# **Decadal Agromet Bulletin of Pakistan**



# Highlights...

- Mainly cold and dry weather prevailed in most parts of the country, while very cold in hilly areas. Heavy rainfall reported from northern parts of Punjab and adjoining areas of Khyber Pakhtunkhwa and Azad Jammu & Kashmir. However, light to moderate rain with snowfall over the hills occurred in most parts of the country except some parts of Sindh and Southwestern Balochistan.
- ❖ Highest amount of rainfall recorded was 127.1 mm at Garhi Dopatta during the last decade.
- ❖ Lowest minimum temperature recorded was -2.69 °C at Gupis during the last decade.
- Dry weather is likely in most parts of the country, while cold and partly cloudy weather is expected in upper Khyber Pakhtunkhwa and Gilgit Baltistan.
- Farmers are advised to view the weather forecast before any field activity.

# NATIONAL AGROMET CENTRE (NAMC) PAKISTAN METEOROLOGICAL DEPARTMENT SECTOR H-8/2, ISLAMABAD

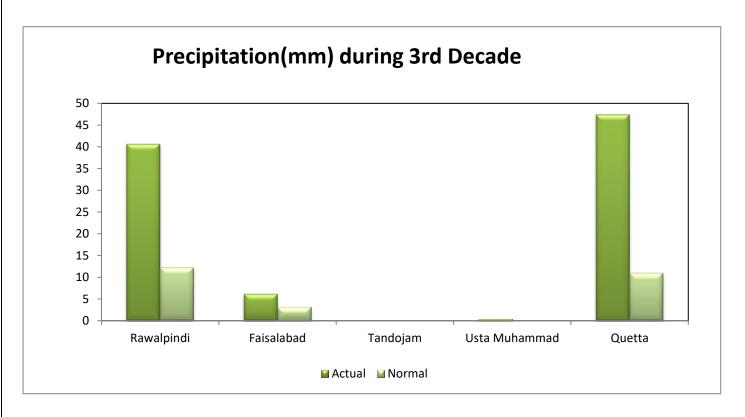
Patron-in-Chief: Mr. Sahibzad Khan, Director General Editor-in-Chief: Ms. Asma Jawad Hashmi, Director Editor: Mr. Irshad Ali, Assistant Meteorologist Phone: +92-51-9250592 Email: dirnamc@yahoo.com

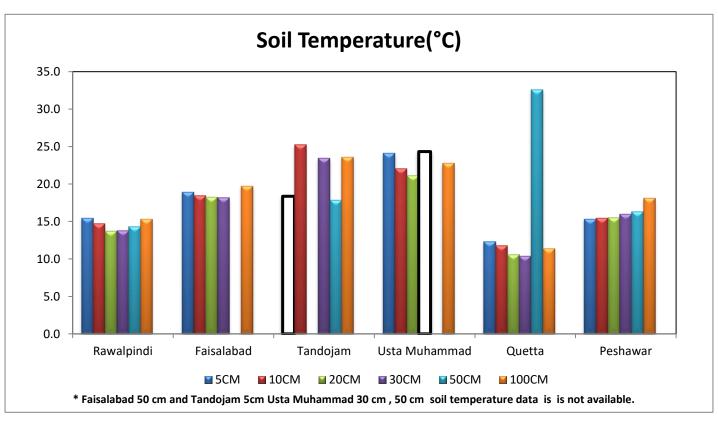
# Meteorological Conditions during 2<sup>nd</sup> Decade of February 2025

Sr. No.	Station	Precipitation (mm)			Air Temperature (°C)			Soil Temperatures (°C)						R.H	Sunshine	Wind	ЕТо
		Normal	Actual	Dep	Tmx Dep	Tmin Dep	Mean	5cm	10cm	20cm	30cm	50cm	100cm	(%)	Duration(hours)	Speed (km/hr)	(mm/day)
1	Rawalpindi	8.0	12.2	40.6	-0.3	1.8	15.8	15.5	14.7	13.7	13.8	14.3	15.3	68.6	38.3	1.7	1.8
2	Faisalabad	10.3	3.1	6.1	-0.8	1.9	18.2	18.9	18.4	18.2	18.2	***	19.7	69.0	48.3	1.9	2.1
3	Jhelum	10.7	9.3	8.1	-1.2	0.4	17.1	18.4	17.6	17.4	17.2	17.9	***	67.0	40.5	5.9	2.5
4	Lahore	13.6	4.2	41.9	-0.5	-1.0	18.3	17.9	17.9	17.5	17.4	***	18.7	64.0	41.3	1.0	1.9
5	Sargodha	10.9	2.3	4.8	-0.6	1.0	18.2	20.8	19.9	19.5	19.8	***	***	63.0	33.5	2.0	2.0
6	Multan	11.5	4.6	11.5	-1.6	4.1	20.0	***	***	***	***	***	***	57.0	41.9	4.2	2.7
7	Khanpur	11.9	0.9	0.0	-0.6	2.2	20.5	***	18.8	19.2	19.2	19.2	19.4	63.0	42.8	1.0	2.2
8	Tandojam	13.3	0.0	0.0	-1.2	2.6	22.7	***	25.2	***	23.4	***	23.6	65.0	34.8	3.9	2.9
9	Sakrand	12.2	0.0	0.0	1.7	3.4	22.2	29.4	25.5	24.0	24.3	24.1	***	57.0	41.9	4.3	3.1
11	Rohri	15.2	4.6	0.0	-2.2	1.1	21.5	***	***	***	***	***	***	60.1	44.0	5.2	3.1
12	D.I Khan	10.3	5.7	19.6	-1.4	1.8	17.6	17.7	17.2	17.7	***	7.6	***	72.0	28.4	2.9	1.9
13	Peshawar	9.7	17.4	37.6	0.5	-1.0	15.5	15.3	15.4	15.5	16.0	16.3	18.1	66.0	36.3	3.1	2.0
14	Usta M.	12.9	0.0	0.4	-0.9	1.1	20.3	24.1	22.0	21.1	***	***	22.8	65.0	0.0	2.5	2.8
15	Quetta	3.6	10.9	47.4	-1.6	3.7	11.4	12.3	11.8	10.6	10.4	32.6	11.4	65.4	34.2	5.6	2.1
16	Skardu	-1.6	9.7	41.0	-0.3	0.8	4.1	***	***	***	***	***	***	54.0	24.6	0.8	1.2
17	Gilgit	2.6	2.8	12.9	-11.2	0.7	4.0	***	***	***	***	***	***	46.9	29.6	2.6	1.4

**Table-1:** Meteorological parameters for selected station of Pakistan. "Dep" in the table stands for difference from climatic normal, i.e. actual value minus normal. The climatic normally used in the Bulletin is extracted from the 2007 - 2016 observed data. 'ETO' stands for reference crop Evapotranspiration\*\*\* stands for data non-availability.

# **Graph at RAMCs during February 2025**





# Past Weather (21st to 28th February 2025)

Mainly cold and dry weather prevailed in most parts of the country, while very cold in hilly areas. Heavy rainfall reported from northern parts of Punjab and adjoining areas of Khyber Pakhtunkhwa and Azad Jammu & Kashmir. However, light to moderate rain with snowfall over the hills occurred in most parts of the country except some parts of Sindh and Southwestern Balochistan.

#### 1.1 Punjab

Mainly cold and dry weather prevailed over most areas, however, moderate to heavy rain was reported from the northern parts of province. The decadal maximum temperature was observed below normal by 4.3°C and minimum temperature was observed above normal by 1.5°C in the province. Whereas values of relative humidity, sunshine hour, wind speed & ETo were recorded 65%, 40.9hrs, 1.9km/hr and 2.2mm/day respectively.

#### 1.2 Sindh

Light rain was recorded from the upper parts of the province whereas dry weather prevailed in southern parts of Sindh. The decadal maximum temperature was observed below normal by 0.6°C and minimum temperature was observed above normal by 2.4°C in the province. Whereas values of relative humidity, sunshine hour, wind speed & ETo were recorded as 61%, 40.2hrs, 4.5km/hr and 3.0mm/day respectively.

#### 1.3 Khyber Pakhtunkhwa

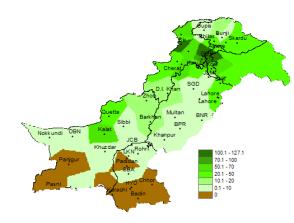
Moderate to heavy rain (snow over hills) was reported from the province. The decadal maximum temperature was observed below normal by 0.4°C and minimum temperature was observed above normal by 0.4°C in the province. Whereas values of relative humidity, sunshine hour, wind speed & ETo were recorded as 69%, 32.4hrs, 3.0km/hr and 2.8mm/day respectively.

#### 1.4 Baluchistan

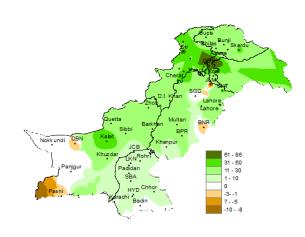
Light to moderate rain (snow over hills) was reported from the upper half of the province. The decadal maximum was observed below normal by 1.3°C and minimum temperature was above normal by 2.4°C in the province. Whereas values of relative humidity, sunshine hour, wind speed & ETo were recorded as 65%, 17.1hrs, 4.1km/hr and 2.5mm/day respectively.

# 1.5 Gilgit-Baltistan and Azad Jammu & Kashmir.

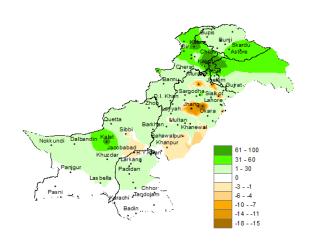
Very cold weather with moderate to heavy rain (snow over hills) was reported from Gilgit Baltistan and Kashmir. The decadal maximum was observed below normal by 5.8°C and minimum temperature was above normal by 0.7°C in the province. Whereas values of relative humidity, sunshine hour, wind speed & ETo were recorded as 50%, 27.1hrs, 1.7km/hr and 1.3mm/day respectively.



#### I. Actual rainfall



# II. Departure of rainfall from Normal



#### III. Departure of rainfall from Previous Decade

Figure.1: Rainfall distribution during previous decade (mm)

# (a) <u>Past Weather for Major Agricultural Plains</u> (21<sup>st</sup> to 28<sup>th</sup> February 2025)

#### 2.1 RAMC, Rawalpindi (Potohar region)

Rain was reported 40.6 mm during the decade; however, weather remained partially cloudy for 07 days. Average relative humidity recorded as 69%. Mean day temperature was 21.8°C while night temperature recorded as 9.8°C with 38.3 hours bright sunshine duration. Wind speed recorded as 1.7km/hr with mean wind direction *variable*.

#### 2.2 RAMC, Faisalabad (Central Punjab)

Rain was reported 6.1 mm during the decade; however, weather remained partially cloudy for 07 days during the decade. Average relative humidity recorded as 69%. Mean day temperature was 24.2°C while night temperature recorded as 12.2°C with 48.3 hours bright sunshine duration. Wind speed recorded as 1.9km/hr with mean wind direction west south westerly.

Wheat: Very good, shooting completed.

#### 2.3 RAMC, Tandojam (Lower Sindh)

Cold and dry weather was observed during the decade. however, weather remained partially cloudy for 05 days. Average relative humidity recorded as 65%. Mean day temperature was 29.5°C while night temperature recorded as 15.9°C with 34.8hours bright sunshine duration. Wind speed recorded as 3.9km/hr with mean wind direction *south-south westerly*..

Wheat: Good, Flowering.

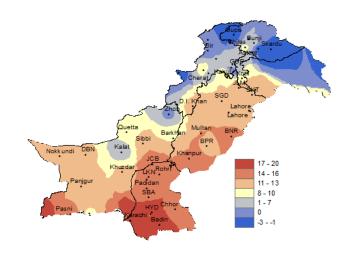
#### 2.4 RAMC, Usta Muhammad (Eastern Baluchistan)

Rain was reported 0.4 mm during the decade; however, weather remained partially cloudy for 07 days. Average relative humidity recorded as 65%. Mean day temperature was 26.6°C while night temperature recorded as 14.0°C. Wind speed recorded as 2.5km/hr with mean wind direction *north easterly*. *Wheat: Good, shooting*.

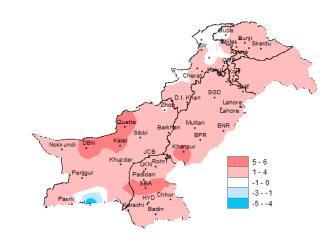
#### 2.5 RAMC, Quetta (Northern Baluchistan)

Rain was reported 47.4 mm during the decade; however, weather remained partially cloudy for 08 days during the decade. Average relative humidity recorded as 65.4.%. Mean day temperature was 15.4°C while night temperature recorded as 7.3°C with 34.2 hours bright sunshine duration. Wind speed recorded as 5.6 km/hr with mean wind direction *southerly*.

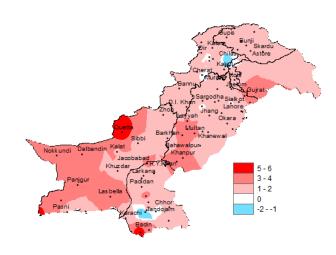
Wheat: Good, Tillering.



#### IV. Actual min-temperature



#### V. Departure of min-temperature from Normal



# VI. Departure of min-temperature from Previous Decade

Figure.2: Minimum Temperature distribution during previous decade (°C)

# 2(b) <u>Past Weather or Sub-Regional Agricultural</u> Plains (21<sup>st</sup> to 28<sup>th</sup> February 2025)

#### 2.6 Jhelum

Rain was reported 8.1 mm during the decade; weather remained partially cloudy for 08 days. Average relative humidity recorded as 67%. Mean day temperature was 23.0°C while night temperature recorded as 11.1°C with 40.5 hours bright sunshine duration. Wind speed recorded as 5.9km/hr with mean wind direction variable.

#### 2.7 Lahore

Rain was reported 41.9 mm during the decade; however, weather remained partially cloudy for 06 days. Average relative humidity recorded as 64%. Mean day temperature was 23.9°C while night temperature recorded as 12.6°C with 41.3 hours bright sunshine duration. Wind speed recorded as 1.0 km/hr with mean wind direction north *westerly*.

## 2.8 Sargodha

Rain was reported 4.8 mm during the decade; however, weather remained partially cloudy for 07 days. Average relative humidity recorded as 63%. Mean day temperature was 24.4°C while night temperature recorded as 11.9°C with 33.5 hours bright sunshine duration. Wind speed recorded as 2.0km/hr with mean wind direction *variable*.

#### 2.9 Multan

Rain was reported 11.5 mm during the decade; however, weather remained partially cloudy for 07 days. Average relative humidity recorded as 63%. Mean day temperature was 24.3°C while night temperature recorded as 13.8°C with 39.4 hours bright sunshine duration. Wind speed recorded as 4.2 km/hr with mean wind direction *north easterly*.

#### 2.10 Khanpur

Rain was reported 0.01 mm during the decade; however, weather remained cloudy for 08 days. Average relative humidity recorded as 63%. Mean day temperature was 26.9°C while night temperature recorded as 14.1°C with 42.8 hours bright sunshine duration. Mean prevailing wind direction *was north easterly*.

#### 2.11 Sakrand

Cold and dry weather was observed during the decade; however, weather remained partially cloudy for 06 days. Average relative humidity recorded as 57%. Mean day temperature was 28.8°C while night temperature recorded as 15.6°C with 41.9 hours bright sunshine duration. Wind speed recorded as 4.3 km/hr with mean direction *north westerly*.

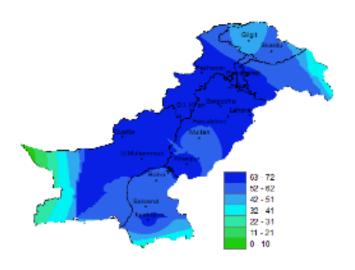


Figure.3: Relative Humidity in Percentage (%)

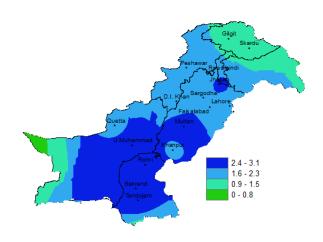


Figure.4: Reference Crop Evapotranspiration ETO (mm/day)

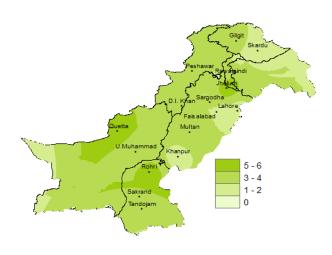


Figure 5: Wind Speed in kilometer per hour (km/h)
2.12 Rohri

Rain was reported 0.01 mm during the decade; however, weather remained partially cloudy for 07 days. Average relative humidity recorded as 60.1%. Mean day temperature was 26.6°C while night temperature recorded as 16.3°C with 44.0 hours bright sunshine duration. Wind speed recorded as 5.2km/hr with mean wind direction as *north easterly*.

Wheat: Very good, heading.

#### 2.13 D.I. Khan

Rain was reported 19.6 mm during the decade; however, weather remained partially cloudy for 06 days. Average relative humidity recorded as 72%. Mean day temperature was 23.0°C while night temperature recorded as 12.1°C with 28.4 hours bright sunshine duration. Wind speed recorded as 2.9km/hr with mean wind direction north westerly.

#### 2.14 Peshawar

Rain was reported 37.6 mm during the decade; however, weather remained partially cloudy for 07 days. Average relative humidity recorded as 66%. Mean day temperature was 22.3°C while night temperature recorded as 8.7°C with 36.3 hours bright sunshine duration. Wind speed recorded as 3.1km/hr with mean wind direction as south westerly.

#### 2.15 Skardu

Rain was reported 41.0 mm during the decade; however, weather remained partially cloudy for 05 days. Average relative humidity recorded as 54%. Mean day temperature was 9.0°C while night temperature recorded as -0.8°C with 24.6 hours bright sunshine duration. Wind speed recorded as 0.8km/hr with mean wind direction as *westerly*.

### 2.16 Gilgit

Rain was reported 12.9 mm was observed during the decade; however, weather remained partially cloudy for 08 days. Average relative humidity recorded as 47%. Mean day temperature was 4.6°C while night temperature recorded as 3.3°C with 29.6 hours bright sunshine duration. Wind speed recorded as 2.6km/hr with mean wind direction as *south easterly*.

# **Ten Days Weather Advisory for Farmers** (1st to 10th March 2025)

## 3.1 Temperature Forecast

Normal mean temperature is likely over most parts of the county.

# 3.2 Wind Forecast

Generally, normal wind patterns may prevail in most of the agricultural plains of the country.

# 3.3 Rain Forecast

# Punjab:

Mainly dry weather is expected in most parts; however, rain/wind-thunderstorms are likely in most parts of the Punjab during 1<sup>st</sup> half of the decade.

# **Khyber Pakhtunkhwa:**

Mainly cold and dry weather is expected in most parts, however, rain/wind-thunderstorm and snow over hills is likely in upper parts during the decade.

#### **❖** Sindh:

Mainly cold and dry weather is expected in most parts of province during the decade.

## **❖** Baluchistan:

Mainly cold and dry weather is expected in most parts of the province.

# **❖** Gilgit-Baltistan:

Mainly very cold and dry weather is expected, while rain/wind-thunderstorm/snowfall is likely in Gilgit Baltistan during the decade.

## **\*** Kashmir:

Mainly very cold and dry weather is expected, while rain/wind-thunderstorm/snowfall is likely in Kashmir during the decade.

## 3.4 Advisory for Farmers

Farmers are advised to follow the weather forecast to proceed for any field activity.