



The Current Status of Coral Bleaching in the Brazil Region

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On behalf of : Department of Ocean and Coastal Management
Secretariat for Climate Change
Ministry of Environment and Climate Change

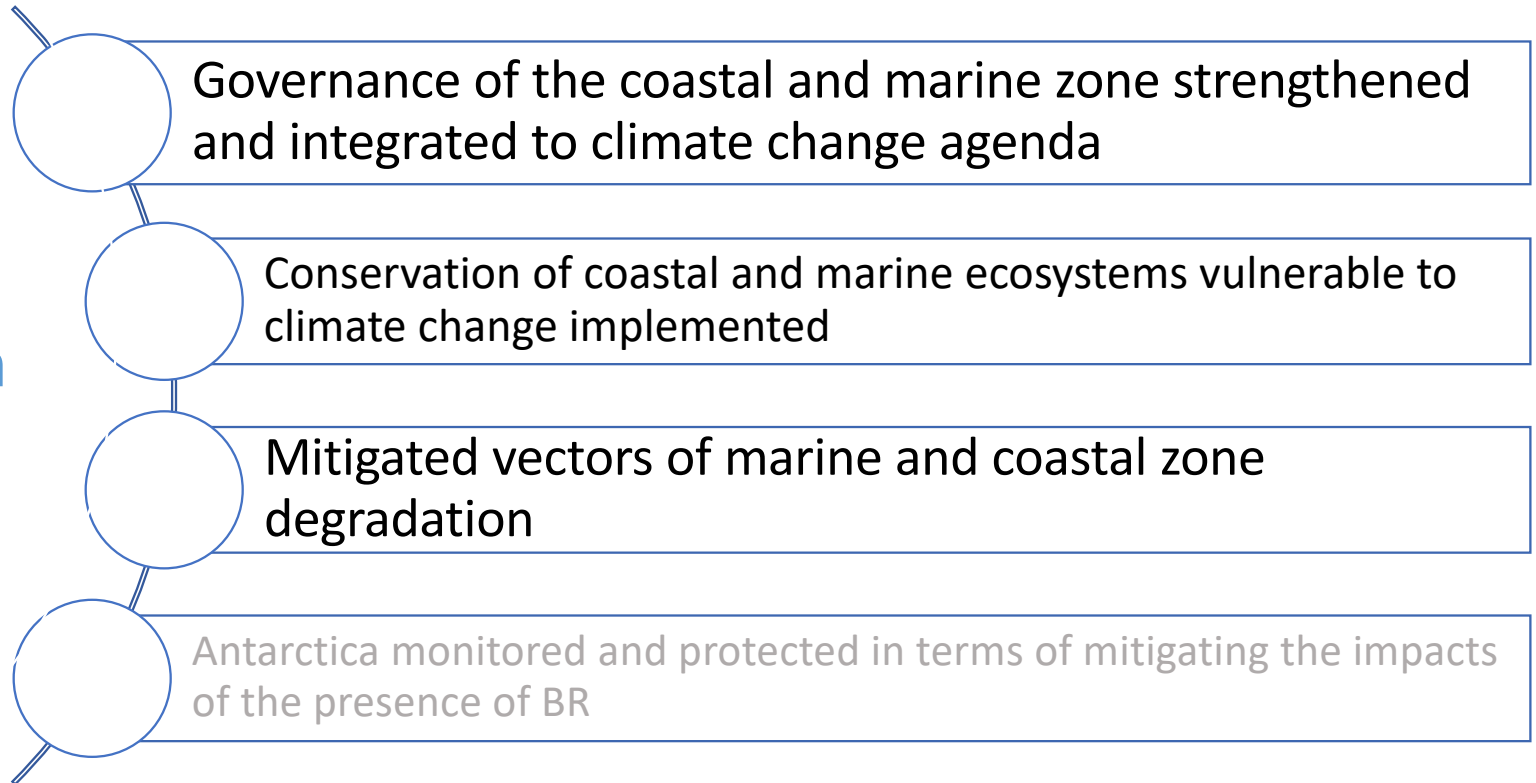


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Ocean and Coastal Management in Climate Change

Include the
ocean and
coastal zone in
climate policy in
an integral and
permanent way.



GCRMN – Status of the Reefs Report (2020)

Status of Coral Reefs of the World: 2020

Chapter 11. Status and trends of coral reefs of the Brazil region

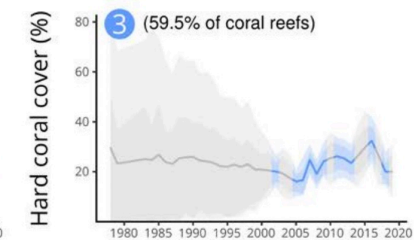
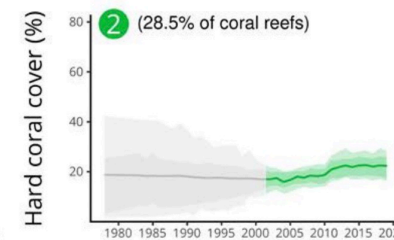
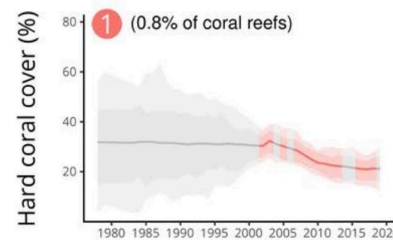
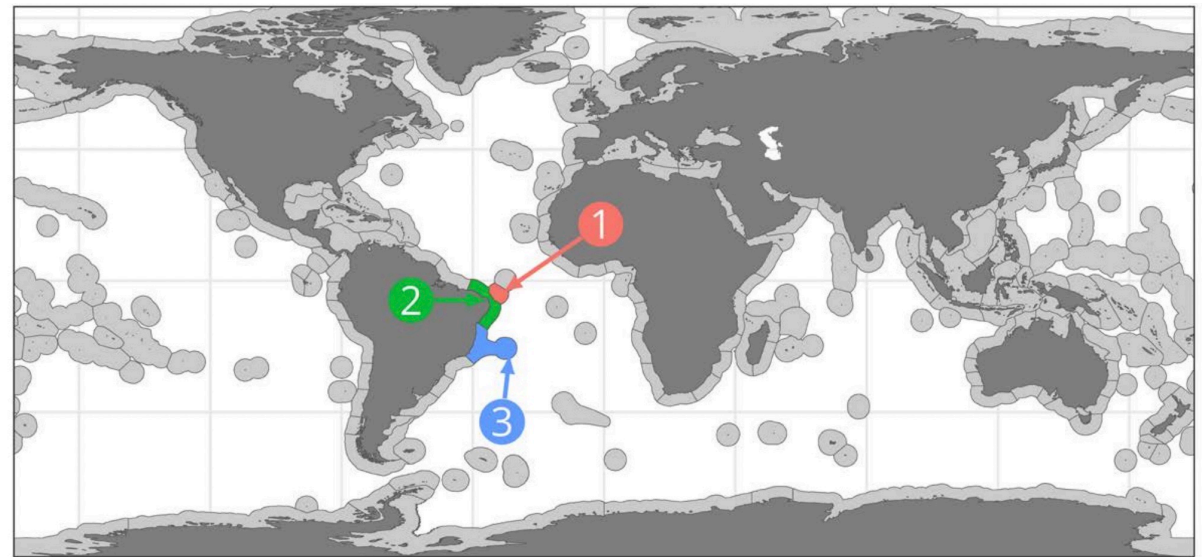


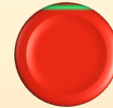
Figure 11.6. Estimated average cover of live hard coral within each subregion comprising the Brazil region. The solid line represents the estimated mean and associated 80% (darker shade) and 95% (lighter shade) credible intervals, which represent levels of uncertainty. Grey areas represent periods during which no field data were available. The proportion of all coral reefs in the Brazil region within each subregion is indicated by the % of coral reefs.

BR – 2023- 2024 Actions

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July/2023 Sept/2023 Nov/2023 Dec/2023 Feb/2024 Mar /2024 April/2024 May/2024 May/2024



Severe Bleaching in Florida

37th ICRI Hawaii

Alert meeting with government
(MMA, ICMBio, IBAMA, Navy)

COP28 - Brazil joins the Coral Reef Breakthrough

1st Meeting with monitoring teams to map out support needs for bleaching monitoring activities

Feedback to researchers on possibilities for supporting bleaching monitoring

Bleaching starts

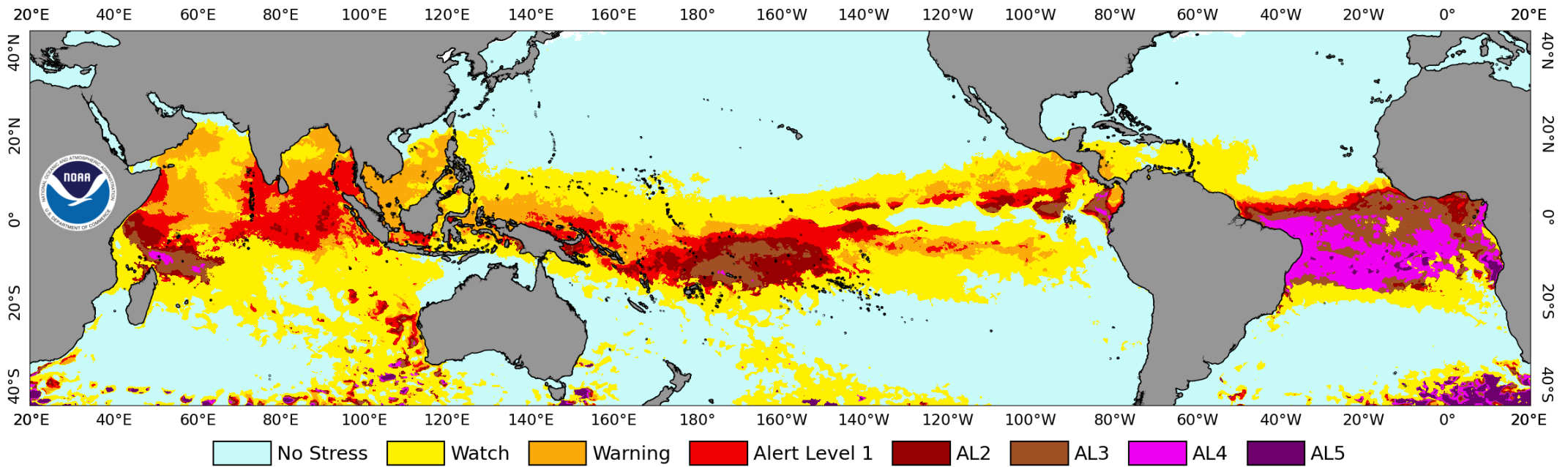
Launch of call for projects - 30 million reais - **BNDES**

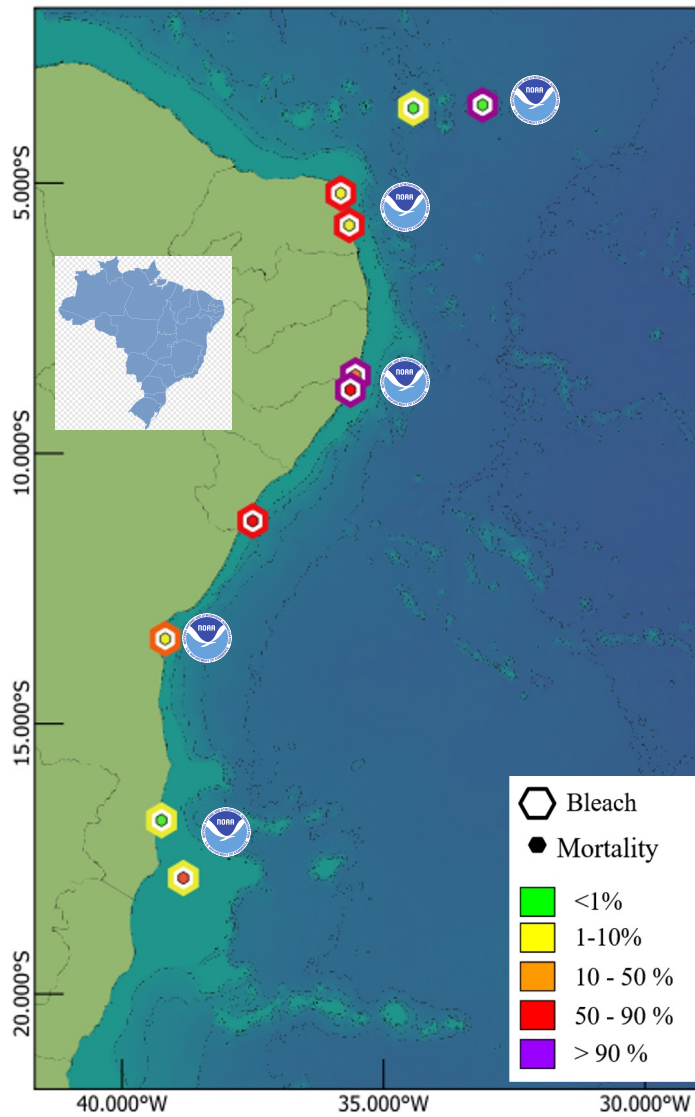
Bleaching Reports from Monitoring teams

Webinar ICRI NOAA

2024: the most severe event

NOAA Coral Reef Watch Daily 5km Bleaching Alert Area 7-day Maximum (v3.1) 4 May 2024





Region Bleach (%) Mortality (%)

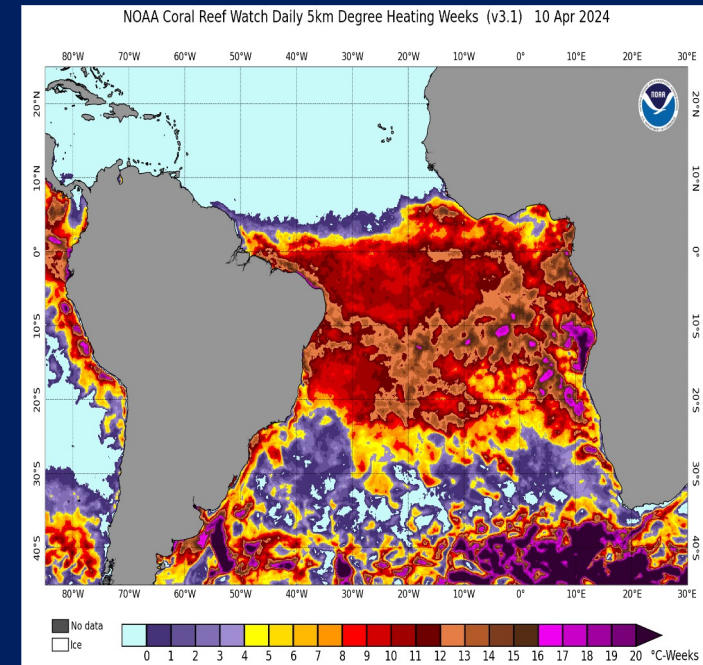
Noronha ☆ ★	>90%	<1%
Rocas Atoll ☆ ★	1-10%	<1%
Pirangi	50-90%	1-10%
Maracajaú	50-90%	1-10%
Tamandaré ☆ ★	>90%	10-50%
Maragogi ☆ ★	>90%	50-90%
Sergipe	50-90%	50-90%
Boipeba	10-50%	1-10%
Corumbau	1-10%	<1%
Abrolhos ☆ ★	1-10%	0-50%

Five long term monitoring sites

☆ ILTER Sites/CNPQ (★ 20 yr)

★ Reef Check sites

INCT, NGOs, Universities



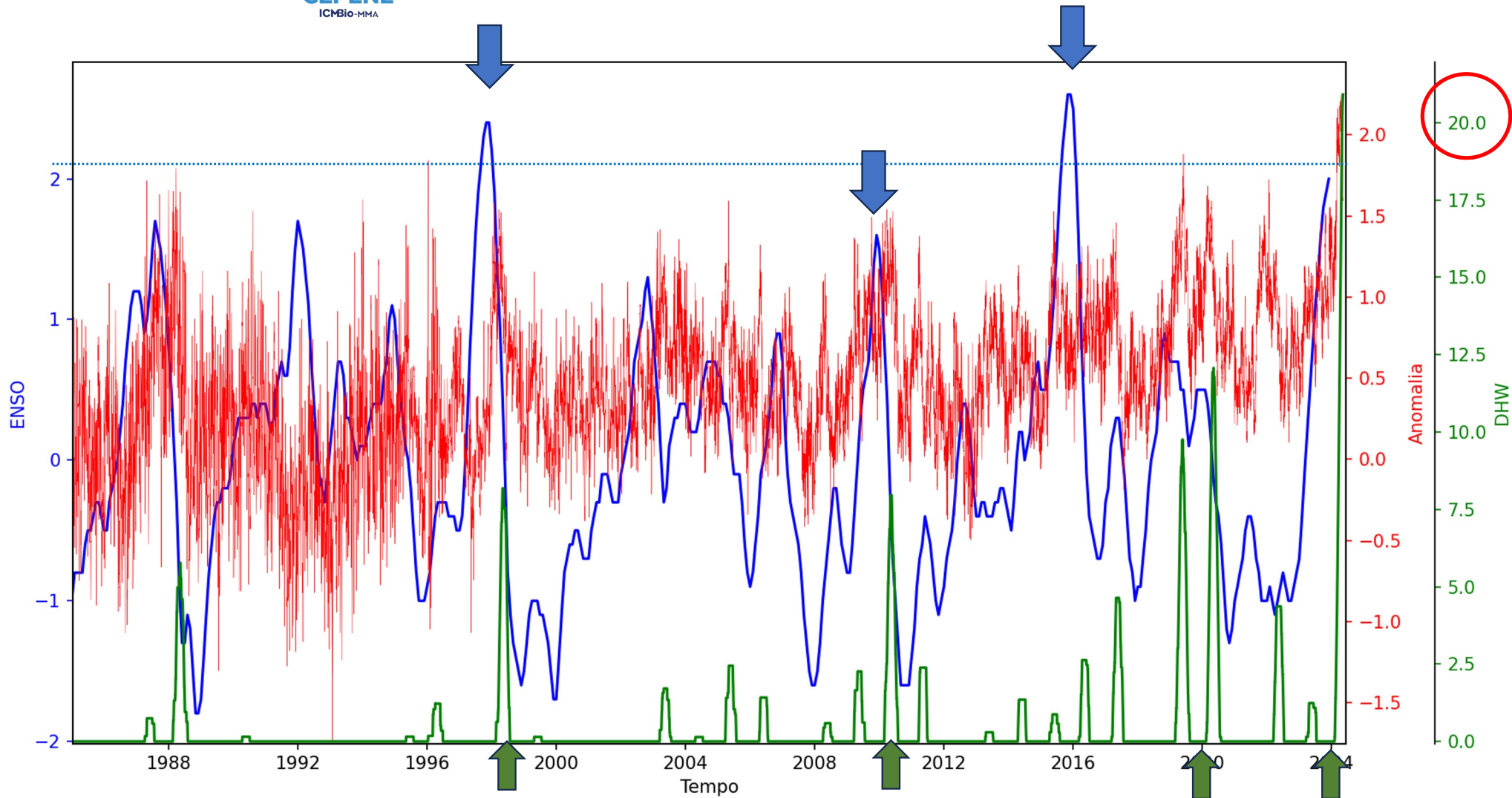
Regional Virtual Station (NOAA)	DHW
Fernando de Noronha	18.5
Maracajau	22.1
Costa dos Corais	20.9
Todos os Santos	20.1
Abrolhos	14.6
Trindade and martim vaz	11.0

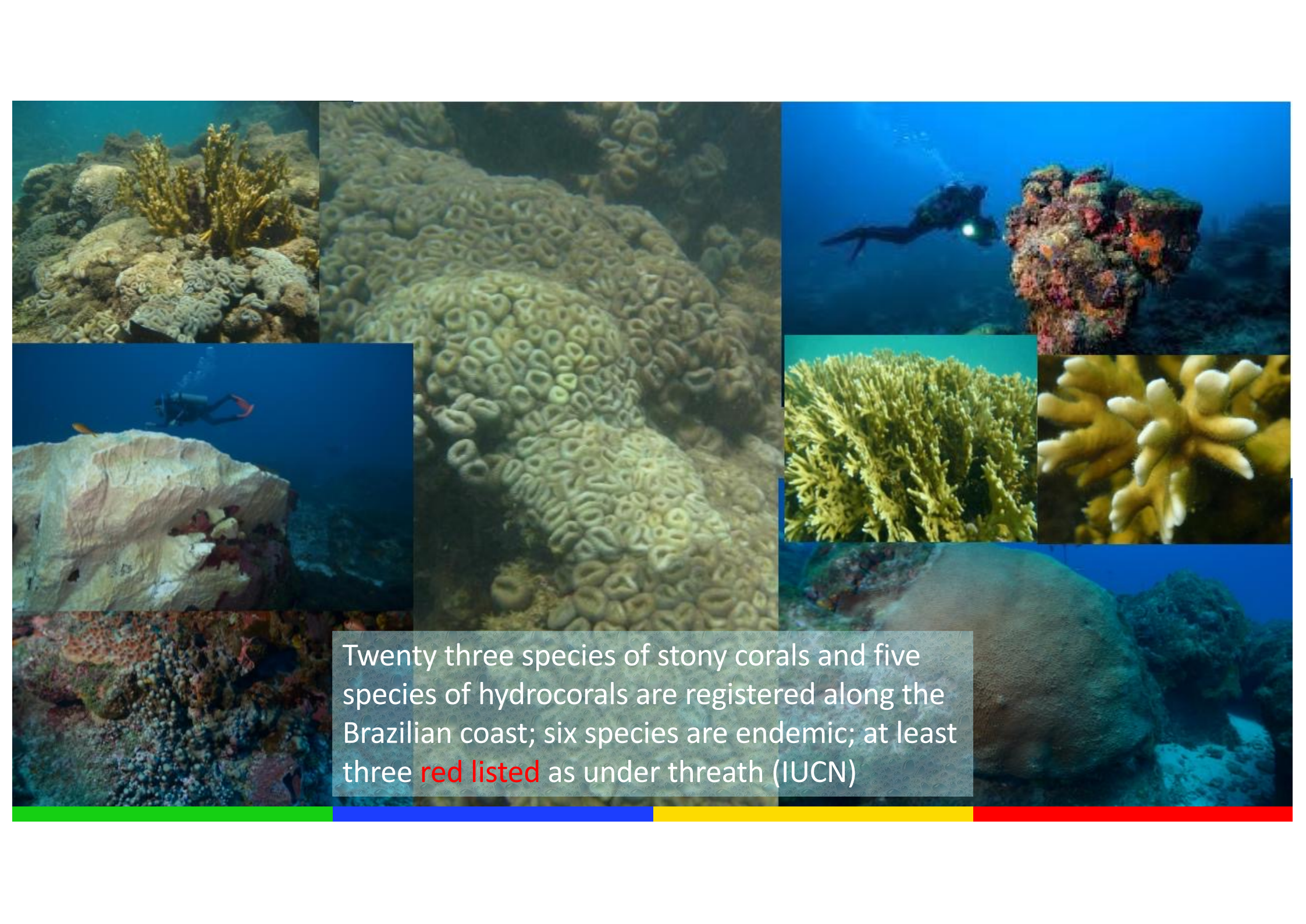
Coral Vivo Bleaching Monitoring network- 2021





Costa dos Corais - Brazil





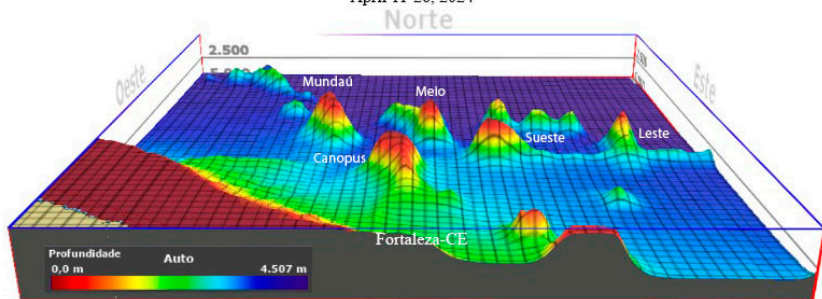
Twenty three species of stony corals and five species of hydrocorals are registered along the Brazilian coast; six species are endemic; at least three **red listed** as under threath (IUCN)

Coral bleaching reaches new depths in the South Atlantic

Seamounts of the Northern Brazilian Chain Expedition

UFPE - CEPENE/ICMBio - IRCOS - WWF Brasil

April 11-26, 2024



Underwater video mapping using the Sassanga towed video system
59.2 km of video transects on the mesophotic tops of 5 seamounts, over 200 hours of underwater video recordings
500 km of bathymetric survey on top and flanks of the seamounts



agênciaBrasil

22/04/2024

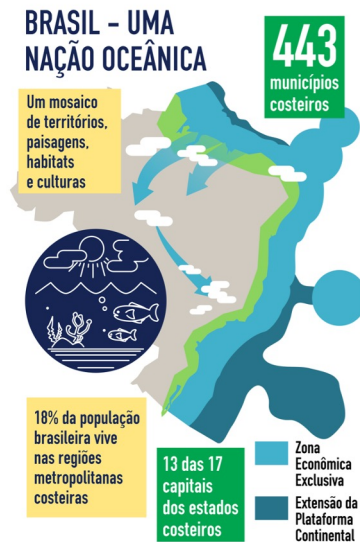
Gerar

Branqueamento de corais é registrado a 60 metros de profundidade

Fenômeno foi observado pela primeira vez no Atlântico Sul



<https://www.bpb.es.net.br/produto/diagnostico-brasileiro-marinho-costeiro/>



Coral reefs in Northeast Brazil prevent BRL 160 billion damage

If preserved, they can guarantee BRL 7 billion for regional tourism

The Northeast Brazilian region has a population of 18 million people living on the coast corresponding to 47% of all coastal Brazil population

Coral reefs have enormous importance to coastal communities through coastal protection, food security, tourism, well being and culture.

The 2024 event was the most extreme to record, affecting severely all but the southernmost region (Abrolhos) that however was affected during previous events.

The western South Atlantic is not a climate refugia and Brazilian coral reefs are not tolerant to intense heat stress, being at severe risk in presente conditions and trends.

Reduction of carbon emissions through reduction of fossil fuel consumption and deforestation as well as increasing conservation and promoting restoration of local conditions is essential to prevent extreme losses.

Scientific Workshop

Oficina Científica

Centro de Síntese em Mudanças Ambientais e Climáticas





Coral bleaching Crisis

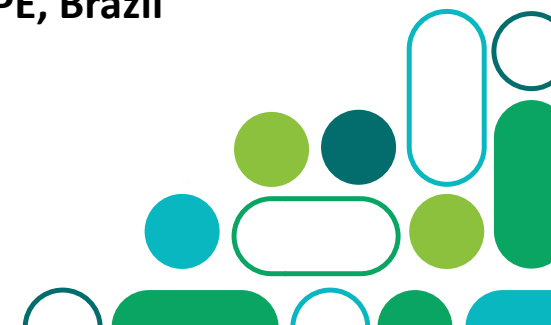


Amazon tipping point



- (i) Integrate the research of the Brazilian Research Network on Global Climate Change (Rede Clima) with other national and international networks;
- (ii) Provide support for strategies and initiatives of the Ministry of Science, Technology, and Innovation related to the goals outlined in the SDGs;
- (iii) Identify opportunities for climate change adaptation actions, for the economic valorization of renewable energy potential and Brazilian biodiversity as a central element of the bioeconomy.

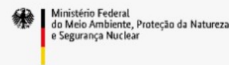
May 6th - 8th
Recife-PE, Brazil



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Por ordem do



da República Federal da Alemanha



Por meio da:



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