Tonga - Vava'u (TOVA33)

surveyed 2013-09-22



0 — 5

Coral Health Index: TBD

What was done. Coral cover here was measured on in-situ benthic transects run by divers on the Living Oceans Foundation Global Reef Expedition over 5 transects — a diver measurement, not an estimate read off photographs. The written account of the site is a review of its photographs (25 of the 32 frames on file), the author's sampling sheet, and the expedition's survey records, not a second survey.

HARD CORAL COVER

33%

Benthic transects+photo-quadrats

MOST RECENT HEAT LOAD RECORD

24.3°C **0.0°C-weeks**

26 Oct 2026 · -2.5°C vs the past-365-day mean (26.8°C) · NOAA No heat stress

HEAT STRESS (5-YR MEAN ANNUAL MAX. DHW)

8.1°C-weeks

NOAA annual peaks averaging 8–12°C-weeks

MAX. DEPTH

30.5 m

dive-log maximum

WATER TEMP. (SURVEY)

26.0°C

CTD-cast midpoint of 26.0–26.1°C

-1.1°C vs the 2013 mean sea temperature (27.1°C)

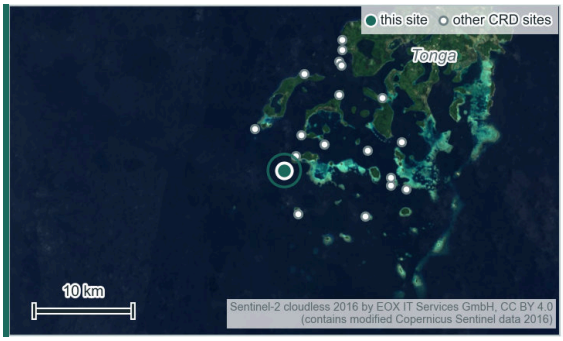
PHOTOGRAPHS

32 in the gallery · 32 on file

POSITION

-18.7570, -174.1228

Coordinate from the supporting data of Mayfield et al. (2017, PLoS ONE).





A mixed Vava'u reef of a steep face and a low terrace running out to a chute of white sand and rubble. The face is densely covered, corner to corner, with mustard and olive leathery soft corals packed among lavender and cream corymbose corals, with a long stream of banded damselfish along the reef edge. Surveyed on the Living Oceans Foundation's Global Reef Expedition.

lea faka-Tonga. Ko ha hakau fefiofiofi ʻi Vavaʻu ʻo ha mata tuʻu mo ha tuʻunga māʻulalo (low terrace) ʻoku aʻu atu ki ha hala ʻo e ʻoneʻone hinehina mo e maka momoa (rubble). Ko e mata ʻo e hakau ʻoku ʻufiʻufi fefuʻifuʻi, mei he tuliki ki he tuliki, ʻe he feo molū fakakili (leathery soft corals) lanu mastati mo ʻolive ʻoku fefuʻifuʻi mo e feo corymbose lanu laileki mo kulimi, mo ha laine loloa ʻo e ika damselfish (banded damselfish) ʻi he tafaʻaki ʻo e hakau. *AI translation of this summary; the English is authoritative. (low confidence)*





CV model comparison (hard coral cover, %): Transect mean (all transects) 33.4 · CoralSCOP unedited 36.3 · Claude (edited photos) 32.5 The two computer-vision methods agree within 3.8 pp (32.5–36.3%) and read within 2.9 pp of the in-water transect (33.4%).

Photographs: Anderson Mayfield/Coral Reef Diagnostics — 3 on this card; 32 in the gallery · 32 on file; watermarked · Full site record: https://api.coralreefdiagnostics.com/site-pages/gre-tonga-vava-u-tova33.html · Heat stress is the mean of the latest five annual maxima of NOAA Coral Reef Watch degree-heating weeks for this reef's NOAA CRW virtual station (Southern Tonga) — a five-year heat history for the station's waters, not a measurement at this site on the dive date.