

The Stresses of Climate Change on Social and Cultural Heritage in the State of Hawai'i: Integrated Water Management in Practice

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Conclusions

- Stronger community participation and the encouragement of local knowledge of water resources could reduce the distrust between community stakeholders and government decision making. Greater affiliation between water management strategy and leaders in the community could help to bridge these gaps.
- The State must prioritize data and research to develop resources for each County to develop their appropriate risk mitigation strategies. The State must provide adequate data resources to enable each County to address their regional variability in precipitation and types of communities to remain resilient against climate change.

Key Takeaways

- The culture and traditions of Hawai'i pre-Western contact are embedded in the lay understanding of water resources in the State today.
- The *ahupua'a*, or traditional land tenure system, promoted a shared value system in Hawaiian culture. While this is referenced in today's State planning framework, the State does not provide clear direction on how to develop a contemporary shared value system that is informed by traditional practices in a modern world.
- The City & County of Honolulu is the only jurisdiction using an IWRM approach, yet it is evident there is still a disconnect of accountability and regulation in practice.



References

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Background

- Climate change and human uses of water resources are threatening its global availability and quality. Water resources require a more sustainable management framework for long-term protection
- Alongside socioeconomic impacts, climate change will threaten the protection and conservation of non-renewable heritage and traditions for communities around the world.
- Water management must integrate social needs and cultural understanding to address existing inequalities and promote social inclusion.
- Integrated Water Resource Management (IWRM) is a holistic approach to water management which considers present day livelihoods alongside protection and consideration for future generations, social equity, environmental sustainability, and economic efficiency.
- As water resources have evolved in Hawai'i from a shared resource system to a divided allocation which meets the needs of a modern economy, the State's approach to protect traditions and customs related to water have been fragmented across the four island Counties.

Research Questions

- How does the geographical and cultural landscape of a community influence its relationship to water resources and shape its understanding and management of these resources?
- How has the existing water resource management approach in Hawai'i, USA considered the social and cultural connections to water?
- Based on a comprehensive understanding of water resources and the future impacts of climate change, what recommendations can be made for future integrated water resource management planning in Hawai'i, USA?

Methodology

Systematic review of existing global IWRM implementation, existing management framework in the State of Hawai'i, and semi-structured interviews were completed to understand the perception and effectiveness of existing water management systems in the State.