



Australasian College for Emergency Medicine

Position Statement

Climate change and health

The Australasian College for Emergency Medicine considers climate change and the associated health impacts to be a population health emergency.

Climate change presents an immediate risk to the capacity and ability of emergency departments, health systems and the medical workforce to cope with increased demand and more frequent and intense disasters. Climate change is a medical emergency; it thus demands an emergency response. ACEM calls for urgent action to establish mechanisms to mitigate and adapt to these threats to ensure the ongoing sustainability of our health systems. There is an immediate need for EDs to be resourced in order to meet increased demand resulting from climate change.

ACEM calls on governments at all levels, including the Commonwealth of Australia and the New Zealand Government, to take immediate and sustained action to address and mitigate the impacts that this climate emergency presents.

ACEM supports efforts to minimise the impact of climate change and actively supports measures to reduce the carbon footprint of hospitals and health systems.

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Document Review

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Revision History

Version	Date	Pages revised / Brief Explanation of Revision
01	Mar 2012	Position statement developed
02	Oct 2019	Entire document revised in line with current evidence

Related Documents

- [ACEM Environmental Strategy](#)
- P59 – [Policy on Heatwaves](#)
- [ACEM Heat Health Resource](#)

1. Purpose and scope

This statement articulates the Australasian College for Emergency Medicine's position on climate change and its impact on human health and Australasian Emergency Departments (EDs).

This Statement outlines the key issues that climate change will present to the capacity of EDs and emergency physicians to cope with additional demands.

This statement further outlines recommendations that can be applied within the ED and throughout the health system to adapt to and mitigate the negative health impacts of climate change.

2. Background

Climate change presents the greatest risk to global population health.¹ The planet is already on a trajectory to unprecedented global warming and immediate action is needed to mitigate irreversible change to the environment and the deleterious effects on population health.²

Since the turn of the century, weather-related disasters such as heatwaves, droughts, floods, storms and bushfires have increased in intensity and frequency causing increased injury, morbidity and mortality.³ Ongoing climatic changes resulting in rises in global temperatures and extremes of precipitation have both immediate and delayed health impacts.⁴ Australasian EDs are at the forefront of these impacts, which will only worsen in years to come.

Projections show that climate change will cause a significant rise in the number of overall ED presentations, an increase in the complexity of presentations as well as surges resulting from climate disasters.⁵ In addition, increased heat and aeroallergens have led to global increases in asthma and COPD attributed ED presentations.⁶ Climate change also impacts indirectly on human health, with a clear association between increased heat, mental illness and ED presentations.⁷ Given the challenges that many EDs face in terms of access block, overcrowding and ambulance ramping⁸, climate change presents a risk in the ability of EDs and hospital systems to cope.

Research has also shown that climate change will exacerbate existing health inequities as certain groups are more vulnerable to climate-related events.⁹ In particular, Aboriginal and Torres Strait Islander people, Māori, children, people with disability, older people and people of a lower socioeconomic status will be the least able to cope with the health impacts of climate change.¹⁰ Urban populations, particularly those of a lower socioeconomic status, are at risk of adverse health outcomes due to the 'heat island effect' which results in densely populated and urbanised areas being warmer than surrounding areas due to city design.¹¹ Rural, remote and isolated communities are also vulnerable to the impacts of climate change due to the social and economic impacts of drought and bushfires compounded by increased isolation and poorer infrastructure.¹²

In Australia, extreme heat conditions are linked with large increases in hospital ED presentations, admissions and deaths.¹³ As an example, the 2009 Victorian heatwave resulted in a 12% increase in overall ED presentations compared to the same time in the five years prior.¹⁴ However, the largest increase was seen in people aged over 75, where presentations increased by 37%.¹⁵ In terms of the acuity of all presentations, resuscitation presentations (ATS 1) increased by 64%, emergency presentations (ATS 2) increased by 26%, and presentations considered urgent (ATS 3) increased by 25%. The number of excess ED presentations due to heatwaves in Brisbane have been forecast to double by 2030 which will place increasing pressure on the health system and on the workforce if appropriate planning does not occur.¹⁶

Climate disasters such as cyclones, floods and bushfires also lead to significant surges in ED presentations. For example, Townsville Hospital reported a 40% increase in ED presentations as a result of cyclone Yasi compared to the two years prior.¹⁷ The closure of community health, primary care services and loss of power to homes also contributed to increased presentations.¹⁸ Given that climate disasters will only continue to increase in intensity and frequency, EDs will need to be staffed and equipped with resources including space and an appropriate surge response to cope.¹⁹

Health systems in Pacific Island nations are already under threat by climate change.²⁰ Therefore, Australia and New Zealand will need to prepare for an influx of climate-change refugees from Pacific Island nations who have been displaced by rising sea levels and climate disasters. ACEM is committed to advancing emergency care in the region and will provide support when and where it is needed.

Australia and New Zealand are two of 193 Member States that agreed to the Sustainable Development Goals (SDG) at the United Nations General Assembly in 2015 and signed the Paris Agreement in 2016.²¹ Achieving these goals and targets is essential to reducing further global warming to a safe level for the sustainability of our planet. Sustained action and commitment are needed to protect human health and the associated impact on EDs.

ACEM also believes that EDs and hospitals have a role in mitigating climate change. The hospital system is a significant source of greenhouse gas emissions and Australia's healthcare system has the second highest per capita emissions after the United States.²² Australia's health system accounts for 7% of all emissions, with public and private hospitals accounting for half of all these emissions.²³ The majority of healthcare emissions are considered to be Scope 3 emissions, that is, indirect emissions which occur in the supply chain and can be mitigated through procurement practices.²⁴ Hospitals should also seek to reduce their Scope 1 (direct emissions from the production of energy) and Scope 2 (indirect emissions from the purchasing of energy).²⁵

ACEM, along with other specialty medical colleges and stakeholders in the health profession, has the ability and responsibility to act. Hundreds of organisations – including health institutions from around the world with billions of dollars of assets – have made divestments from fossil fuel sources.²⁶ ACEM made a commitment to divest from fossil fuels in December 2018.

While mitigation is critical, adaptation is essential to minimise the harms that climate change already poses to human health.²⁷ For example, in Adelaide, heat warning systems have been shown to be an effective mechanism to reduce ED presentations and hospitalisations.²⁸ Adaptation strategies, at the national and jurisdictional levels are needed which recognise the impact of climate change on health and EDs and actions that should be undertaken to address these threats to the sustainability of the system and the emergency medicine workforce.²⁹ ACEM also recognises that emergency physicians have a role as resource stewards and advocates in their departments and healthcare organisations to reduce waste and emissions.

3. Recommendations

3.1 Government

- ACEM calls for leadership at a national and bi-national level by committing to achieving a zero-carbon economy by 2050ⁱ and investing in renewable energy sources to protect population health now and into the future.
- ACEM supports the implementation of a National Strategy on Climate, Health and Wellbeing.
- Further investment in robust research is needed to understand the additional number of ED presentations as a result of climate change and evaluate the economic cost and resource implications.
- All jurisdictions should be required to conduct climate change risk assessment and adaptation plans with a focus on risks to health infrastructure, population and community health, the health workforce, emergency and disaster preparedness, and safety and quality of care.
- The Australian and New Zealand Governments have a responsibility to be leaders in the Pacific region, to ensure health systems have the capacity to address the evolving risks climate change poses to communities in the Pacific.

3.2 Health systems

- Health systems should actively reduce their carbon footprint by reducing Scope 1, 2 and 3 emissions by reviewing their energy sources and consumption practices to reduce waste.
- Responses to climate change, and disaster preparedness should be incorporated into the National Health Performance Framework (Australia) and the National Health Targets (New Zealand).
- All hospitals and emergency services require disaster management plans which establish early warning systems and account for surges in service demand, destruction of infrastructure and equipment, and interruptions to supply chain.
- Local jurisdictions need to provide community education with respect to the health impacts of climate change. This would include a focus on vulnerable populations within those communities. Mechanisms should be in place to support such communities to be resilient and recover from climate-related events.

3.3 Emergency departments

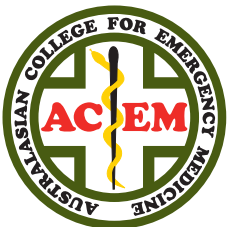
- ACEM is committed to the ongoing education of our Fellows and Trainees of the impacts of climate change on population health, EDs and our health systems.
- EDs and emergency physicians should advocate within their departments and healthcare organisations for improved purchasing and consumption practices to reduce waste. ACEM also supports the sharing of resources and ideas to promote change within individual EDs and hospital systems.

ⁱ An economy where net greenhouse gas emissions are zero by using renewable energy sources and/or by offsetting carbon emissions.

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