Pedagogy for the Future: Equipping Students for Complex and Climate-Relevant Practice

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Introduction

- Key Question: What knowledge and skills do students need to navigate polarization, climate breakdown, and governance challenges?
- **Context:** Northern BC region/ communities, undergraduates

Image Sources: McCracken, Andru. 2019. Valemount Climate Protests. Rocky Mtn Goat. October. And Taylor, JJ. Residential Street with Haze. AdobeStock 437999833



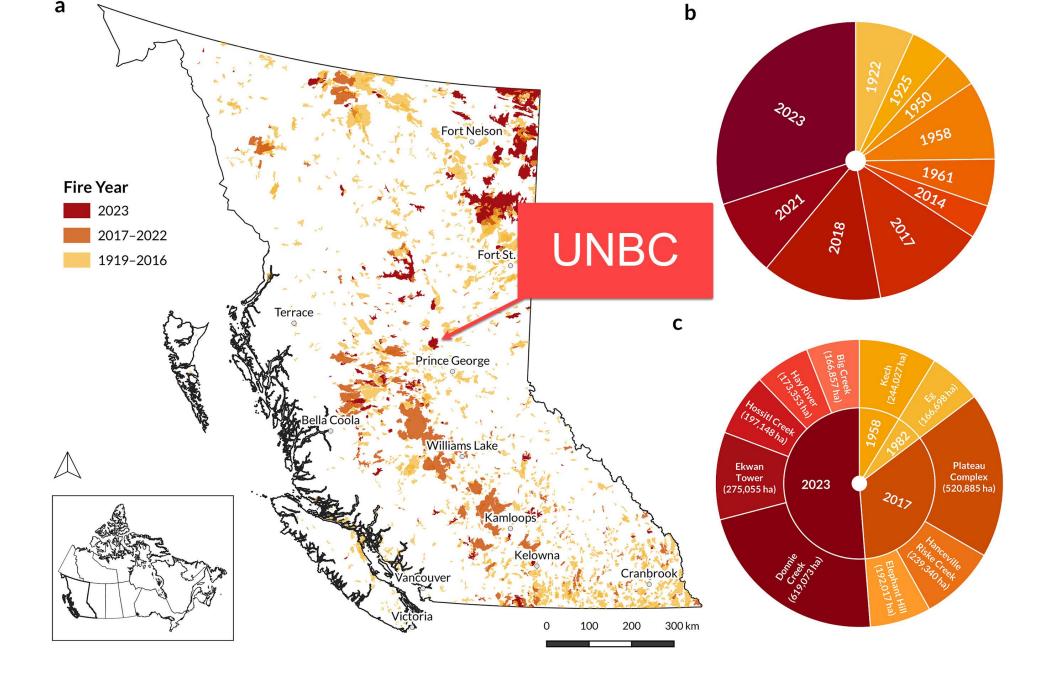


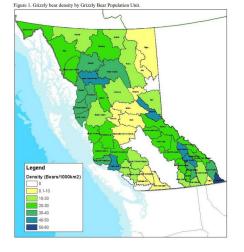
Image altered from: Daniels et al. 2025. The 2023 Wildfires in British Columbia. Canadian Journal of Forest Research, 55. Figure 1.

Theories Guiding Curriculum Transformation

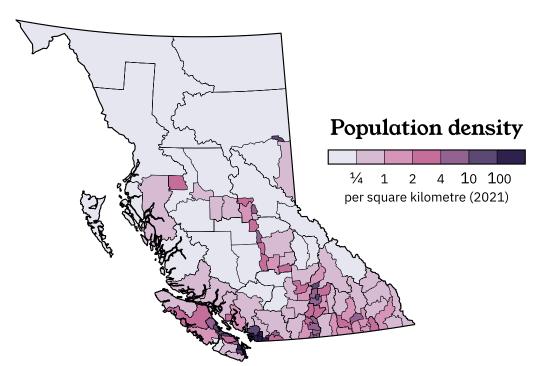
• Core Educational Theories Supporting the approach:

- Critical pedagogy
- Experiential learning
- Systems thinking
- How They Apply:
 - Preparing students for interdisciplinary problem-solving
 - Bridging theory and practice

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Learning Context in Northern British Columbia



- Regional Considerations:
 - Unique socio-political and environmental factors shaping education
 - Resource periphery, regional centre, Dakelh meeting place
- Student Preparedness:
 - Developing resilience and adaptability for climate action

Images: Population Density, from Awmcphee, CC BY-SA 4.0 < https://creativecommons.org/licenses/by-sa/4.0>, via Wikimedia Commons Grizzly Bear Population Density, from BC FLNRO 2012 Report on Grizzly Bear Populations. Barriers and Opportunities in Curriculum Planning

Challenges:

- Institutional constraints
- Gaps in interdisciplinary learning
- Adapting to evolving climate data

Opportunities:

- Community engagement
- Innovative learning models
- Expanding practical applications

Reinventing Planning Studio Curriculum

Key Elements:

- Project-based learning, students engaged with complexity
- Integration of governance systems/ community stakeholders
- Community collaborators as partners
- Student projects serve as inputs to real policy process

Impact on Student Learning:

- Practice in iterative design thinking, whether policy or physical
- Enhancing problem-solving skills
- Strengthening partnerships with communities

Climate Action Studio Overview

• Structure:

- Community partnership model
- Hands-on climate innovation projects
- Expected Learning Outcomes:
 - Practical solutions to climate challenges
 - Strengthened policy and governance literacy

Image credits: Funk,K.2021.Village of Valemount threatened by debris slide. CBC.CA Aug 2021. AND James, Sandra. 2021. McBridePOSTflood. Rocky Mountain Goat. July 2021.



Conclusion & Future Directions

- The evolving role of education in addressing climate crises
- Strategies for equipping students with forward-thinking skills
- Expanding community-driven climate studios