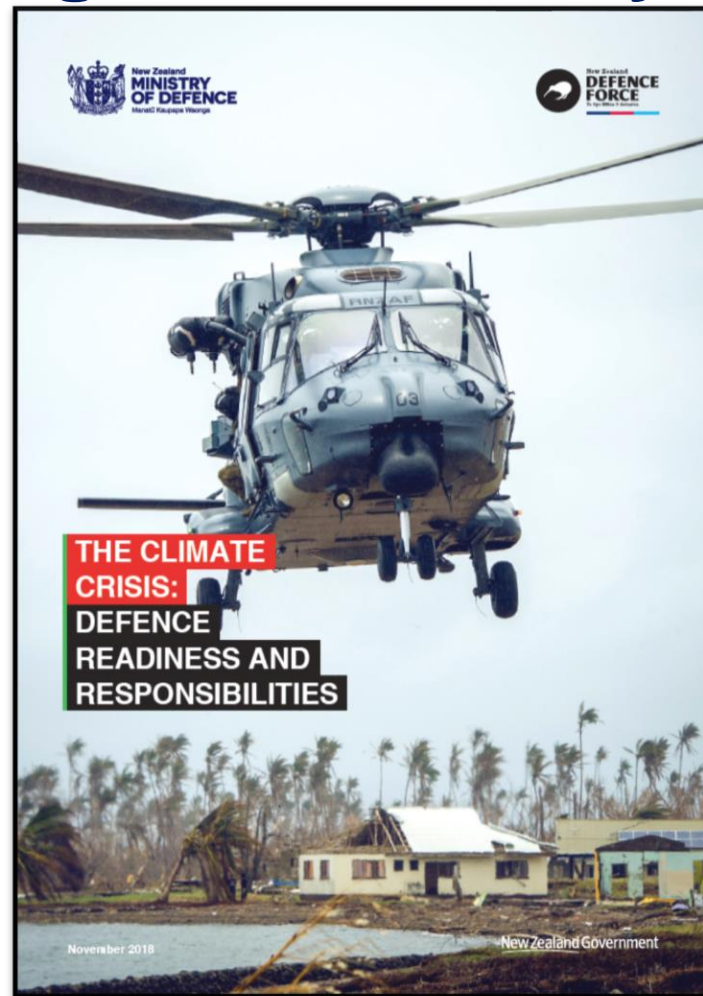


Defence Assessment on Climate Change and security



<https://www.defence.govt.nz/publications/publication/the-climate-crisis-defence-readiness-and-response>

[UNCLASSIFIED]

Wider Policy context

Expanded concept of security, with human
and environmental security

New Zealand

Strategic Defence Policy
Statement 2018

Pacific Reset

Action Plan on Climate
displacement / migration

Maritime Security Strategy

Development of Zero Carbon Bill

“All-hazards” approach to national security

Wellbeing focus (Living Standards
Framework)

Pacific

Boe Declaration climate change
security language

Pacific Islands Forum priority

Climate change security on
South Pacific Defence Ministers’
Meeting agenda

Development of a
Pacific Environmental
Security Organisation

Global

Paris Agreement

Wide concern in the United Nations
General Assembly

2019 United Nations
Secretary-General climate
change summit

Proposed Special Representative of
the Secretary-General for Climate
Change and Security

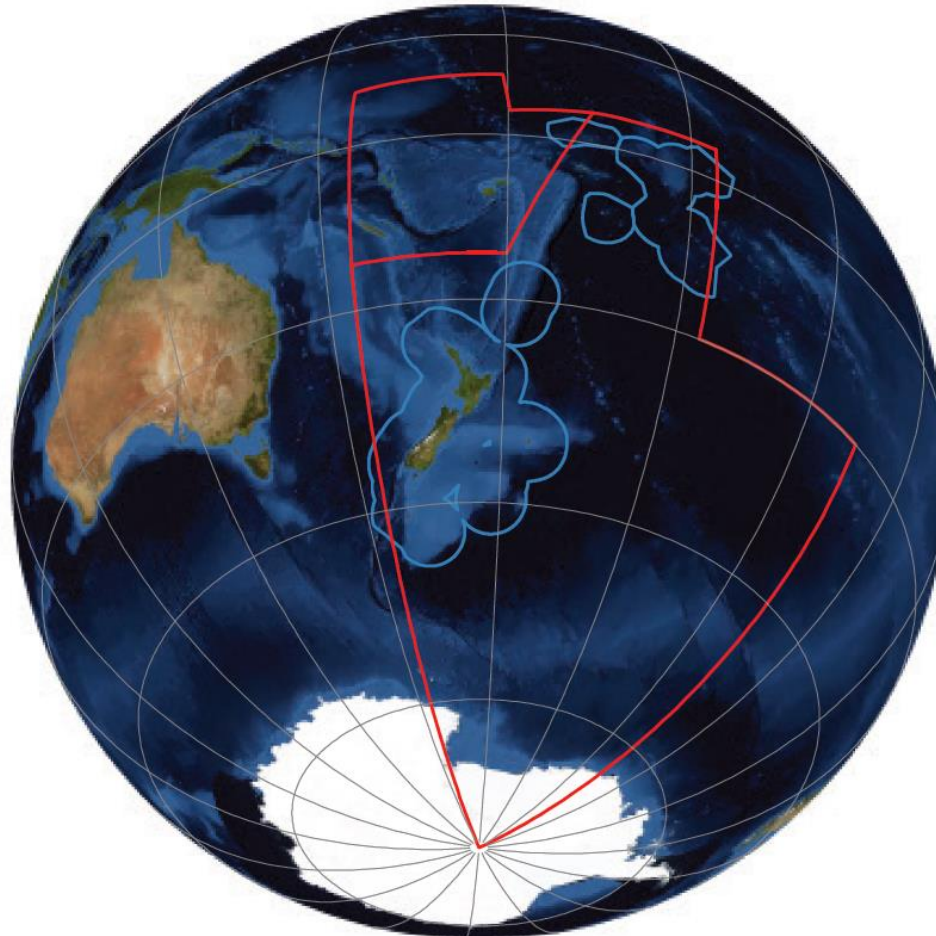
Climate change in the South Pacific

- At the 2018 Pacific Islands Forum, leaders affirmed that “climate change presents the single greatest threat to the livelihood, security and wellbeing of Pacific people.”
- Climate science also supports this statement—the Intergovernmental Panel on Climate Change’s October 2018 Special Report notes that global warming is likely to reach 1.5°C above pre-industrial levels between 2030 and 2052.

Climate change in the South Pacific

- Dramatic climate effects the region is facing stemming from rising temperatures include:
 - Sea level rise, increased frequency and intensity of extreme weather events such as storm surges, increased intensity of tropical cyclones, more variable rainfall patterns and prolonged droughts.
- For some Pacific Island countries, the threats posed by climate change are extreme.
- Across the Pacific, at least eight low-lying islands have already been immersed by rising sea levels.
- The western Pacific Ocean is rising at about three times the global average rate of around three millimetres annually.

Climate change is adversely impacting the oceans and Antarctica



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Climate change and security

- The links between climate change and security are indirect but demonstrable.
- When the effects of climate change intersect with a complex array of environmental and social issues, it can be a significant contributor to both low-level and more violent conflict.
- The security implications of climate change are further magnified in areas dealing with weak governance or corruption.

Security impacts of climate change

Climate effects

- Rising temperatures
- Melting ice
- Sea level rise
- Ocean acidification
- Intensifying cyclones
- More or less rainfall
- Floods / Droughts
- Heatwaves

Environmental impacts

- Coral bleaching
- Decreasing fish stocks and marine life
- Coastal erosion
- Increase in soil salinity
- Unproductive land (non cultivable and eventually uninhabitable land)

Social impacts*

- Loss of livelihood
- Water and food scarcity
- Increase in malnutrition
- Loss of jobs / education opportunities
- Loss of cultural identity
- Damage to community infrastructure
- Climate migration

Security implications

- Human security challenges
- Health-related crises
- Resource competition (food and water security)
- Violence from mismanaged adaptation or migration
- Land disputes

Magnified by weak governance

The impacts of climate change will become more pronounced as time goes on

*Social Impacts are often interconnected with economic and political factors

Implications for Defence



Key Implications for Defence

The effects of climate change are challenging countries and regions in different ways:

- Militaries will be stretched with a growing number of tasks in response to climate-induced impacts globally.
- More HADR and stability operations in New Zealand's region will be required.
- The increased frequency and intensity of extreme weather events such as storm surges, and increased intensity of tropical cyclones combined will shorten recovery periods.
- Fishing vessels will operate in new areas, including within New Zealand's expansive search and rescue area of responsibility in the coming years.

Recommendations

- High-level recommendations are to be followed by a joint MoD NZDF implementation plan in 2019.
- Recommendations include:
 - Planning for increasingly concurrent operational requirements
 - More work alongside Pacific partners in building resilience
 - Elevating discussion on the security impacts of climate change at bilateral defence talks and regional forums
 - Supporting scientific research on climate change in our wider region
 - Investing in research relating to developments around “green” or sustainable military technology – e.g. fuels and energy
 - More work with international partners to be more sustainable on operations and at camps and bases in New Zealand
- Three recommendations in light of ongoing development of New Zealand’s Zero Carbon Bill.