

بِسْمِ اللّٰهِ الرَّحْمٰنِ الرَّحِیْمِ



ދިވެހި ވަނަ ދުވަހުގެ ދުވަސް

Maldives Meteorological Service

Rainfall and Temperature Outlook over Maldives

For January 2024

Summary

Rainfall is expected to be above average in most parts of the country. The temperature across the country is expected to be slightly higher than average.

Introduction

This consensus outlook on rainfall and temperature for the Maldives has been prepared through assessments including prevailing regional and global climate conditions and prediction of various climate models, seasonal forecast of WMO Lead Centre for Long-Range Forecast Multi-Model Ensemble (LC-LRFMME), North American Multi-Model Ensemble (NMME) Forecasts of Monthly Climate Anomalies, climate driver update of Bureau of Meteorology (BoM) and monthly forecasts of European Centre for Medium-Range Weather Forecasts (ECMWF).

Current status and expected condition of major climate drivers.

El Niño conditions are prevailing with above-average equatorial sea surface temperatures (SSTs) across the central and eastern Pacific Ocean. Conditions are likely to continue through March-May 2024.

The positive Indian Ocean Dipole (IOD) is still active and has warmer than normal temperatures throughout much of the western Indian Ocean.

Madden-Julian Oscillation (MJO) is currently enhanced over western Indian Ocean and is anticipated to propagate to the east and diminish by the second week of the month in the eastern Indian Ocean. The amplitude is likely to reach the Maritime Continent by the third week and over the Western Pacific by the end of the month.

Calibration of climate models

The Climate Predictability Tool (CPT) was used to downscale global model outputs to a local scale. These results indicate above-normal rainfall over southern atolls and most parts of central atolls while below-normal rainfall over the rest of the country for January 2024.

Global Producing Centres and WMO Lead Centre Forecasts

The Probabilistic Multi-Model Ensemble of WMO LC-LRFMME suggests that there will be above-normal rainfall and temperatures across the country in January 2024.



www.meteorology.gov.mv info@met.gov.mv +960 3323084 +960 3320021

22000 Hulhule' 22000
ދިވެހިރާއްޖޭގެ ޖުމްހޫރިއްޔާ
Republic of Maldives

@MetMaldives

#MetMaldives





Condition of Rainfall and Temperature over the Maldives during January

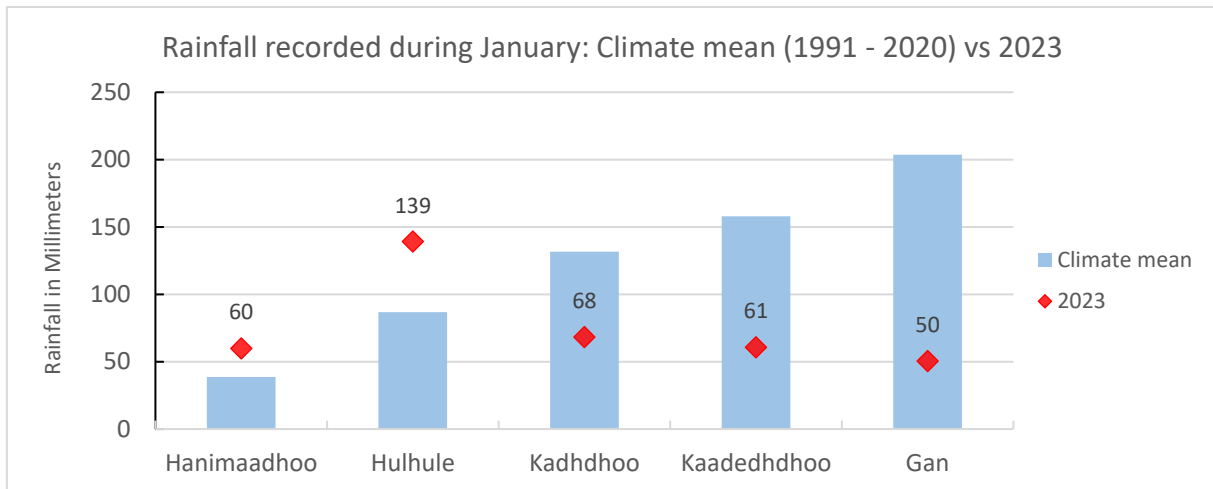


Figure 1- The rainfall in January 2023 was above average for Hanimaadhoo and Hulhule, while all other stations saw below-average rainfall.

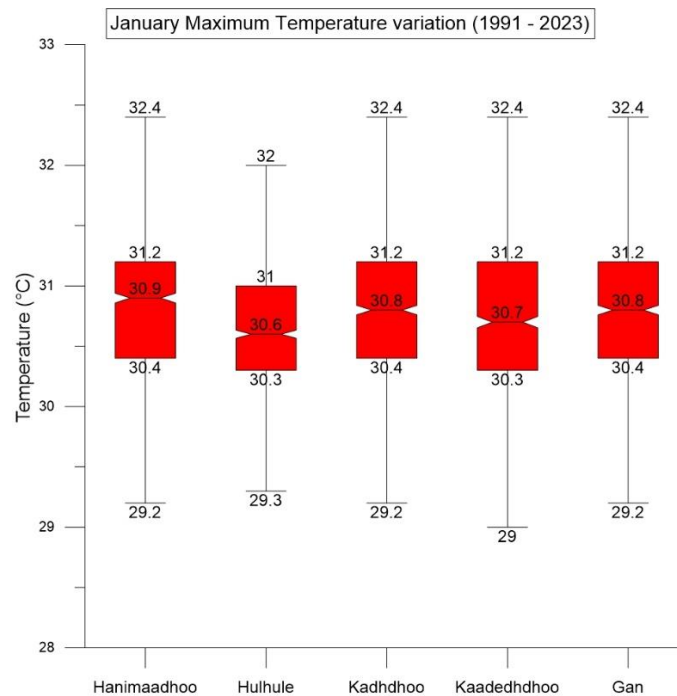


Figure 2: Daily Maximum Temperature range at Meteorological stations during December for the period 1991-2023, showing the highest maximum Temperature of 32.4°C recorded at Meteorological Office Hanimaadhoo, Kadhdhoo, Kaadedhdhoo and Gan.

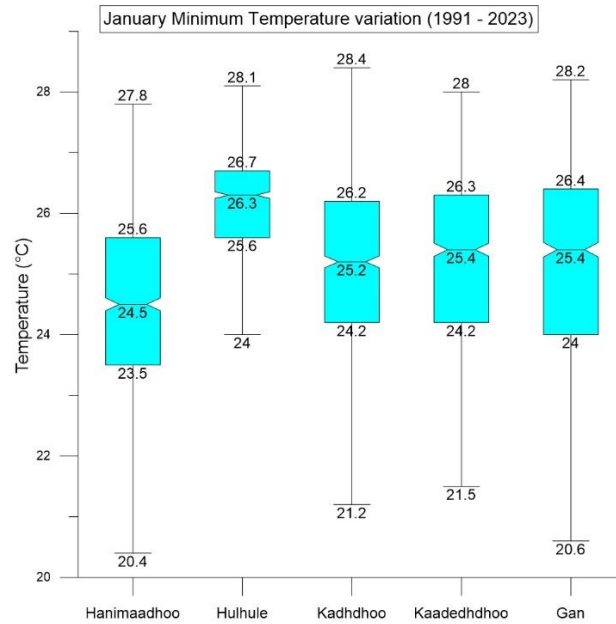


Figure 3: Daily Minimum Temperature range at Meteorological stations during December for the period 1991-2023, showing the lowest minimum Temperature of 20.4°C at Meteorological Offices, Hanimaadhoo.

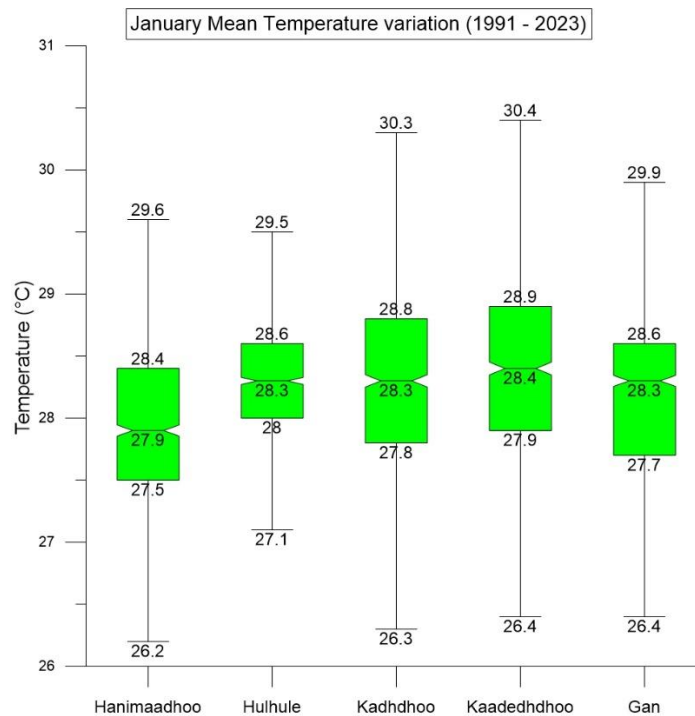


Figure 4: Daily Mean Temperature range at Meteorological stations during December for the period 1991-2023, showing most (50%) of the time, the daily average temperature lies between 27.5– 28.4°C in Hanimaadhoo, 28.0 – 28.6 °C in Hulhule, 27.8 – 28.8 °C in Kadhdhoo, 27.9– 28.9 °C in Kaadeddhoo and 27.7 - 28.6 °C in Gan.



Conclusion

By considering the enhanced MJO over the Indian Ocean, Multi-Model Ensemble of WMO Lead Centre forecasts, NMME forecasts, CPT analysis and climate data of the Maldives, most parts of the country are expected to experience above average rainfall. The temperature across the country is expected to be slightly above average.

Note:

Normal: Amount of rainfall between 90% - 110% of the average for the period.

Above normal: Amount of rainfall more than 110% of the average for the period.

Below Normal: Amount of rainfall less than 90% of the average for the period