



Regional Climate Change Adaptation Strategy Guidance Note 1

Place-based adaptation concepts and approaches

Adaptation needs to be equitable and enable sustainability

Climate change is already negatively impacting on people and natural systems, increasing vulnerability, threatening ecological health, human health and livelihoods.

The decisions we make now about how to adapt to climate change will enable or constrain possible positive futures. The needs and objectives of adaptation can be challenging to identify and agree upon, because the impacts of climate change interact in complex and context-dependent ways with human and environmental systems.

Vulnerability to the impacts of climate change follows patterns of existing vulnerabilities and social disadvantage. Therefore, for adaptation to be equitable and sustainable it should aim to be transformative; to target the root drivers of existing social and

ecological injustices, not just the effects; and avoid creation of further inequities.

If it does not do this, adaptation risks reinforcing existing practices and institutions that currently drive inequalities and unsustainable outcomes.

Climate change adaptation policy and practice is about making complex, value-laden decisions with far-reaching, path-dependent consequences in the context of highly uncertain knowledge about future climate trends and impacts.¹

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Place-based adaptation

Climate change will affect different places in different ways. This is generally the argument for adaptation to be place-based with place specific strategies.

Yet while this concept is widely used, what we each mean by place-based adaptation is somewhat opaque. This perhaps leads people to think that they may all mean or be thinking of the same thing, when they might not. Broadly, the term 'place-based' implies a spatially distinctive 'ensemble' of human and biophysical conditions or coupled human-environment systems.²

Places are also spaces that have been given meaning by people associated with them (though not necessarily residents), and places and their constitutive elements are valued in various ways by various groups.³

What all of this means however, is that people think differently about places, different places mean different things to different people and groups, and different people value different things about places.

Consequently, for adaptation to be 'place-based', it must explore and engage with those different perspectives and values. It must also not just think about the people who are in 'a place' now, but also who might be there in future.

For adaptation to be 'place-based', it must explore and engage with those different perspectives and values



Uncertainty and the need for flexible and robust adaptation pathways

While sophisticated climate modelling can indicate likely future changes, there are substantial uncertainties around the magnitude, pace and impacts of change. These uncertainties are even more pronounced when downscaled to regions or localities.

Further, uncertainties are compounded by the flow-on effects around how climate stressors will interact with other systems and co-existing drivers of change (social, economic, political, technological). Because of these compounding uncertainties and complexities, adaptive planning needs approaches that work with, rather than try to contain, unknowns.

Because of the range of potential change and the interactions described above, we can no longer rely on business-as-usual planning models and their underlying assumptions. These were developed under conditions where the past was a more reliable predictor of current and future situations. These uncertainties mean we need different approaches that allow us to make decisions under conditions of uncertainty, to try new things, and to learn as we go.

Due to the range and dynamic nature of potential change any adaptation plan needs to be adaptive itself. This means it requires a process to respond to change in both context and focal area, but one that enables proactive change not reactive. Rather than a predict-and-act approach of business-as-usual planning, adaptation planning needs to consider how options perform against a range of multiple possible futures, and the extent to which an action leaves additional and further options open or closes those options down – greater flexibility is better.

This type of thinking, allows organisations to commit to short-term actions within a framework that allows for flexibility to switch from one action to another as situations change. Adaptation strategies can enable this by considering thresholds and timing of triggers for changing approaches and actions.

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Systems thinking – social-ecological interconnections

Systems thinking has become increasingly influential in climate change adaptation policy and practice. It offers a more holistic lens to consider complex and interconnected policy issues.

Thinking of regions as ‘socio-ecological systems’ emphasises that adaptation challenges emerge through the dynamic inter-relationships between environmental and social systems and that they should not be managed as separate entities.

Using systems concepts in adaptation planning can help reveal relationships between different issues or system components, their patterns, structures and underlying drivers.

Adaptation planning teams that want to develop capacity for systems thinking might use the Iceberg Model and Activity, which draws on decades of systems thinking and practice research. See the Wayfinder Guide’s iceberg activity https://wayfinder.earth/wp-content/uploads/2018/08/activity-sheet_work-card-3-1.pdf

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3. Adger, W.N., Barnett, J., Chapin III, F.S. and Ellemor, H., 2011. This must be the place: underrepresentation of identity and meaning in climate change decision-making. *Global Environmental Politics*, 11(2), pp.1-25.

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