



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

Press: Dated: 16 June, 2022

**Subject: Current Weather Status and Extended range Forecast for next two weeks
(16-29 June 2022)**

1. Salient Observed Features for week ending on 15 June 2022

- Southwest Monsoon has further advanced into some more parts of Central Arabian sea, entire Goa, some parts of Konkan and some more parts of Karnataka on 10th June 2022 and the Northern Limit of Monsoon (NLM) passed through Lat. 16°N/ Long. 60°E, Lat. 16°N/ Long. 70°E, Vengurla, Chikmagalur, Bengaluru, Puducherry, Lat. 14°N/Long.84°E, Lat. 17°N/ Long. 87°E, Lat.20°N/Long.89.5°E, Lat.22°N/Long.90°E, Lat.25°N/Long.89°E, Siliguri and Lat.27.5°N/Long.88°E on that day; it has further advanced into remaining parts of Central Arabian Sea, most parts of Konkan (including Mumbai), some parts of Madhya Maharashtra, some more parts of Karnataka on 11th June, 2022 and the Northern Limit of Monsoon (NLM) passed through Lat. 20°N/ Long. 60°E, Lat. 20°N/ Long. 70°E, Dahanu, Pune, Gadag, Bengaluru, Puducherry, Lat. 14°N/ Long. 84°E, Lat. 17°N/ Long. 87°E, Lat.20°N/Long.89.5°E, Lat.22°N/Long.90°E, Lat.25°N/Long.89°E, Siliguri and Lat.27.5°N/Long.88°E on that day; it has advanced further into some parts of North Arabian Sea and Gujarat state, entire Konkan, most parts of Madhya Maharashtra, Marathwada and Karnataka, some parts of Telangana and Rayalaseema, some more parts of Tamil Nadu, most parts of Sub-Himalayan West Bengal and some parts of Bihar on 13th June, 2022 and the Northern Limit of Monsoon (NLM) passed through Lat. 21°N/ Long. 60°E, Lat. 21°N/ Long. 70°E, Diu, Nandurbar, Jalgaon, Parbhani, Bidar, Tirupati, Puducherry, Lat. 14°N/ Long. 84°E, Lat. 17°N/ Long. 87°E, Lat.20°N/Long.89.5°E, Lat.22°N/90°E, Lat.25°N/89°E, Balurghat, Supaul, Lat.26.5°N/Long.86°E on that day; it has further advanced into some more parts of Marathwada and Telangana, entire Karnataka, Rayalaseema and Tamil Nadu, some parts of Coastal Andhra Pradesh and some more parts of Northwest & Westcentral Bay of Bengal on 15th June, 2022 and accordingly the Northern Limit of

Monsoon (NLM) passed through Lat. 21°N/ Long. 60°E, Lat. 21°N/ Long. 70°E, Diu, Nandurbar, Jalgaon, Parbhani, Medak, Rentachintala, Machilipatnam, Lat. 17°N/ Long. 84°E, Lat. 18.5°N/ Long. 87°E, Lat. 22°N/ Long. 90°E, Lat. 25°N/ Long. 89°E, Balurghat, Supaul, and Lat. 26.5°N/ Long. 86°E towards the end of the week.

- Last week's heat wave spell which started since 3 June, continued to prevail over isolated pockets of Delhi, Jammu & Kashmir, Himachal Pradesh, Uttarakhand, northern parts of Rajasthan, Punjab, Haryana, Southeast Uttar Pradesh, North Madhya Pradesh, Eastern parts of Vidarbha till 12 June, which latter then reduced by areas and prevailed over isolated pockets over Delhi, south Haryana, Southeast Uttar Pradesh and parts of western Himalayan region during 13-15 June. Eastern India covering isolated pockets of Jharkhand, west Bihar, north interior Odisha and Chhattisgarh also experiences a heat wave spell during 10-15 June in this week. **This Heat wave has been abated today on 16 June. Progress of southwest Monsoon towards central India and eastern India and impact of the WD over northwest India towards end of the week have caused such abating of heat wave with falling of maximum temperature by 5-10 degC.**
- Under favourable synoptic systems and winds, fairly widespread to widespread rainfall/thunderstorm activity observed over Northeast India and adjoining Sub-Himalayan West Bengal on most of the date in the week and during 14-16 June, extreme record rainfall spells over these areas have caused floods. Fairly widespread to widespread rainfall/thunderstorms also reported from many met-sub-divisions of Peninsula and parts of central India during 2nd half of the week.
- **Weekly overall Rainfall distribution during the current week ending on 15 June 2022 Monsoon Season's Rainfall Scenario (01 to 15 June, 2022):** During the week ending on 15 June 2022, for the country as a whole, the weekly cumulative All India Rainfall departure from its long period average (LPA) was -24% with weekly cumulative over northwest India as -64%, while all India cumulative rainfall during this year's **monsoon Season's Rainfall Scenario (01-15 June, 2022)** is -32% and over northwest India, it is below LPA by **-77%**. Details of the rainfall distribution over the four broad geographical regions of India are given in **Table 1** and Meteorological sub-division-wise rainfall both for week and season are given in Annex I and II respectively.

Table 1: Rainfall status (Week and season)

Region	WEEK			SEASON		
	09.06.2022 TO 15.06.2022			01.06.2022 TO 15.06.2022		
	Actual	Normal	% Dep	Actual	Normal	% Dep
EAST & NORTH-EAST INDIA	95.2	71	34%	155.4	136	14%
NORTH-WEST INDIA	5.2	14.6	-64%	5.8	25.4	-77%
CENTRAL INDIA	16.2	33.5	-52%	18.5	53	-65%
SOUTH PENINSULA	21.9	39.5	-45%	48.2	75	-36%
Country as a whole	26.5	34.9	-24%	42.3	62.1	-32%

2. Large scale features

➤ Currently, La Niña conditions are prevailing over the equatorial Pacific region. The latest Monsoon Mission Climate Forecasting System (MMCFS) forecast indicates that La Niña conditions are likely to continue throughout the Month. Other climate models are also indicating enhanced probability for La Niña conditions likely during summer season. At present, neutral Indian Ocean Dipole (IOD) conditions are present over the Indian Ocean and the latest MMCFS forecast indicates that the neutral IOD conditions are likely to continue during summer season. As the changes in the sea surface temperature (SST) conditions over the Pacific and the Indian Oceans are known to influence the Indian climate, IMD is carefully monitoring the evolution of sea surface conditions over these Ocean basins.

➤ The Madden Julian Oscillation Index (MJO) currently lies in phase 1 with amplitude close to 1. It would continue in same phase with decreasing amplitude during remaining part of the forecast period. Hence, MJO will not support cyclogenesis over the North Indian Ocean (NIO) including the Bay of Bengal (BoB) and the Arabian Sea (AS) during the entire forecast period

3. Forecast for next two week

Weather systems & associated Precipitation during Week 1 (16 to 22 June, 2022) and Week 2 (23 to 29 June, 2022)

Advancement of Southwest Monsoon:

- The Northern Limit of Monsoon (NLM) now passes through Lat. 22°N/ Long. 60°E, Lat. 22°N/ Long. 65°E, Porebandar, Bhavnagar, Khandwa, Gondia, Durg, Bhawanipatna, Kalingapatnam, Lat.22.0°N/ 89.5°E, Lat.25.0°N/89°E, Balurghat and Supaul, 26.50°N/86°E.
- Conditions are favorable for further advance of monsoon into some more parts of North Arabian Sea, Gujarat State, Madhya Pradesh, remaining parts of Vidarbha, Andhra Pradesh and Westcentral & northwest Bay of Bengal, some more parts of Chhattisgarh and Odisha, some parts of Gangetic West Bengal, Jharkhand, remaining parts of Sub-Himalayan West Bengal and some more parts of Bihar, some parts of east Uttar Pradesh during next 2-3 days.
- **Southwest monsoon is likely to cover remaining parts of East India, some more parts of central for subsequent days of the week.**

Forecast for week 1 (16 to 22 June, 2022):

- **Under the influence of strong southwesterly winds from Bay of Bengal to northeast & adjoining east India in lower tropospheric levels:**
 - ✓ Widespread thundershowers with **isolated heavy to very heavy rainfall** very likely over northeast India and adjoining Sub-Himalayan West Bengal & Sikkim during most days of the week. Isolated **extremely heavy rainfall** also likely over Assam & Meghalaya during 16th-18th June; over Arunachal Pradesh on 16th and over Sub-Himalayan West Bengal & Sikkim on 16th & 17th June, 2022.
 - ✓ Fairly widespread to widespread rainfall with thunderstorm/lightning/gusty winds very likely over Bihar, Jharkhand, Odisha and Gangetic West Bengal during the week. **Isolated heavy rainfall** likely over Jharkhand & Bihar during 16th-19th; Odisha on 16th & 17th June. Isolated very heavy falls also likely over Bihar during 16th-18th June.
 - ✓ Scattered to fairly widespread rainfall with thunderstorm/lightning/gusty winds very likely over Madhya Pradesh, Vidarbha and Chhattisgarh during the week. **Isolated heavy**

rainfall likely over East Madhya Pradesh & Chhattisgarh during next 5 days and over Vidarbha on 18th & 19th June.

- Under the influence of westerly winds along the west coast and a trough from Rayalaseema to Comorin area in lower tropospheric levels:
 - ✓ Fairly widespread/ widespread rainfall with **thunderstorm/lightning** very likely over Coastal Karnataka, Konkan & Goa, Kerala & Mahe and Lakshadweep and scattered to fairly widespread rainfall likely over Madhya Maharashtra, Marathwada, Andhra Pradesh & Yanam, Telangana and Tamilnadu, Puducherry & Karaikal during the week.
 - ✓ Isolated **heavy rainfall** very likely over Coastal Andhra Pradesh, Rayalaseema, Kerala & Mahe, coastal & South Interior Karnataka during the week; Telangana during 16th-19th; Tamilnadu, Puducherry & Karaikal during 16th-18th; over south Konkan & Goa during 18th-22th and over south Madhya Maharashtra on 20th -22nd June, 2022.
- Under the influence of Western Disturbances and lower level easterlies:
 - ✓ Fairly widespread to widespread rainfall with **thunderstorm/lightning** very likely over Western Himalayan region (Jammu, Kashmir, Ladakh, Gilgit- Baltistan & Muzaffarabad, Himachal Pradesh, Uttarakhand); scattered to fairly widespread rainfall over adjoining plains (Punjab, Haryana, Chandigarh & Delhi, Uttar Pradesh) and isolated rainfall over Rajasthan during most days of the week.
 - ✓ Isolated **heavy rainfall** likely over Jammu division, Himachal Pradesh, Uttarakhand & Punjab on 17th June.
- Isolated to scattered rainfall with thunderstorm likely to occur over rest parts of the country during most days of the week.

Rainfall for week 2 (23 to 29 June, 2022):

- Due to southerly/southwesterly winds from Bay of Bengal to northeast & adjoining East India at lower tropospheric levels, fairly widespread to widespread rainfall with **isolated heavy falls** likely to continue over northeast & adjoining East India during most days of the week.
- Due to Easterly winds from Bay of Bengal at lower tropospheric levels and Western Disturbances, light/moderate scattered to fairly widespread rainfall very likely over northwest India during most days of the week.
- Due to strong westerly/south-westerly winds from Arabian Sea over north Peninsula India at

lower tropospheric levels, light/moderate fairly widespread to widespread rainfall with isolated heavy falls very likely over Gujarat and Maharashtra.

- **Southwest monsoon is likely to cover remaining parts of central India and many parts of northwest India.**
- **Overall, rainfall activity is likely to be above normal over Gujarat and Maharashtra; below normal over parts of Western Himalayan Region, Kerala and Andaman & Nicobar Islands; and normal to above normal over rest parts of the country.**

Maximum Temperatures for week 1(16 to 22 June, 2022) and week 2(23 to 29 June, 2022)

Maximum Temperatures for Week 1(16 to 22 June, 2022):

- **Maximum Temperature Departures (as on 15-06-2022):** Maximum temperatures were markedly above normal (5.1°C or more) at a few places over Uttarakhand; appreciably above normal (3.1°C to 5.0°C) at most places over Himachal Pradesh and Punjab; at many places over Jammu & Kashmir, Ladakh, Gilgit, Baltistan & Muzaffarabad and Uttar Pradesh; at a few places over Haryana, Chandigarh & Delhi, East Madhya Pradesh and Marathwada; at isolated places over Bihar and Tamilnadu, Puducherry & Karaikal; above normal (1.6°C to 3.0°C) at most places over Coastal & North Interior Karnataka; at many places over Konkan & Goa; at a few places over Gujarat Region, West Madhya Pradesh, Chhattisgarh, Telangana, Coastal Andhra Pradesh & Yanam and Andaman & Nicobar Islands; at isolated places over West Rajasthan, Vidarbha, Odisha and Kerala & Mahe. It is near normal or below normal over rest parts of the country.
- Maximum temperatures likely to fall by 2-4° C over most parts of northwest India and no significant change in maximum temperatures very likely over rest parts of the country during the week.
- **No significant Heat wave conditions likely over any part of the country.**

Maximum Temperatures for week 2 (23 to 29 June, 2022):

- **Maximum temperatures are likely to be below normal to near normal over the country.**
- **No significant heat wave likely over any part of the country during the week(Refer Annex V).**

4. Cyclogenesis forecast for North Indian Ocean during next 2 weeks

Refer:

https://rsmcnewdelhi.imd.gov.in/uploads/archive/24/24_3d9ee2_Extended%20Range%20Outlook_09062022.pdf

Next weekly update will be issued on next Thursday i.e. 16 June 2022

Legends: Heavy Rain: 64.5 to 115.5 mm **Very Heavy Rain:** 115.6 to 204.4 mm, **Extremely Heavy Rain** > 204.4 mm

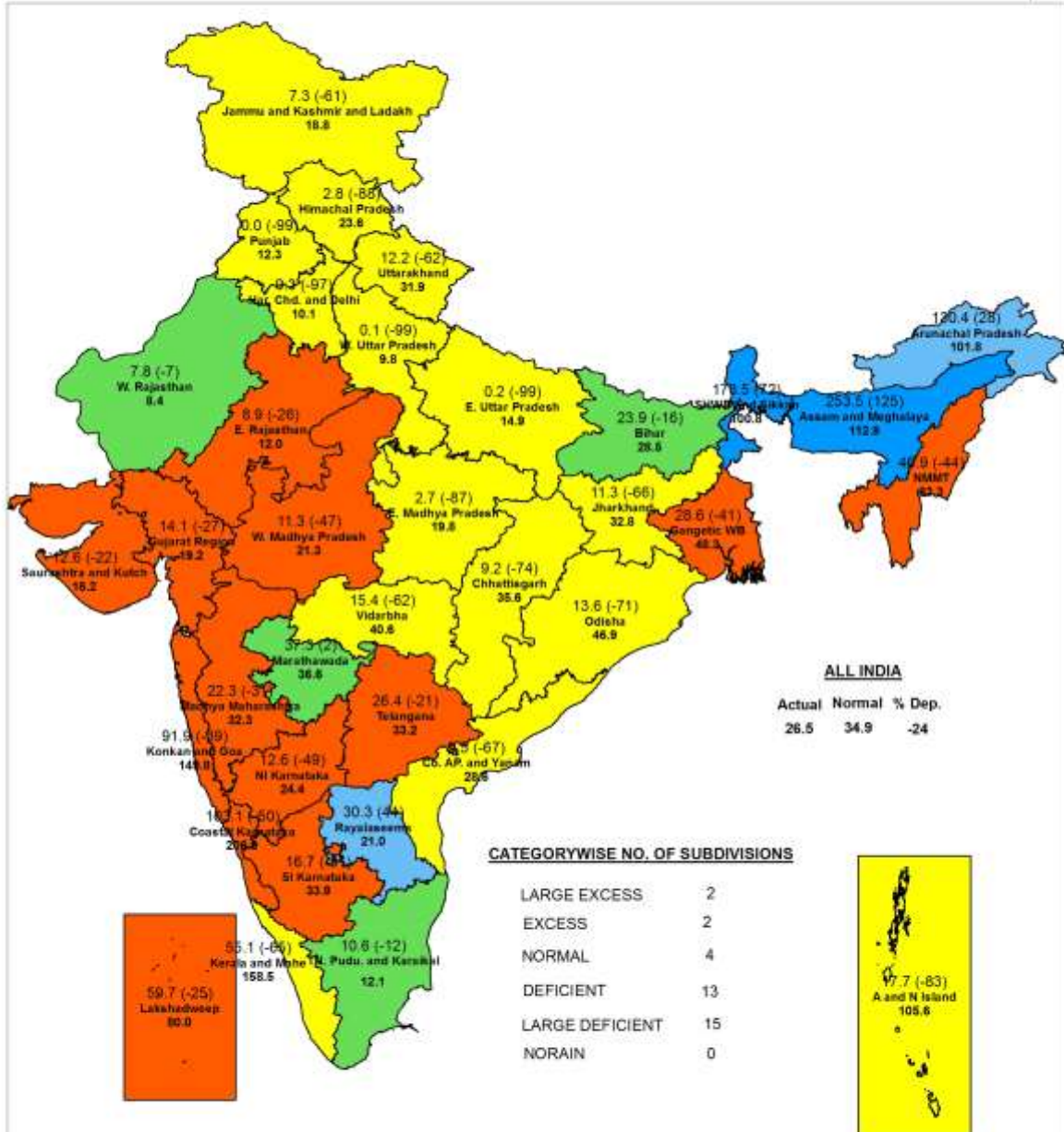
SPATIAL DISTRIBUTION (% of Stations reporting)			
% Stations	Category	% Stations	Category
76-100	Widespread (WS/ Most Places)	26-50	Scattered (SCT/ A Few Places)
51-75	Fairly Widespread (FWS/ Many Places)	1-25	Isolated (ISOL)

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



SUBDIVISION RAINFALL MAP

Week : 09-06-2022 To 15-06-2022

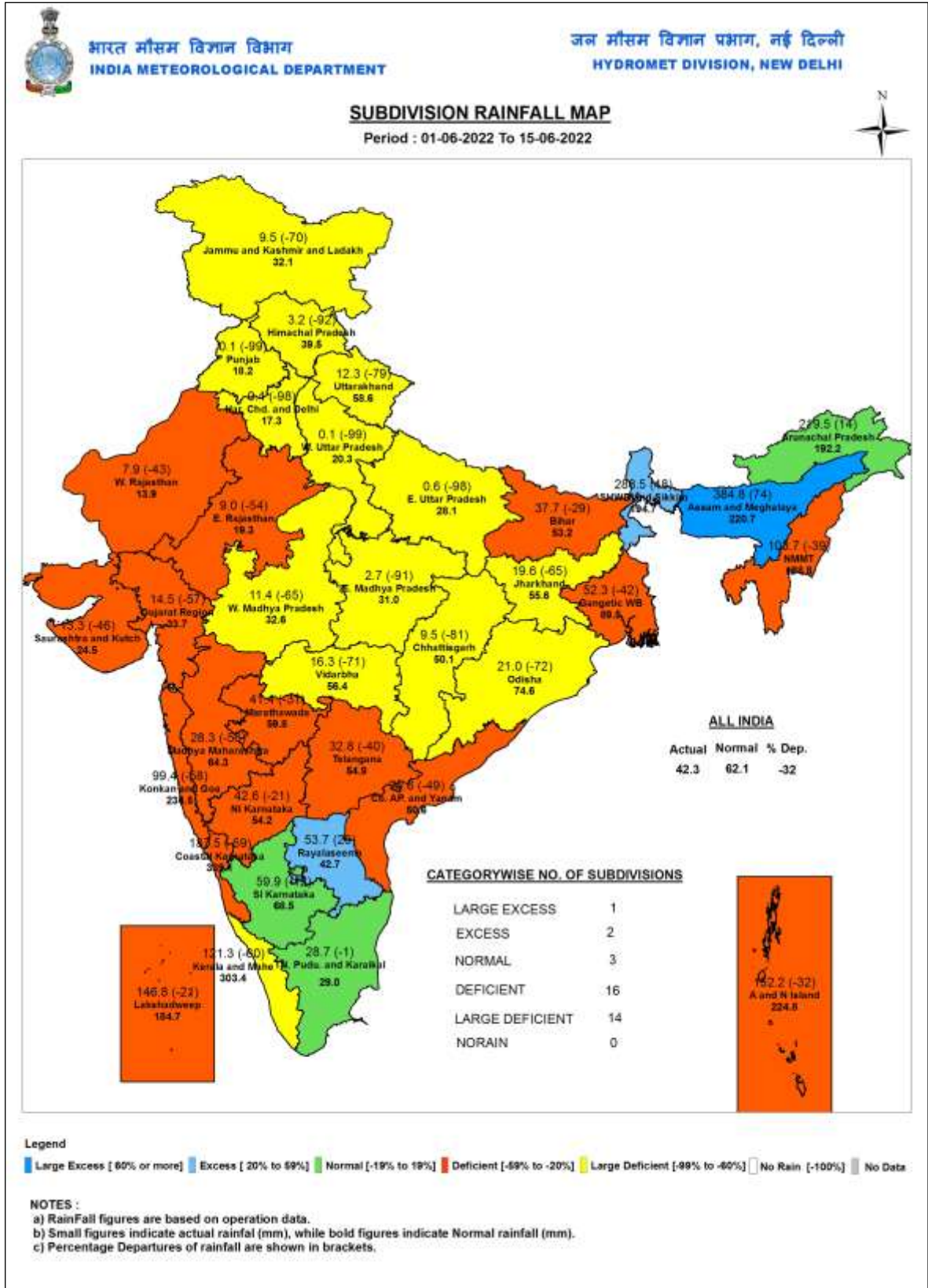


Legend

Large Excess [60% or more] Excess [20% to 59%] Normal [-19% to 19%] Deficient [-59% to -20%] Large Deficient [-99% to -40%] No Rain [-100%] No Data

NOTES :

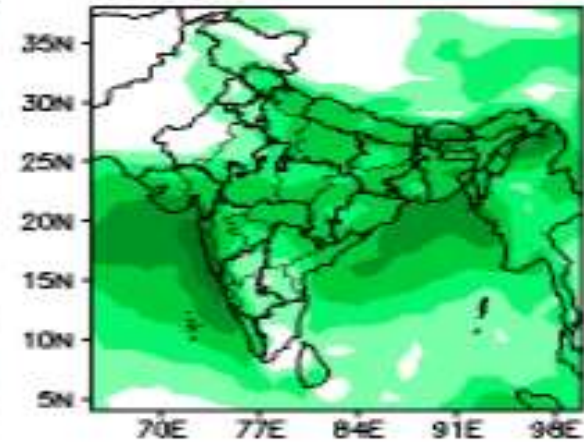
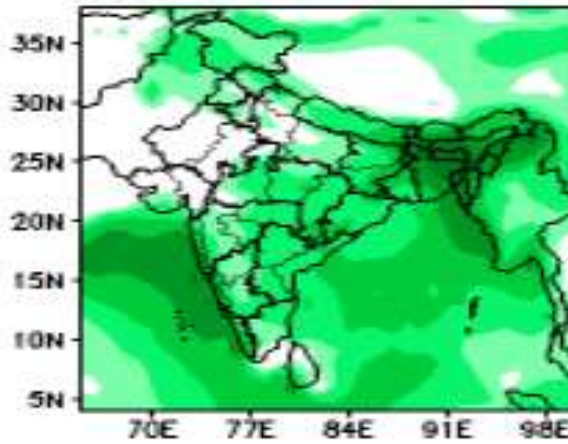
- a) Rainfall figures are based on operation data.
- b) Small figures indicate actual rainfall (mm), while bold figures indicate Normal rainfall (mm).
- c) Percentage Departures of rainfall are shown in brackets.



Forecast Rainfall (mm/day)

(Week1: 17Jun-23Jun)

(Week2: 24Jun-30Jun)



Forecast Rainfall Anomaly (mm/day)

(Week1: 17Jun-23Jun)

(Week2: 24Jun-30Jun)

