



# Climate and Ocean Support Program in the Pacific (COSPPac)

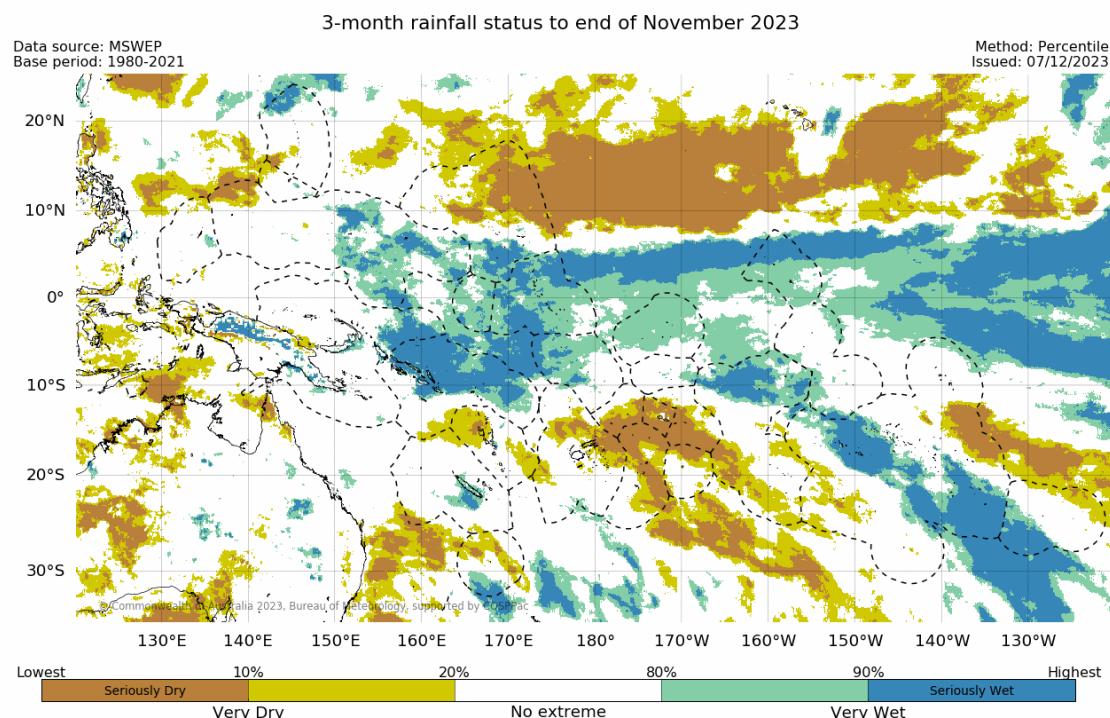
## Regional Early Action Rainfall Watch

### December 2023

#### El Niño-Southern Oscillation Status: as of 30 November 2023

Pacific Sea Surface Temperatures (SSTs) for November 2023 showed a mature El Niño pattern. Across much of the tropical Pacific between 10°S and 10°N, SSTs were more than 0.8°C above the long-term average, increasing to nearly 3°C above average east of the Date Line.

#### Rainfall Status: as of 30 November 2023



The 3-month rainfall status for September to November 2023 was Very Wet or Seriously Wet in a near-equatorial region covering eastern FSM, PNG's eastern EEZ, the Solomon Islands, southern RMI, Nauru, Kiribati (Gilbert, Phoenix and northern Line Islands), and Tuvalu. There was another band of Very Wet or Seriously Wet stretching southeast from the northern Cook Islands to northwest French Polynesia, to the western Pitcairn Islands and beyond.

The rainfall status was Very Dry or Seriously Dry over the same period over northern RMI extending eastwards towards Hawaii. The same status was also observed over northern Vanuatu, eastern and north-central Fiji, much of Tonga, Wallis and Futuna, Samoa, American Samoa, some of the southern Cook Islands, and eastern French Polynesia.

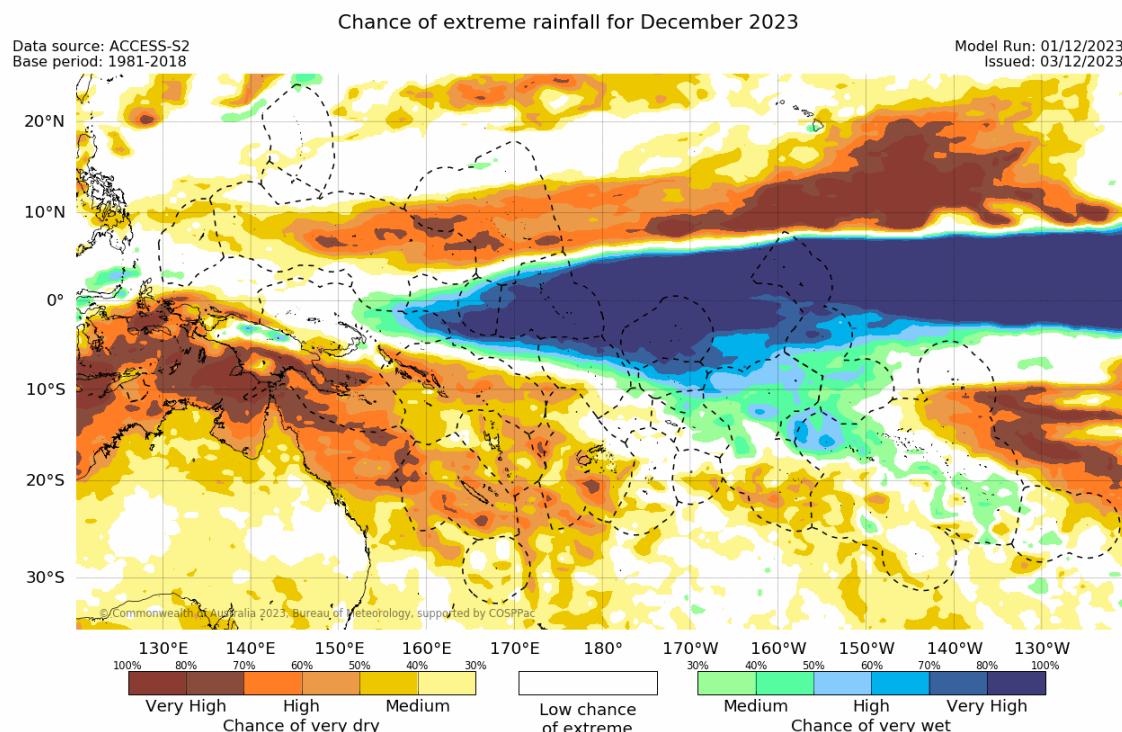
The regional maps are available via [http://access-s.clide.cloud/files/project/EAR\\_watch/pacificx/](http://access-s.clide.cloud/files/project/EAR_watch/pacificx/)

Three-month total rainfall is typically used for monitoring grasslands, shallow rooted plants and small water body (e.g. small water tanks, streams) moisture deficits. Allow for uncertainty associated with island size, topography, geology and soil type.

### Rainfall Status

- Estimates of moisture/water stress are based on recent rainfall compared with historical observations using the Percentile (Decile) Index.
- Definitions: "Very Dry" = rainfall in the lowest 20% of the historical record for that location and season, "Very Wet" = rainfall in the highest 20% for that location and season, "Seriously Dry" = rainfall in the lowest 10% of the historical record for that location and season, "Seriously Wet" = rainfall in the highest 10% for that location and season.

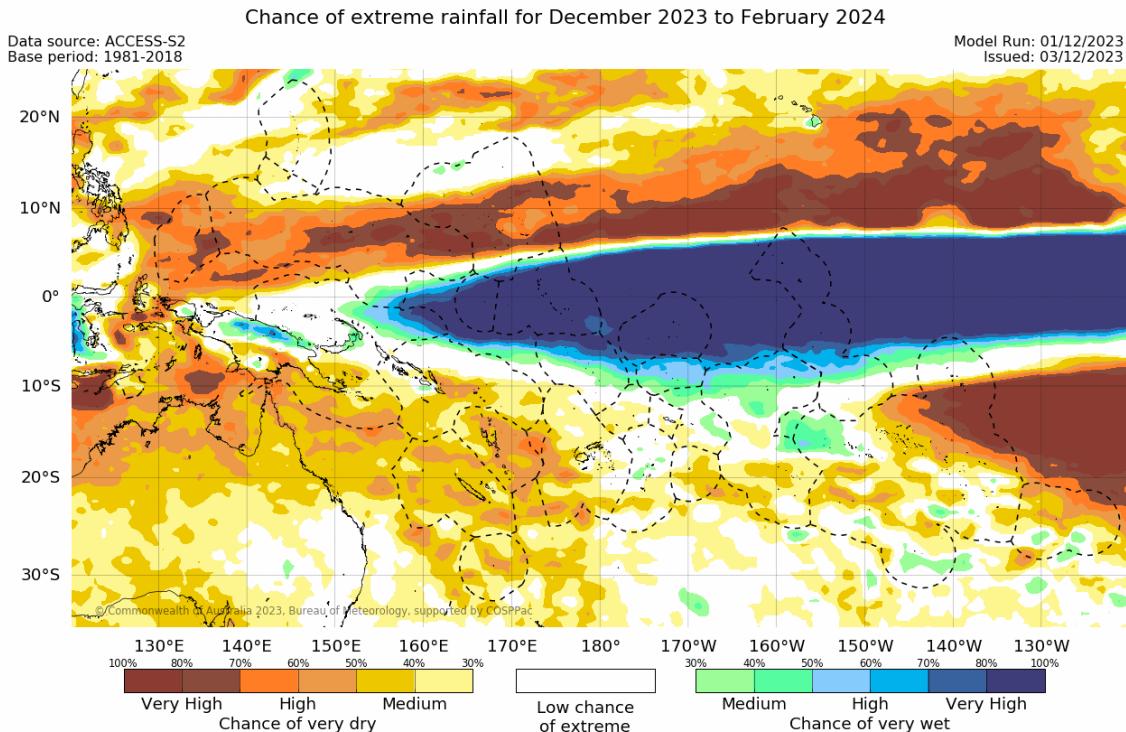
## Monthly Rainfall Watch: December 2023



For December 2023, there is a medium to very high chance of rainfall in the Very Wet category (highest quintile, which includes the Seriously Wet category) in far southern RMI, Nauru, far eastern PNG, Kiribati, northern Tuvalu, Tokelau, American Samoa, northern and central Cook Islands, and patches over western to southern French Polynesia.

There is a medium to very high chance that rainfall will be in the Very Dry category (lowest quintile, which includes the Seriously Dry category) in northern Palau, most of FSM, much of RMI, Australia, PNG mainland (except the north coast), Solomon Islands, New Caledonia, Vanuatu, Fiji, parts of Tonga, Niue, southern Cook Islands, southern and northeastern French Polynesia, and northeastern Pitcairn Islands.

# Seasonal Rainfall Watch: December 2023 – February 2024



For December 2023 to February 2024, there is a medium to very high chance of rainfall in the Very Wet category (highest quintile, which includes the Seriously Wet category) stretching eastward from PNG (northern mainland, Islands, far eastern EEZ) to Nauru, northern Tuvalu, Tokelau, Kiribati (Gilbert, northern Phoenix, northern and central Line Islands), northern American Samoa, northern Cook Islands, patches of northwestern French Polynesia, plus the far north of French Polynesia.

In contrast, there is a medium to very high chance of rainfall in the Very Dry category (lowest quintile, which includes the Seriously Dry category) in most of southern PNG, Palau, FSM, much of RMI, Australia, Solomon Islands, New Caledonia, Vanuatu, Fiji, southern Tonga, Wallis and Futuna, Samoa, southern American Samoa, Niue, central and southern Cook Islands, most of French Polynesia (except far north), plus Pitcairn Islands.

## Monthly and Seasonal Rainfall Watch

- Information provided has been interpreted on a divisional scale where possible as Pacific Island Countries can experience a high range of rainfall variability within country. It is possible to have forecasts which simultaneously favour above and below normal rainfall in different parts of the one country.
- Definitions: "Chance of Very Dry" = percent chance of rainfall in the lowest 20% of the historical record for that location and season, "Chance of Very Wet" = percent chance of rainfall in the highest 20% for that location and season. Medium, High and Very High refer to the percent probability level where Very High has the highest confidence and represents the range 70% and above.
- Local Met Services should be contacted for detailed information and outlooks. This product is not to be distributed to the public or other organisations.