

Pacific Islands - Ocean and Climate Outlook Forum (OCOF) No. 186

Country: Fiji

Part 1: Recent climate

TABLE 1: Monthly Rainfall

Station (include data period)	Dec-2022	Jan-2023	Feb-2023				
			Total (mm)	33%tile	67%tile	Median	Rank
	Total (mm)	Total (mm)	Rainfall (mm)				
Western Division							
Penang Mill (1910-2023)	509.6	490.5	580.2	293.1	406.2	353.1	101/114
Lautoka Mill (1900-2023)	362.6	419.8	688.6	223.1	388.6	286.8	118/123
Nadi Airport (1942-2023)	390.5	711.9	643.7	223.0	375.4	285.9	79/81
Central Division							
Laucala Bay (Suva) (1942-2023)	221.3	378.9	425.3	241.1	324.1	280.9	74/82
Nausori Airport (1957-2023)	157.7	341.1	373.7	219.8	314.4	279.9	54/67
Tokotoko (Navua) (1945-2023)	139.0	294.5	294.0	250.3	343.1	286.1	41/78
Eastern Division							
Lakeba (1950-2023)	141.7	165.3	321.1	168.0	278.8	206.8	54/74
Vunisea (Kadavu) (1931-2022)							
Ono-i-Lau (1943-2023)	506.2	167.1	334.0	129.1	226.3	177.5	67/77
Northern Division							
Labasa Airport (1946-2023)	296.8	369.5	548.0	246.3	459.6	347.2	55/67
Savusavu Airfield (1956-2023)	198.9	212.4	253.2	154.0	301.6	250.2	32/63
Udu Point (1946-2023)	237.9	286.7	315.7	219.6	356.9	278.0	44/76
Rotuma (1912-2023)	206.9	168.1	205.5	281.4	365.2	314.4	18/111

TABLE 2: Three-month Total Rainfall for December 2022 to February 2023

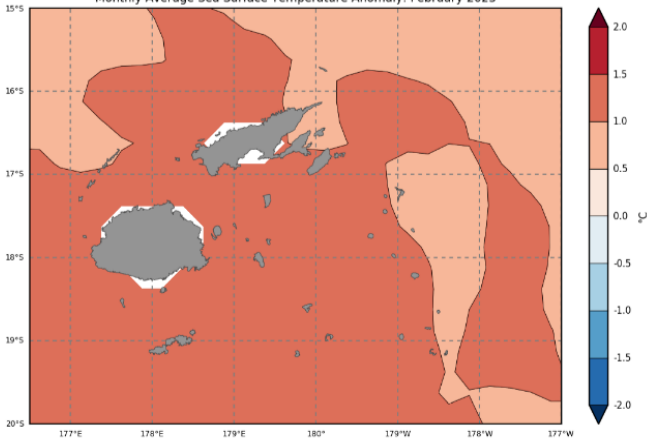
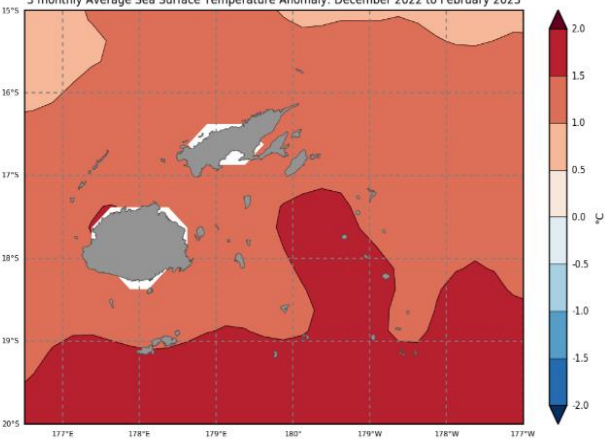
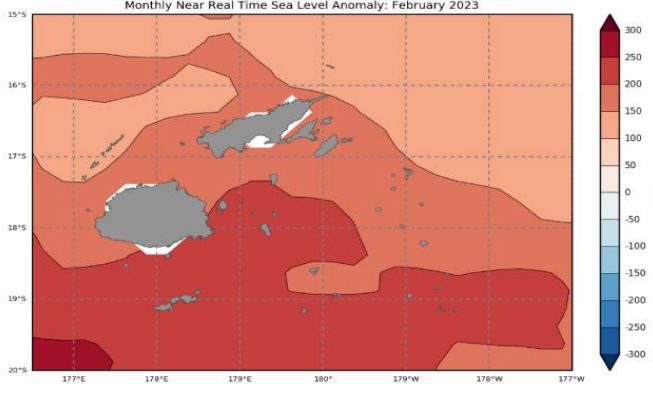
Station	Three-month Total		33%tile	67%tile	Median	Rank
	Rainfall (mm)					
Western Division						
Penang Mill (1910-2023)	1580.3	Above normal	825.6	1093.4	963.3	100/110
Lautoka Mill (1900-2023)	1471.0	Above normal	678.0	1009.4	851.8	115/123
Nadi Airport (1942-2023)	1746.1	Above normal	672.4	966.8	852.1	78/80
Central Division						
Laucala Bay (Suva) (1942-2023)	1025.5	Normal	782.9	1026.7	880.1	53/81
Nausori Airport (1957-2023)	872.5	Normal	786.9	1034.4	882.4	34/67
Tokotoko (Navua) (1945-2023)	727.5	Below normal	875.1	1119.0	989.9	11/75
Eastern Division						
Lakeba (1950-2023)	628.1	Normal	582.1	765.5	666.7	32/73
Vunisea (Kadavu) (1931-2023)						
Ono-i-Lau (1943-2023)	1007.3	Above normal	439.1	610.1	523.5	71/72
Northern Division						
Labasa Airport (1947-2023)	1214.3	Above normal	780.3	1105.5	897.2	45/63
Savusavu Airfield (1957-2023)	664.5	Normal	586.6	852.4	703.2	26/61
Udu Point (1946-2023)	840.3	Normal	751.9	1065.8	930.4	31/73
Rotuma (1912-2023)	580.5	Below normal	866.5	1069.1	964.8	5/107

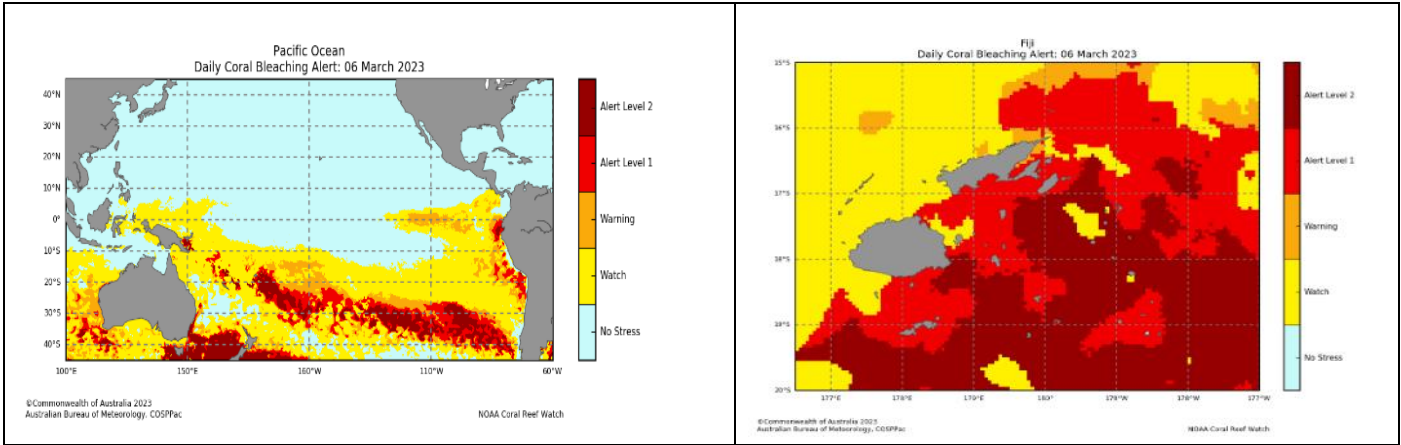
Part 1i. Monthly and Seasonal Outlooks for April and April to June 2023

Monthly: April	Seasonal: April to June
Rainfall (Image 1)	Rainfall (Image 2)
<p>Tercile rainfall probabilities for April 2023</p> <p>Base period: 1981-2018 Model: ACCESS-S2 © Commonwealth of Australia 2023, Australian Bureau of Meteorology Shapelite data extracted from Flanders Marine Institute (2019), Maritime Boundaries Geodatabase: Maritime Boundaries and Exclusive Economic Zones (200NM), version 11. Available online at http://www.maritimerregions.org/</p>	<p>Tercile rainfall probabilities for April to June 2023</p> <p>Base period: 1981-2018 Model: ACCESS-S2 © Commonwealth of Australia 2023, Australian Bureau of Meteorology Shapelite data extracted from Flanders Marine Institute (2019), Maritime Boundaries Geodatabase: Maritime Boundaries and Exclusive Economic Zones (200NM), version 11. Available online at http://www.maritimerregions.org/</p>
Monthly Maximum temperature (Image 3):	Seasonal maximum temperature (Image 4):
<p>Tercile maximum temperature probabilities for April 2023</p> <p>Base period: 1981-2018 Model: ACCESS-S2 © Commonwealth of Australia 2023, Australian Bureau of Meteorology Shapelite data extracted from Flanders Marine Institute (2019), Maritime Boundaries Geodatabase: Maritime Boundaries and Exclusive Economic Zones (200NM), version 11. Available online at http://www.maritimerregions.org/</p>	<p>Tercile maximum temperature probabilities for April to June 2023</p> <p>Base period: 1981-2018 Model: ACCESS-S2 © Commonwealth of Australia 2023, Australian Bureau of Meteorology Shapelite data extracted from Flanders Marine Institute (2019), Maritime Boundaries Geodatabase: Maritime Boundaries and Exclusive Economic Zones (200NM), version 11. Available online at http://www.maritimerregions.org/</p>
Monthly minimum temperature (Image 5):	Seasonal minimum temperature (Image 6):
<p>Tercile minimum temperature probabilities for April 2023</p> <p>Base period: 1981-2018 Model: ACCESS-S2 © Commonwealth of Australia 2023, Australian Bureau of Meteorology Shapelite data extracted from Flanders Marine Institute (2019), Maritime Boundaries Geodatabase: Maritime Boundaries and Exclusive Economic Zones (200NM), version 11. Available online at http://www.maritimerregions.org/</p>	<p>Tercile minimum temperature probabilities for April to June 2023</p> <p>Base period: 1981-2018 Model: ACCESS-S2 © Commonwealth of Australia 2023, Australian Bureau of Meteorology Shapelite data extracted from Flanders Marine Institute (2019), Maritime Boundaries Geodatabase: Maritime Boundaries and Exclusive Economic Zones (200NM), version 11. Available online at http://www.maritimerregions.org/</p>

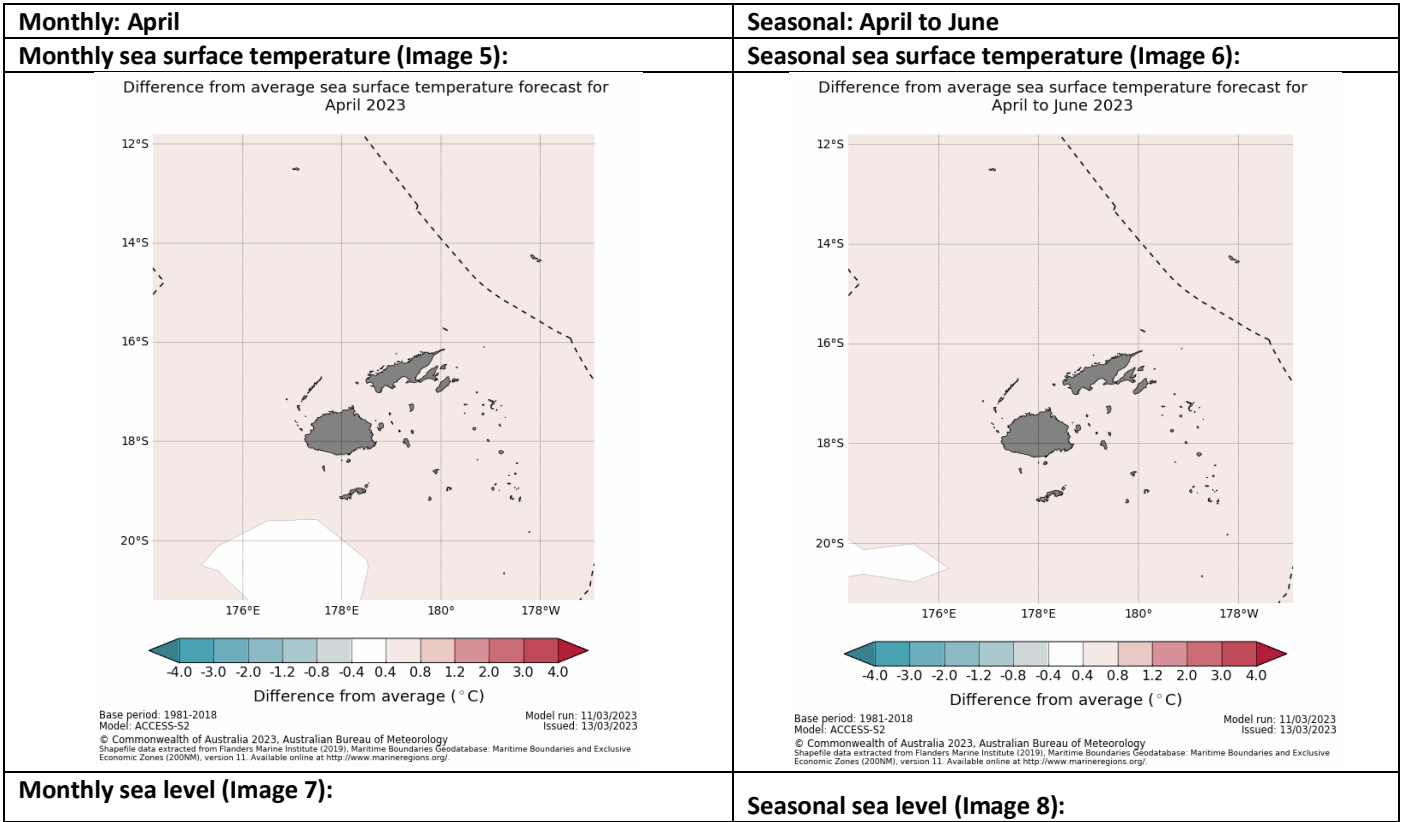
Part 2: Recent Ocean Observation

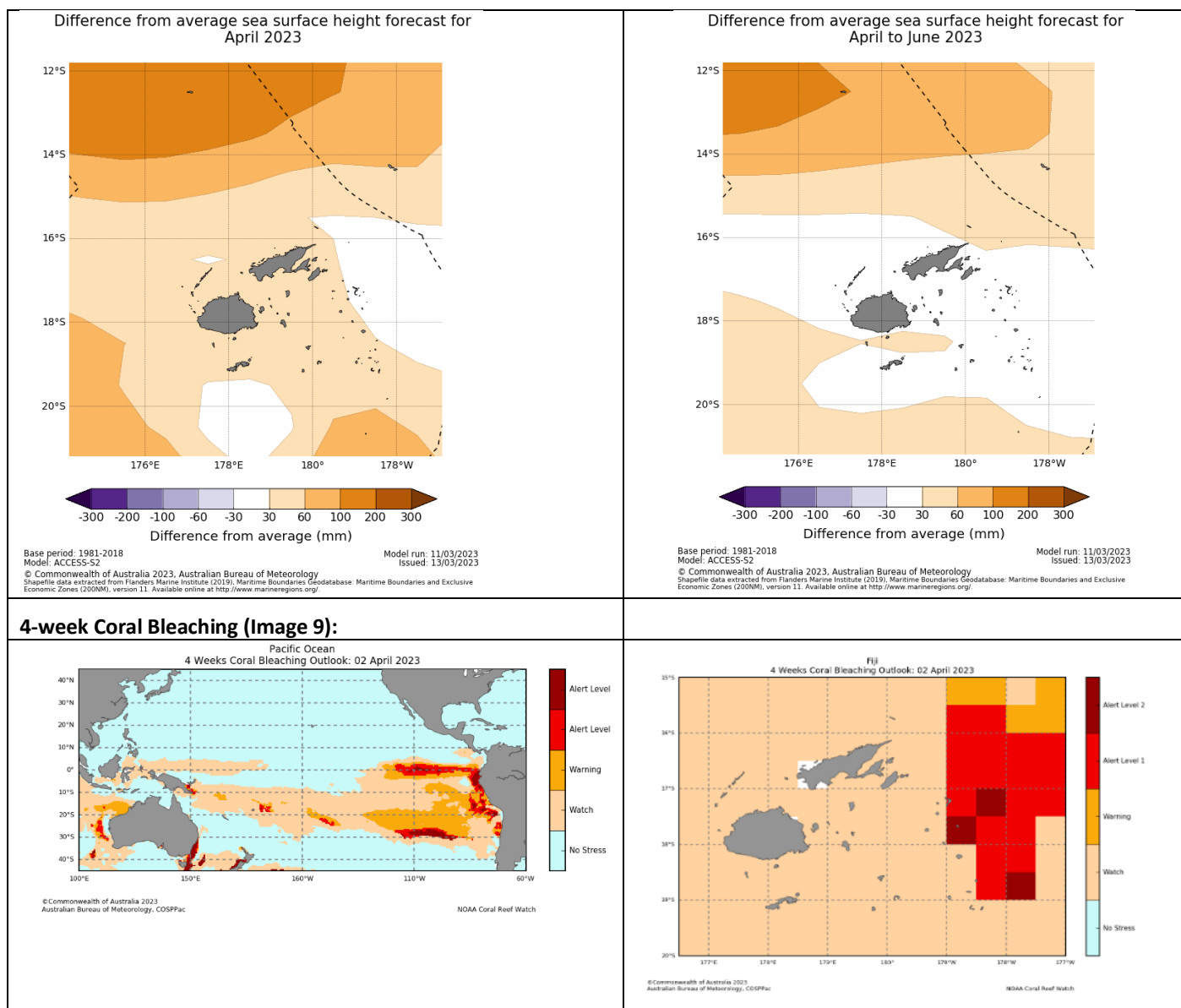
Monthly/Three months: February 2023 and December 2022 to February 2023

Monthly: February	
Sea Surface Temperature (Image 1):	Last three months: December 2022 to February 2023:
<div><p>Fiji</p><p>Monthly Average Sea Surface Temperature Anomaly: February 2023</p><p>©Commonwealth of Australia 2023 Australian Bureau of Meteorology, COSPPac</p><p>Reynolds SST</p></div>	<div><p>Fiji</p><p>3 monthly Average Sea Surface Temperature Anomaly: December 2022 to February 2023</p><p>©Commonwealth of Australia 2023 Australian Bureau of Meteorology, COSPPac</p><p>Reynolds SST</p></div>
Sea level (Image 2):	
<div><p>Fiji</p><p>Monthly Near Real Time Sea Level Anomaly: February 2023</p><p>©Commonwealth of Australia 2023 Australian Bureau of Meteorology, COSPPac</p><p>AVISO SsaltoDuacs SLA</p></div>	
Daily coral bleaching alert (Image 3):	



Part 2i. Monthly and Seasonal Outlooks for April and April to June 2023





Summary Statement

Monthly and last three months: February 2023/December 2022 to February 2023 statement

For February 2023, *above normal* rainfall was registered across the Western and Eastern Divisions, Laucala Bay (Suva), Nausori Airport and Labasa Airport. *Near-normal* rainfall was recorded at Tokotoko (Navua), Savusavu Airfield and Udu Point. *Below normal* rainfall was recorded at Rotuma. Nadi Airport registered its third wettest February in 81 years of record, while Laucala Bay (Suva) registered its ninth wettest February in 82 years of record.

For December 2022 to February 2023, *near-normal* to *above normal* rainfall was recorded across Fiji, except for Tokotoko (Navua) and Rotuma, which recorded *below normal* rainfall. Lautoka Mill, Nadi Airport and Ono-i-Lau registered their ninth, third and second wettest December to February in 123 years, 80 years and 72 years of record, respectively. Rotuma recorded its fifth driest December to February in 107 years of record.

Part 1i. Monthly and Seasonal Outlooks for April and April to June 2023

Monthly /Seasonal rainfall and temperature Outlook statements

Fiji's April and April to June 2023 rainfall is likely to be *above normal*, except for Rotuma where there is little guidance as the chances of above normal, normal and below normal are similar.

Both maximum and minimum temperatures for Fiji for April and April to June 2023 are very likely to be *above normal*.

Part 2: Recent Ocean summary statement

Monthly and last three months: February 2023/December 2022 to February 2023

February ocean temperatures around Fiji were 0.5 to 1.5°C above normal.

Averaged over December to February, ocean temperatures around Fiji were 1.0 to 2.0°C above normal.

February sea levels around Fiji were 150mm to 250mm above normal.

Coral bleaching alert is at '*Alert Level 2*' for most of the Fiji Waters.

Part 2i. Monthly and Seasonal Outlooks for April and April to June 2023

Ocean Variable statement

April ocean temperatures around Fiji are predicted to be 0.4 to 0.8°C above normal.

Averaged over April to June, ocean temperatures around Fiji are predicted to be 0.4 to 0.8°C above normal.

April sea levels around Fiji are predicted to be 30mm to 60mm above normal, while Rotuma is predicted to be 100-200mm above normal.

Averaged over April to June, sea levels around Fiji are predicted to be -30mm to 30mm near normal, while Rotuma is predicted to be 60-200mm above normal.

Coral bleaching outlook for the next four weeks is at '*Alert Level 2*' for Lau group, and with '*Watch*' for most of the Fiji waters.

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

Product	Date: February 2023	Stakeholder	Total Number of Participants	Number of male	Number of female
Fiji Climate Summary	07/02/23	General Public	140	106	34
EAR Watch	10/02/23	Humanitarian partners	122	96	26
Fiji Climate Outlook	27/02/23	General public	124	93	31

Climate Outlook for Monasavu	27/02/23	Energy Fiji Limited	13	13	-
Fiji Ocean Outlook	20/02/23	A number of key ocean related stakeholders	36	29	7
Meteorological Data Request	01/02/23 to 28/02/23	A range of stakeholders	44	33	11
Total			479	370	109

Flash Flooding – 3rd February 2023, 17th February 2023 & 22nd February 2023



Figure 1: Flooding in Labasa town on 3rd February, 2023. Source: Fiji Sun.



Figure 2: A vehicle swept away at Munir Road in Seaqaqa on 3rd February, 2023. Source: Fiji Roads Authority.



Figure 3: Fallen coconut trees due to torrential rainfall in Siberia, Labasa on 3rd February, 2023. Source: Fiji Roads Authority.



Figure 4: Flooding in Balevuto, Ba on 17th February, 2023. Source: fijivillage.



Figure 5: Nadi town inundated with floodwaters on 17th February, 2023. Source: fijivillage



Figure 6: Flooding in low lying areas of Tavua on 17th February, 2023. Source: Women's Weather Watch.



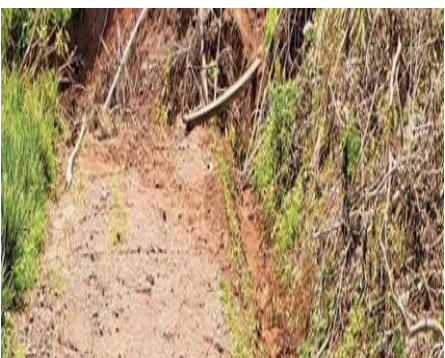
Figure 7: Rabulu road (Tavua) damaged due to continuous flooding on 17th February, 2023. Source: fijivillage.



Figure 8: Flash flooding in Rakiraki Town on 22nd February, 2023. Source: Femlink Pacific.



Figure 9: Flooding in Rakiraki on 22nd February, 2023. Source: Femlink Pacific.



Landslide – 18th to 23rd February 2023



Figure 10: Landslide in Nadarivatu on 18th February, 2023. Source: Fiji Roads Authority.



Figure 11: Landslide at Nakabuta settlement, Kubulau road, Wainunu, Bua on 21st February, 2023. Source: The Fiji Times.

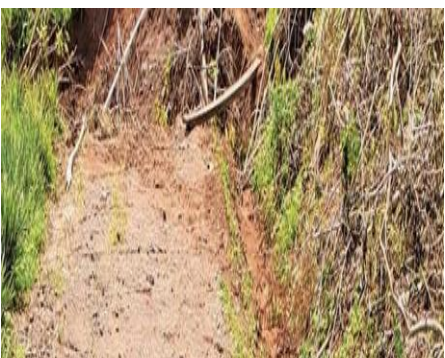


Figure 12: Landslide in Paipai, Lautoka after heavy downpour on 23rd February, 2023. Source: Fiji Sun.