



**Government of India
Earth System Science Organization
Ministry of Earth Sciences
India Meteorological Department**

Dated: 11 February, 2021

Subject: Current Weather Status and Outlook for next two weeks (11 to 24 February, 2021)

Salient Features

- Rainfall activity was below normal over all the regions of India during past week (04 to 10 February, 2021).
- Dense to very dense fog occurred over Haryana, Chandigarh & Delhi on many days; over Punjab on some days and over Rajasthan, Uttar Pradesh, Madhya Pradesh and Uttarakhand on one or two days of the week.
- Cold wave conditions occurred at isolated places over Chhattisgarh, Odisha and Madhya Pradesh on one or two days of the week.
- **Hence, Cold Wave conditions not likely over northern India during next one week.**
- **Dense to very dense fog at isolated pocket very likely to occur over plains of northwest India during next 3-4 days.**
- **Isolated rain/thunderstorm with hailstorm is very likely over central parts of the country (Madhya Pradesh, Chhattisgarh & Vidarbha) during 15th to 17th February, 2021.**

Weekly Rainfall Scenario (04 to 10 February, 2021)

During the week, rainfall for the country as a whole was below Long Period Average (LPA) by 76%. Details are given below:

Regions	Actual Rainfall (mm)	Normal Rainfall (mm)	% Departure from LPA
Country as a whole	1.3	5.2	-76%
Northwest India	3.7	9.3	-60%
Central India	0.0	2.2	-99%
South Peninsula	0.2	1.8	-87%
East & northeast India	0.5	8.0	-94%

The Meteorological sub-division-wise rainfall for the week is given in **Annexure I**.

Winter Rainfall Scenario (01 January to 10 February, 2021)

For the country as a whole, cumulative rainfall during this year's winter season till 10 February, 2021 is below LPA by 10%. Details of the rainfall distribution over the four broad geographical regions of India are given below:

Regions	Actual Rainfall (mm)	Normal Rainfall (mm)	% Departure from LPA
Country as a whole	21.7	24.2	-10%
Northwest India	32.6	45.6	-28%
Central India	3.9	10.4	-62%
South Peninsula	46.1	10.4	343%
East & northeast India	8.4	29.5	-72%

Cumulative seasonal rainfall is given in **Annexure II**.

Weekly minimum Rainfall Scenario (04 to 10 February, 2021)

- The minimum temperatures were below 8°C over most parts of northwest India (excluding Uttar Pradesh) and below 12°C over rest parts of north, central & east India. These were slightly above normal over most parts of northwest, central & adjoining east India (**Annexure III**).

Chief synoptic conditions as on 11 February, 2021

- A trough runs roughly along longitude 88°E to the north of latitude 24°N at 3.1 km above mean sea level.
- A fresh feeble Western Disturbance as a trough in mid-tropospheric westerlies with its axis at 3.1 km above mean sea level runs roughly along longitude 72°E to the north of latitude 32°N.

- A trough in low level easterlies at 0.9 km above mean sea level runs from central Kerala to Vidarbha across Interior Karnataka & Marathwada.

Large scale features as on 11 February, 2021

- Currently, moderate La Niña conditions are prevailing over equatorial Pacific and Sea Surface Temperatures (SSTs) are below normal over central and eastern equatorial Pacific Ocean. The latest Monsoon Mission Climate Forecasting System (MMCFS) forecast indicates that colder than normal SST anomaly is most likely to persist over Nino 3.4 region and La Niña conditions likely to continue during coming seasons.
- At present, neutral Indian Ocean Dipole (IOD) conditions are observed over Indian Ocean and the latest MMCFS forecast indicates neutral IOD conditions are likely to continue during the coming months.
- The Madden Julian Oscillation (MJO) index is in Western Pacific (Phase 7) with high amplitude. As per the latest projections, it is likely to be in same phase with high amplitude during next one week. Thus suppressed convective activity is likely over north Indian Ocean.

Forecast for next two week

Weather systems & associated Precipitation during Week 1 (11 to 17 February, 2021) and Week 2 (18 to 24 February, 2021)

Rainfall for week 1: (11 to 17 February, 2021)

- Under the influence of a fresh feeble Western Disturbance, light isolated rain/snow very likely over high reaches of Western Himalayan Region during 13th to 15th February, 2021. Light isolated rain/snow is very likely over Sikkim and Arunachal Pradesh during the week.
- Under the influence of a trough in lower level easterlies, light/moderate isolated to scattered rain and isolated thunderstorm with lightning is very likely over Madhya Pradesh, Chhattisgarh, Vidarbha, Jharkhand and Odisha during 15th to 18th February, 2021. **Isolated hailstorm is also very likely over Madhya Pradesh, Chhattisgarh & Vidarbha during 15th to 17th February, 2021.**

- Under the influence of an easterly wave, isolated rain/thundershower very likely to occur over south Peninsular India towards end of the week 1 (**Annexure IV**).
- **Cumulatively, below normal rain very likely over northern parts of country including Western Himalayan Region (Annexure V).**

Rainfall for week 2: (18 to 24 February, 2021)

- **Under the influence of cold & dry westerly winds in middle & upper tropospheric levels in association with and trough in easterly winds at lower levels, above normal rainfall activity likely over south & central India throughout the week.**
- **Under the influence of Western Disturbance, above normal rainfall activity also likely over north India during second half of the week (Annexure V).**

Temperature for week 1 & 2: (11 to 24 February, 2021)

- Minimum temperatures are above normal by 6 to 12°C over most parts of northwest, central & east India. These are near normal or slightly below normal over above mentioned regions.
- No significant change in minimum temperatures likely over northwest India during the week 1. Gradual rise in minimum temperatures by 3-5°C over most parts of Central India during 1st half of the week 1 and no change likely its 2nd half.
- Gradual rise in minimum temperatures by 2-4°C over most parts of East and West India during 1st half of the week 1 and no change likely its 2nd half.
- **Hence, Cold Wave and cold day conditions are unlikely over northern India during week 1.**
- **During week 2, the minimum temperatures likely to be normal to above normal over northwest & adjoining central India. These are likely to be below normal by 2-4°C over remaining parts of the country (Annexure VI).**

Fog

- Due to availability of moisture at lower levels and other favorable meteorological features, **Dense to Very Dense Fog in isolated pockets very likely over Punjab, Haryana, Chandigarh & Delhi, East Uttar Pradesh and northwest Rajasthan in the morning hours of 12th & 13th February and Dense Fog in isolated pockets**

over the same area in the morning hours of 14th February, 2021. Dense Fog in isolated pockets over Bihar in the morning hours of 12th & 13th and over Odisha in the morning hours of 12th February, 2021.

Cyclogenesis:

- No cyclogenesis is likely over the north Indian Ocean during next two weeks.

Next weekly update will be issued on next Thursday i.e. 18 February, 2021

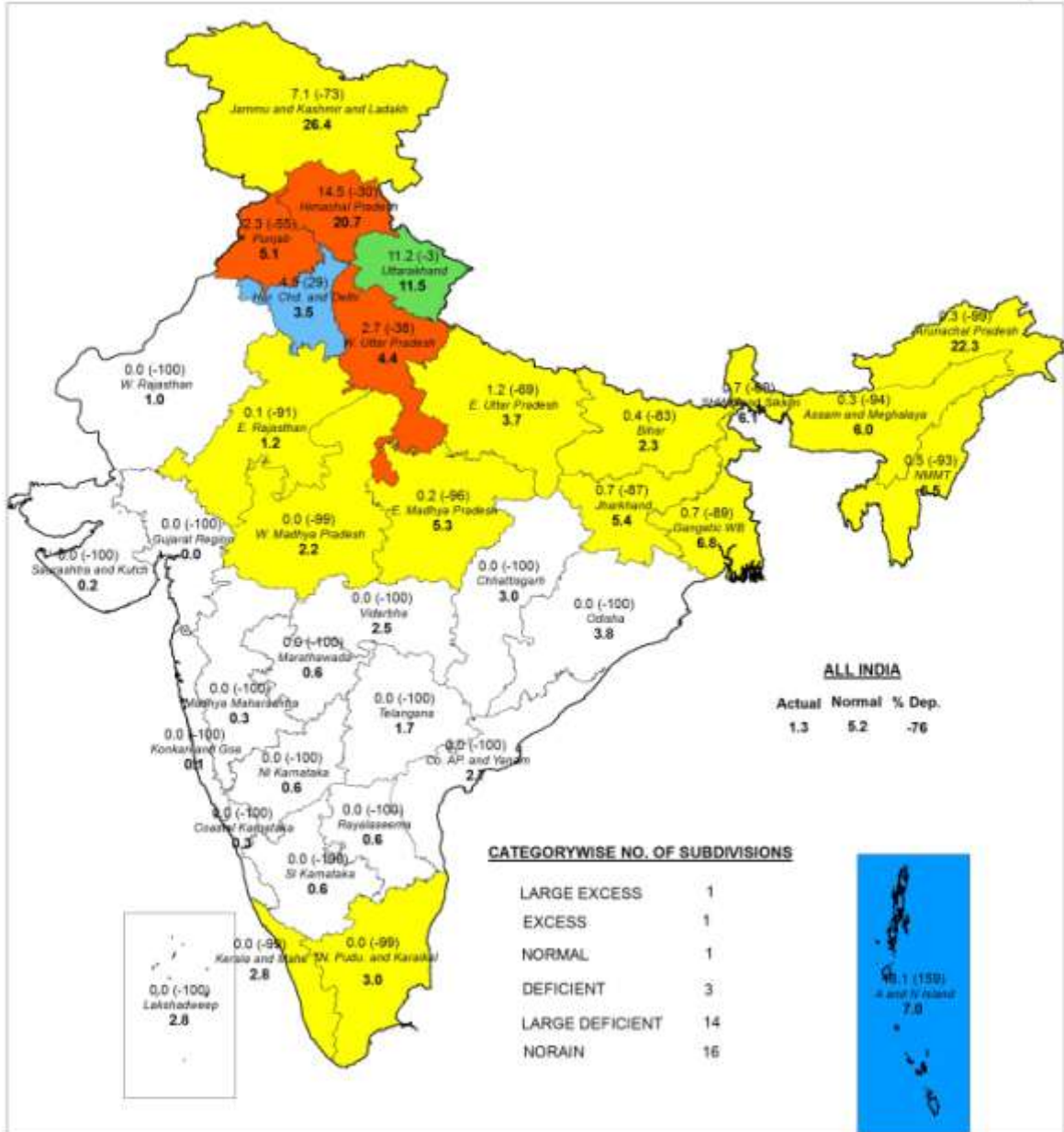


भारत मौसम विज्ञान विभाग
INDIA METEOROLOGICAL DEPARTMENT

जन मौसम विज्ञान पभाग, नई दिल्ली
HYDROMET DIVISION, NEW DELHI

SUBDIVISION RAINFALL MAP

Week : 04-02-2021 To 10-02-2021



Legend

Large Excess [60% or more] Excess [20% to 59%] Normal [-19% to 19%] Deficient [-59% to -20%] Large Deficient [-49% to -40%] No Rain [-100%] No Data

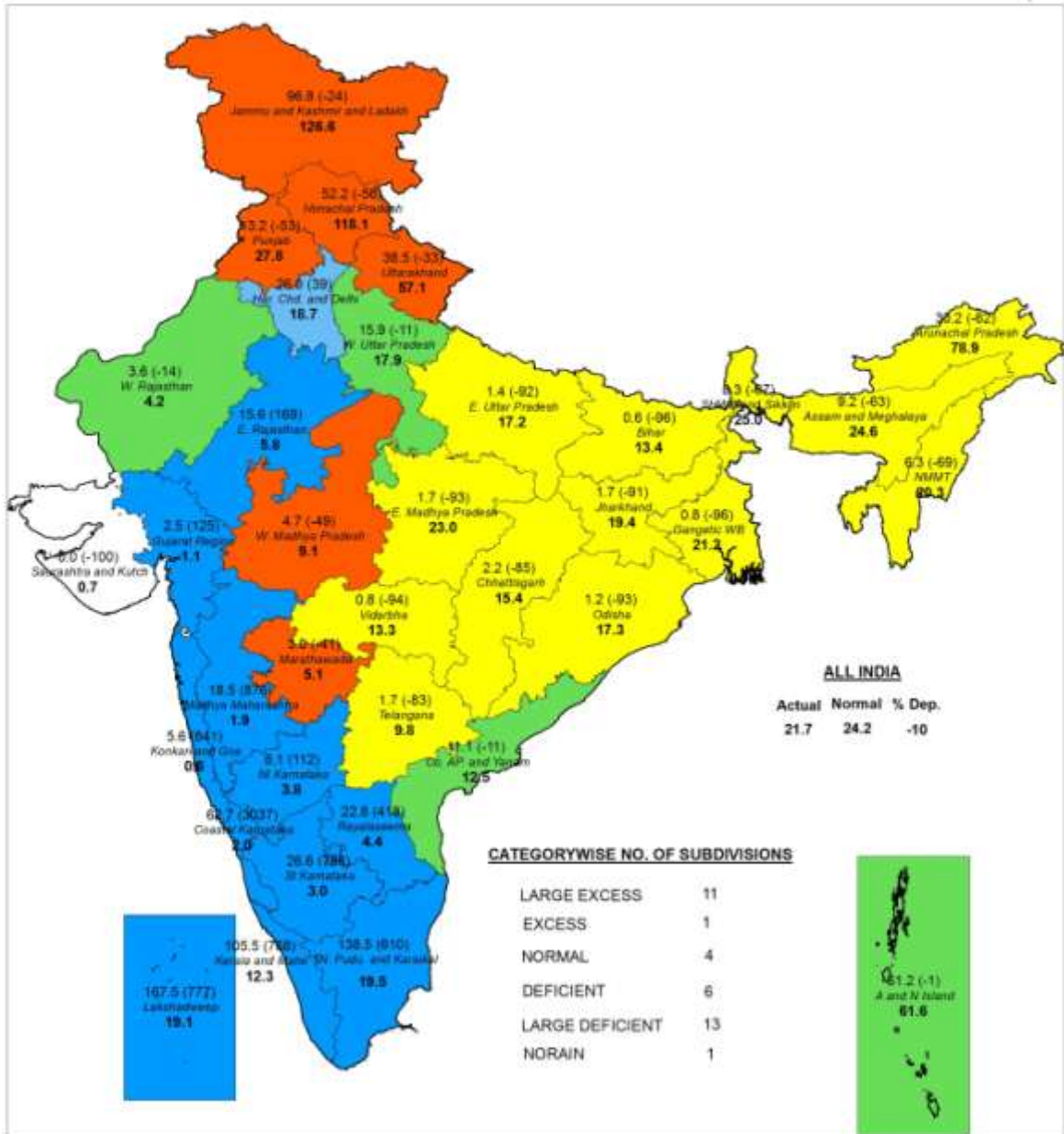
NOTES :

- a) Rainfall figures are based on operation data.
- b) Small figures indicate actual rainfall (mm), while bold figures indicate Normal rainfall (mm).
- c) Percentage Departures of rainfall are shown in brackets.



SUBDIVISION RAINFALL MAP

Period : 01-01-2021 To 10-02-2021



Legend

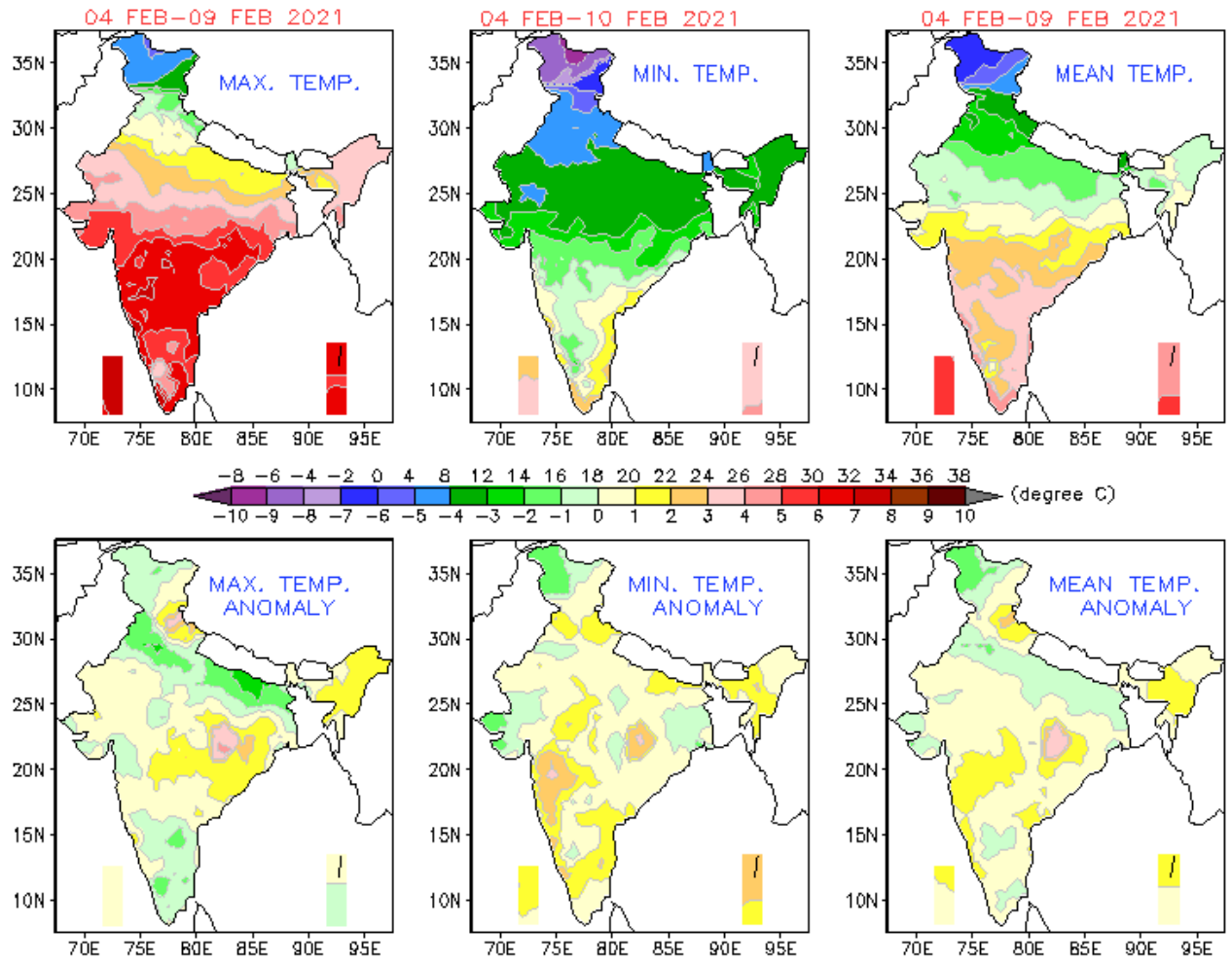
Large Excess [80% or more] | Excess [20% to 59%] | Normal [-19% to 19%] | Deficient [-59% to -20%] | Large Deficient [-89% to -40%] | No Rain [-100%] | No Data

NOTES :

- a) RainFall figures are based on operation data.
- b) Small figures indicate actual rainfall (mm), while bold figures indicate Normal rainfall (mm).
- c) Percentage Departures of rainfall are shown in brackets.

Annexure III

TEMPERATURE FOR WEEK ENDING 10 FEB & ITS ANOMALY



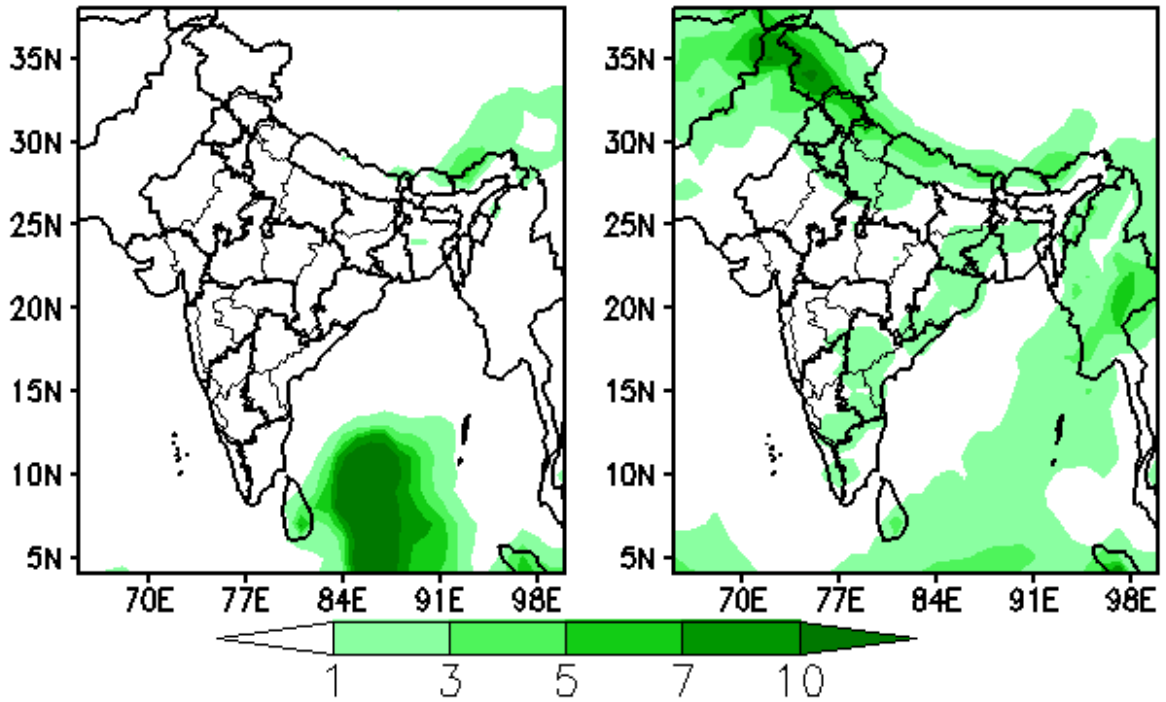
Annexure IV

METEOROLOGICAL SUB-DIVISIONWISE WEEKLY RAINFALL FORECAST & Wx. WARNINGS-2021								
Sr. No	MET.SUB-DIVISIONS	11 FEB	12 FEB	13 FEB	14 FEB	15 FEB	16 FEB	17 FEB
1	ANDAMAN & NICO.ISLANDS	ISOL	ISOL	ISOL	ISOL	ISOL	D	D
2	ARUNACHAL PRADESH	ISOL ^L	D	D	ISOL	ISOL	ISOL	ISOL
3	ASSAM & MEGHALAYA	D	D	D	D	D	D	D
4	NAGA.MANI.MIZO.& TRIPURA	D	D	D	D	D	D	D
5	SUB-HIM.W. BENG. & SIKKIM	ISOL	ISOL	D	ISOL	ISOL	ISOL	D
6	GANGETIC WEST BENGAL	D	D	D	D	D	D	D
7	ODISHA	D ^F	D	D	D	D	D	ISOL
8	JHARKHAND	D	D	D	D	D	D	ISOL
9	BIHAR	D ^F	D ^F	D	D	D	D	D
10	EAST UTTAR PRADESH	D ^F	D ^F	D ^F	D	D	D	D
11	WEST UTTAR PRADESH	D	D	D	D	D	D	D
12	UTTARAKHAND	D	D	D	D	D	D	D
13	HARYANA CHD. & DELHI	D ^F	D ^F	D ^F	D	D	D	D
14	PUNJAB	D ^F	D ^F	D ^F	D	D	D	D
15	HIMACHAL PRADESH	D	D	D	D	D	D	D
16	JAMMU & KASHMIR AND LADAKH	D	D	D	D	D	D	D
17	WEST RAJASTSAN	D ^F	D ^F	D	D	D	D	D
18	EAST RAJASTSAN	D	D	D	D	D	D	D
19	WEST MADHYA PRADESH	D	D	D	D	D	D	D
20	EAST MADHYA PRADESH	D	D	D	D	ISOL	ISOL	ISOL
21	GUJARAT REGION	D	D	D	D	D	D	D
22	SAURASTRA & KUTCH	D	D	D	D	D	D	D
23	KONKAN & GOA	D	D	D	D	D	D	D
24	MADHYA MAHARASHTRA	D	D	D	D	D	D	D
25	MARATHAWADA	D	D	D	D	D	D	D
26	VIDARBHA	D	D	D	D	D	ISOL	SCT
27	CHHATTISGARH	D	D	D	D	ISOL	SCT	SCT
28	COASTAL ANDHRA PR. & YANAM	D	D	D	D	D	D	D
29	TELANGANA	D	D	D	D	D	D	D
30	RAYALASEEMA	D	D	D	D	D	D	D
31	TAMIL. PUDU. & KARAIKAL	D	D	D	D	D	D	D
32	COASTAL KARNATAKA	D	D	D	D	D	D	D
33	NORTH INTERIOR KARNATAKA	D	D	D	D	D	D	D
34	SOUTH INTERIOR KARNATAKA	D	D	D	D	D	D	D
35	KERALA & MAHE	D	D	D	D	ISOL	ISOL	ISOL
36	LAKSHADWEEP	D	D	D	D	D	D	D
LEGENDS:								
WS - WIDE SPREAD / MOST PLACES (76-100%)				FWS - FAIRLY WIDE SPREAD / MANY PLACES (51% to 75%)				
SCT - SCATTERED / FEW PLACES (26% to 50%)				ISOL - ISOLATED (up to 25%)			D / DRY - NO RAINFALL	
* Heavy Rainfall (64.5-115.5 mm)			** Heavy to Very Heavy Rainfall (115.6-204.4 mm)			*** Extremely Heavy Rainfall (204.5 mm or more)		
^F Fog	[*] Snowfall	^D Duststorm	^S Thunderstorm with Squall	^L Thunderstorm with Lightning			[#] Thunderstorm with Hail	
[↓] Cold Wave (Minimum temperature departure from Normal -4.5°C to -6.4°C)				[↓] Severe Cold Wave (Minimum temperature departure from Norma ≤ -6.5°C)				
[↑] Heat Wave (Maximum temperature departure from Normal +4.5°C to +6.4°C)				[↑] Severe Heat Wave (Maximum temperature departure from Normal ≥ +6.5°C)				

Forecast Rainfall (mm/day)

(Week1: 12Feb-18Feb)

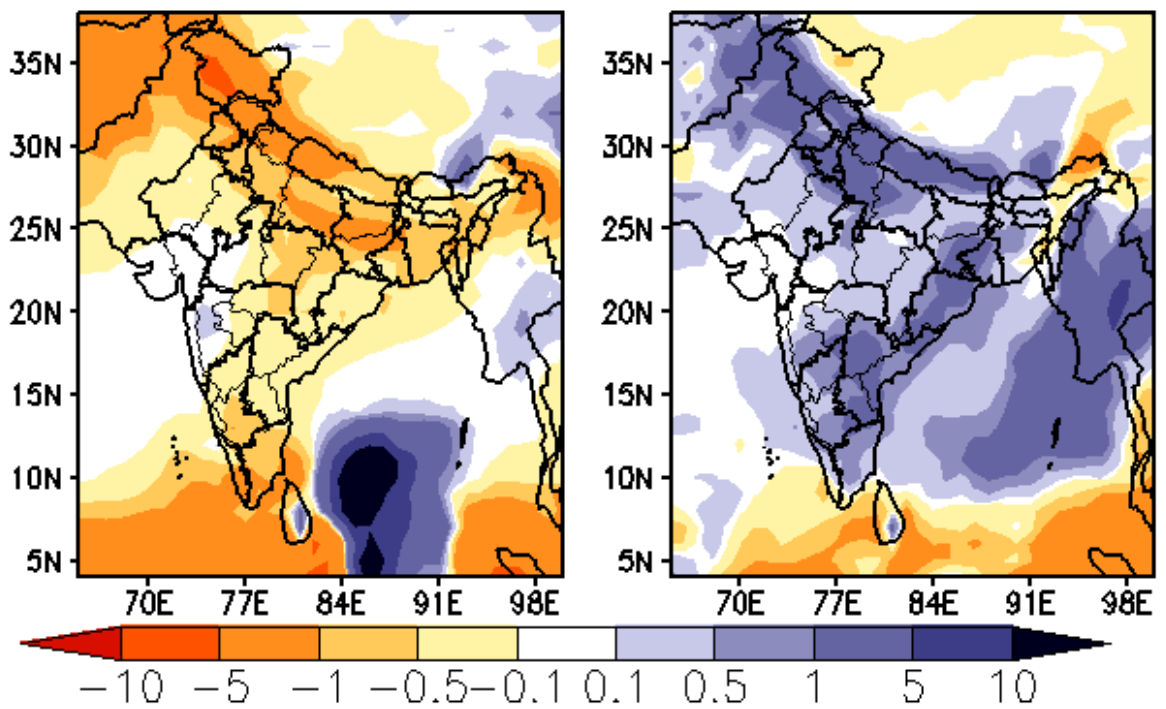
(Week2: 19Feb-25Feb)



Forecast Rainfall Anomaly (mm/day)

(Week1: 12Feb-18Feb)

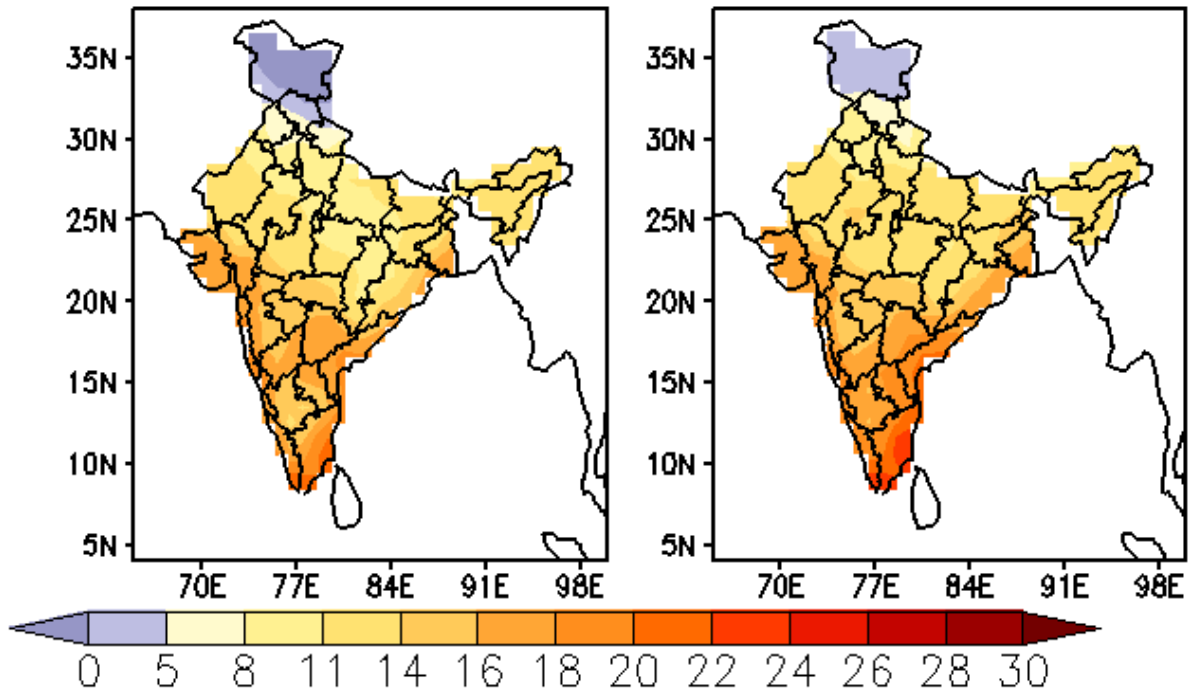
(Week2: 19Feb-25Feb)



MME Bias corrected forecast Tmin (Deg)

(Week1: 12Feb-18Feb)

(Week2: 19Feb-25Feb)



MME forecast Tmin anomaly (Deg C)

(Week1: 12Feb-18Feb)

(Week2: 19Feb-25Feb)

