## **Public Education for Environmental Change**

At the 2018 Environmental Studies Association of Canada (ESAC) annual meeting (May 28-30, Regina, SK), we convened an interdisciplinary panel to address the challenge of educating for environmental change, specifically, climate action. We defined public education broadly, as including both formal schooling systems, but also non-formal public communication activities. This document represents a summary of themes across presentations and small group discussion.

The following four panelists presented: Margot Hurlbert, University of Regina; Garrett Richards, University of Saskatchewan; Shannon Dyck, City of Saskatoon; Kathleen Aikens, University of Saskatchewan

### **Overarching Themes**

- We reaffirm the importance of interdisciplinary & transdisciplinary collaboration for addressing wicked problems, such as climate change. Aligned with this, we need to transform academic-public relationships and include collaboration from inception to dissemination.
- "Public" is misleading. It is more generative to define what/which publics to address.
- The art and science of climate change communication needs to be respected as its own discipline.
- We need to rethink how we evaluate and communicate "risk"- i.e., what forms of risks do we deem acceptable because they are familiar, and what forms are less acceptable because they are unknown, with examples:
  - -Coal-fire power plants vs wind turbines;
  - -Sedentary, car-oriented lifestyles vs. active transportation to school

### **Municipal Climate Communication & Action**

Municipalities can serve as hubs of climate action, particularly in cases of lackluster national and provincial performance.

- Public engagement should take stock of public values: not just information dissemination.
- Communication should be a multi-way street, involving municipalities, residents, and other public institutions, such as universities.
  - Eg. 1 Citizen presentations to municipal council are an important impetus for climate action.
    Eg. 2 Universities can serve public engagement by
  - Eg. 2 Universities can serve public engagement by creating opportunities for dialogue with public officials.
- Saskatoon residents valued investment in public transportation and renewable energy. Similar results emerged in the mock public engagement exercise conducted with ESAC conference participants (see photo at right).



Results from a 'mock' municipal climate action prioritization exercise

# **Strategic Climate Communication**

One of the breakout questions asked whether climate communicators should be "opportunistic" with messaging in the wake of extreme events like floods and forest fires. This led to a broader discussion about the variety of messages that should be considered, and the dimensions or "spectrums" they can be categorized under.

- The communicator spectrum A wide variety of actors (e.g. journalists, business owners, stakeholder groups, policy makers) can be messengers. Partnerships are important so that the message is not simply a climate scientist dictating what to do.
- The event spectrum There are numerous "focusing events" besides disasters that may provide an opportunity for climate messaging (e.g. elections, infrastructure investments, political debates). All such opportunities should be considered.
- The social-environmental-economic spectrum Climate messaging usually focuses on the environment, and occasionally on economic costs, but all three areas are critical. Social aspects, in particular, are often overlooked, but may be more immediate and persuasive to audiences. How does a large forest fire affect livelihoods? Use anecdotes.
- The issue spectrum Messaging for other issues can indirectly achieve the same goals as direct climate change messaging (e.g. supporting innovation, improving population health, return on investment). This is called the "oblique" approach.
- The temporal spectrum Focusing on present-day climate impacts can be more meaningful than the typical focus on long-term effects, but there is also an opportunity to make the longer-term impacts clearer by referring to past events (e.g. during a new forest fire, pointing out that social impacts of the last one are still occurring).

#### **Further Resources:**

- Intergovernment Panel on Climate Change: Assessment Reports http://www.ipcc.ch/publications and data/publications and data reports.shtml
- The Climate Change Communication Handbook, Volumes 1-3 (edited collection, published 2018, by Springer)
- K-12 Climate Change resources:
  - SEPN, Sustainability & Education Policy Network sepn.ca
  - -Environmental Education Research, Virtual Special Issue on Climate Change Research <a href="http://explore.tandfonline.com/content/ed/ceer-vsi-on-climate-change">http://explore.tandfonline.com/content/ed/ceer-vsi-on-climate-change</a>
  - -Green Learning, Climate Change Where I Live: <a href="http://ccwil.greenlearning.ca">http://ccwil.greenlearning.ca</a>
- Indigenous Climate Network: https://www.indigenousclimateaction.com
- Municipal Climate Action:
  - -Global Covenant of Mayors for Climate & Energy https://www.globalcovenantofmayors.org
  - -C40 Cities, network of megacities addressing climate change c40.org
  - -Urban Climate Change Research Network <a href="http://uccrn.org">http://uccrn.org</a>

For questions and access to any resources, please contact: kathleen.aikens@usask.ca

We acknowledge that these discussions took place on Treaty 4 territory land, the territories of the Nêhiyawak, Anihšināpēk, Dakota, Lakota, and Nakoda nations, and the homeland of the Métis.