

COMOROS

LANCET COUNTDOWN ON HEALTH AND CLIMATE CHANGE DATA SHEET 2024

Health and climate change in Comoros

The Lancet Countdown on Health and Climate Change annually takes stock of the evolving links between health and climate change through 50+ peer-reviewed indicators. Since 2016, these indicators have provided regular, reliable global and regional stocktakes on climate change and health. Data in this year's report reveal that people all around the world are facing record-breaking threats to their wellbeing, health and survival from the rapidly changing climate. This document summarises key findings from the 2024 Small Island Developing States report for the *Lancet* Countdown for Comoros, which reveal that:



Trends in **heat and health** are particularly concerning, with populations experiencing increases in exposure to high temperatures, undermining livelihoods and threatening people's health and wellbeing.



Comoros' **adaptation measures** include promotion of urban greenness, strong collaborative foundation with key regional actors, and a migration policy.



Comoros bears a high burden of communicable diseases. Climatic conditions have grown increasingly suitable for the spread of vector-borne diseases including **dengue and malaria**.



Millions of **work hours** were lost due to greater **heat exposure**, with the loss of earnings amounting to millions of dollars, especially in the agricultural sector.

These findings underline the urgency of strengthening local health systems and adapting to climate change. These actions will help build healthier, more resilient populations and forge the way to a thriving future for Comoros.

Heat and health

Exposure to high temperatures threatens people's lives, health, and wellbeing, leading to death and heat-related disease, and increasing healthcare demand during heatwave episodes. Older people, socio-economically deprived communities, very young children, pregnant women, and those with underlying health problems are particularly at risk.

0.4°C Mean summer temperature over 2018–2022 was 0.4°C higher than the mean temperature between 1986–2005 (indicator 1.1.1).

On average between 2019–2023, there was a 9-day increase in exposure to health-threatening heat for both each infant under 1 and person over 65, compared to average exposure in 2005–2009 (indicator 1.1.2). In 2023 alone, there were about 19 more days of exposure for both vulnerable groups.

ECONOMIC IMPACT OF HEAT

Heat exposure limits labour productivity, which undermines livelihoods and the social determinants of health.

500 million

Near half a billion work hours were lost across all outdoor labour sectors from 2014 through 2023; double the hours lost in 1991–2000 (indicator 1.1.4).

\$800M

This was associated with almost US\$800 million loss of earnings, which is a 22% increase compared to loss of earnings due to heat in 1991–2000 (indicators 1.1.4, 4.1.3).

400 million

Over 400 million work hours were lost in the agricultural sector from 2014–2023 (99% higher than 1991–2000), associated with about US\$700 million loss of earnings over the same period (indicators 1.1.4, 4.1.3).

Vulnerability to infectious disease

Comoros has long been burdened with the endemic transmission of malaria. Despite progress in public health interventions, communicable diseases continue to account for a high proportion of deaths across the country.



Climate suitability for the transmission of malaria was up by 9% over the period 2013–2022 compared to 1951–1960 (indicator 1.3.2). Climate suitability for the transmission of dengue through the *Aedes aegypti* and *Aedes albopictus* mosquito was up by 2% and 3%, respectively, over the period 2013–2022 compared to 1951–1960 (indicator 1.3.1).



The climate of Comoros remains suitable for malaria transmission for over 5 months of the year (indicator 1.3.2).

Extreme weather events and sea level rise

Tropical cyclones can precipitate major wind- and flood-induced infrastructural damage, injury, morbidity, and commonly, death. In most SIDS, these annual extreme events have contributed to developmental instability through anticipation of climatic shocks.

400,000

From 2000–2023, storms and flood events led to 14 deaths and affected over 400,000 persons (indicator 2.3.2).

Sea level rise can affect human health through episodic flooding, permanent inundation, erosion, soil and drinking water contamination, vector- and water-borne disease, and mental health impacts, for populations living less than 1 metre above sea level.

4 %

Over 34,000 persons (4% of the population) were living within 1 metre of Comoros' coastline in 2022 (indicator 2.3.3).

SLOW-ONSET DISPLACEMENT AND MIGRATION

Apart from potential inundation, coastal zones in Comoros are already facing coastal erosion, soil salinisation, and saline intrusion which threaten livelihood, agricultural production, and water security.



In 2015, Comoros published a migration policy for sea level rise that specifically highlighted the impacts on human health and wellbeing. The implementation period of the policy extends to 2030 (indicator 2.3.3).

Since the 2015 policy does not explicitly recommend a framework for the migration of displaced or immobile persons, an opportunity exists to refine future policies to cover the relocation of vulnerable populations.

Diet and physical activity

Promoting shifts to healthier, more plant-based diets can substantially reduce agricultural GHG emissions, while also delivering major co-benefits for public health through improvements to dietary risk factors and reduced deaths due to unbalanced diets.



In 2019 and 2021, over 1,600 deaths in Comoros were attributable to imbalanced diets characterised by overconsumption of red and processed meat, and insufficient consumption of fresh fruits, vegetables, and nuts (indicator 3.3.2).

Regular engagement in physical activity, such as jogging, significantly reduces the risk of cardiovascular complications. Promoting engagement in physical activity could reduce the risk factors associated with poor dietary outcomes. Yet, increased heating threatens the viability of this vital health benefit.



Between 2019 and 2023, there were an average of around 550 and 570 additional hours during which light and moderate intensity outdoor exercise, respectively, may have posed at least moderate heat stress risk compared to mean hours for 1991–2000 (indicator 1.1.3).

Adaptation and scientific engagement

Comoros is one of a few SIDS that have maintained urban green space, one of the key adaptations for reducing the impacts of increased warming.



The city of Fomboni has improved urban greenness from low levels in 2010 to moderate levels of greenness in 2015 and 2023 (indicator 2.2.3).

Climate adaptation policies, strategies, and measures play a pivotal role in building resilience against multiple climate hazards. There remain several key gaps hindering the growth of adaptation capacity in the country.



Through collaboration with the World Meteorological Organization, the health sector in Comoros has reported having climate and data services for health (indicator 2.2.1).



Research provides evidence for climate action, however, scientific publications remain low overall for SIDS. Only four scientific papers were published between 1990 and 2023 on climate change impacts on health from Comoros. No scientific publications were found that covered climate-related health adaptation or climate change mitigation (indicator 5.3).

FOR FURTHER INFORMATION, VISIT WWW.LANCETCOUNTDOWN.ORG

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