

Country: Tuvalu

Part 1: Recent climate

TABLE 1: Monthly Rainfall

Station (include data period)	Oct-2024	Nov-2024	Dec-2024				
			Total (mm)	33%tile	67%tile	Median	Rank
	Total (mm)	Total (mm)	Rainfall (mm)				
Nanumea (1941-2024)	103.8	49.6	121.8	245.9	384.0	331.0	18/83
Nui (1946-2024)	87.0	210.8	206.4	240.1	440.2	319.5	17/79
Funafuti (1933-2024)	285.6	216.7	515.6	289.9	445.2	383.8	76/92
Niulakita (1953-2024)	215.6	389.2	244.7	290.5	440.8	366.3	24/71

TABLE 2: Three-month Total Rainfall for October to December 2024

Station	Three-month Total		33%tile	67%tile	Median	Rank
	Rainfall (mm)					
Nanumea (1941-2024)	275.2	Below normal	525.9	759.0	625.5	16/82
Nui (1946-2024)	504.2	Below normal	701.9	908.1	802.4	11/76
Funafuti (1933-2024)	1017.5	Above normal	806.7	1007.5	893.4	64/92
Niulakita (1953-2024)	849.5	Normal	769.4	944.9	832.7	36/69

## Part 1i. Monthly and Seasonal Outlooks for February and February to April 2025

Monthly: February	Seasonal: February to April
<b>Rainfall (Image 1)</b> <p>Tercile rainfall probabilities for February 2025 Base period: 1981-2018 Model: ACCESS-S2 Model run: 06/01/2025 Issued: 09/01/2025</p> <p>© Commonwealth of Australia 2025, Bureau of Meteorology, supported by COSPPac</p> <p>-- EEZ border V11 (Flanders Marine Institute, 2019).</p>	<b>Rainfall (Image 2)</b> <p>Tercile rainfall probabilities for February to April 2025 Base period: 1981-2018 Model: ACCESS-S2 Model run: 06/01/2025 Issued: 09/01/2025</p> <p>© Commonwealth of Australia 2025, Bureau of Meteorology, supported by COSPPac</p> <p>-- EEZ border V11 (Flanders Marine Institute, 2019).</p>
<b>Monthly Maximum temperature (Image 3):</b> <p>Tercile maximum temperature probabilities for February 2025 Base period: 1981-2018 Model: ACCESS-S2 Model run: 06/01/2025 Issued: 09/01/2025</p> <p>© Commonwealth of Australia 2025, Bureau of Meteorology, supported by COSPPac</p> <p>-- EEZ border V11 (Flanders Marine Institute, 2019).</p>	<b>Seasonal maximum temperature (Image 4):</b> <p>Tercile maximum temperature probabilities for February to April 2025 Base period: 1981-2018 Model: ACCESS-S2 Model run: 06/01/2025 Issued: 09/01/2025</p> <p>© Commonwealth of Australia 2025, Bureau of Meteorology, supported by COSPPac</p> <p>-- EEZ border V11 (Flanders Marine Institute, 2019).</p>
<b>Monthly minimum temperature (Image 5):</b> <p>Tercile minimum temperature probabilities for February 2025 Base period: 1981-2018 Model: ACCESS-S2 Model run: 06/01/2025 Issued: 09/01/2025</p> <p>© Commonwealth of Australia 2025, Bureau of Meteorology, supported by COSPPac</p> <p>-- EEZ border V11 (Flanders Marine Institute, 2019).</p>	<b>Seasonal minimum temperature (Image 6):</b> <p>Tercile minimum temperature probabilities for February to April 2025 Base period: 1981-2018 Model: ACCESS-S2 Model run: 06/01/2025 Issued: 09/01/2025</p> <p>© Commonwealth of Australia 2025, Bureau of Meteorology, supported by COSPPac</p> <p>-- EEZ border V11 (Flanders Marine Institute, 2019).</p>

Part 2: Recent Ocean Observation

Monthly/Three months: December 2024 and October to December 2024

Monthly: December 2024	Last three months: October to December 2024:
Sea Surface Temperature Anomaly (Image 1): <div><p>Tuvalu Monthly Average Sea Surface Temperature Anomaly: December 2024</p><p>©Commonwealth of Australia 2025 Australian Bureau of Meteorology, CSIRO/Par Reynolds SST</p></div>	Sea Surface Temperature Anomaly (Image 4): <div><p>Tuvalu 3 monthly Average Sea Surface Temperature Anomaly: October 2024 to December 2024</p><p>©Commonwealth of Australia 2025 Australian Bureau of Meteorology, CSIRO/Par Reynolds SST</p></div>
Sea level anomaly (Image 2): <div><p>Tuvalu Monthly Near Real Time Sea Level Anomaly: December 2024</p><p>©Commonwealth of Australia 2025 Australian Bureau of Meteorology, CSIRO/Par AVISO SeaWiFS SLA</p></div>	
Daily coral bleaching alert (Image 3): <div><p>Pacific Ocean Daily Coral Bleaching Alert: 04 January 2025</p><p>©Commonwealth of Australia 2025 Australian Bureau of Meteorology, CSIRO/Par NOAA Coral Reef Watch</p></div>	<div><p>Tuvalu Daily Coral Bleaching Alert: 04 January 2025</p><p>©Commonwealth of Australia 2025 Australian Bureau of Meteorology, CSIRO/Par NOAA Coral Reef Watch</p></div>

Part 2i. Monthly and Seasonal Outlooks for February and February to April 2025

Monthly: February	Seasonal: February to April
Monthly sea surface temperature anomaly (Image 5):	Seasonal sea surface temperature anomaly (Image 6):
<div><p>Difference from average sea surface temperature forecast for February 2025</p><p>Base period: 1981-2018 Model: ACCESS-S2 Model run: 06/01/2025 Issued: 08/01/2025</p><p>© Commonwealth of Australia 2025, Bureau of Meteorology, supplied by COSPPac</p><p>--- EEZ border V11 (Flanders Marine Institute, 2019)</p></div>	<div><p>Difference from average sea surface temperature forecast for February to April 2025</p><p>Base period: 1981-2018 Model: ACCESS-S2 Model run: 06/01/2025 Issued: 08/01/2025</p><p>© Commonwealth of Australia 2025, Bureau of Meteorology, supplied by COSPPac</p><p>--- EEZ border V11 (Flanders Marine Institute, 2019)</p></div>
Monthly sea level anomaly (Image 7):	Seasonal sea level anomaly (Image 8):
<div><p>Difference from average sea surface height forecast for February 2025</p><p>Base period: 1981-2018 Model: ACCESS-S2 Model run: 06/01/2025 Issued: 08/01/2025</p><p>© Commonwealth of Australia 2025, Bureau of Meteorology, supplied by COSPPac</p><p>--- EEZ border V11 (Flanders Marine Institute, 2019)</p></div>	<div><p>Difference from average sea surface height forecast for February to April 2025</p><p>Base period: 1981-2018 Model: ACCESS-S2 Model run: 06/01/2025 Issued: 08/01/2025</p><p>© Commonwealth of Australia 2025, Bureau of Meteorology, supplied by COSPPac</p><p>--- EEZ border V11 (Flanders Marine Institute, 2019)</p></div>
4-week Coral Bleaching (Image 9):	
<div><p>Tuvalu 4 Weeks Coral Bleaching Outlook: 26 January 2025</p><p>© Commonwealth of Australia 2025 Australian Bureau of Meteorology, COSPPac</p><p>NOAA Coral Reef Watch</p></div>	<div><p>Pacific Ocean 4 Weeks Coral Bleaching Outlook: 26 January 2025</p><p>© Commonwealth of Australia 2025 Australian Bureau of Meteorology, COSPPac</p><p>NOAA Coral Reef Watch</p></div>

## Summary Statement

### Monthly and last three months: December 2024/October to December 2024 statement

The rainfall for December was below normal over Nanumea, Nui, and Niulakita stations, while near normal rainfall at Funafuti.

For the past three months, rainfall was below normal over Nanumea, and Nui. Niulakita recorded normal rainfall while Funafuti recorded above normal rainfall.

## Part 1i. Monthly and Seasonal Outlooks for February and February to April 2025

### Monthly /Seasonal rainfall and temperature Outlook statements

The rainfall for February and February to April is likely or very likely to be below normal over Tuvalu.

Maximum and minimum temperatures during February and averaged over February to April is very likely to be above normal over Tuvalu, excepts north-east parts of Tuvalu EEZ which is likely to be near normal.

## Part 2: Recent Ocean summary statement

### Monthly and last three months: December 2024/October to December 2024

December sea surface temperatures (SSTs) around northern and central groups were utmost 1.0°C above normal, and for the southern group were 0.5 to 1.0°C above normal.

Averaged over October to December, sea surface temperatures around northern group were 0.0 to 0.5°C near normal, while central and southern groups were 0.5 to 1.0°C above normal.

December sea levels around northern and central groups were 100 to 200mm above normal and around southern group were utmost 150mm above normal.

A coral bleaching shown on watch over Tuvalu, excepts some parts for the far northern parts Tuvalu EEZ shows no thermal stress.

## Part 2i. Monthly and Seasonal Outlooks for February and February to April 2025

### Ocean Variable statement

February and averaged over February to April Sea surface temperatures around Tuvalu are predicted to be 0.4 to 0.8°C above normal, while for the northern part of Tuvalu, SSTs are predicted to be near normal.

February sea levels around northern group are predicted to be 30 to -30mm near normal, but for the central and southern groups are predicted to be 30 to 100mm above normal.

Averaged over February to April, sea levels around Tuvalu are predicted to be -30 to 30mm near normal but above normal over western parts for Tuvalu EEZ.

Coral Bleaching outlook indicates no thermal stress over northern group and warning status around southern groups for the next 4 weeks.

## IN BRIEF for Teleconference

- Rainfall was mostly below normal for December and below normal to above normal for October to December.
- The rainfall outlook generally indicates below averages most likely in February and February to April.
- SSTs were near normal to above normal for December and October to December. The outlook shows near normal to above normal SSTs for the next one and three months.
- Sea levels were above normal for December. Near-normal to above normal sea levels are predicted for February and February to April.
- Coral Bleaching outlook predicted to be no thermal stress to watch across the country.

**TABLE 3: Stakeholder Engagement- Evaluations of how effective NMS engage with stakeholders**

Product	Date: December 2024	Stakeholder	Total Number of Participant s	Numbe r of Male	Numbe r of Female	Disabilit y	Age grou p	Comments (If there are comments from you Stakeholders )
Climate Bulletin	26/12/24	MET Staff	30	18	12		20-50	
		Disaster Dept	2	1	1		30-40	
		TRC	2		2		25-50	
		TuCAN	1	1			40-50	
		Agriculture	3	2	1		35-40	
		Head Quarter (PWIDW)	2	1	1		40-50	
		All-Island Council	14	10	4		35-50	
		Permanent Sec	1	1			45-50	
		Gov	2	1	1		35-55	
		Fisheries Dept	1	1			35-40	
		Health Dept	2	2	1		45-50	
		TEC Dept	1	1			30-40	
		Environment	1	1			30-35	
		ClimateChan ge	1	1			40-55	
		TuvaluMaritim e						
		School						
EAR Watch	26/12/24	MET Staff	30	18	12		20-50	
		Disaster Dept	2	1	1		30-40	
		TRC	2		2		25-50	
		TuCAN	1	1			40-50	
		Agriculture	3	2	1		35-40	
		Head Quarter	2	1	1		40-50	

		(PWIDW) All-Island Counsil Permanent Sec Gov Fisheries Dept Health Dept TEC Dept Environment ClimateChan ge Tuvalu Maritime School	14  1  2 1 2 1 1  1	10  1  1 2 1 1  1	4   1  1     1		35-50  45-50  35-55 35-40 45-50 30-40 30-35  40-55	
Monthly Climate Briefing	23/12/24	Climate and Forecast Divisions	5	2	3			
Ocean Outlook	26/12/24	MET Staff Disaster Dept TRC TuCAN Agriculture Head Quarter (PWIDW) All-Island Counsil Permanent Sec Gov Fisheries Dept Health Dept TEC Dept Environment ClimateChan ge TuvaluMaritim e School	30 2 2 1 3 2  14  1  2 1 2 1 1  1	18 1  1 2 1  10  1  1 1 2 1 1  1	12 1 2  1 1  4   1  1  1    1		20-50 30-40 25-50 40-50 35-40 40-50  35-50  45-50  35-55 35-40 45-50 30-40 30-35  40-55	
Climate data request								
<b>Total</b>			<b>204</b>	<b>125</b>	<b>72</b>			