

4.4 Climate Change, Key Traditional Food Species and Community Health in the Arctic

Summary

Project Leader(s)

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Traditional food is well documented as a critical resource to northern populations for its nutritional, economic, social and cultural benefits. However, these important foods are also the main source of exposure for many environmental contaminants among northern Aboriginal people via their traditional diet based on land and sea species. Climate related changes in the North have been associated with alterations in animal, fish and plant populations and ice and snow conditions which influence their availability and northerners' access to them. Therefore, climate has the potential to influence nutrition and health status in relation to such things as the incidence of disease, contaminant affected health outcomes (e.g. child development) and general individual and community health related to aspects of diet and lifestyle. This project will investigate health impacts of climate change in 5 major regions in the Canadian Arctic (Yukon, NWT, Nunavut, Nunavik and Labrador) in relation to traditional food consumption. Specifically the project will focus on: 1) nutrition and potential changes in intake of nutrients; 2) exposure to contaminants; and 3) levels of food security (availability and access to traditional foods). The research seeks to investigate to what extent, and how climate change is affecting the traditional diet profile of northern Aboriginal residents presently and potentially into the future and what implications this may have for individuals' health? Modelling and qualitative approaches will be used, integrating both scientific and local/traditional knowledge. In combination with ArcticNet project 2.1 (resources), the results will be used to propose regional harvesting regimes that are informed by the health implications / needs of alterations in the local food security situations.

People

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Publications

Articles Published in Refereed Publications

Furgal, C.M. and Seguin, J., 2006, Climate Change, Health and Community Adaptive Capacity: Lessons from the Canadian North, *Environmental Health Perspectives*, doi:10.1289/ehp.8433 (available at <http://dx.doi.org/>) Online 11 July 2006, Published

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- Furgal, C. and Prowse, T. D., 2005, Assessing Climate Impacts and Adaptation in the Canadian North: A Northern View for the National Climate Assessment, 2005 ArcticNet Annual Conference Proceedings, 21-22, Published
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- Lafortune, V., Furgal, C., Drouin, J., Annanack, T., Etidloie, B., Einish, N., Tookalook, P., Qiisiq, M., Tremblay, M. and Kangiqsujuaq, Umiujaq, Kangiqsualujjuaq and Kawawachikamach Communities, 2005, Climate change in Northern Quebec and its impacts on accessibility to resources: The example of the traditional trails network, 2005 ArcticNet Annual Conference Proceedings, 66-67, Published
- Li, Y., Xu, H. and Chan, HM, 2005, Impact of Environmental Changes on Nutrient and Contaminant among Inuit, 2005 ArcticNet Annual Conference Proceedings, 75-76, Published
- Alain, J., Furgal, C., Tremblay, M., Annanack, T., Tookalook, P., 2007, Climate Change and Country Food Security in Nunavik: a Video Documentary of Inuit and Scientific Perspectives, 2007 ArcticNet Annual Conference Proceedings, 17, Published
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