



FORTNIGHTLY DROUGHT WATCH BULLETIN

(16th to 31st December, 2024)



Pakistan Meteorological Department

National Drought Monitoring Centre

Ph No 051-9250598

1. Actual Rainfall Analysis during Second Fortnight of December, 2024

Light to moderate rainfall was observed over south Kashmir and northeastern Punjab. Northeast Punjab received major amounts of rainfall. The spatial distribution of the rainfall during the period 16-31 December, 2024 is shown in Figure No.1, while chief amounts of rainfall recorded at different stations of Pakistan are shown in Table-1 below;

Rainfall Table					
S. No	Station	Rainfall (mm)	S. No	Station	Rainfall (mm)
1.	Narowal	21.9	6.	Lahore, City	8.0
2.	Kasur	15.6	7.	Rawalakot	7.9
3.	Kotli	13.0	8.	Gujranwala	7.8
4.	Lahore, Airport	12.0	9.	Hafizabad	6.9
5.	Sialkot, Airport	9.1	10.	Skardu	5.5

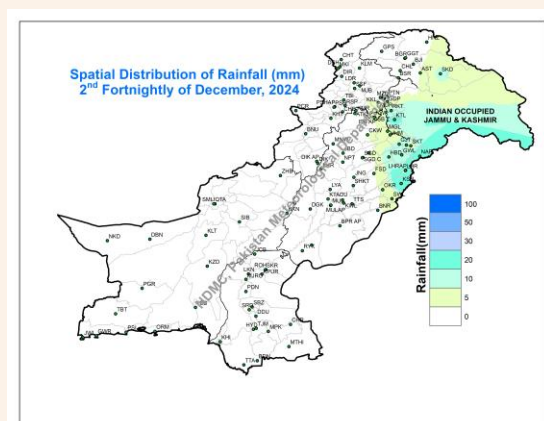


Figure 1: Spatial distribution of rainfall (mm)

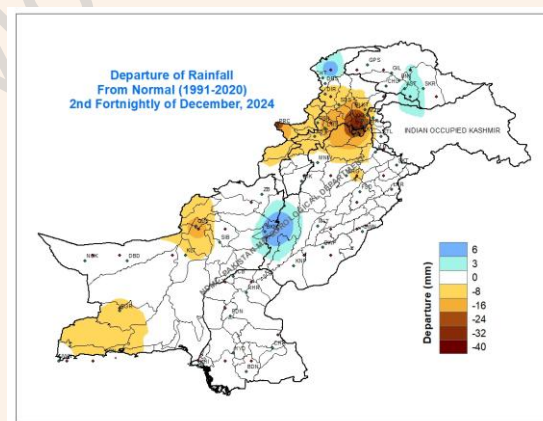


Figure 2: Departure of rainfall (mm)

2. Departure of Rainfall during Second Fortnight of December 2024

Figure 2 depicts the departure of rainfall from the Normal (1991-2020) during the fortnight. Weather remained dry across most of the country as similar to its climate normal. Below normal rainfall was received over Kashmir, Hazara, Peshawar and Kohat divisions of KP, Murree, Quetta, Jiwani, Ormara and Jiwani.

Normal (1991-2020) distribution of rainfall (mm) during the fortnight of December is shown in Figure 3. The normal rainfall across most of Pakistan ranges from 1 to 8 (mm), whereas for Kashmir, Khyber Pakhtunkhwa and Potohar region, it ranges from 9 to 40 (mm).

Normal distribution of temperature is shown in Figure 4 for the Second fortnight of December 2024, using the mean temperature data for the period 1991-2020.

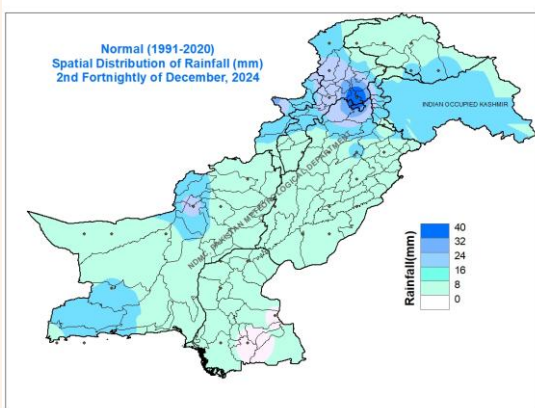


Figure 3: Normal distribution of rainfall (mm)

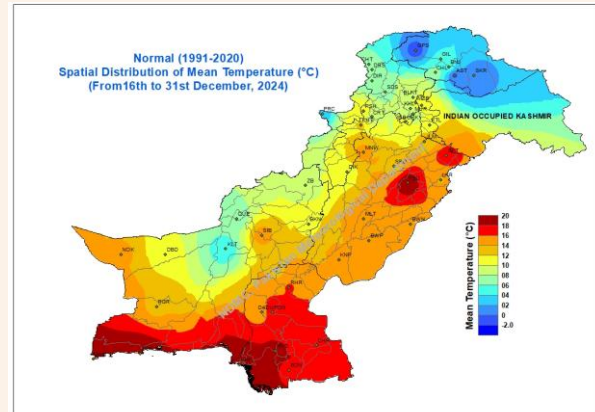


Figure 4: Normal distribution of mean Temperature (°C)

3. Mean Temperature Analysis during the Second Fortnight of December 2024

The spatial distribution of mean Temperature (°C) during the Second fortnight of December is shown in Figure 5. Lowest mean temperature has been recorded at Quetta, Kalat, Parachinar, upper KP, north Kashmir and Gilgit Baltistan while moderate temperatures were observed in remaining parts of the country.

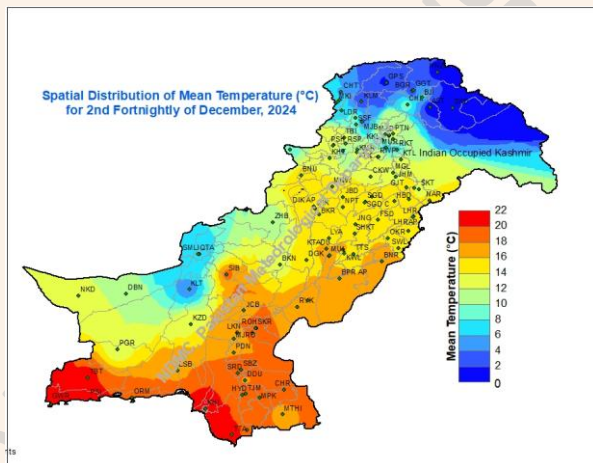


Figure 5: Spatial distribution of Mean Temperature (°C)

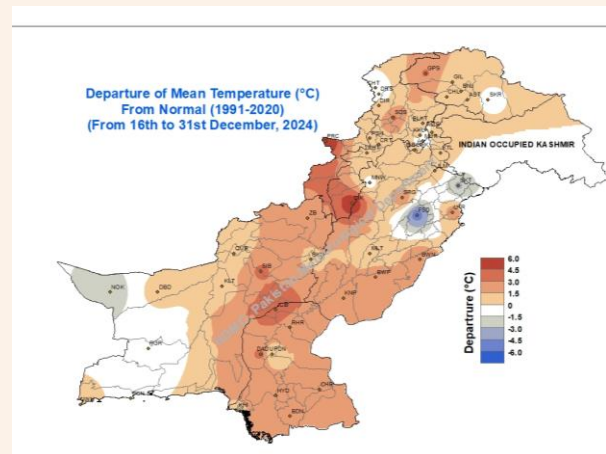


Figure 6: Departure of Mean Temperature (°C) from Normal (1991-2020)

4. Departure of Temperature during the Second Fortnight of December 2024

The Figure 6 illustrates the departure of mean temperature from normal (1991-2020) during Second fortnight of December 2024. Temperatures remain 1-6°C above normal over major part of the country whereas 1 to 5°C below normal temperatures were observed in Faisalabad, Sialkot and Nokundi.

5. Maximum Length of Consecutive Dry Days

The Maximum length of dry spell is calculated from the day receiving less than one (1) mm of rainfall. The spatial distribution of the Consecutive Dry Days (CDD) are shown in Figure 7. Highest number of consecutive dry days are observed at districts of Nokkundi (228) and Dalbandin(160), while coastal Balochistan, Sindh and eastern Punjab have also experienced 90-120 consecutive dry days spells .

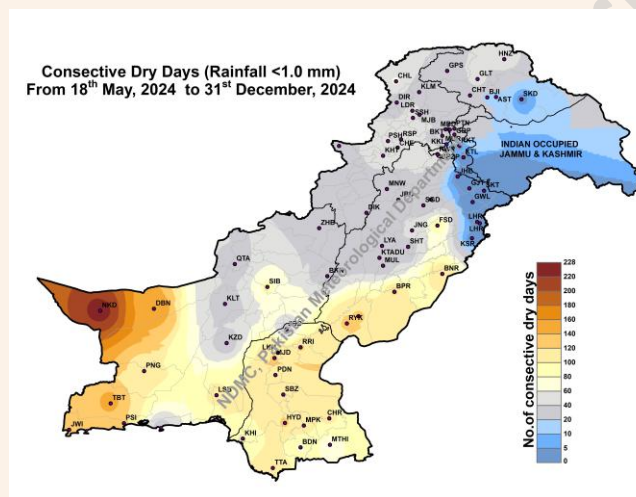


Figure 7: Spatial Distribution of Dry Days Spell

6. Drought Situation Analysis

Below normal rainfall was observed across most part of Pakistan except Barkhan (Baluchistan), Chitral and Astore. The temperature remained above than normal by 1-6°C over most part of country. Faisalabad, Sialkot and Nokundi experienced below normal temperatures. The length of the consecutive dry days increased majorly in Nokkundi and Dalbandin districts.

Keeping in view in the above climatic conditions, all stake holders are advised to keep eye on the latest weather advisories and plan the disaster risk reduction (DRR) in accordance with the prevailing climatic conditions.