has become less marked.
- ❖ The **cyclonic circulation** over Gulf of Mannar & neighbourhood at 0.9 km above mean sea level has become less marked.

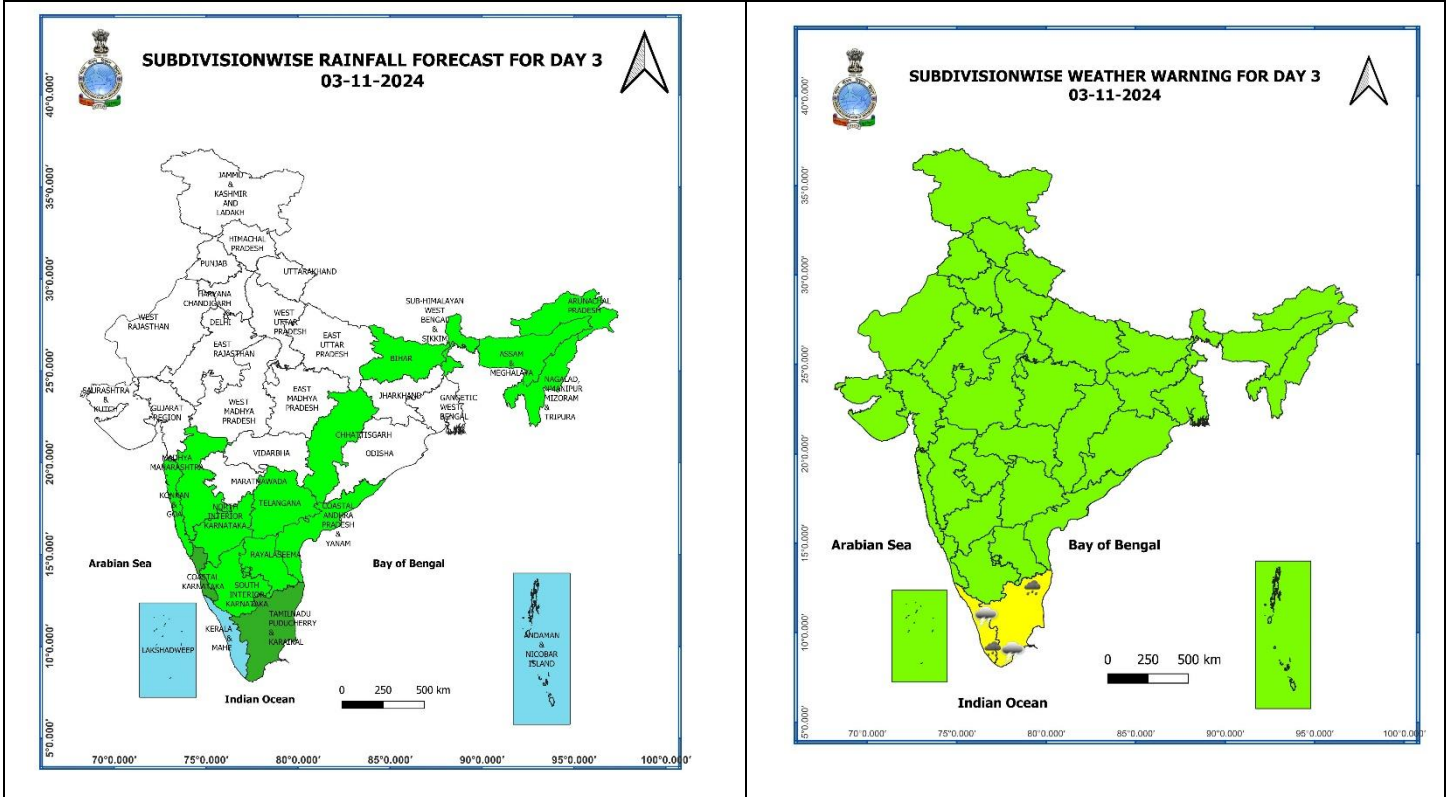
**Weather Forecast & Warnings for next 7 days (Upto 0830 hours IST of 08<sup>th</sup> November, 2024)**



**01 November (Day 1):**

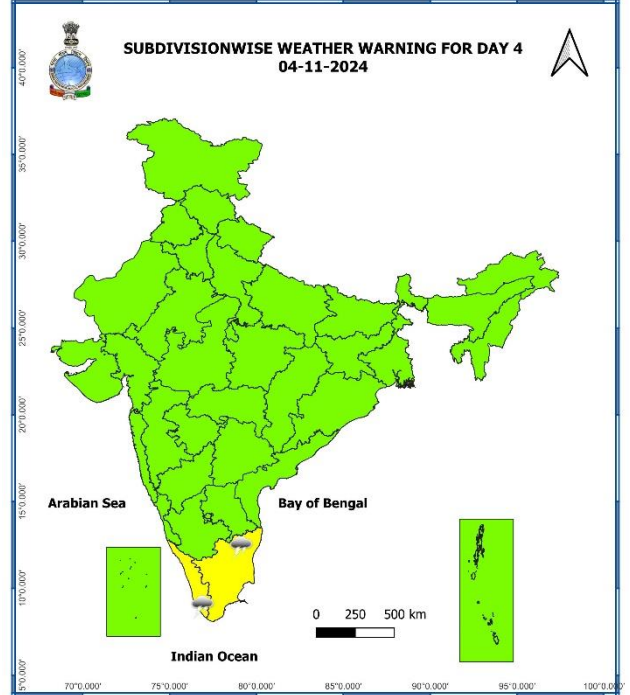
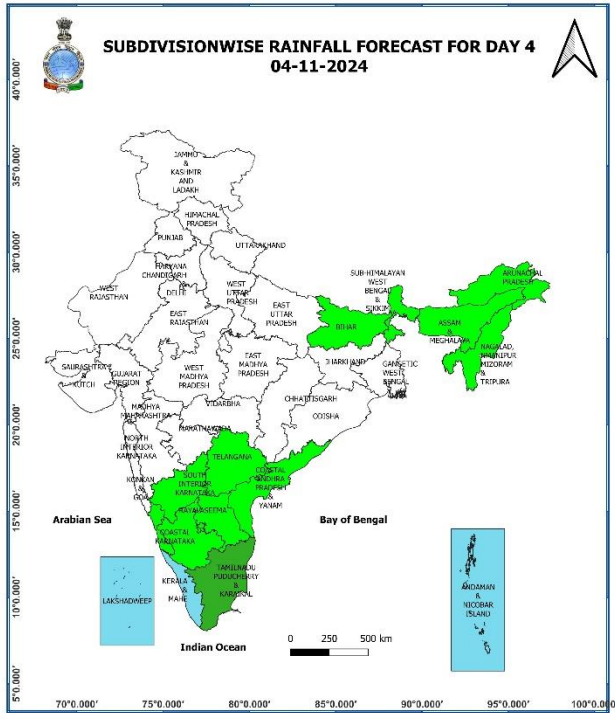
- ❖ **Heavy to very heavy rainfall ( $\geq 12$  cm)** very likely at isolated places over Tamil Nadu, Puducherry & Karaikal, Kerala & Mahe; **Heavy rainfall ( $\geq 7$  cm)** likely at isolated places over Coastal & South Interior Karnataka.
- ❖ **Thunderstorm accompanied gusty winds (speed reaching 30-40 kmph)** very likely at isolated places over Kerala & Mahe; **with lightning** likely at isolated places over Chhattisgarh, Konkan & Goa, Madhya Maharashtra, Marathwada, Tamil Nadu, Puducherry & Karaikal, Karnataka, Coastal Andhra Pradesh & Yanam, Rayalaseema, Telangana.
- ❖ **Squally weather with wind speed 35 kmph to 45 kmph gusting to 55 kmph** likely over along and off Kerala coast, Comorin area, Gulf of Mannar. Fishermen are advised not to venture into these areas.





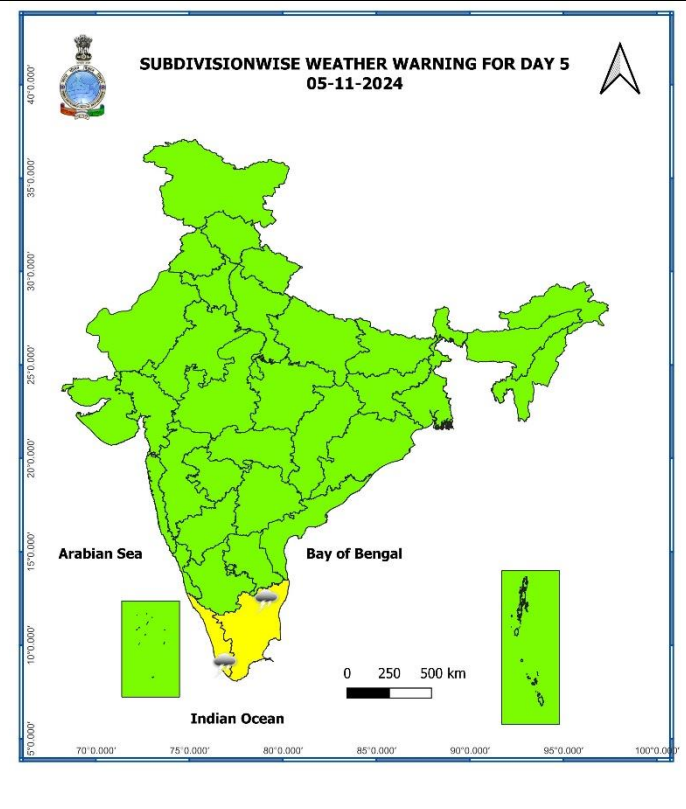
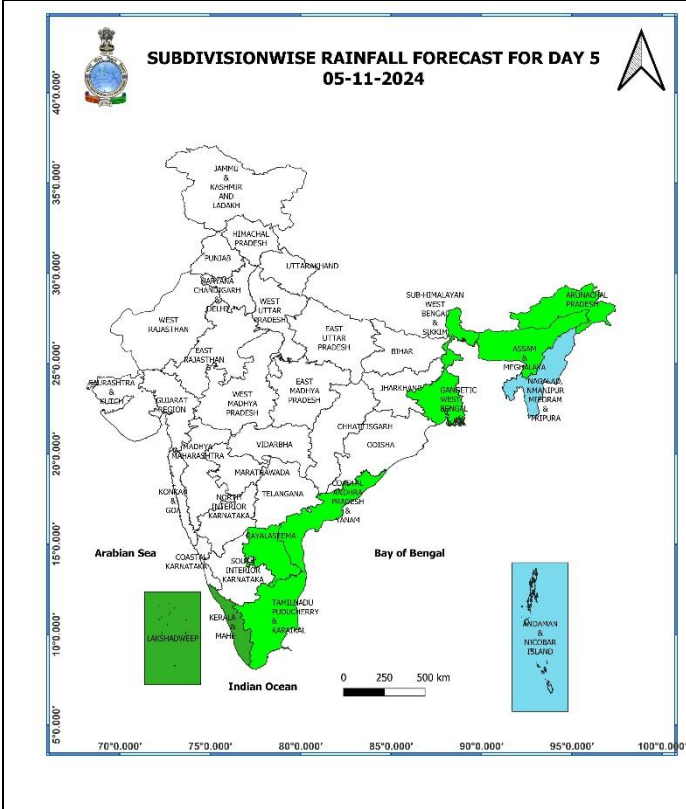
**03 November (Day 3):**

- ❖ **Heavy rainfall ( $\geq 7$  cm)** likely at isolated places over Tamil Nadu, Puducherry & Karaikal, Kerala & Mahe.
- ❖ **Thunderstorm accompanied with lightning** likely at isolated places over Kerala & Mahe, Tamil Nadu, Puducherry & Karaikal.



### 04 November (Day 4):

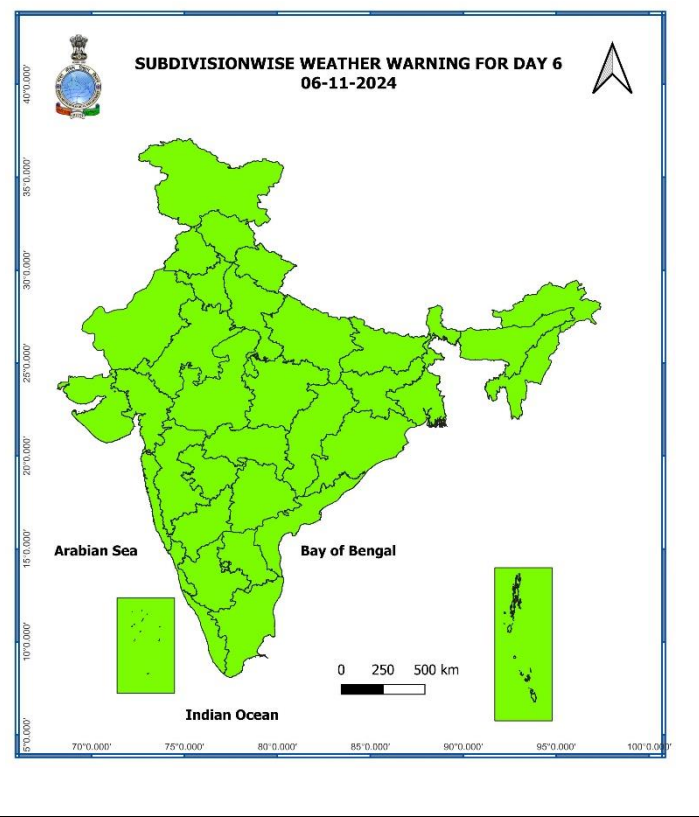
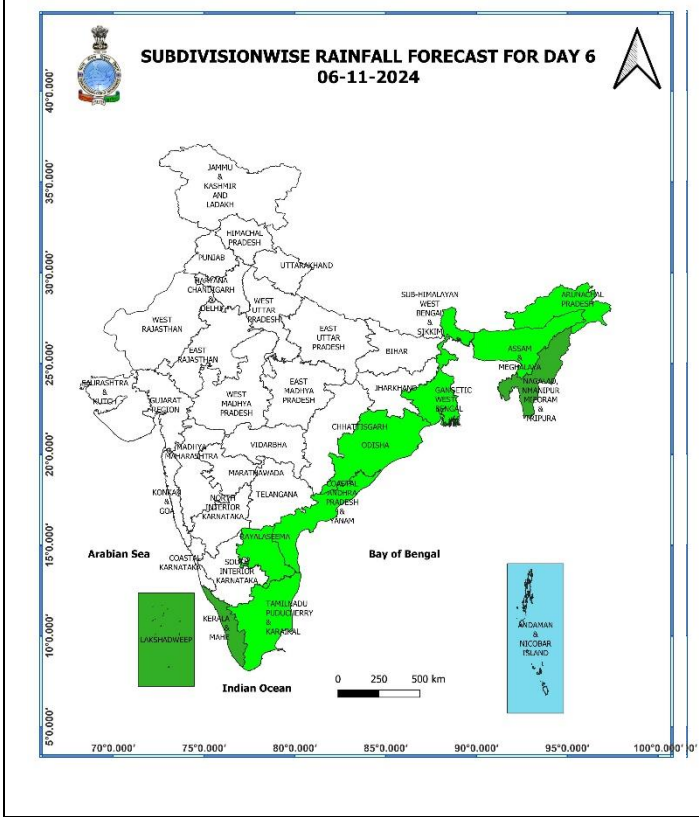
- ❖ **Thunderstorm accompanied with lightning** likely at isolated places over Kerala & Mahe, Tamil Nadu, Puducherry & Karaikal.



**05 November (Day 5):**

- ❖ **Thunderstorm accompanied with lightning** likely at isolated places over Nagaland, Manipur, Mizoram & Tripura, Coastal Andhra Pradesh & Yanam, Kerala & Mahe, Tamil Nadu, Puducherry & Karaikal.

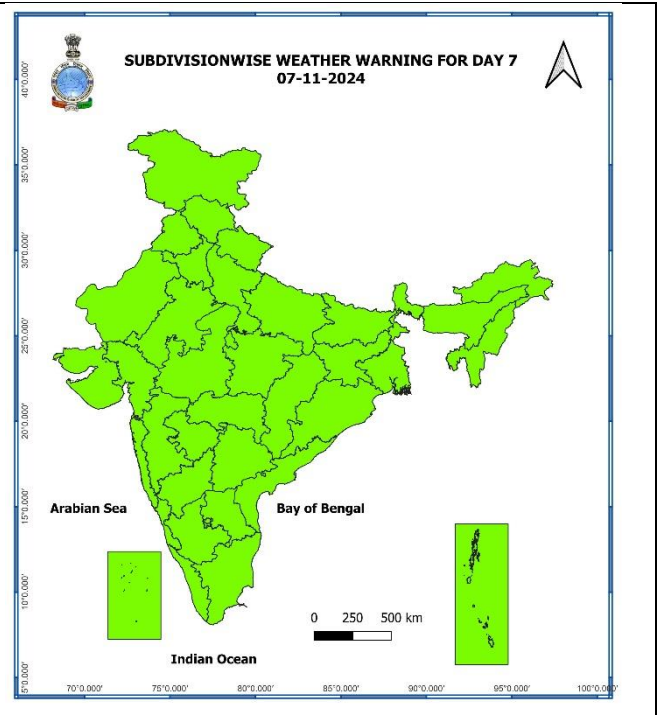
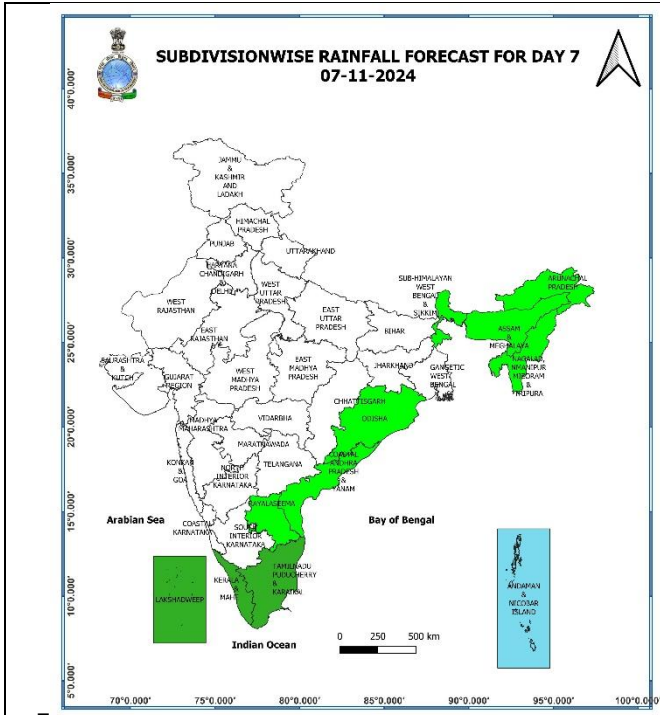




**06 November (Day 6):**

❖ **No weather warning.**

\* Red colour warning does not mean "Red Alert", Red colour warning means "Take Action".  
Forecast and Warning for any day is valid from 0830 hours IST of day till 0830 hours IST of next day.  
For more details, kindly visit <https://mausam.imd.gov.in> or contact: 011-2434-4599  
(Service to the Nation since 1875)



**07 November (Day 7):**

❖ **No weather warning.**

**Weather Outlook for subsequent 3 days (During 08<sup>th</sup> November – 10<sup>th</sup> November, 2024)**

- ❖ Isolated to Scattered light rainfall likely over some parts of Jammu-Kashmir-Ladakh-Gilgit-Baltistan-Muzaffarabad, Tamil Nadu, Puducherry & Karaikal, Kerala & Mahe and Northeast India.
- ❖ Mainly dry weather will prevail over rest parts of country.

- Action may be taken based on **ORANGE AND RED COLOUR** warnings.
- Vulnerable regions likely urban and hilly areas action may be initiated for heavy rainfall warning.
- As the lead period increases forecast accuracy decreases.

\* Red colour warning does not mean "Red Alert", Red colour warning means "Take Action".  
Forecast and Warning for any day is valid from 0830 hours IST of day till 0830 hours IST of next day.  
For more details, kindly visit <https://mausam.imd.gov.in> or contact: 011-2434-4599  
(Service to the Nation since 1875)

## Impact due to

- ❖ **Isolated heavy to very heavy rainfall** very likely over Tamil Nadu, Puducherry & Karaikal, Kerala & Mahe on 01<sup>st</sup> November, 2024.

## Impact Expected

- ✓ Localized Flooding of roads, water logging in low lying areas and closure of underpasses mainly in urban areas of the above region.
- ✓ Occasional reduction in visibility due to heavy rainfall.
- ✓ Disruption of traffic in major cities and roadways due to water logging in roads leading to increased travel time.
- ✓ Minor damage to kutcha roads.
- ✓ Possibilities of damage to vulnerable structure.
- ✓ Localized Landslides/Mudslides/landslips/mud slips/land sinks/mud sinks.
- ✓ Damage to horticulture and standing crops in some areas due to inundation and wind.
- ✓ It may lead to riverine flooding in some river catchments (for riverine flooding please visit Web page of CWC)

## Action Suggested

- ✓ Judicious regulation of surface transports including railways and roadways.
- ✓ Check for traffic congestion on your route before leaving for your destination.
- ✓ Follow any traffic advisories that are issued in this regard.
- ✓ Avoid going to areas that face the water logging problems often.
- ✓ Avoid staying in vulnerable structure.

## Agromet advisories for Heavy Rainfall likely over various parts of the country

- ✓ In **Tamil Nadu**, drain out excess water from paddy and other field crops, vegetables and orchards. Undertake detrashing and propping of more than five-months-old sugarcane to avoid lodging. Provide support to banana plantations.
- ✓ Drain out excess water from the standing crops in Kerala, Coastal Karnataka and South Interior Karnataka.
- ✓ Keep the harvested produce at safer places.
- ✓ Provide mechanical support to horticultural crops and staking to vegetables.

Fig. 1: Maximum Temperatures

Fig. 2: Departure of Maximum Temperatures

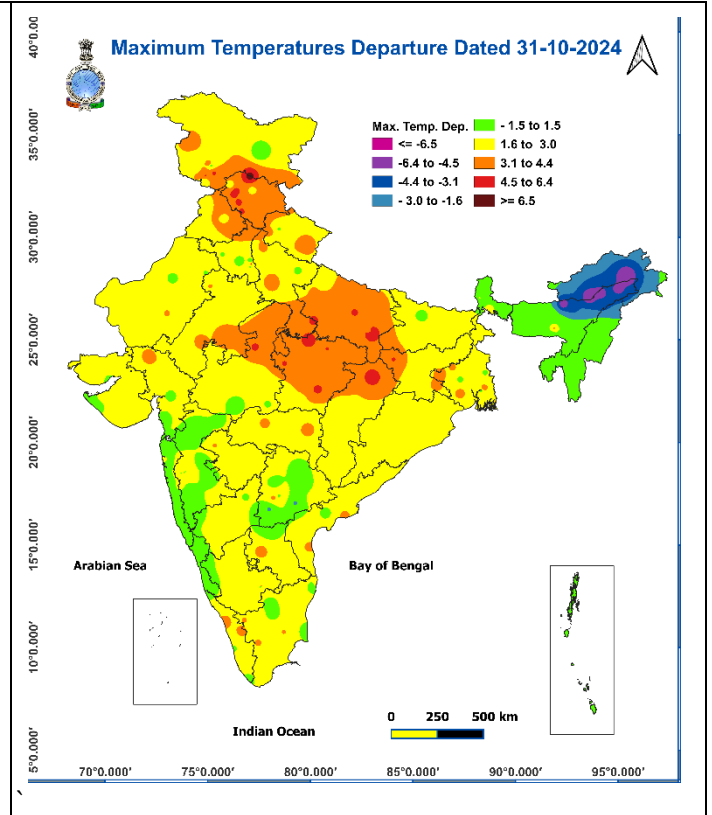
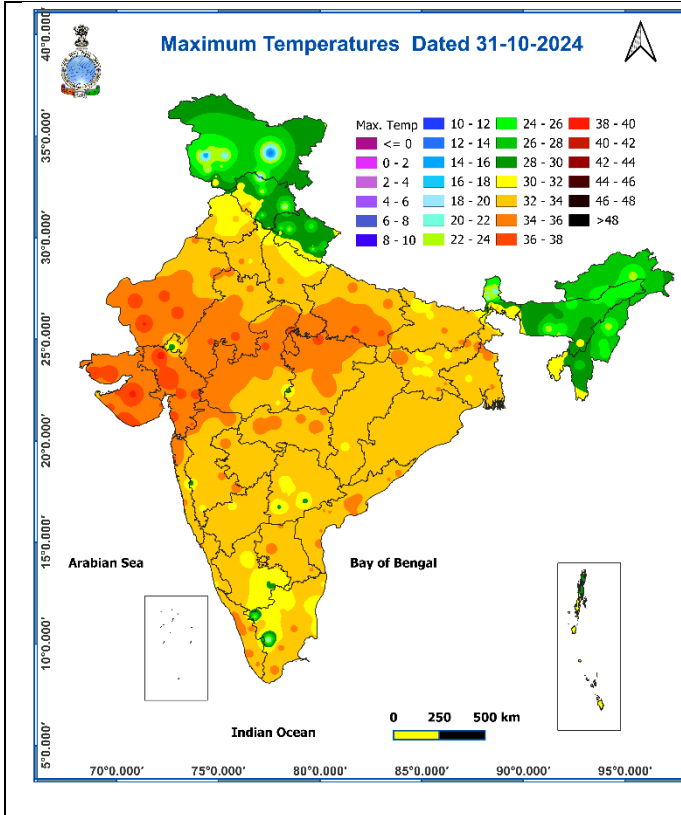


Fig. 3: Minimum Temperatures

Fig. 4: Departure of Minimum Temperatures

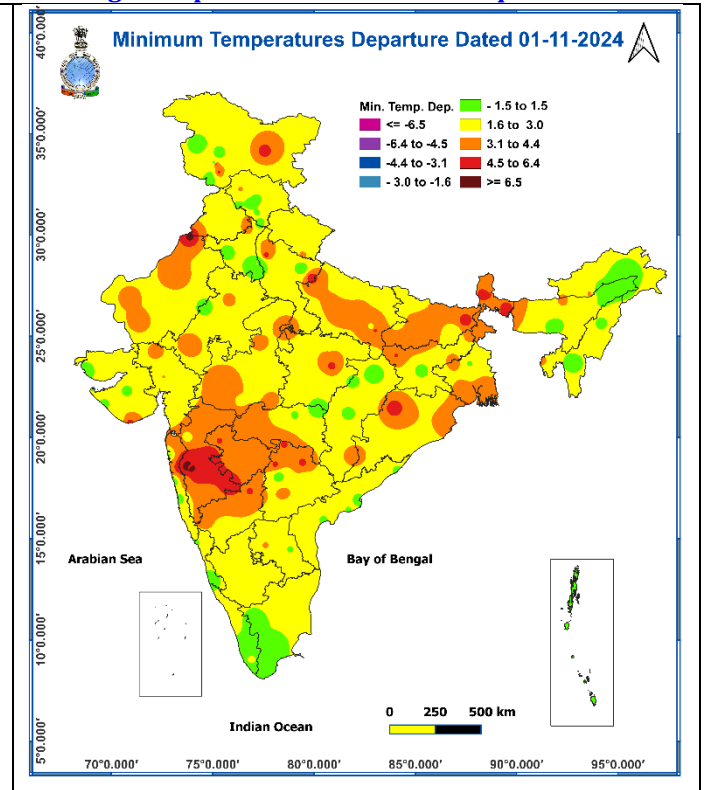
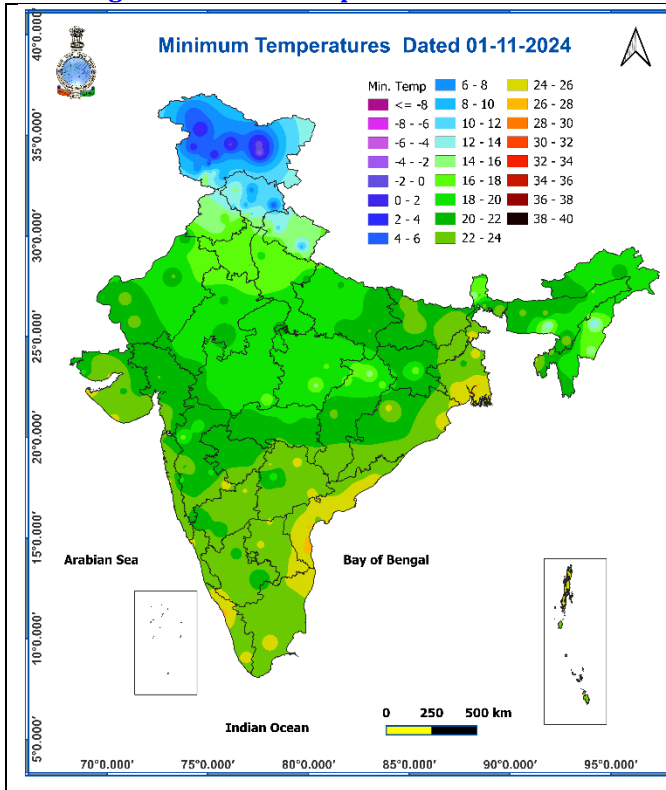
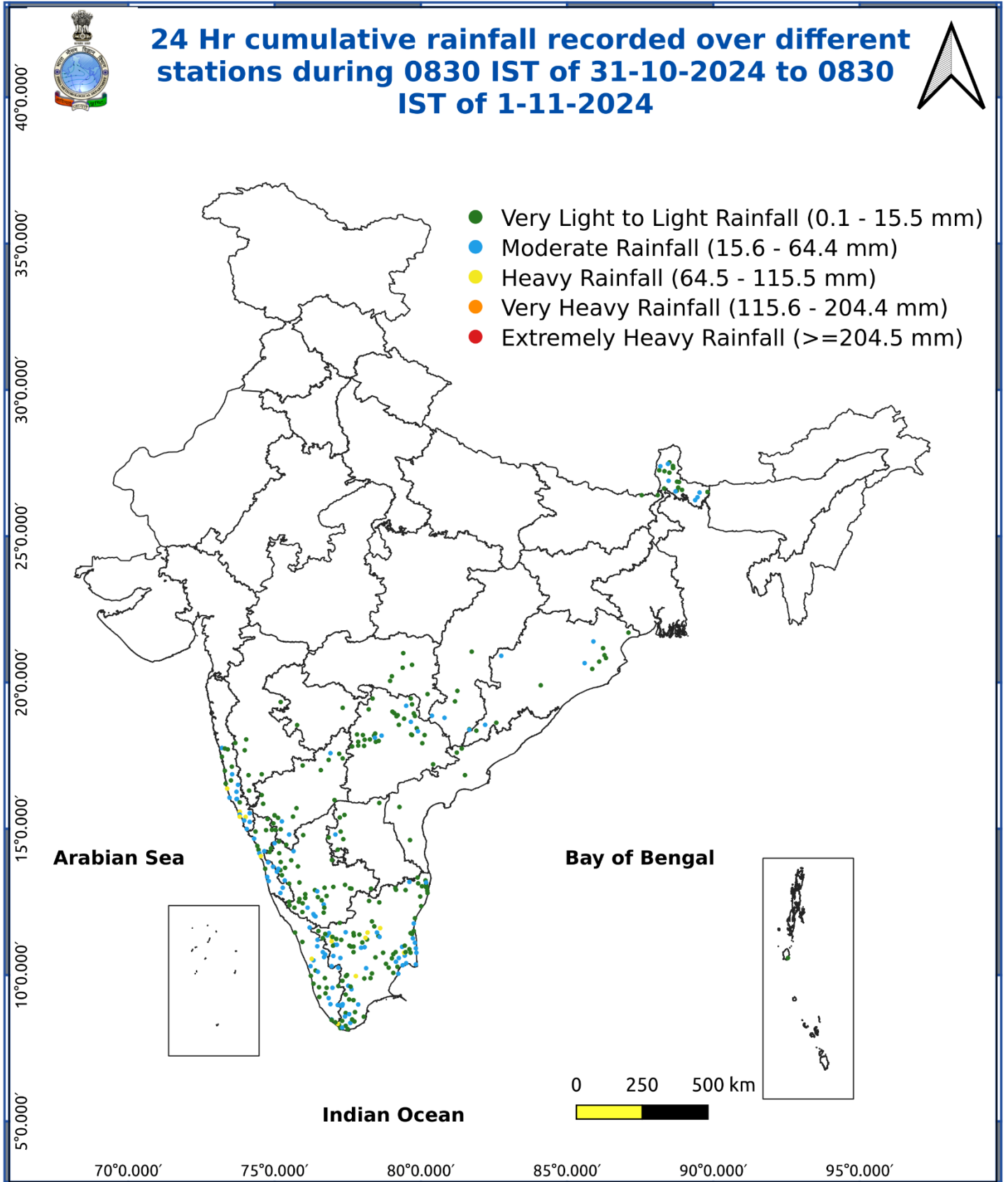


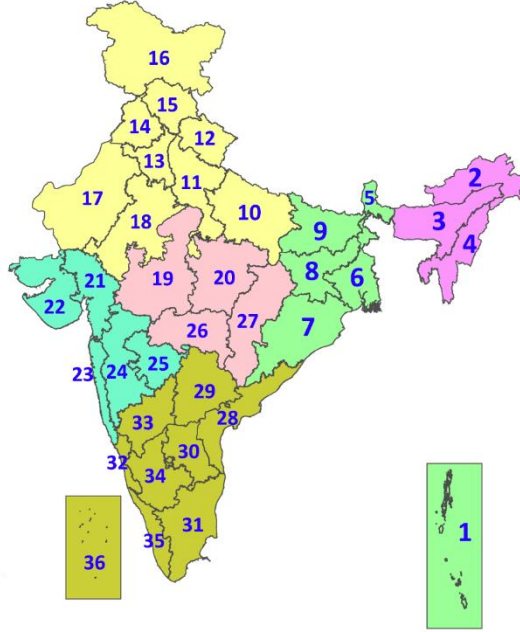
Fig. 5: Accumulated Rainfall (mm) during past 24 hours



\* Red colour warning does not mean "Red Alert", Red colour warning means "Take Action".  
Forecast and Warning for any day is valid from 0830 hours IST of day till 0830 hours IST of next day.  
For more details, kindly visit <https://mausam.imd.gov.in> or contact: 011-2434-4599  
(Service to the Nation since 1875)

## LEGENDS

1. अंडमान और निकोबार द्वीपसमूह
2. अरुणाचल प्रदेश
3. असम और मेघालय
4. नागालैंड, मणिपुर, मिजोरम और त्रिपुरा
5. उप-हिमालयी पश्चिम बंगाल और सिक्किम
6. गंगीय पश्चिम बंगाल
7. ओडिशा
8. झारखंड
9. बिहार
10. पूर्वी उत्तर प्रदेश
11. पश्चिम उत्तर प्रदेश
12. उत्तराखंड
13. हरियाणा, चंडीगढ़ और दिल्ली
14. पंजाब
15. हिमाचल प्रदेश
16. जम्मू और कश्मीर और लद्दाख
17. पश्चिम राजस्थान
18. पूर्वी राजस्थान
19. पश्चिम मध्य प्रदेश
20. पूर्वी मध्य प्रदेश
21. गुजरात
22. सौराष्ट्र
23. कोंकण और गोवा
24. मध्य महाराष्ट्र
25. मराठवाड़ा
26. विदर्भ
27. छत्तीसगढ़
28. तटीय आंध्र प्रदेश और यनम
29. तेलंगाना
30. रायलसीमा
31. तमिलनाडु, पुडुचेरी और कराईकल
32. तटीय कर्नाटक
33. आंतरिक उत्तरी कर्नाटक
34. आंतरिक दक्षिणी कर्नाटक
35. केरल और 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. Odisha
8. Jharkhand
9. Bihar
10. East Uttar Pradesh
11. West Uttar Pradesh
12. Uttarakhand
13. Haryana, Chandigarh & 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. Marathwada
26. Vidarbha
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

## SPATIAL DISTRIBUTION (% of Stations reporting)

| % 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)              |

- |                      |                      |              |
|----------------------|----------------------|--------------|
| Fog                  | Heavy Snow           | Cold Wave    |
| Heavy Rain           | Dust Storm           | Cold Day     |
| Very Heavy Rain      | Heat Wave            | Ground Frost |
| Extremely Heavy Rain | Warm Night           |              |
| Thunder & Lightning  | Hot Day              |              |
| Hailstorm            | Hot & Humid          |              |
| Dust Raising Winds   | Strong Surface Winds |              |

### COLOUR CODED WARNING

|                                    |
|------------------------------------|
| No Warning (No Action)             |
| Watch (Be Aware)                   |
| Alert (Be Prepared To Take Action) |
| Warning (Take Action)              |

### Probabilistic Forecast

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

## DEFINITION/CRITERIA

|                        |   |
|------------------------|---|
| <b>Rain/ Snow *</b>    | <p><b>Heavy:</b> 64.5 to 115.5 mm/cm *</p> <p><b>Very Heavy:</b> 115.6 to 204.4 mm/cm*</p> <p><b>Extremely Heavy:</b> &gt; 204.4 mm/cm *</p>  |
| <b>Heat Wave</b>       | <p><b>When maximum temperature of a station reaches <math>\geq 40^\circ\text{C}</math> for plains and <math>\geq 30^\circ\text{C}</math> for hilly regions</b></p> <p><b>(a) Based on Departure from normal</b></p> <p><b>Heat Wave:</b> Maximum Temperature Departure from normal <math>4.5^\circ\text{C}</math> to <math>6.4^\circ\text{C}</math>.</p> <p><b>Severe Heat Wave:</b> Maximum Temperature Departure from normal <math>\geq 6.5^\circ\text{C}</math></p> <p><b>(b). Based on Actual maximum temperature</b></p> <p><b>Heat Wave:</b> When actual maximum temperature <math>\geq 45^\circ\text{C}</math>.</p> <p><b>Severe Heat Wave:</b> When actual maximum temperature <math>\geq 47^\circ\text{C}</math></p> <p><b>( c). Criteria for heat wave for coastal stations</b></p> <p>When maximum temperature departure is <math>&gt;4.5^\circ\text{C}</math> from normal. Heat Wave may be described provided maximum temperature <math>\geq 37^\circ\text{C}</math></p> |
| <b>Warm Night</b>      | <p><b>When maximum temperature remains <math>40^\circ\text{C}</math></b></p> <p><b>Warm Night:</b> When minimum temperature departure <math>4.5^\circ\text{C}</math> to <math>6.4^\circ\text{C}</math>.</p> <p><b>Severe Warm Night:</b> When minimum temperature departure <math>&gt;6.4^\circ\text{C}</math>.</p>   |
| <b>Cold Wave</b>       | <p><b>When minimum temperature of a station <math>\leq 10^\circ\text{C}</math> for plains and <math>\leq 0^\circ\text{C}</math> for hilly regions.</b></p> <p><b>(a). Based on departure</b></p> <p><b>Cold Wave:</b> Minimum Temperature Departure from normal <math>-4.5^\circ\text{C}</math> to <math>-6.4^\circ\text{C}</math>.</p> <p><b>Severe Cold Wave:</b> Minimum Temperature Departure from normal <math>\leq -6.5^\circ\text{C}</math></p> <p><b>(b) Based on actual Minimum Temperature (for Plains only)</b></p> <p><b>Cold Wave :</b> When Minimum Temperature is <math>\leq 4.0^\circ\text{C}</math></p> <p><b>Severe Cold Wave:</b> When Minimum Temperature is <math>\leq 2.0^\circ\text{C}</math></p> <p><b>( c) For Coastal Stations</b></p> <p>When Minimum Temperature departure is <math>\leq -4.5^\circ\text{C}</math> &amp; actual Minimum Temperature is <math>\leq 15^\circ\text{C}</math></p>   |
| <b>Cold Day</b>        | <p><b>When minimum temperature of a station <math>\leq 10^\circ\text{C}</math> for plains and <math>\leq 0^\circ\text{C}</math> for hilly regions</b></p> <p><b>Based on departure</b></p> <p><b>Cold Day:</b> Maximum Temperature Departure from normal <math>-4.5^\circ\text{C}</math> to <math>-6.4^\circ\text{C}</math>.</p> <p><b>Severe Cold Day:</b> Maximum Temperature Departure from normal <math>\leq -6.5^\circ\text{C}</math></p>  |
| <b>Fog</b>             | <p><b>Phenomenon of small droplets suspended in air and the horizontal visibility <math>&lt; 1\text{km}</math></b></p> <p><b>Moderate Fog:</b> When the visibility between 500-200 metres</p> <p><b>Dense Fog:</b> when the visibility between 50- 200 metres</p> <p><b>Very Dense Fog:</b> when the visibility <math>&lt; 50</math> metres</p>   |
| <b>Thunderstorm</b>    | <p><b>Sudden electrical discharges manifested by a flash of light (Lightning) and a sharp rumbling sound (thunder)</b></p>  |
| <b>Dust/Sand Storm</b> | <p><b>An ensemble of particles of dust or sand energetically lifted to great heights by a strong and turbulent wind.</b></p>  |
| <b>Frost</b>           | <p><b>Ice deposits on ground</b></p> <p>Air temperature <math>\leq 4^\circ\text{C}</math> ( over Plains)</p>  |
| <b>Squall</b>          | <p><b>A strong wind that rises suddenly, lasts for atleast 1 minute.</b></p> <p><b>Moderate:</b> Wind speed 52-61 kmph</p> <p><b>Severe:</b> Wind speed 62-87 kmph</p> <p><b>Very Severe:</b> Wind speed <math>&gt;87</math> kmph</p>   |
| <b>Sea State</b>       | <p><b>Effect of various waves in the sea over specific area</b></p> <p><b>Rough to very rough:</b> Wind speed 41-62 kmph (22-33 knots) &amp; Wave height 2.5-6 metre</p> <p><b>High to very high:</b> Wind speed 63-117 kmph ( 34-63 knots) &amp; Wave height 6-14 metre</p> <p><b>Phenomenal:</b> Wind speed <math>&gt;117</math> kmph (<math>&gt;63</math> knots) &amp; Wave height <math>&gt;14</math> metre</p>   |
| <b>Cyclone</b>         | <p><b>Cyclonic Storm:</b> Wind speed 62-87 kmph (34-47 knots)</p> <p><b>Severe Cyclonic Storm:</b> Wind speed 88-117 kmph (48-63 knots)</p> <p><b>Very Severe Cyclonic Storm:</b> Wind speed 118-165 kmph (64 - 89 knots)</p> <p><b>Extremely Severe Cyclonic Storm:</b> Wind speed 166-220 kmph (90 -119 knots)</p> <p><b>Super Cyclone Strom:</b> Wind speed <math>&gt;220</math> kmph (<math>&gt;119</math> knots)</p>   |