

# Weekly Weather and Crop Bulletin for Pakistan

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**Rainfall Distribution (mm) during the Previous  
Week (28<sup>th</sup> November – 04<sup>th</sup> December, 2022)**



## Highlights of Past Weather (28<sup>th</sup> November – 04<sup>th</sup> December, 2022)

Above normal temperature was recorded in most parts of the country except Northern Baluchistan, and upper parts of KPK where below normal temperature was observed.

Province wise distribution of rainfall reported as follows during the last week:

1. Dry weather reported from the Punjab.
2. Dry weather reported from the KPK.
3. Dry weather reported from Sindh.
4. Dry weather reported from the Baluchistan.
5. Dry weather reported from GB and Kashmir.

## Contents

|                                     |     |
|-------------------------------------|-----|
| Highlights of past weather          | 1-2 |
| Past weather for Agri Plains        | 3-4 |
| Crop progress                       | 4   |
| Agrometeorological parameters       |     |
| • Temperature                       | 5   |
| • R.H and GDD                       | 6   |
| • Wind speed                        | 7   |
| • Cloudiness                        | 8   |
| Advisory for Farmers                | 9   |
| Weather Outlook                     | 9   |
| National data for selected stations | 10  |
| AgMIP project findings              | 11  |

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**Past Weather of Provinces (28<sup>th</sup> November – 04<sup>th</sup> December, 2022)****Punjab**

Dry weather reported from the province of Punjab. Weekly maximum and minimum temperatures recorded as 24.3°C & 8.6°C respectively. For the recent week on average 80.3 growing degree days were accumulated. Average relative humidity recorded as 64% and wind speed in the morning/evening recorded as 0.1/0.1 Knots. During the previous week the lowest minimum temperature was recorded as 3.0°C at Murree.

**Baluchistan**

Dry weather reported from Baluchistan. Weekly maximum and minimum temperatures recorded as 25.6°C & 7.7°C respectively. For the recent week on average 81.3 growing degree days were accumulated. Average relative humidity recorded as 40% and wind speed in the morning/evening recorded as 0.7/3.3 Knots. During the previous week the lowest minimum temperature was recorded as -4.0°C at Kalat.

**Khyber Pakhtunkhwa**

Dry weather reported from Khyber Pakhtunkhwa. Weekly maximum and minimum temperatures recorded as 20.4°C & 4.8°C respectively. For the recent week on average 53.2 growing degree days were accumulated. Average relative humidity recorded as 70% and wind speed in the morning/evening recorded as 0.6/0.6 Knots. During the previous week the lowest minimum temperature was recorded as -4.0°C at Kalam.

**Sindh**

Dry weather reported from Sindh province. Weekly maximum and minimum temperatures recorded as 28.3°C & 12.3°C respectively. For the recent week, on average 107.1 growing degree days were accumulated. Average relative humidity recorded as 64% and wind speed in the morning/evening recorded as 0.7/2.6 Knots.

Lowest minimum temperature was recorded as 6.5°C at Mithi.

**Gilgit-Baltistan and Azad Jammu & Kashmir**

Dry weather reported from GB and Kashmir. Weekly maximum and minimum temperatures recorded as 16.7°C & 1.1°C respectively. For the recent week on average 29.0 growing degree days were accumulated. Average relative humidity recorded as 67% and wind speed in the morning/evening recorded as 0.1/0.1 Knots. During the previous week the lowest minimum temperature was recorded as -6.6°C at Skardu.

### **Past Weather for Major Agricultural Plains** **(28<sup>th</sup> November – 04<sup>th</sup> December, 2022)**

#### **Rawalpindi (Potohar region)**

Dry weather reported from Rawalpindi during the week; however, cloudiness in the morning/evening recorded as 0.9/1.1 Oktas while, average relative humidity observed as 73%. Mean night time temperature recorded 4.5°C & for the recent week 65.7 growing degree days were accumulated. Wind speed recorded in the morning/evening as 0.2/0.0 Knots.

#### **Faisalabad (Central Punjab)**

Dry weather reported from Faisalabad during the week; however, cloudiness in the morning/evening recorded as 0.7/1.7 Oktas while, average relative humidity observed as 73%. Mean night time temperature recorded as 9.0°C & for the recent week 84.5 growing degree days accumulated. Wind speed recorded in the morning/evening as 0.0/0.2 Knots.

#### **Tandojam (Lower Sindh)**

Dry weather reported from Tandojam during the week; however, cloudiness in the morning/evening recorded as 0.0/0.0 Oktas, average relative humidity observed as 66%. Mean night time temperature recorded as 10.6°C & for the recent week 101.3 growing degree days accumulated. Wind speed recorded in the morning/evening as 0.3/0.8 Knots.

#### **Usta Muhammad (Baluchistan)**

Dry weather reported from Usta Muhammad during the week; however, cloudiness in the morning/evening recorded as 0.6/0.9 Oktas while, average relative humidity observed as 73%. Mean night time temperature recorded as 10.2°C & for the recent week 92.8 growing degree days accumulated. Wind speed recorded in the morning/evening as 0.5/0.9 Knots.

#### **Quetta (Northern Baluchistan)**

Dry weather reported from Quetta during the week; however, cloudiness in the morning/evening recorded as 4.0/5.2 Oktas while, average relative humidity observed as 35%. Mean night time temperature recorded as -0.5°C & for the recent week 35 growing degree days accumulated. Wind speed recorded in the morning/evening as 0.5/0.3 Knots.

### **Past Weather for Sub-Regional Agricultural Plains** **(28<sup>th</sup> November – 04<sup>th</sup> December, 2022)**

#### **Multan**

Dry weather reported from Multan during the week; however, cloudiness in the morning/evening recorded as 0.6/1.3 Oktas. Average relative humidity observed as 70%. Mean night time temperature recorded as 9.5°C & for the recent week 85.4 growing degree days accumulated. Wind speed recorded in the morning/evening as 0.0/0.0 Knots

#### **Lahore**

Dry weather reported from Lahore during the week; however, cloudiness in the morning/evening recorded as 0.7/1.0 Oktas, average relative humidity observed as 74%. Mean night time temperature recorded as 10.2°C & for the recent week 85.8 growing degree days accumulated. Wind speed recorded in the morning/evening as 0.0/0.0 Knots.

#### **Zhob**

Dry weather reported from Zhob during the week; however, cloudiness in the morning/evening recorded as 0.6/0.3 Oktas while, average relative humidity observed as 30%. Mean night time temperature recorded as 4.3°C & for the recent week 60.5 growing degree days accumulated. Wind speed recorded in the morning/evening as 2.0/3.0 Knots.

#### **Murree**

Dry weather reported from Murree during the week; however, cloudiness in the morning/evening recorded as 0.3/1.4 Oktas while, average relative humidity observed as 48%. Mean night time temperature recorded as 5.2°C & for the recent week 42.8 growing degree days accumulated. Wind speed recorded in the morning/evening as 0.3/0.3 Knots.

#### **D.I. Khan**

Dry weather reported from DI Khan during the week; however, cloudiness in the morning/evening recorded as 0.4/0.9 Oktas, average relative humidity observed as 75%. Mean night time temperature recorded as 9.6°C & for the recent week 86.0 growing degree days accumulated. Wind speed recorded in the morning/evening as 0.6/0.6.

**Peshawar**

Dry weather reported during the week; however, cloudiness in the morning/evening recorded as 0.3/3.4 Oktas while, average relative humidity observed as 79%. Mean night time temperature recorded as 5.1°C & for the recent week 63.5 growing degree days accumulated. Wind speed recorded in the morning/evening as 0.0/0.3 Knots.

**Kalam**

Dry weather reported from Kalam during the week; however, cloudiness in the morning/evening recorded as 1.6/4.1 Oktas while, average relative humidity observed as 60%. Mean night time temperature recorded as -2.3°C & for the recent week 9.6 growing degree days accumulated. Wind speed recorded in the morning/evening as 0.0/0.0 Knots.

**Gilgit**

Dry weather reported from Gilgit during the week, cloudiness in the morning/evening recorded as 2.9/3.6 Oktas while, average relative humidity observed as 63%. Mean night time temperature recorded as -1.4°C & for the recent week 21.1 growing degree days accumulated. Wind speed recorded in the morning/evening as 0.3/0.6 Knots.

**Skardu**

Dry weather reported from Skardu during the week; however, cloudiness in the morning/evening recorded as 3.6/2.6 Oktas while, average relative humidity observed as 60%. Mean night time temperature recorded as -4.8°C & for the recent week 0.0 growing degree days accumulated. Wind speed recorded in the morning/evening as 0.0/0.0 Knots.

**Crop Situation for Major Agricultural Plains**  
**(Based on data from Regional Agromet Centers)****Potohar Region (Rawalpindi)**

There is presently no crop grown in the fields of RAMC Rawalpindi.

**Central Punjab (Faisalabad)**

Wheat crop, sowing on 10-11-2022.

very good, Third Leaf completed, Irrigated, 13.1%

**Lower Sindh (Tandojam)**

Wheat (TJ 83) Sowing on 09-11-2022.

Third Leaf, Irrigated, Good.

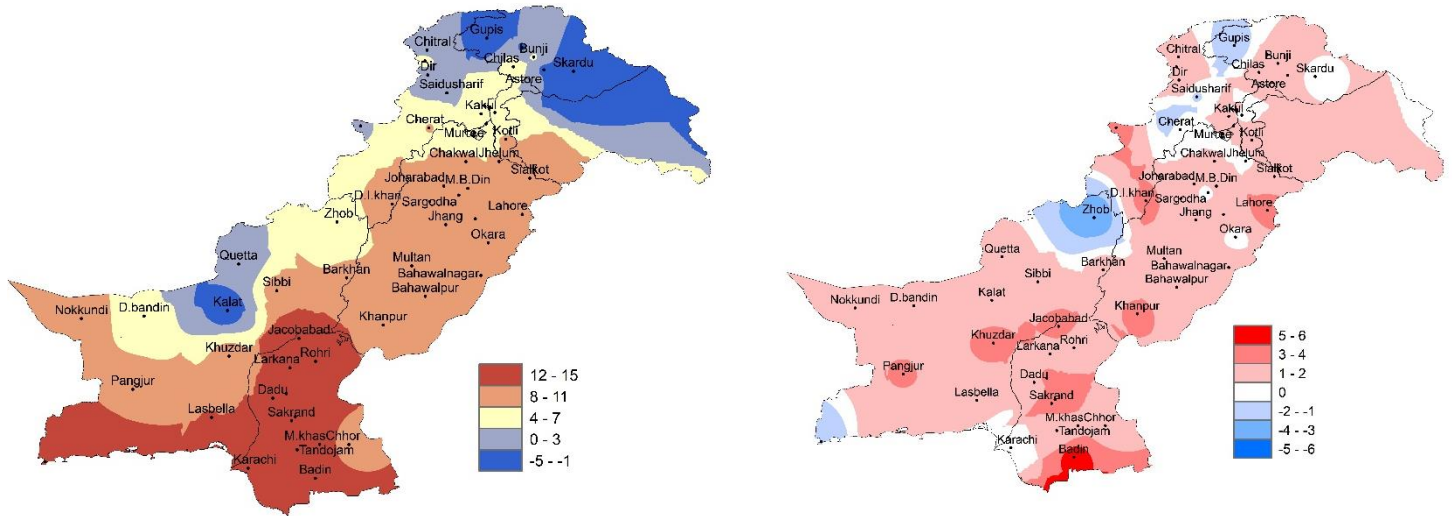
**Northern Baluchistan (Quetta)**

No Crop grown presently. Wheat crop harvested on 24-05-2022 at RAMC Quetta. At present no crop grown in the fields.

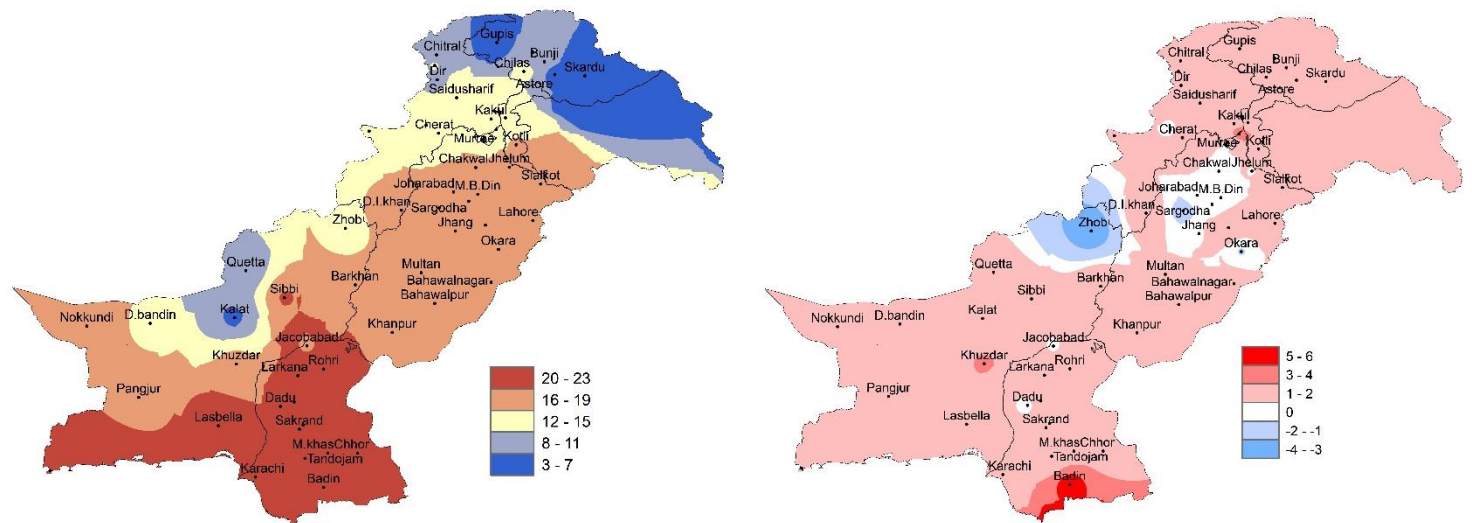
**Eastern Baluchistan (Usta Muhammad)**

Wheat Crop, Emergence Stage.

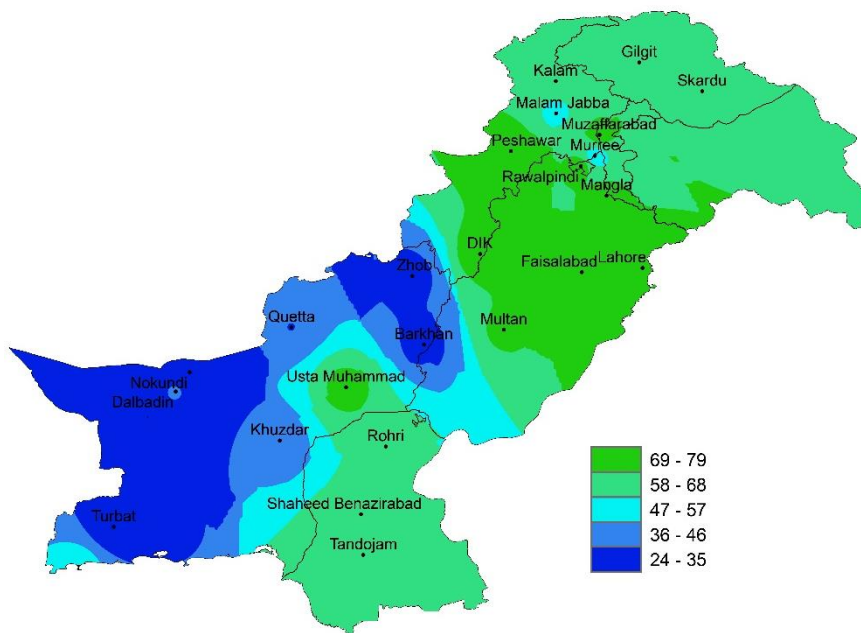
**Actual & Departure of Minimum temperature (°C) for the Previous week (28<sup>th</sup> November – 04<sup>th</sup> December, 2022)**



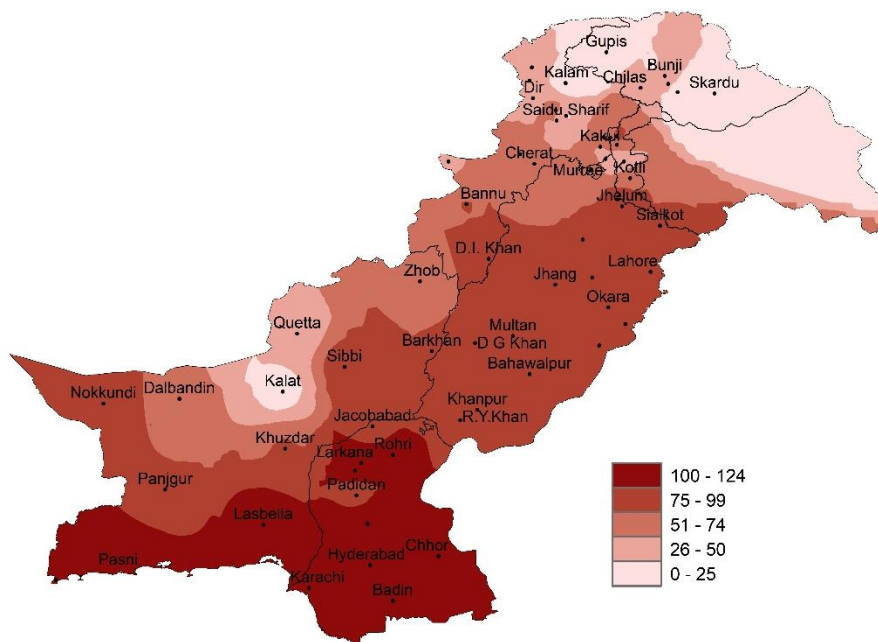
**Actual & Departure of Mean temperature (°C) for the Previous week (28<sup>th</sup> November – 04<sup>th</sup> December, 2022)**



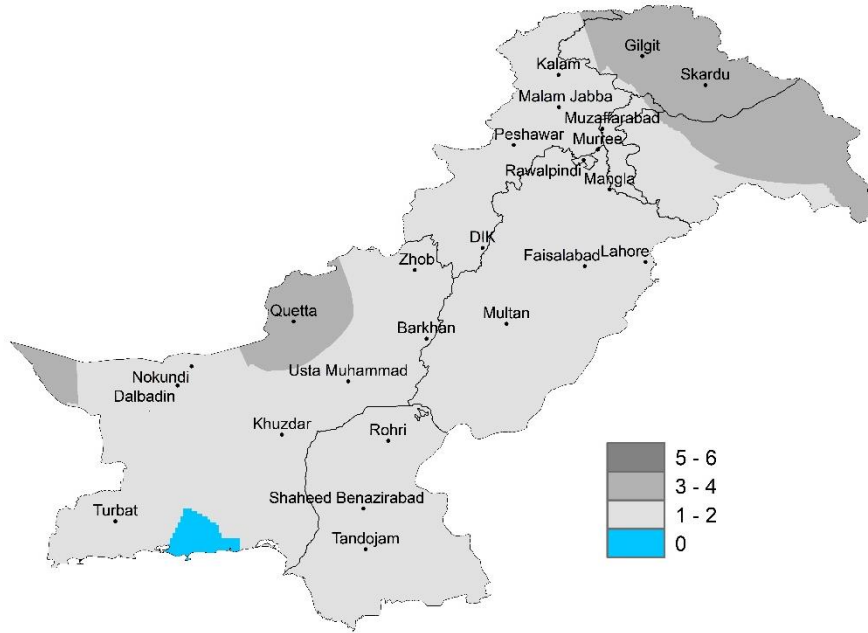
Mean Relative Humidity (%) during the  
Previous week (28<sup>th</sup> November – 04<sup>th</sup> December, 2022)



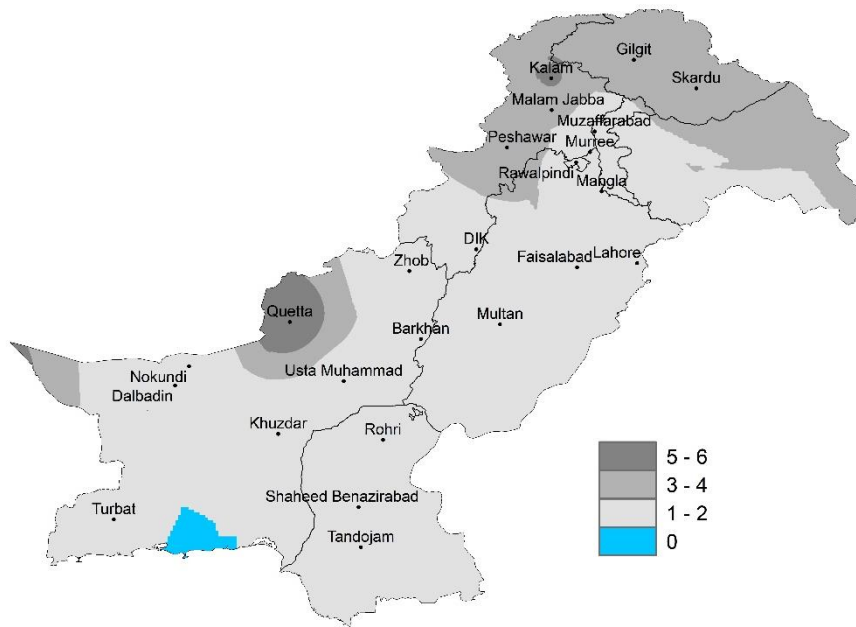
Total Growing Degree Days accumulated during the  
Previous week (28<sup>th</sup> November – 04<sup>th</sup> December, 2022)



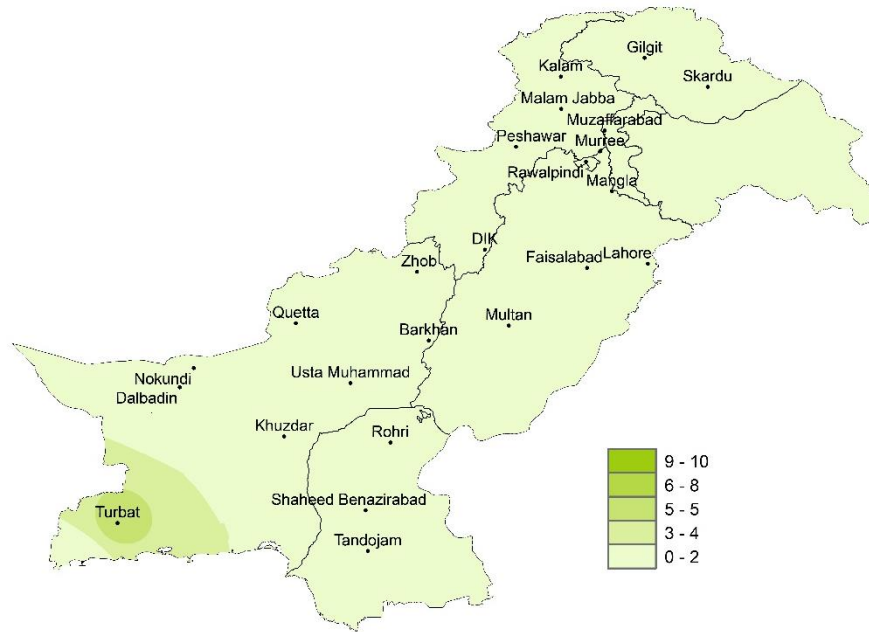
Mean Cloudiness (Oktas) at 0800PST during the  
Previous week (28<sup>th</sup> November – 04<sup>th</sup> December, 2022)



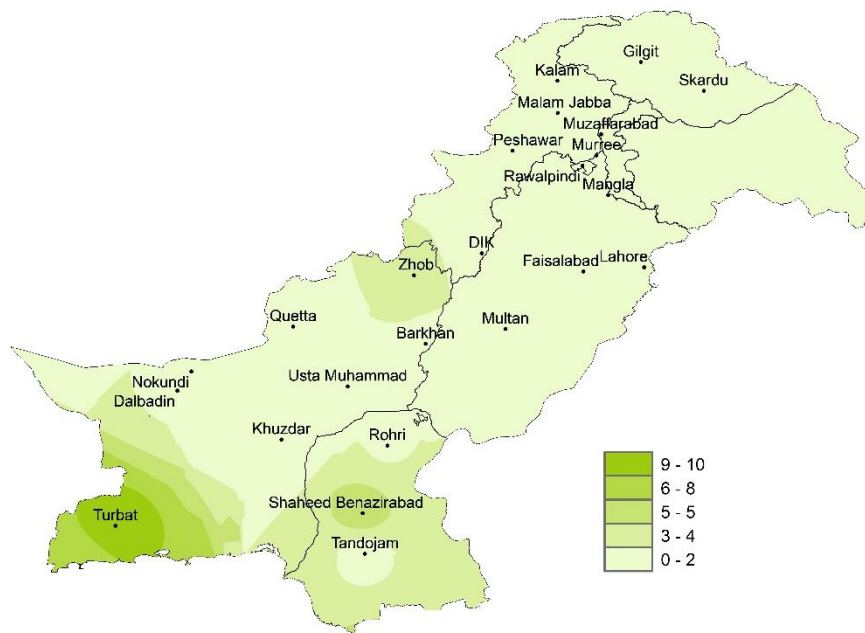
Mean Cloudiness (Oktas) at 1700PST during the  
Previous week (28<sup>th</sup> November – 04<sup>th</sup> December, 2022)



**Mean Wind Speed (Knots) at 0800PST during the Previous week (28<sup>th</sup> November – 04<sup>th</sup> December, 2022)**



**Mean Wind Speed (Knots) at 1700PST during the Previous week (28<sup>th</sup> November – 04<sup>th</sup> December, 2022)**





**Weekly Weather Advisory for Farmers**  
**(05<sup>th</sup> December – 11<sup>th</sup> December, 2022)**

Continental air is prevailing over most parts of the country. However, a shallow westerly wave is also present in upper parts of the country.

**MONDAY****05-12-2022**

Cold and dry weather is expected in most parts of the country. However, partly cloudy weather is likely in Gilgit-Baltistan and upper Khyber Pakhtunkhwa.

**TUESDAY****06-12-2022**

Cold and dry weather is expected in most parts of the country. However, partly cloudy weather is likely in Gilgit-Baltistan and upper Khyber Pakhtunkhwa. Foggy conditions are likely in Punjab, Khyber Pakhtunkhwa and upper Sindh during night and morning hours.

**WEDNESDAY****07-12-2022**

Mainly cold and dry weather is expected in most parts of the country. Foggy conditions are expected in plain areas of Punjab and upper Sindh. However, partly cloudy weather is likely in Gilgit-Baltistan and upper Khyber Pakhtunkhwa.

**THURSDAY****08-12-2022**

Mainly cold and dry weather is expected in most parts of the country. Foggy conditions are expected in plain areas of Punjab and upper Sindh. However, partly cloudy to cloudy with light rain is expected in upper Khyber Pakhtunkhwa, Gilgit-Baltistan and Kashmir.

**FRIDAY****09-12-2022**

Mainly cold and dry weather is expected in most parts of the country. while partly cloudy to cloudy weather with light rain/ light snow is expected in Gilgit-Baltistan, upper Khyber Pakhtunkhwa and Kashmir. Foggy conditions are expected in plain areas of Punjab and upper Sindh.

**SATURDAY****10-12-2022**

Mainly cold and dry weather is expected in most parts of the country. while partly cloudy weather with light rain/ light snow is expected in Gilgit-Baltistan and upper Khyber Pakhtunkhwa. Foggy conditions are expected in plain areas of Punjab and upper Sindh.

**SUNDAY****11-12-2022**

Mainly cold and dry weather is expected in most parts of the country. While light rain/ light snow is expected in Gilgit-Baltistan, upper Khyber Pakhtunkhwa and north Balochistan. Foggy conditions are expected in plain areas of Punjab and upper Sindh.

**ADVISORY FOR FARMERS**

1. The farmers may continue the routine activities according to the weather forecast.

**National Weather Data of Selected Cities from (28<sup>th</sup> November – 04<sup>th</sup> December, 2022)**

| Stations     | Minimum/Day Time Temperature (°C) |        | Growing Degree Days | Relative Humidity (%) | Rainfall (mm) | Cloudiness (Oktas) 0800 PST | Cloudiness (Oktas) 1700 PST | Wind Speed (Knots) 0800 PST | Wind Speed (Knots) 1700 PST |
|--------------|-----------------------------------|--------|---------------------|-----------------------|---------------|-----------------------------|-----------------------------|-----------------------------|-----------------------------|
|              | Mean                              | Lowest |                     |                       |               |                             |                             |                             |                             |
| D.I. Khan    | 9.64                              | 9.00   | 86.00               | 75.36                 | 0.00          | 0.43                        | 0.86                        | 0.57                        | 0.57                        |
| Faisalabad   | 9.00                              | 8.50   | 84.50               | 72.50                 | 0.00          | 0.70                        | 1.70                        | 0.00                        | 0.20                        |
| Gawadar      | 13.36                             | 13.00  | 124.00              | 52.86                 | 0.00          | 0.00                        | 0.00                        | 0.00                        | 6.86                        |
| Gilgit       | -1.40                             | -3.30  | 21.10               | 63.29                 | 0.00          | 2.86                        | 3.57                        | 0.29                        | 0.57                        |
| Kalam        | -2.26                             | -4.00  | 9.60                | 59.93                 | 0.00          | 1.57                        | 4.14                        | 0.00                        | 0.00                        |
| Khuzdar      | 8.57                              | 7.00   | 77.00               | 38.21                 | 0.00          | 0.00                        | 0.00                        | 0.00                        | 0.00                        |
| Lahore       | 10.24                             | 9.50   | 85.75               | 73.83                 | 0.00          | 0.67                        | 1.00                        | 0.00                        | 0.00                        |
| Malam Jabba  | 4.00                              | 2.00   | 19.75               | 54.57                 | 0.00          | 1.57                        | 2.57                        | 1.71                        | 1.14                        |
| Mangla       | 7.00                              | 6.70   | 77.75               | 71.64                 | 0.00          | 0.57                        | 1.71                        | 0.00                        | 0.00                        |
| Multan (PBO) | 9.51                              | 8.80   | 85.40               | 70.07                 | 0.00          | 0.57                        | 1.29                        | 0.00                        | 0.00                        |
| Murree       | 5.19                              | 3.00   | 42.80               | 48.07                 | 0.00          | 0.29                        | 1.43                        | 0.29                        | 0.29                        |
| Muzaffarabad | 5.60                              | 5.30   | 56.40               | 73.93                 | 0.00          | 0.00                        | 0.00                        | 0.00                        | 0.00                        |
| Nawabshah    | 12.64                             | 12.00  | 107.75              | 64.21                 | 0.00          | 0.43                        | 0.29                        | 0.57                        | 5.43                        |
| Peshawar     | 5.07                              | 4.50   | 63.50               | 78.71                 | 0.00          | 0.29                        | 3.43                        | 0.00                        | 0.29                        |
| Quetta       | -0.50                             | -1.50  | 35.00               | 35.00                 | 0.00          | 4.00                        | 5.20                        | 0.50                        | 0.30                        |
| Rawalpindi   | 4.50                              | 4.00   | 65.70               | 73.30                 | 0.00          | 0.90                        | 1.10                        | 0.20                        | 0.00                        |
| Rohri        | 12.26                             | 11.50  | 101.65              | 61.93                 | 0.00          | 0.00                        | 0.00                        | 1.14                        | 1.71                        |
| Skardu       | -4.83                             | -6.60  | 0.00                | 59.93                 | 0.00          | 3.57                        | 2.57                        | 0.00                        | 0.00                        |
| Tandojam     | 10.60                             | 9.00   | 101.30              | 66.00                 | 0.00          | 0.00                        | 0.00                        | 0.30                        | 0.80                        |
| Usta. M      | 10.20                             | 9.50   | 92.80               | 72.50                 | 0.00          | 0.60                        | 0.90                        | 0.50                        | 0.90                        |
| Zhob         | 4.29                              | 3.00   | 60.50               | 29.79                 | 0.00          | 0.57                        | 0.29                        | 2.00                        | 3.00                        |

\*\*\* Shows that data was not available.

## Findings of AgMIP Pakistan, University of Agriculture, Faisalabad

1. There would be significant increase in temperature i.e., 2.8°C in day and 2.2°C in the night during mid-century (2040-2069).
2. There would be significant variability in rainfall patterns (about 25% increase in summer & 12% decrease in winter during 2040-2069).
3. Climate Change will affect the crop yields negatively (about 17% for rice and 14 % for wheat).
4. If there will be no adaptation to Climate Change, majority of farmers would be the economic losers.
5. With Adaptation to Climate Change (through technology and management), there would be significant decrease in poverty and improvement in the livelihood of farming community.

*(Agricultural Model Inter-comparison and Improvement Project (AgMIP) Pakistan 2012-2014)*

- 1- سال 2040-69 کے دوران درجہ حرارت میں قابل ذکر اضافہ ہو سکتا ہے۔ جو کہ دن کے وقت 2.8°C اور رات کو 2.2°C تک ہوگا۔
- 2- گرمیوں کی بارش میں 25 فیصد اضافہ اور سردیوں کی بارش میں 12 فیصد تک کمی کا امکان ہے۔
- 3- مندرجہ بالا موسمی تغیرات کی وجہ سے دھان کی پیداوار میں 17 فیصد اور گندم کی پیداوار میں 14 فیصد تک کمی ہو سکتی ہے۔
- 4- اگر موسمی تغیرات کا مناسب بندوبست نہ کیا گیا۔ تو کسانوں کی اکثریت کو معاشی نقصان کا سامنا کرنا پڑے گا۔
- 5- موسمی تغیرات کے سدباب (بذریعہ نئی ٹیکنالوجی کا استعمال اور بہتر نظم و نسق) سے غربت میں کمی اور کسانوں کی زندگی میں خوشحالی لائی جاسکتی ہے۔

(ایگمپ پاکستان 2014-2012)