

# Government of India Ministry of Earth Sciences India Meteorological Department



Press Release Date: 22<sup>nd</sup> September, 2025 Time of Issue: 1315 hours IST

Subject: (i) A low pressure area has formed over northeast Bay of Bengal today, the 22<sup>nd</sup> September, 2025.

- (ii) Another low pressure area is likely to form over east central & adjoining north Bay of Bengal around  $25^{\rm th}$  September.
- (iii) The southwest monsoon has further withdrawn from some more parts of Gujarat, Rajasthan, Haryana and Punjab today. Conditions are becoming favourable for further withdrawal of southwest monsoon from some more parts of Gujarat, Rajasthan, Haryana and Punjab; some parts of Uttar Pradesh, Delhi, Himachal Pradesh, Jammu & Kashmir during next 2-3 days.

### Realised weather during past 24 hours till 0830 hours IST of today, the 22nd September, 2025:

- Very heavy rainfall (12-20 cm) has been recorded at isolated places over Madhya Maharashtra, Marathawada, Tamil Nadu and Telangana.
- Heavy rainfall (7-11 cm) has been recorded at isolated places over West Madhya Pradesh, East Rajasthan, Odisha, Jharkhand, Tripura, North Interior Karnataka and Coastal Andhra Pradesh & Yanam.
  For more details of realised weather, kindly refer Annexure I.

#### Withdrawal of southwest Monsoon:

- ❖ The southwest monsoon has further withdrawn from some more parts of Gujarat, Rajasthan, Haryana and Punjab today, the 22<sup>nd</sup> September 2025.
- Conditions are becoming favourable for further withdrawal of southwest monsoon from some more parts of Gujarat, Rajasthan, Haryana and Punjab; some parts of Uttar Pradesh, Delhi, Himachal Pradesh, Jammu & Kashmir during next 2-3 days.
- ❖ The line of withdrawal of southwest monsoon now passes through 32°N/74°E, Tarn Taran, Sangrur, Jind, Rewari, Tonk, Mahesana, Porbandar, 21°N/68°E. (Annexure II)

# i. Weather Systems, Forecast and Warnings (refer to Annexure III & IV):

- ❖ Under the influence of northeast Bay of Bengal & adjoining Myanmar- south Bangladesh coasts, a low pressure area has formed over northeast Bay of Bengal & neighborhood at 0530 hrs IST of today and it persisted over same area at 0830 hrs IST of today, the 22<sup>nd</sup> Sept 2025. It is likely to move west–northwestwards during next 24 hours towards northwest Bay of Bengal.
- ❖ A trough runs from the upper air cyclonic circulation associated with Low-Pressure area over northeast Bay of Bengal & neighborhood to north Karnataka across central Bay of Bengal, Andhra Pradesh and Telangana in lower tropospheric levels.
- Another fresh **low pressure area** is likely to form over eastcentral and adjoining north Bay of Bengal around 25<sup>th</sup> September. Moving west-northwestwards, it is very likely to become a **depression** over northwest & adjoining westcentral Bay of Bengal off South Odisha-North Andhra Pradesh coasts around 26<sup>th</sup> September. It is very likely to cross South Odisha-North Andhra Pradesh coasts around 27<sup>th</sup> September.
- An **upper air cyclonic circulation** lies over central parts of Coastal Andhra Pradesh & neighbourhood and another over south Tamil Nadu & neighbourhood in middle tropospheric levels.

#### **East & Central India:**

- ❖ Light to moderate rain/thunderstorm at most/many places with isolated **heavy rainfall** likely over Odisha, Chhattisgarh during 22<sup>nd</sup>-27<sup>th</sup>; Bihar on 25<sup>th</sup> & 26<sup>th</sup>; Jharkhand during 23<sup>rd</sup>-25<sup>th</sup>; Gangetic West Bengal on 22<sup>nd</sup> & 23<sup>rd</sup>; West Madhya Pradesh on 22<sup>nd</sup>, Vidarbha during 24<sup>th</sup>-27<sup>th</sup> September with **very heavy rainfall** over Odisha on 22<sup>nd</sup>, 23<sup>rd</sup>, 25<sup>th</sup> & 26<sup>th</sup>; Gangetic West Bengal on 22<sup>nd</sup> and Chhattisgarh on 24<sup>th</sup> & 25<sup>th</sup> September.
- ❖ Thunderstorm & gusty winds (speed reaching 30-40 kmph) very likely over East India during next 5 days.

#### West India:

❖ Light to moderate rain/thunderstorm at many/some places with isolated heavy rainfall likely over Madhya Maharashtra during next 7 days except on 24<sup>th</sup>; Konkan & Goa on 22<sup>nd</sup> & during 25<sup>th</sup> -28<sup>th</sup>; Marathawada on 22<sup>nd</sup>, 23<sup>rd</sup>, 26<sup>th</sup> & 27<sup>th</sup> and Gujarat Region on 22<sup>nd</sup> September with very heavy rainfall over Marathawada on 22<sup>nd</sup>, Konkan & Goa during 26<sup>th</sup>-28<sup>th</sup> and Madhya Maharashtra on 22<sup>nd</sup> and during 26<sup>th</sup>-28<sup>th</sup> September.

#### **Northeast India:**

❖ Light/moderate rain/thunderstorm at many/some places with isolated **heavy rainfall** likely over Assam & Meghalaya during 23<sup>rd</sup>-25<sup>th</sup> and Nagaland, Manipur, Mizoram & Tripura during 22<sup>nd</sup>-24<sup>th</sup> and on 28<sup>th</sup> September.

#### **South Peninsular India:**

- ❖ Light to moderate rain/thunderstorm at many/some places with isolated **heavy rainfall** likely over Coastal Andhra Pradesh & Yanam, Telangana, North Interior Karnataka during 22<sup>nd</sup>-28<sup>th</sup>; Tamil Nadu, Kerala & Mahe on 22<sup>nd</sup>, 26<sup>th</sup> & 27<sup>th</sup>; Rayalaseema, Coastal & South Interior Karnataka during 26<sup>th</sup>-28<sup>th</sup>; September.
- ❖ Strong surface winds (speed reaching 30-40 kmph) very likely over Coastal Andhra Pradesh & Yanam and Rayalaseema during next 5 days.

# Fishermen warnings:

Fishermen are advised not to venture into the following areas during 22<sup>nd</sup> to 27<sup>th</sup> September:

#### Arabian Sea

Some parts of southwest & adjoining westcentral Arabian Sea, along and off Somalia coast during 22<sup>nd</sup> to 27<sup>th</sup> September.

#### **Bay of Bengal:**

- ➤ Gulf of Mannar & adjoining Comorin area, along and off Sri Lanka coast over south Bay of Bengal during 22<sup>nd</sup> to 27<sup>th</sup> September, eastcentral, northeast & adjoining areas during 22<sup>nd</sup> to 24<sup>th</sup> September; most parts of Bay of Bengal on 25<sup>th</sup> September; entire Bay of Bengal on 25<sup>th</sup> & 26<sup>th</sup> September; over some parts of north Bay of Bengal on 21<sup>st</sup> September; over entire central and most parts of north Bay of Bengal and along and off Tamil Nadu, Andhra Pradesh, Odisha coasts during 25<sup>th</sup> to 27<sup>th</sup> September; and along and off West Bengal, Bangladesh, Myanmar coasts on 22<sup>nd</sup> to 27<sup>th</sup> September.
- Andaman Sea during 22<sup>nd</sup> to 27<sup>th</sup> September.

# ii. Weather conditions and forecast over Delhi/NCR during 22<sup>nd</sup> September to 25<sup>th</sup> September, 2025 (Annexure V)

For more details, kindly refer National Weather Bulletin:

https://mausam.imd.gov.in/responsive/all india forcast bulletin.php

For District wise warnings refer: <a href="https://mausam.imd.gov.in/responsive/districtWiseWarningGIS.php">https://mausam.imd.gov.in/responsive/districtWiseWarningGIS.php</a>

For Fishermen warning refer <a href="https://rsmcnewdelhi.imd.gov.in/fishermen-warning.php">https://rsmcnewdelhi.imd.gov.in/fishermen-warning.php</a>

## Rainfall recorded (in cm) during past 24 hours till 0830 hours IST of today, the 22<sup>nd</sup> September (≥ 7cm):

- Marathwada: Paithan (dist Chh. Sambhajinagar) 20; Bhum (dist Dharashiv) 17; Patoda (dist Beed) 15; Dharur (dist Beed) 9; Lohara (dist Dharashiv), Georai (dist Beed) 8 Each; Washi (dist Dharashiv), Paranda (dist Dharashiv), Umarga (dist Dharashiv) 7 Each;
- Telangana: Atmakur M (dist Y. Bhuvanagiri) 16; Alladurg (dist Medak), Devaruppal (dist Jangaon) 12 Each; Doma (dist Vikarabad), Ibrahimpatnam (dist Rangareddy), Yellareddy (dist Kamareddy), Parvathagiri (dist Warangal), Sathupalle (dist Khammam), Kodakandla (dist Jangaon) 9 Each; Palakurthi (dist Jangaon) 8; Pinapaka (dist B. Kothagudem), Hayathnagar (dist Rangareddy), Kodangal (ARG) (dist Vikarabad) 7 Each;
- Madhya Maharashtra: Pachora (dist Jalgaon) 14; Madha (dist Sholapur) 12; Jeur IMD Parttime (dist Sholapur) 10; Dahigaon Fmo (dist Jalgaon) 9; Chas ARG (dist Ahilyanagar) 8; Ahilyanagar IMD Pt (dist Ahilyanagar) 7;
- **★ Tamil Nadu, Puducherry & Karaikal**: Rscl-2 Nemoor (dist Villupuram) 12; Chetpet (dist Tiruvannamalai) 11; Arani (dist Tiruvannamalai) 9; Rscl-3 Valathy (dist Villupuram) 7;
- North Interior Karnataka: Badami (dist Bagalkote) 11; Tidagundi Agro (dist Vijayapura) 8; Bilgi (irri.) (dist Bagalkote), Kerur (dist Bagalkote), Manvi (dist Raichur) 7 Each;
- Tripura: Budhjongnagar ARG (dist West Tripura) 11; Sabroom (dist South Tripura) 8; Arundhutinagar (dist West Tripura), Sabroom AWS (dist South Tripura) 7 Each;
- ❖ West Madhya Pradesh: Khategaon (dist Dewas) 9; Ghatiya (dist Ujjain) 7;
- Odisha: Gop (dist Puri) 9, Chilika (dist Khurda) 7, Sankheimundi (dist Ganjam) 7,
- \* Coastal Andhra Pradesh & Yanam: Parvathipuram (dist Parvathipuram Manyam) 8;
- ❖ Jharkhand: Putki (dist Dhanbad) 8; Putki Dvc (dist Dhanbad) 7;
- **East Rajasthan**: Vallabhnagar (dist Udaipur), Rashmi SR (dist Chittorgarh) 7 Each.

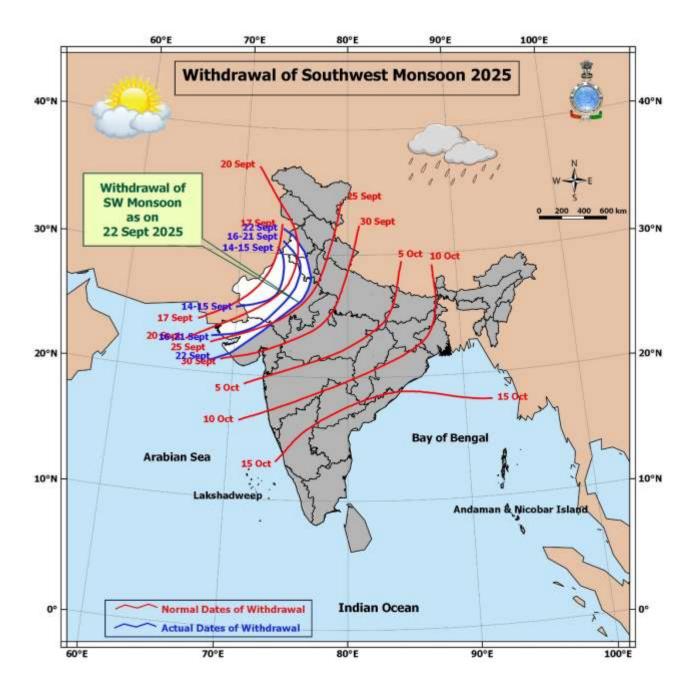
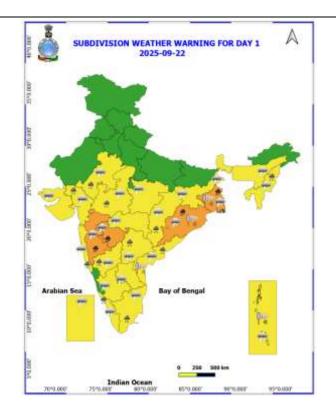
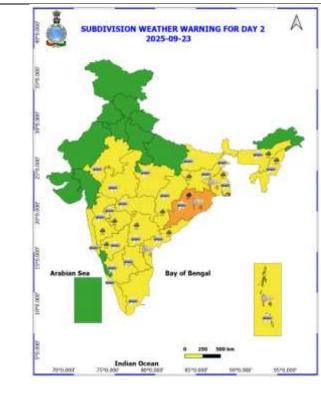
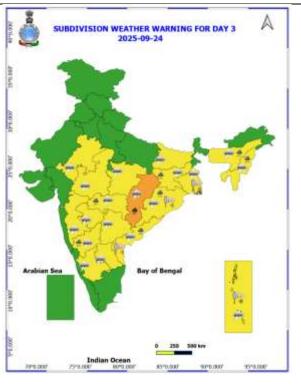


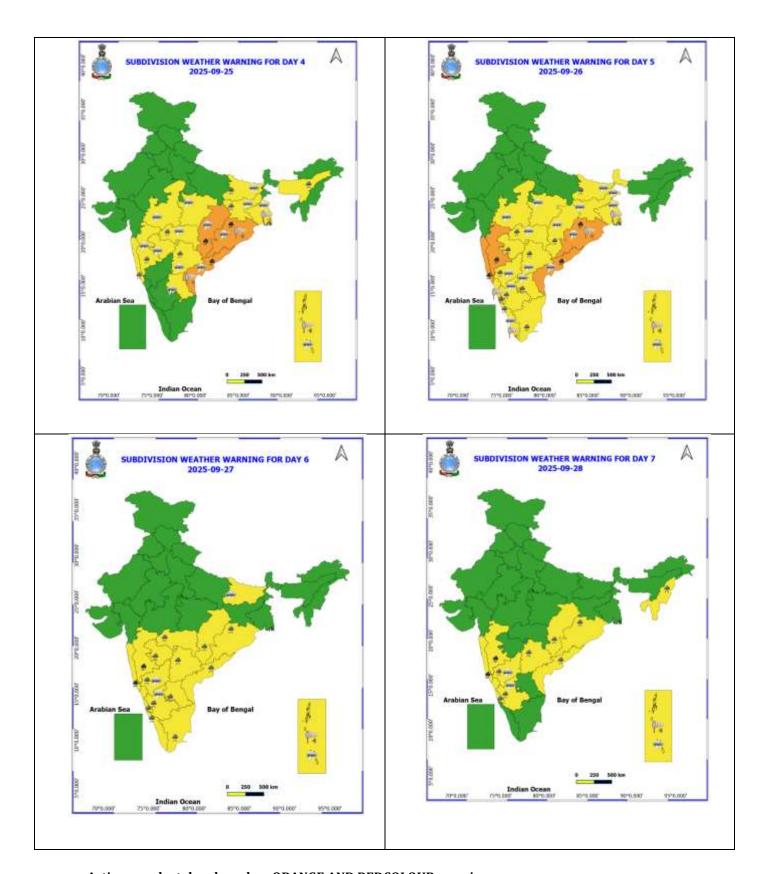
Table-1  7 Days Rainfall Forecast  22- Sep 23- Sep 24- Sep 25- Sep 26- Sep 27- Sep 28- Se											
- 1	ANDAMAN & NICOBAR ISLANDS	FWS		Day 3	Day 4	Day 5	Day 6	Day			
	ARUNACHAL PRADESH	SCT		SCT	ISOL	ISOL	ISOL	ISO			
	ASSAM & MEHGHALAYA	SCT	SCT		SCT	ISOL	ISOL	SC			
	NAGALAND, MANIPUR, MIZORAM AND TRIPURA			SCT	SCT	ISOL	the same of the same of				
	SUB HIMALAYAN WEST BENGAL & SIKKIM	SCT	SCT	SCT	SCT	FWS					
	GANGETIC WEST BENGAL	Wa	WE	Wil	FWS	FWS	FWS				
	ODISHA	W.S.	FWS	WB	100	Wa	FWS				
8	JHARKHAND	SCT	FWS		WS	FWS					
_	BIHAR	ISOL	ISOL		_	FWS					
	EAST UTTAR PRADESH	DRY	DRY	DRY	ISOL	SCT		ISO			
11	AN PROPERTY OF A STATE OF THE PROPERTY OF THE	DRY	DRY			ISOL	ISOL	ISO			
12	UTTARAKHAND	ISOL	ISOL		ISOL	ISOL	ISOL	ISC			
13	HARYANA, CHANDIGARH & DELHI	DRY	DRY	DRY	Commence of the Commence of th	DRY	DRY				
	PUNJAB	DRY	DRY	DRY		DRY	DRY	DR			
15	HIMACHAL PRADESH	DRY	DRY	ISOL	ISOL	DRY	DRY	DR			
16	JAMMU AND KASHMIR AND LADAKH	DRY	DRY	ISOL	ISOL	DRY	DRY	DR			
17	WEST RAJASTHAN	DRY	DRY	DRY	the same of the same of the same of	DRY	DRY	DR			
18	EAST RAJASTHAN	ISOL	ISOL			ISOL	ISOL	ISC			
19	WEST MADHYA PRADESH	SCT	SCT		SCT	SCT	FWS				
20	EAST MADHYA PRADESH	ISOL	-			SCT	FWS				
21	GUJRAT REGION	FWS			SCT	SCT	SCT	THE RESERVE AND ADDRESS OF THE PERSON NAMED IN			
22	SAURASHTRA & KUTCH	ISOL	ISOL	ISOL	ISOL	ISOL	ISOL	ISO			
23		FWS				WS	WS	W			
24	MADHYA MAHARASHTRA	FWS	SCT	SCT	SCT	FWS	FWS	FW			
25	MARATHWADA	FWS	FWS	SCT	SCT	FWS	FWS				
26	VIDARBHA	FWS	SCT	FWS	The second secon	WS	WB	99			
27	CHHATTISGARH	FWS	FWS	FWS	FWS	WB	. 999	- 27			
28	COASTAL ANDHRA PRADESH	SCT	FWS	FWS	FWS	WS	FWS	se			
29	TELANGANA	FWS	FWS	SCT	FWS	WB	Wis	1/4			
30	RAYALASEEMA	SCT		FWS		FWS	SCT	ISO			
31	TAMILNADU & PUDUCHERRY	SCT	ISOL			ISOL	ISOL	ISC			
32	COSTAL KARNATAKA	FWS	FWS	FWS	With	With	WS	W			
33	NORTH INTERIOR KARNATAKA	FWS			SCT	FWS	FWS	FW			
34		FWS	FWS		SCT	FWS					
35	KERALA AND MAHE	FWS	FWS		2,15	WS	WS	-			
36	LAKSHADWEEP	FWS	The second secon		703	Wil	Wis	39			

• As the lead period increases forecast accuracy decrease.









- $\bullet \quad \hbox{Action may be taken based on ORANGE AND REDCOLOUR warnings}.$
- Vulnerable regions likely urban and hilly areas action may be initiated for heavy rainfall warning.
- As the lead period increases forecast accuracy decreases.

#### Weather forecast over Delhi/NCR during 22th to 25th September 2025

#### **Past Weather:**

There has been no large change in the minimum and maximum temperatures over Delhi/NCR during the past 24 hours. The maximum and minimum temperatures over Delhi were around 34 to 35°C and 22 to 24°C respectively. The minimum and maximum temperatures were near normal. Partly cloudy sky conditions with predominant surface wind from the northwest/west direction with wind speeds up to 20 kmph with gusty wind up to 30 kmph prevailed during the past 24 hours. Mainly clear sky conditions with a wind speed of less than 14 kmph from the southwest direction prevailed over the region in the forenoon today.

#### **Weather Forecast:**

**22.09.2025:** Mainly clear sky. The maximum and minimum temperatures over Delhi are likely to be in the range of 35 to  $37^{\circ}$ C. The maximum temperature will be above normal up to  $1 - 2^{\circ}$ C. The predominant surface wind will likely to be from the northwest direction with a wind speed of up to 15-20 kmph during afternoon hours. The wind speed will decrease becoming less than 10 kmph from the southwest direction during the evening and night.

**23.09.2025:** Mainly clear sky. The maximum and minimum temperatures over Delhi are likely to be in the range of 33 to 35°C and 24 to 26°C respectively. The minimum temperature will be near normal and the maximum temperature will be near normal. The predominant surface wind will likely to be from the northwest direction with a wind speed of up to 10-15 kmph during morning hours. The wind speed will gradually increase becoming less than 25 kmph from the northwest direction in the afternoon. The wind speed will decrease becoming less than 15 kmph from the northwest direction during the evening and night.

**24.09.2025:** Mainly clear sky. The maximum and minimum temperatures over Delhi are likely to be in the range of 33 to  $35^{\circ}$ C and 23 to  $25^{\circ}$ C respectively. The minimum temperature will be below normal up to  $1 - 2^{\circ}$ C and the maximum temperature will be near normal. The predominant surface wind will likely to be from the northwest direction with a wind speed of up to 20-22 kmph during morning hours. The wind speed will gradually increase becoming less than 25 kmph from the northwest direction in the afternoon. The wind speed will decrease becoming less than 15 kmph from the northwest direction during the evening and night.

**25.09.2025:** Mainly clear sky. The maximum and minimum temperatures over Delhi are likely to be in the range of 33 to  $35^{\circ}$ C and 23 to  $25^{\circ}$ C respectively. The minimum temperature will be below normal up to 1 -  $2^{\circ}$ C and the maximum temperature will be near normal. The predominant surface wind will likely to be from the northwest direction with a wind speed of up to 20-22 kmph during morning hours. The wind speed will gradually increase becoming less than 25 kmph from the northwest direction in the afternoon. The wind speed will decrease becoming less than 15 kmph from the northwest direction during the evening and night.

# Impact & Action Suggested due to

❖ Heavy to very heavy rainfall (12-20 cm) at isolated places over Odisha on 22<sup>nd</sup>, 23<sup>rd</sup>, 25<sup>th</sup> & 26<sup>th</sup>; Gangetic West Bengal on 22<sup>nd</sup>; Chhattisgarh on 24<sup>th</sup> & 25<sup>th</sup>; Marathawada on 22<sup>nd</sup>, Konkan & Goa during 26<sup>th</sup>-28<sup>th</sup> and Madhya Maharashtra on 22<sup>nd</sup> and during 26<sup>th</sup>-28<sup>th</sup> September.

#### **Impact Expected**

- Water logging/ flooding in many parts of low lying area and river banks
- ➤ Localized and short term disruption to municipal services (water, electricity, etc.)
- Major disruption of traffic flow. Major roads/local trains affected.
- Possibility of danger to very old buildings and unmaintained structures, falling of trees etc
- Closure of roads crossing low water bridges.

# **Action Suggested**

- > Traffic may be regulated effectively
- ➤ People in the affected area may restrict their movement

#### Agromet advisories for likely impact of Heavy Rainfall

- ➤ In **Odisha**, harvest the matured vegetables such as pumpkin, okra, brinjal etc. and store them at safe places and maintain drainage channels to remove excess water from fields of rice, green gram, maize, pigeon pea, finger millet and vegetables in **North Central Plateau Zone**. Make provision for draining out excess rain water from fields of maize, finger millet and vegetables in **North Eastern Ghat Zone** and rice, pigeon pea, maize, ginger and vegetables in **Eastern Ghat High Land Zone** and **South Eastern Ghat Zone**.
- ➤ In **Gangetic West Bengal**, ensure proper drainage in winter vegetable fields and betel vine gardens in **Coastal Saline Zone** and rice and vegetable fields in **Laterite and Red Soil Zone**.
- > In **Jharkhand**, make proper arrangements for drainage of excess water in fields of pigeon pea, maize, finger millet and vegetables in **Western Plateau Zone**.
- ➤ In **Chhattisgarh**, ensure adequate drainage facilities in fields of rice, maize, groundnut, pigeon pea, black gram and vegetables.
- ➤ In **Maharashtra**, undertake harvesting of matured crops of groundnut and sorghum and keep the harvested produce at safer places and make provision to drain out excess rain water from fields of cotton, pigeon pea, soybean, maize, vegetables and fruit orchards in **Madhya Maharashtra**. In **Marathwada**, keep the harvested produce of black gram at safer places and provide adequate drainage facilities in fields of soybean, cotton, pigeon pea, vegetables and fruit orchards.
- ➤ In **Gujarat**, make arrangements to drain out excess rain water from fields of castor, cotton, pigeon pea and fruit orchards (banana and mango) in **South Gujarat Zone**.
- ➤ In **North Interior Karnataka**, ensure proper drainage facilities in fields of sugarcane, pigeon pea, soybean, maize, vegetables and fruit orchards in **North Dry Zone**.
- ➤ In Andhra Pradesh, make arrangements to drain out excess water from fields of rice, maize, cotton, mesta, green gram, black gram, groundnut, sugarcane and vegetables in North Coastal Zone and rice, sugarcane, maize, finger millet, groundnut, ginger, turmeric, vegetables and fruit orchards in High Altitude Tribal Zone
- ➤ In **Telangana**, make provision to drain out excess rain water from fields of rice, cotton, soybean, maize and pigeon pea in **Southern Telangana Zone**.
- In **Manipur**, undertake harvesting of matured pods of soybean and groundnut and store at safer places. Avoid waterlogging in fields of rice, soybean, groundnut, black gram and ginger.
- ➤ In **Mizoram**, undertake harvesting of matured cobs of maize and matured upland *Jhum* rice and keep the harvested produce in safe place.
- ➤ In **Nagaland**, continue harvesting of sesame and *Jhum* rice and keep harvested produce at safer places. Maintain proper drainage in fields of rice and soybean.

#### Livestock / Fishery

- > Keep the animals inside the shed during heavy rainfall and provide them balanced feed.
- Store feed and fodder in a safe place to prevent spoilage.
- Construct an outlet with proper netting around the ponds to drain out excess water, thereby preventing fish from escaping in case of overflow.

# Agromet advisories for likely impact of Thunderstorm / Gusty Winds / Squally Winds

Provide mechanical support to horticultural crops and staking or support to vegetables and young fruit plants / fruit-bearing plants to avoid lodging due to strong winds.

#### **Legends & abbreviations:**

- **♦ Heavy Rain:**64.5-115.5mm; **Very Heavy Rain:**115.6-204.4mm; **Extremely Heavy Rain:** >204.4mm.
- Obsy: Observatory; Automatic Weather Station; ARG: Automatic Rain Gauge; dist: District: NH: National Highway; KVK: Krishi Vigyan Kendra; DVC: Damodar Valley Corporation; PTO: Part Time Office, Aero: Aerodrome, IAF: Indian Air Force.
- Region wise classification of meteorological Sub-Divisions:
  - Northwest India: Western Himalayan Region (Jammu-Kashmir-Ladakh-Gilgit-Baltistan-Muzaffarabad, Himachal Pradesh and Uttarakhand); Punjab, Haryana-Chandigarh-Delhi; West Uttar Pradesh, East Uttar Pradesh, West Rajasthan and East Rajasthan.
  - Central India: West Madhya Pradesh, East Madhya Pradesh, Vidarbha and Chhattisgarh.
  - **East India:** Bihar, Jharkhand, Sub-Himalayan West Bengal & Sikkim; Gangetic West Bengal, Odisha and Andaman & Nicobar Islands.
  - Northeast India: Arunachal Pradesh, Assam & Meghalaya and Nagaland, Manipur, Mizoram & Tripura.
  - West India: Gujarat Region, Saurashtra & Kutch, Konkan & Goa, Madhya Maharashtra and Marathawada.
  - South India: Coastal Andhra Pradesh & Yanam, Telangana, Rayalaseema, Coastal Karnataka, North Interior Karnataka, South Interior Karnataka, Kerala & Mahe, Tamil Nadu, Puducherry & Karaikal and Lakshadweep.



#### राष्ट्रीय मौसम पूर्वानुमान केन्द्र भारत मौसम विज्ञान विभाग पृथ्वी विज्ञान मंत्रालय



#### National Weather Forecasting Centre India Meteorological Department Ministry of Earth Sciences

# **LEGENDS**



# SPATIAL DISTRIBUTION (% of Stations reporting)

6 Stations Category		% Stations	Category					
76-100	6-100 Widespread (WS/Most Places)		26-50	Scattered (SCT/A Few Places)				
51-75	Fairly Widesp	read (FWS/Many Places)	1-25	isolated (ISOL)				
Fog		Heavy Snow	Cold Wave	COLOUR CO	COLOUR CODED WARNING			
			#	No Warni	No Warning (No Action)			
Heavy Ra	in	Dust Storm	Cold Day	Watch (B	Watch (Be Aware)  Alert (Be Prepared To Take Action)			
Very Heav	y Rain	+ Heat Wave	Ground Fro	Alert (Be				
Extremely	Heavy Rain	+ Warm Night		Warning (Take Action)				
Thunder & Lightning 1+ Hot Day				-	Probabilistic Forecast			
Inunder	& Lightning	* in		Terms	Probability of Occurrence (%			
<b>▶</b> Hailstorm	1	Hot & Humid		Unlikely Likely Very Likely	< 25 25 - 50 50 - 75			
Dust Raisi	ng Winds	Strong Surface Win	ds	Most Likely	> 75			





#### DEFINITION/CRITERIA Heavy: 64.5 to 115.5 mm/cm \* Very Heavy: 115.6 to 204.4 mm/cm Rain/ Snow \* Extremely Heavy: > 204.4 mm/cm When maximum temperature of a station reaches ≥40° C for plains and ≥30° 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 ≥6.5° C **Heat Wave** (b). Based on Actual maximum temperature Heat Wave: When actual maximum temperature ≥45°C Severe Heat Wave: When actual maximum temperature ≥47°C ( c). Criteria for heat wave for coastal stations When maximum temperature departure is >4.5°C from normal. Heat Wave may be described provided maximum temperature ≥37°C When maximum temperature remains 40°C nimum temperature departure 4.5 °C to 6.4 °C Warm Night: Whe Warm Night Severe Warm Night: When minimum temperature departure >6.4 °C When minimum temperature of a station ≤10°C for plains and ≤0°C for hilly regions. (a). Based on departure Cold Wave: Minimum Temperature Departure from normal -4.5 °C to -6.4 °C Severe Cold Wave: Minimum Temperature Departure from normal ≤ -6.5 °C **Cold Wave** (b) Based on actual Minimum Temperature (for Plains only) Cold Wave : When Minimum Temperature is ≤ 4.0 °C Severe Cold Wave: When Minimum Temperature is ≤ 2.0 °C (c) For Coastal Stations When Minimum Temperature departure is ≤-4.5 °C & actual Minimum Temperature is ≤ 15 °C When minimum temperature of a station ≤10°C for plains and ≤0°C for hilly regions Based on departure Cold Day Cold Day: Maximum Temperature Departure from normal -4.5 °C to -5.4 °C. Severe Cold Day: Maximum Temperature Departure from normal ≤ -6.5 °C Phenomenon of small droplets suspended in air and the horizontal visibility < 1km Moderate Fog: When the visibility between 500-200 metres Dense Fog: when the visibility between 50-200 metres Fog Very Dense Fog: when the visibility < 50 metres Sudden electrical discharges manifested by a flash of light (Lightning) and a sharp rumbling sound (thunder) Thunderstorm An ensemble of particles of dust or sand energetically lifted to great heights by a strong and **Dust/Sand** turbulent wind. Ice deposits on ground Frost Air temperature s4°C (over Plains) A strong wind that rises suddenly, lasts for atleast 1 minute. Moderate: Wind speed 52-61 kmph Squall Severe: Wind speed 62-87 kmph Very Severe: Wind speed >87 kmph Effect of various waves in the sea over specific area Rough to very rough: Wind speed 41-62 kmph (22-33 knots) & Wave height 2,5-6 metre High to very high: Wind speed 63-117 kmph ( 34-63 knots) & Wave height 6-14 metre Phenomenal: Wind speed >117 kmph (>63 knots) & Wave height >14 metre Sea State Cyclonic Storm: Wind speed 62-87 kmph (34-47 knots) Severe Cyclonic Storm: Wind speed 88-117 kmph (48-63 knots) Very Severe Cyclonic Storm: Wind speed 118-165 kmph (64 - 89 knots) Extremely Severe Cyclonic Storm: Wind speed 166-220 kmph (90 -119 knots) Cyclone Super Cyclone Strom: Wind speed >220 kmph (>119 knots)

\* 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)

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