

بِسْمِ اللّٰهِ الرَّحْمٰنِ الرَّحِیْمِ



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# Maldives Meteorological Service

## Rainfall and Temperature Outlook over Maldives

For March 2021

### Summary

Rainfall is likely above normal over the area from Haa Alifu atoll to Laamu atoll and normal from Gaafu Alifu atoll to Addu City during March 2021. Temperature is expected to be slightly above normal during the month.

### Introduction

This consensus outlook for Maldives has been developed through assessments including prevailing regional and global climate condition and prediction of various models, seasonal forecast of WMO Lead Centre for Long-Range Forecast Multi-Model Ensemble (LC-LRFMME), NMME Probability Forecasts of Monthly Climate Anomalies and forecasts from Regional Integrated Multi-Hazard Early Warning System (RIMES).

**El Niño -Southern Oscillation (ENSO):** La Niña condition persists with currently below average Equatorial Sea Surface Temperatures (SSTs) from west-central to eastern Pacific Ocean. The condition is likely throughout March.

**Indian Ocean Dipole (IOD):** Neutral IOD condition persists and models suggest same condition during the month.

**Madden-Julian Oscillation (MJO):** MJO is currently weak over western Western Pacific. The signal is expected over Western Hemisphere and Africa during the first week. It is likely over Western Indian Ocean and become weaker towards end of the month. Models are showing high uncertainty of the signal.

### Calibration of climate models

Most models suggest above normal rainfall for northern and central atolls, below normal rainfall for southern atolls.

### Global Producing Centres and Lead Centre



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Probabilistic Multi-Model Ensemble of WMO Lead Centre for Long Range Forecast Multi-Model Ensemble indicates above normal rainfall over the area from Haa Alifu to Laamu atoll and normal rainfall from Gaafu Alifu to Addu City. Most individual models indicate above normal rainfall to the area from Haa Alifu to Laamu atolls and normal rainfall from Gaafu Alifu to Addu City for March.

Probabilistic Multi-Model Ensemble of WMO Lead Centre for Long Range Forecast Multi-Model Ensemble indicates above normal Temperature across the country for March 2021.

### Climate condition

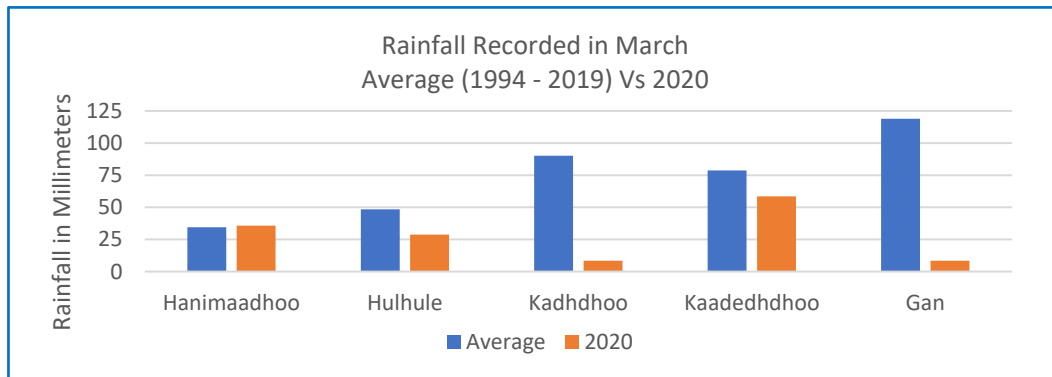


Figure 1- Central and southern stations recorded lower than normal rainfall while northern station recorded normal in March 2020.

Figure 1 shows rainfall recorded in March between 1994 and 2020. in five Meteorological stations.

Figure 2 shows spatial distribution of rainfall across the country during March between 1994 and 2020. Highest amount rainfall received southern-most atolls. Northern and central atolls received relatively less rain than southern atolls.

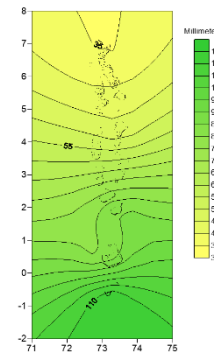


Figure 2 Spatial distribution of rainfall over the country during March (1994-2020)

### Conclusion

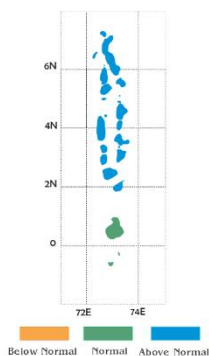


Figure 3 Rainfall probability for March 2021

By considering the Multi-Model Ensemble of WMO Lead Centres, individual models, NMME Probability Forecasts, RIMES forecasts, climate data, expected MJO, rainfall likely is above normal over the area from Haa Alifu atoll to Laamu atoll, and normal from Gaafu Alifu atoll to Addu City.

Temperature is likely to be slightly above normal across the country during the month.



*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.*

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