



Australian Government

Australian Climate Service

Committee Secretariat
Senate Standing Committees on
Environment and Communications
PO Box 6100
Parliament House
CANBERRA ACT 2600
By email: ec.sen@aph.gov.au

10 September 2025

Dear Committee Secretary

RE: Senate Standing Committees on Environment and Communications Inquiry into the Climate Risk Assessment

The Australian Climate Service (ACS) welcomes the opportunity to contribute to the Senate Standing Committees on Environment and Communications inquiry into the Climate Risk Assessment.

Australia is increasingly exposed to the impacts of a changing climate. Understanding climate risks — and how they affect our people, economy, infrastructure and environment — is essential to building a safe, resilient and prosperous future. The ACS was established to help meet this challenge by delivering trusted, accessible and actionable climate intelligence to support national preparedness and adaptation.

Australian Climate Service Role

Established on 1 July 2021, the ACS is a national partnership that brings together the Bureau of Meteorology, CSIRO, Geoscience Australia, and the Australian Bureau of Statistics. Together, we deliver authoritative climate intelligence to support decision-making across government, industry and communities.

Effective climate adaptation requires more than data — it demands a robust, multidisciplinary capability to generate, interpret and apply climate information and evidence-based knowledge across the adaptation cycle. This capability is foundational to understanding what is at risk, where and why, and how best to respond.

Bringing together the 4 Australian Government capabilities has provided a vital boost to Australia's climate information architecture. The ACS has drawn on the strengths of these agencies to build new capability, including methodologies, data integration, platforms, and analytical tools to help Australia understand climate risks and generate the information and knowledge needed to plan, prepare and respond.

The ACS is actively building this national capability at the Australian Government level. Drawing on expertise, resources and data from climate science and across Australia's social, economic, built and natural domains, the ACS is developing integrated insights that support planning, preparedness and resilience. This includes the development of national

frameworks, indicators, and methodologies to assess hazard, exposure, vulnerability, response and impact enabling consistent, trusted and actionable climate intelligence.

This capability is not static. Like other national challenges, climate risk requires a coordinated, evolving capability that can integrate diverse data, disciplines and decision-making needs. The ACS is building this capability through collaboration with governments, researchers, communities and industries, and embedding it in national platforms and services. As climate risks become more complex and interconnected, ACS's role in translating science into practical, decision-ready intelligence is essential to ensuring Australia is equipped to anticipate, absorb and adapt to future shocks.

National Climate Risk Assessment

The ACS was asked by the Australian Government to undertake Australia's first National Climate Risk Assessment.

The ACS has focused on delivering an independent, science-based national assessment of climate risk. This work provides a consistent and credible evidence base to understand how climate hazards, exposure and vulnerability interact across Australia's systems and regions. The assessment is being used by the Australian Government to inform the development of a National Adaptation Plan — a framework for coordinated national action to reduce climate risks and build resilience across sectors and communities.

The National Climate Risk Assessment is being delivered in 2 phases:

- Phase One identified 56 nationally significant climate risks through desktop review, analysis, and a national expert elicitation process. These findings were publicly released in 2024.
- Phase Two is a detailed assessment of 11 priority risks, selected by the Australian Government. The ACS has undertaken the science and analysis for this second-pass assessment, identifying available data and developing new methodologies and data sources where needed.

Given this is the first national assessment of its kind, the ACS has had to build new capability — including the development of national indicators, integrated datasets, and analytical frameworks — to support a consistent and transparent approach to risk assessment. This will be further developed by the ACS in the coming years.

Different countries have approached national climate risk assessments in different ways, reflecting their unique contexts, priorities and capabilities. In developing Australia's first assessment, the ACS has drawn on international experience and best practice. Our approach aligns with guidance from the Intergovernmental Panel on Climate Change (IPCC), adopting a structured methodology that integrates hazard, exposure, vulnerability and response. This ensures the assessment is scientifically robust, transparent and consistent with global standards.

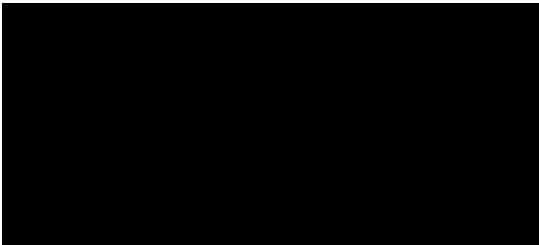
By learning from international counterparts and tailoring these insights to Australia's systems, landscapes and decision-making needs, the ACS is delivering a nationally relevant and globally credible assessment that supports adaptation planning and risk reduction across sectors and communities.

Australia set an ambitious timeframe for its first national assessment. While the ACS is eager to help stakeholders understand what the National Assessment tells us and how we can improve our response, the priority remains ensuring delivery of high-quality and practical technical products and resources that can inform adaptation action in Australia now and for many years to come.

Looking Ahead

The ACS remains committed to building national capability and information resources to support decision-making and strengthen Australia's climate resilience. We welcome the opportunity to provide further detail to the Committee and to support the broader national conversation on climate risk and adaptation.

Yours sincerely



Vicki Manson

Head of the Australian Climate Service