

# Planetary Health Report Card (Nursing):

University of Northern British Columbia



# 2024-2025 Contributing Team:

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Land acknowledgment: This report was written on the unceded traditional Ts'msyen (Tsimshian) territory of the Kitsumkalum and Kitselas First Nation. UNBC's main campus is situated on the unceded traditional territory of the Lheidli T'enneh First Nation, part of the Dakelh (Carrier) peoples' territory.

# **Summary of Findings**

Overall Grade B

# Curriculum

- The University of Northern British Columbia (UNBC) demonstrates a cursory engagement of planetary health into its curriculum through a range of courses and activities. However, there is distinct room for growth from the School of Nursing. The student-led seminar was a pivotal student initiative to integrate planetary health into the curriculum. However, it is key to note that this was a single-time event for this cohort, not integrated into the curriculum prior to student intervention, nor did it extend across all UNBC Campuses.
- The curriculum covers imperative planetary health subject matter, such as extreme weather
  impacts, infectious disease, and food security, yet there remains room for diversification and depth.
  As noted in this report, many courses rely on shared mandatory readings such as the Canadian
  Nurses Association Planetary Health Position Statement. These resources, while effective and
  overarching, do not demonstrate the pedagogical depth for a comprehensive planetary health
  education.
- Recommendation: To enhance the pedagogical depth, UNBC should prioritize diversifying course content, introducing region-specific studies, and providing experiential learning opportunities across all campuses. Integration of key content material from <a href="NURS 498: Health">NURS 498: Health</a>, Justice and the Environment, into core curricula would be pragmatic in achieving pedagogical depth and prevent a reduction of curriculum grade in subsequent report cards.

# **Interdisciplinary Research**

B-

- Known as "Canada's Green University" UNBC houses several research centres which address the aggregate of Planetary Health. Faculty within the nursing program have engaged in exploring environmental determinants of health, while broader institutional efforts contribute to global discussions on Indigenous environmental health and ecosystem approaches to health.
- The School of Nursing (SON) has not engaged as proactively in knowledge dissemination in the planetary health field. Research outputs tend to be few and concentrated among certain individuals, without widespread proliferation into the broader research culture.
- Recommendations: Leverage UNBC's extensive sustainability research capacity by facilitating stronger partnerships between the SON and other university research centres to elevate planetary health as a visible priority in nursing research.

# **Community Outreach and Advocacy**

**C**+

• Particularly at the central campus in Prince George, UNBC has demonstrably cultivated significant partnerships with a variety of community organizations, such as the Recycling and Environmental Action Planning Society (REAPS), the Prince George Energy Transition Group, and the Prince George Electric Vehicle Association (PG EVA), which collectively contribute to advancing planetary and environmental health objectives. These collaborations are commendable in that they facilitate substantive engagement in sustainability-oriented activities, including waste reduction initiatives, energy transition advocacy, and the promotion of ecological conservation practices. However, while these partnerships reflect a positive commitment to addressing planetary health

- concerns, they appear to be relatively compartmentalized and lack systematic integration across all campus sites and community stakeholders.
- While UNBC has effectively established individual relationships with select community organizations, there is a clear need for the development of a more robust, formalized approach to community advocacy and outreach.
- **Recommendations:** UNBC should invest in the development of a formal outreach strategy that ensures equitable access to planetary health initiatives across all campuses, with particular attention paid to underrepresented communities and regions. The SON should join in existing collaborative efforts to work with communities to address planetary health topics that are priorities within the region.

# **Support for Student-Led Initiatives**

В

- UNBC facilitates multiple avenues for student engagement in planetary health initiatives, supported by substantial funding mechanisms. Further, the institution hosts experiential learning through extracurricular activities for students to apply planetary health principles in praxis, bridging theory with pragmatic implementation. However, these opportunities are not evenly distributed across all campuses, posing a challenge to equitable access.
- **Recommendations:** Create a centralized repository for documentation and dissemination of student-led planetary health initiatives, serving as documentation and resource for future projects. Further, enhance equity in access to opportunities across campuses to ensure inclusive participation and collaboration.

# **Campus Sustainability**

B+

- UNBC's central campus demonstrates a strong institutional commitment to sustainability as evidenced by its bioenergy-powered campus, comprehensive composting and recycling initiatives, and various sustainability-driven programs that underscore its dedication to environmental stewardship; integrating ecological considerations into the university's infrastructure and operational frameworks.
- While the SON has engaged in sustainability initiatives across the campus, there is significant opportunity for growth in actively establishing and enforcing sustainability standards within its specific programs and practices.
- Recommendations: Strengthen sustainability policies by implementing mandatory
  guidelines for food procurement, event planning, and materials procurement practices.
  Additionally, increase investment in renewable energy sources and work toward full
  divestment from fossil fuels, aligning the university's financial practices with its
  environmental goals.

# **Statement of Purpose**

Planetary health is human health.

The Planetary Health Alliance describes planetary health as "a solutions-oriented, transdisciplinary field and social movement focused on analysing and addressing the impacts of human disruptions to Earth's natural systems on human health and all life on Earth." This definition is intentionally broad, intended to encompass the multitude of ways that the environment can affect health, including water scarcity, changing food systems, urbanisation, biodiversity shifts, natural disasters, climate change, changing land use and land cover, global pollution, and changing biogeochemical flows. The health of humanity is dependent on our environment, and our environment is changing rapidly and in disastrous ways. Although the World Health Organization has called climate change "the greatest threat to global health in the 21st century," many medical school's institutional priorities do not reflect the urgency of this danger to human health.

As future health professionals, we must be prepared to address the impacts of human-caused environmental changes on our patients' health. This preparation is in the hands of the institutions providing our medical training. It is imperative that we hold our institutions accountable for educating medical students about the health impacts of climate change and other anthropogenic environmental changes, generating research to better understand health impacts and solutions, supporting related student initiatives, embracing sustainable practices as much as possible, and engaging with surrounding communities that are most affected by environmental threats. Because climate change and environmental threats disproportionately affect vulnerable populations (for example, communities of colour, older adults sensitive to health threats, and individuals in low-resource settings), these issues are inherently ones of equity and justice.

With the purpose of increasing planetary health awareness and accountability among health professional schools, we have created a Planetary Health Report Card that students internationally can use to grade and compare their institutions on an annual basis. This student-driven initiative aims to compare health professional schools nationally and internationally on the basis of discrete metrics in five main category areas: 1) planetary health curriculum, 2) interdisciplinary research in health and environment, 3) university support for student planetary health initiatives, and 4) community outreach centred on environmental health impacts 5) nursing school campus sustainability.

# **Definitions & Other Considerations**

#### **Definitions:**

- Planetary Health: is described by the Planetary Health Alliance as "the health of human civilisation and the state of the natural systems on which it depends." For example, topics such as climate change, declining biodiversity, shortages of arable land and freshwater, and pollution would all fall under the realm of planetary health. Both planetary health and traditional 'environmental health' examine the relationship between human health and the external environment, including extreme temperatures, chemicals, vector-borne diseases, etc. Planetary health explicitly concerns itself with the potential health harms associated with human-caused perturbations of natural systems. Therefore, the human health focus of planetary health makes the field well-adapted for the context of nursing school education. Throughout this report card, we use the term planetary health to refer to this broad swath of topics, but resources do not need to explicitly include the term "planetary health" to satisfy the metric.
- Sustainable Healthcare: As defined by the Academy of Royal Colleges, sustainable healthcare involves ensuring the ability to provide good quality care for future generations by balancing the economic, environmental, and social constraints and demands within health care settings. A sustainable healthcare system maintains population health, reduces disease burden and minimises use of healthcare services.
- Education for Sustainable Healthcare (ESH): is defined as the process of equipping current and future health professionals with the knowledge, attitudes, skills and capacity to provide environmentally sustainable services through health professional education, thus working to decrease the enormous environmental impact of the healthcare industry. Planetary Health Education is an integral part of this education rather than an end in itself. This is because knowledge on Planetary Health is required to be able to fully understand the necessity of sustainable healthcare as well as being part of the broader knowledge needed to fully protect and promote health. In summary, ESH is covered by the three Priority Learning Outcomes of the Centre of Sustainable Healthcare below, and Planetary Health Education is embraced in the first learning objective and is a fundamental requirement to achieve learning outcomes 2 and 3:
  - 1. Describe how the environment and human health interact at different levels.
  - 2. Demonstrate the knowledge and skills needed to improve the environmental sustainability of health systems.
  - 3. Discuss how the duty of a doctor to protect and promote health is shaped by the dependence of human health on the local and global environment.
- Nursing School/Department vs. Institution: When "nursing school" is specified in the report card, this only refers to curriculum and resources offered by the School/department of nursing and does not include offerings from other parts of the university (e.g. undergraduate departments (USA), other related departments (e.g. Public Health, Population Health departments). In contrast, when "institution" is specified in the report card, we are referring to the university more broadly including all of its campuses. Any resource reasonably accessible

by nursing students, no matter where in the institution the resource comes from or if it is specifically targeted for medical students, can meet this metric.

- Environmental history: This is a series of questions students are taught to ask during medical encounters that elicits patients' exposures and environmental risk factors. Historically, this has included consideration of exposures like pesticides, asbestos, and lead, though in the modern era shaped by climate change, it can be expanded to include things like wildfire smoke exposure, air pollution and mould after flooding. Key components include place of residence over the lifecourse, occupational history, food and water sources (e.g. meat from industrial feeding operations, regular fishing in contaminated water, access to clean drinking water), and exposure to air pollution. Please be as specific as possible when providing evidence for this metric.
- **Elective:** The word "elective" refers to an optional course or lecture series that a nursing student can opt to take part in but is not a requirement in the core curriculum. Generally, these elective courses take place in the preclinical curriculum but vary by school.
- Core Curriculum: This refers to taught material that is delivered to the entire cohort of students in one year.
- Clerkship / Outreach: This is a term used in the USA to refer to placements that nursing students go on e.g. Pediatrics, General medicine, Psychiatry. In the UK these are referred to as rotations, outreach or placements. This is a relatively short (approximately 4-8 weeks) period of study and patient-centred clinical experience that takes place as part of the undergraduate programme.
- Clinical rotation: This is a term used to refer to placements that students go on (e.g., ophthalmology, surgery, cardiology).
- **Physiotherapy vs Physical Therapy:** For the purposes of this report card these terms are considered interchangeable. However, physiotherapy will be used primarily.
- Community organisations: For most institutions, there are existing groups that are not directly affiliated with the university and exist as a product of what the community the institution exists in cares about or needs. These specific community organisations relevant to this report include those that are focused around some aspect of climate and health preservation. These community organisations can include but are not limited to local mutual aid initiatives, underserved-resource distribution groups, clean-up and nature conservation groups, community gardeners, and other environmental-related organisations. If your institution does not have access to local volunteerships with community groups, please report any community organisations your institution or school has collaborated with.
- Climate justice: The idea that certain population groups and geographical locations which are disproportionately more impacted by climate change are already economically and socially disadvantaged. This double vulnerability sits alongside pre-existing social justice concerns and should therefore shift policy and practice to mitigate the inequitable effects of the climate crisis.
- Extractivisim: The removal of natural resources typically in large quantities.

Within anthropology this term is often used in the context of colonialism to refer to the historic seizing of natural resources, a practice which has developed business models tied to ecological degradation and loss of biodiversity.

- Global South: Nations that often have less economic and industrial development and are typically in the southern hemisphere. These nations have been found to be disproportionately impacted by the climate crisis.
- Low socioeconomic status (SES): An individual or geographical area that across a variety of socioeconomic factors (e.g., income, education, race/ethnicity) is considered vulnerable. This vulnerability has been correlated to more adverse health outcomes often as a consequence of encountering more barriers in accessing and receiving healthcare.
- Low and Middle-Income Countries (LMIC): Countries that have lower degrees of economic affluence.
- **Anthropogenic:** Created through human activity
- Marginalized communities: Groups excluded from mainstream economic, educational, social, and/or cultural experiences due to race, gender identity, sexual orientation, age, physical ability, language, and/or immigration status (Sevelius et al., 2020).

#### Other considerations:

• If there are more than one "tracks" at your institution with two different curricula (for example, Harvard Medical School has a Pathways and HST curriculum track), you can choose to fill out a report card for each track, or fill out just one report card and average the scores received by each track in cases where the scores are different (see the 2021 Harvard or Oxford report cards as examples). Where possible please indicate the proportion of students that are on each track.

Completed in 2022 a <u>Literature Review by Metric</u> is available for the 2022 medicine report card metrics. We are in the process of updating this review and making it more applicable to all the disciplines. However the review serves as a rough collection of references for further learning and a resource for those advocating for increased planetary health engagement at their institutions.

# **Planetary Health Curriculum**

Section Overview: This section evaluates the integration of relevant planetary health topics into the nursing school curriculum. The curriculum for nursing programs around the world shares many core topics regarding health and the medical system. In order to create a truly holistic education that includes the implications of our changing climate, the subject must be integrated into the nursing curriculum. As future frontline workers, nurses will experience the dire consequences of climate change firsthand and must be equipped to not only care for afflicted patients but to encourage preventative change. We are already seeing the impacts on human health that climate change can bring, and the nursing curriculum must reflect these realities.

Questions with a "\*" next to them signify questions that are unique to the Nursing Planetary Health Report Card.

1.1. Does your nursing school offer courses regarding the relationships between extreme weather events, health effects, and climate change?		
This topic was explored <b>in depth</b> by the <b>core</b> curriculum. (3 points)		
This topic was <b>briefly</b> covered in the <b>core</b> curriculum. (2 points)		
This topic was covered in <b>elective</b> coursework. (1 point)		
This topic was <b>not</b> covered. (0 points)		
Score Assigned:	2	

## Score explanation:

NURS 329: Objective Structured Clinical Examination - Module 1 - provides a concurrent asynchronous "Environmentally Responsible Nursing Practice Module" integrated into the coursework. This module explores the principles of environmental health sciences, the pathophysiology of environment-related health conditions, and sustainable healthcare practices. Through this module, students engage with interdisciplinary content aimed at fostering a comprehensive understanding of the environmental determinants of health and their implications for nursing practice.

NURS 329: Objective Structured Clinical Examination - Reading - The Canadian Nurses Association & Canadian Association of Nurses for the Environment (CNA-CANE) Planetary Health Position Statement delineates the health outcomes associated with climate change, air pollution, and social inequities. It examines the role of nurses in addressing these challenges through policy alteration and advocacy, highlighting the intersection between environmental health risks and social determinants of health. The position statement provides a framework for nursing professionals to engage in climate action, focusing on their contributions to public health initiatives and the advancement of health equity in the face of environmental change.

NURS 418: Introduction to Community Health and Nursing - Week 7 - Global Health. Curriculum integrate scholarly perspectives on the environmental, social, and policy dimensions of health, drawing from key position statements and resources from authoritative nursing organizations. Incorporated readings hyperlinked: <u>Canadian Nurses Association</u>; <u>Canadian Federation of Nurses Unions</u> (CFNU); and the <u>International Council of Nurses</u> (ICN).

# 1.2. Does your nursing program provide education regarding the impacts of extreme weather events (e.g. storm, flooding, heat, drought, air pollution) on individual health? This topic was explored in depth by the core curriculum. (3 points) This topic was briefly covered in the core curriculum. (2 points) This topic was covered in elective coursework. (1 point) This topic was not covered. (0 points)

3

Score explanation:

Score Assigned:

NURS 418: Introduction to Community Health and Nursing - Week 7 - Planetary Health Seminar. This student-led seminar examined the impact of extreme weather events on individual health. In course, it examined the deterioration of health identifiers in face of storms, health and air pollution. A key component of the session was a Heat Stroke Case Study, in which participants triaged and rapidly intervened in the care of an elderly patient experiencing heat stroke. The case study addressed the importance of prompt intervention and the particular vulnerability of older adults during extreme temperature events.

NURS 329: Objective Structured Clinical Examination - Reading - The CNA-CANE <u>Planetary Health Position Statement</u> delineates the health outcomes associated with extreme weather events such as droughts, floods, fires, & coastal erosions on on individual health outcomes and broader health systems. It highlights the physical and psychological repercussions of these events, with particular emphasis on the exacerbation of solastalgia.

NURS 498/680 (elective course): Health, Justice and the Environment - includes a module about climate change and health impacts, including those due to extreme weather secondary to climatic changes. A separate module addresses effects of pollutants on human health, including vulnerable populations, and a selected set of environmental pollutants.

1.3. Does your nursing curriculum address the impacts of climate change on the changing patterns of infectious diseases?

This topic was explored **in depth** by the **core** curriculum. (3 points)

This topic was **briefly** covered in the **core** curriculum. (2 points)

This topic was covered in **elective** coursework. (1 point)

This topic was **not** covered. (0 points)

Score Assigned:	3
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Score explanation:

**NURS 418:** Introduction to Community Health and Nursing - Week 7 - Global Health. This lecture examines the increasing burden of both emerging and reemerging infectious and chronic diseases driven by rapid urbanization and climate change. It explores how these global shifts contribute to the spread of pathogens, the intensification of chronic conditions, and the overall strain on healthcare systems.

**NURS 418:** Introduction to Community Health and Nursing - Week 7 - Planetary Health Seminar. This student-led seminar discussed the relationship between storm, floods, and tropical weather events in displacement of the population, and contamination of water sources in adulterating the communication of infectious diseases. Emphasis was placed on the mechanisms by which waterborne pathogens proliferate in the aftermath of weather events, exacerbating public health risks, particularly in displaced and vulnerable populations as well as the determinant of Place on health outcomes.

NURS 329: Objective Structured Clinical Examination - Reading - The CNA-CANE <u>Planetary</u> <u>Health Position Statement</u> examines the impact of climate change on the patterns of infectious disease remission and resurgence within the global population. It highlights how extreme weather events influence the incidence of reemerging infectious diseases, with particular emphasis on their disproportionate effects on marginalized and disenfranchised populations.

NURS 498/680 (elective course): Health, Justice and the Environment includes a module about climate change and health, including vector-borne diseases, food-borne diseases and water-borne diseases as a result of climatic changes.

1.4. Does your nursing curriculum address pathophysiological health effects resulting from environmental degradation and climate change, including effects such as air, soil and water pollution, extreme heat, human-animal interactions, and emerging pathogens?

This topic was explored **in depth** by the **core** curriculum. (3 points)

This topic was **briefly** covered in the **core** curriculum. (2 points)

This topic was covered in **elective** coursework. (1 point)

This topic was **not** covered. (0 points)

Score Assigned: 2

Score explanation:

NURS 306: Introduction to Epidemiology - Week 13 - Environmental Epidemiology. This lecture briefly explores the interrelation between various environmental exposures such as air pollution and resultant incidence of pathological events. This lecture and in class presentation and subsequent round table discussion of Carter's (2006) TED Talk critically explores the role of environmental degradation in shaping health outcomes, particularly within vulnerable and marginalized populations.

NURS 418: Introduction to Community Health and Nursing - Week 7 - Planetary Health Seminar. This student-led seminar delineated the role of air pollution as part of the triple threat towards human health and the exacerbation of infant-juvenile respiratory events, particularly in high-density urban environments.

NURS 498/680 (elective course): Health, Justice and the Environment includes a module outlining human pathophysiological changes due to various environmental pollutants, including SO2, NO2 PM2.5, VOCs, Ozone, endocrine disruptors, and PFAS, among others.

1.5. Does your nursing curriculum address mental health issues and well-being effects resulting from environmental degradation and climate change?		
This topic was explored in depth by the core curriculum. (3 points)		
This topic was <b>briefly</b> covered in the <b>core</b> curriculum. (2 points)		
This topic was covered in <b>elective</b> coursework. (1 point)		
This topic was <b>not</b> covered. (0 points)		
Score Assigned:	2	

#### Score explanation:

NURS 418: Introduction to Community Health and Nursing - Week 7 - Global Health. Required reading of CNA-CANE Planetary Health Position Statement which discusses into the impact of "Extreme heat, droughts, wildfires, floods, melting permafrost, coastal erosion and loss of sea ice [on] Canadians' physical and mental health[;]"emphasizing the intersection of climate events and their contribution to increased morbidity, particularly in vulnerable populations, while outlining the mental health challenges associated with climate-related stressors.

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NURS 498/680 (elective course): Health, Justice and the Environment includes a module devoted to Climate Change and Health, and Mental Health, which includes a discussion of eco-anxiety and explores the unique impacts on youth.

1.6. Does your nursing curriculum address relationships between climate change, food and water security, and the impact on health?		
This topic was explored <b>in depth</b> by the <b>core</b> curriculum. (3 points)		
This topic was <b>briefly</b> covered in the <b>core</b> curriculum. (2 points)		
This topic was covered in <b>elective</b> coursework. (1 point)		
This topic was <b>not</b> covered. (0 points)		
Score Assigned: 3		
Score explanation:		

**NURS 418**: Introduction to Community Health and Nursing - Week 9 - Poverty, Homelessness, and Food Security. Required reading of Dietitians of Canada's literature delineating the role of health care professionals in supporting food-insecure clients alongside the importance of sustainable food systems on the impact of health and the mitigation of harm to the environmental systems on which they depend. The text examines the interconnection between food access, patient well-being, and the ecological systems on which health depends, providing a framework to address food insecurity within the context of environmental sustainability (1)(2)(3).

NURS 329: Objective Structured Clinical Examination - Reading - The CNA-CANE Planetary Health Position Statement delineates the role of global weather systems in influencing the safety of international food and water security for all Earth's organisms. It highlights how disruptions in ecological systems, driven by climate change and extreme weather events, elevate the risk of health deterioration for both human populations and the ecological systems which allow us to persist.

NURS 498/680 (elective course): Health, Justice and the Environment includes a module on Biodiversity and Ecosystem Health. Within that module, food systems are explored, particularly in the ways that our food systems contribute to climate change and environmental degradation; and the ways that the health of the planet and humans living on it are impacted by our current food system.

# 1.7. Does your nursing program address the environmental and health co-benefits of a plant-based diet?

This topic was explored **in depth** by the **core** curriculum. (3 points)

This topic was **briefly** covered in the **core** curriculum. (2 points)

This topic was covered in **elective** coursework. (1 point)

This topic was **not** covered. (0 points)

Score Assigned:

2

# Score explanation:

NURS 418: Introduction to Community Health and Nursing - Week 9 - Poverty, Homelessness, and Food Security. Required reading of <u>Dietitians of Canada's literature</u> examining the role of plant-based diets in ensuring positive environmental outcomes. It further investigates the impact of these diets on enhancing cardiovascular health metrics with a focus on evidence-based strategies to mitigate risk of malnutrition and/or overexposure to highly & ultra processed foods.

NURS 498/680 (elective course): Health, Justice and the Environment includes a module on Biodiversity and Ecosystem Health. Within that module, the Planetary Health Diet is introduced and findings from the EAT-Lancet Commission are required course materials. The benefits of sustainable agriculture are also included.

1.8. Does your nursing school curriculum address relationships between ecosystem health, human health, and climate change?

This topic was explored <b>in depth</b> by the <b>core</b> curriculum. (3 points)		
This topic was <b>briefly</b> covered in the <b>core</b> curriculum. (2 points)		
This topic was covered in <b>elective</b> coursework. (1 point)		
This topic was <b>not</b> covered. (0 points)		
3		

## Score explanation:

NURS 329: Objective Structured Clinical Examination - Reading - The CNA-CANE Planetary Health Position Statement delineates the implication of climate change in relation of biodiversity loss and ecosystem functioning on the outcome of human health, through facets such as availability of freshwater, food, and fuel sources. Further, examining the relationship of biodiversity in pathogenicity of microflora.

NURS 418: Introduction to Community Health and Nursing - Week 7 - Global Health. Planetary Health Student-led Seminar discusses the role of biodiversity in genetic disease-resistance profiles and the biodominative function of benign microflora. Overall demonstrating the significance of maintaining ecological balance for safeguarding Planetary Health and mitigating the risks of infectious and chronic diseases.

<u>NURS 498/680 (elective course)</u>: <u>Health, Justice and the Environment</u> -The majority of the content in this elective course addresses the relationships between ecosystem health, human health, and climate change.

# 1.9. Does your nursing curriculum address the reproductive health effects of industry-related environmental toxins (e.g. air pollution, pesticides)? This topic was explored in depth by the core curriculum. (3 points) This topic was briefly covered in the core curriculum. (2 points) This topic was covered in elective coursework. (1 point) This topic was not covered. (0 points) Score Assigned: 3

#### Score explanation:

NURS 329: Objective Structured Clinical Examination - Self-Paced Module 1. This module examines the human reproductive health effects resultant of mercury, various cleaning products, di(2-ethylhexyl)phthalate (DEHP) products in polyvinyl chloride (PVC) products, and pesticide exposure; analyzing how these substances can disrupt endocrine function and contribute to adverse reproductive outcomes including fertility issues, development disorders, and hormonal imbalances particularly in marginalized communities.

NURS 418: Introduction to Community Health and Nursing - Week 7 - Global Health. Planetary Health Student-led Seminar. This student-led seminar discussed the teratogenic role of persistent organic pollutants (POPs)- industry-related environmental toxins in harming maternal-fetal growth resulting in cancers, infertility, congenital abnormalities, and developmental disabilities.

**NURS 498/680** (elective course): Health, Justice and the Environment includes a module covering a variety of industry-related pollutants and their impacts on vulnerable populations. In particular, the reproductive effects of PFAS and endocrine disruptors are explored. As well, a required reading describes perinatal health effects of hydraulic fracturing ("fracking") within Northeastern British Columbia.

# 1.10. Does your nursing program emphasize the importance of Indigenous and Traditional Knowledge Systems as essential components of planetary health solutions?

This topic was explored **in depth** by the **core** curriculum. (3 points)

This topic was **briefly** covered in the **core** curriculum. (2 points)

This topic was covered in **elective** coursework. (1 point)

This topic was **not** covered. (0 points)

Score Assigned:

3

# Score explanation:

NURS 418: Introduction to Community Health and Nursing - Week 7 - Global Health. Required reading of the CNA-CANE <u>Planetary Health Position Statement</u> emphasizes the centrality of Indigenous epistemology and ontology in life conducive to the fruition of Planetary Health. Further discussing the role Indigenous Peoples serve in stewarding the land internationally in the face of unprecedented environmental traumas.

- Week 7 Planetary Health Student-led Seminar, informs that Planetary Health is
   Indigenous, with most, if not all, theoretical systems in the ideology formed as a result of
   the culmination of Indigenous Knowledges.
- Week 7 Chapter 22 Indigenous Health, discusses the pertinence of Indigenous ideology in recognition and preservation of Land.

NURS 304: Introduction to Nursing Knowledge - Week 7 - Indigenous & Gendered Knowing. Lecture and subsequent roundtable of Wiggins' (2019) <u>TED Talk</u> argues for the recognition of Indigenous Science, noting that its foundation in observation, experimentation, and analysis is paramount in safeguarding the Planet's Health. Indigenous Science is integral to sustainable management practices, social architecture, and governance responsibilities, offering essential frameworks for environmental stewardship and resilience.

NURS 498/680 (elective course): Health, Justice and the Environment integrates Indigenous worldviews into the overall framework of the course. Writings by Indigenous scholars are emphasized throughout the course, and a sub-module within the Biodiversity and Ecosystem Health module covers "Indigenous-led conservation as planetary health intervention"

# 1.11. Does your nursing curriculum address important human-caused environmental threats that are relevant to the university or program's surrounding community? This topic was explored in depth by the core curriculum. (3 points) This topic was briefly covered in the core curriculum. (2 points) This topic was covered in elective coursework. (1 point) This topic was not covered. (0 points) Score Assigned: 3 Score explanation: NURS 418: Introduction to Community Health and Nursing - Class 11 - Community. Primary class presentation regarding results of windshield surveys of residing community examining physical, chemical, biological, social, and psychosocial factors of the environment and impact on surrounding community.

NURS 329: Objective Structured Clinical Examination - Self-Paced Module 1. This module examines local environmental threats to the community such as the biomagnification of mercury in the ecosystem from local emissions caused from coal-fire combustion, elemental mining, and waste incineration. This module delineated the teratogenic effects of methylmercury on fetal & pediatric neurodevelopment alongside vertical transmission through breastfeeding after consumption of bioaccumulated organisms or contaminated fluids.

NURS 498/680 (elective course): Health, Justice and the Environment includes case studies exploring human-caused environmental and health threats in the region, such as hydraulic fracturing in Northeastern BC, oil extraction in the Canadian tar sands, and effects of mining operations.

# 1.12. Does your nursing curriculum address socioeconomic/racial disparities in extreme weather and climate change exposure? This topic was explored in depth by the core curriculum. (3 points) This topic was briefly covered in the core curriculum. (2 points) This topic was covered in elective coursework. (1 point) This topic was not covered. (0 points) Score Assigned:

#### Score explanation:

**NURS 418**: Introduction to Community Health and Nursing - Class 9A - Poverty, Homelessness, and Food Security. This lecture examines the relation between socioeconomic status and exposure to environmental assailants such as hot weather and poor air quality on clients contending with respiratory degradation.

NURS 329: Objective Structured Clinical Examination - Reading - The CNA-CANE Planetary Health Position Statement outlines the disproportionate impact of extreme weather events and climate change ramifications on marginalized populations, with particular emphasis on racialized and equity-denied communities. This document accentuates how systemic vulnerabilities amplify the adverse health outcomes faced by these groups in the context of environmental disruptions, indicating the need for targeted interventions and equitable policy responses.

NURS 306: Introduction to Epidemiology - Week 13 - Environmental Epidemiology. This lecture explores the interrelation between various environmental exposures such as air pollution and resultant incidence of pathological events. This lecture and in class presentation and subsequent round table discussion of Carter's (2006) TED Talk critically analyzes the disproportionate impact of redlining and environmental racism on marginalized African-American communications.

1.13. Does your	nursing curriculu	m address inec	quitable health	impacts of c	limate change
globally?					

This topic was explored **in depth** by the **core** curriculum. (3 points)

This topic was **briefly** covered in the **core** curriculum. (2 points)

This topic was covered in **elective** coursework. (1 point)

This topic was **not** covered. (0 points)

Score Assigned:

3

#### Score explanation:

**NURS 418**: Introduction to Community Health and Nursing - Week 7 - Global Health. This lecture and associated pre-reading examines the impact of globalization and the resulting inequities arising from varying rates of development among countries, often rooted in historical colonial practices. It addresses how less developed countries face disproportionate health impacts from industrialization and environmental degradation.

NURS 306: Introduction to Epidemiology - Week 13 - Environmental Epidemiology. This lecture and in class presentation and subsequent round table discussion of Carter's (2006) TED Talk provides an environmental justice framework which highlights the inequities faced by marginalized communities due the lasting effects of climate change and local pollutant systems, with discussion of the salutogenic nature of green spaces.

NURS 329: Objective Structured Clinical Examination - Reading - The CNA-CANE Planetary Health Position Statement delineates the inequitable impact of climate change globally, particularly as those who have contributed least to climate change, suffer the greatest. The document attributes this disparity to historical and systemic power imbalances and patterns of oppression, which have driven the rapid commodification of land and resources. This exploitation has led to widespread ecological degradation and unsustainable resource consumption, exacerbating vulnerability among marginalized populations worldwide.

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NURS 498/680 (elective course): Health, Justice and the Environment includes a module on Environmental Justice, Racism, and Policy, including environmental and climate justice, the global and Canadian environmental justice movements, Indigenous environmental justice, environmental racism, and the nurse's role in environmental justice.

1.14. Does your nursing curriculum address climate and environmental health challenges that impact marginalized populations and communities?		
This topic was explored in depth by the core curriculum. (3 points)		
This topic was <b>briefly</b> covered in the <b>core</b> curriculum. (2 points)		
This topic was covered in <b>elective</b> coursework. (1 point)		
This topic was <b>not</b> covered. (0 points)		
Score Assigned:	3	
Score explanation:		

NURS 306: Introduction to Epidemiology - Week 13 - Environmental Epidemiology. This lecture and in class presentation and subsequent round table discussion of Carter's (2006) <u>TED Talk</u> provides an environmental justice framework which highlights the inequities faced by the African-American population and communities. Further delineating the role of ecological-environmental redlining and the effects on marginalized & racialized groups.

**NURS 418**: Introduction to Community Health and Nursing - Week 9A - Poverty, Homelessness, and Food Security. This lecture and associated pre-reading addresses the disproportionate risk of food insecurity faced by Indigenous Peoples particularly those residing in Northern Regions which are attributed to colonial erasure of traditional practices and knowledges concomitant with the effects of climate change and altering terrains on wild game availability.

NURS 498/680 (elective course): Health, Justice and the Environment includes a module on Environmental Justice, Racism, and Policy, including environmental and climate justice, the global and Canadian environmental justice movements, Indigenous environmental justice, environmental racism, and the nurse's role in environmental justice.

1.15. Does your nursing curriculum address the impact of environmental degradation due to climate change on marginalized populations and communities?		
This topic was explored <b>in depth</b> by the <b>core</b> curriculum. (3 points)		
This topic was <b>briefly</b> covered in the <b>core</b> curriculum. (2 points)		
This topic was covered in <b>elective</b> coursework. (1 point)		
This topic was <b>not</b> covered. (0 points)		
Score Assigned:	3	

## Score explanation:

NURS 329: Objective Structured Clinical Examination - See metric 1.9 for evidence.

**NURS 418:** Introduction to Community Health and Nursing - Week 7 - Global Health. Required reading of <u>CNA-CANE Planetary Health Position Statement</u> examines the disproportionate impact of anthropogenic impact of pollution on marginalized communities including, children, older adults, women, Indigenous population, and the unhoused. with pollutants being the largest environmental risk factor for premature death and disease.

• Week 7 - Planetary Health Student-led Seminar, discusses the disproportionate impact of POPs on child-bearing people, those who live off the land, and the determinant of Place

NURS 498/680 (elective course): Health, Justice and the Environment includes a module on Environmental Justice, Racism, and Policy, including environmental and climate justice, the global and Canadian environmental justice movements, Indigenous environmental justice, environmental racism, and the nurse's role in environmental justice.

# 1.16. Does your nursing curriculum address the outsized impacts of anthropogenic environmental toxins on marginalized populations and communities?

This topic was explored in depth by the core curriculum. (3 points)

This topic was **briefly** covered in the **core** curriculum. (2 points)

This topic was covered in **elective** coursework. (1 point)

This topic was **not** covered. (0 points)

Score Assigned:

Score explanation:

2

NURS 418: Introduction to Community Health and Nursing - Week 2 & 3 - History, Policies, Roles, Practices & Public Health Nursing, Home Health Nursing, Advocacy, Ethical, and Legal Considerations. Required pre-readings for these classes examine the role of the public health nurse during crisis events such as flood evacuations, food security during transit disruption, and resettlement of refugees in context of extreme weather events.

 Week 7 - Planetary Health Student-led Seminar, discusses the increased incidence and communicability of disease in face of extreme weather events due to disrupted sanitation structure, supply lines, and housing.

NURS 498/680 (elective course): Health, Justice and the Environment includes a module on Environmental Justice, Racism, and Policy, including environmental and climate justice, the global and Canadian environmental justice movements, Indigenous environmental justice, environmental racism, and the nurse's role in environmental justice.

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# 1.17. Does your nursing curriculum address the impacts of extreme weather events on healthcare systems?

This topic was explored in depth by the core curriculum. (3 points)

This topic was **briefly** covered in the **core** curriculum. (2 points)

This topic was covered in **elective** coursework. (1 point)

This topic was **not** covered. (0 points)

Score Assigned:

2

#### Score explanation:

NURS 418: Introduction to Community Health and Nursing - Week 2 & 3 - History, Policies, Roles, Practices & Public Health Nursing, Home Health Nursing, Advocacy, Ethical, and Legal Considerations. Required pre-readings for these classes examine the role of the public health nurse during crisis events such as flood evacuations, food security during transit disruption, and resettlement of refugees in context of extreme weather events.

• Week 7 - Planetary Health Student-led Seminar, discusses the increased incidence and communicability of disease in face of extreme weather events due to disrupted sanitation structure, supply lines, and housing.

# 1.18. Does your nursing program address the carbon footprint of healthcare systems?

This topic was explored **in depth** by the **core** curriculum. (3 points)

This topic was **briefly** covered in the **core** curriculum. (2 points)

This topic was covered in **elective** coursework. (1 point)

This topic was **not** covered. (0 points)

Score Assigned:

3

## Score explanation:

NURS 329 - Objective Structured Clinical Examination - Self-Paced Module 1 examines the carbon footprint of the healthcare system regarding the production of GHGs, toxic substances, large scale consumption of energy, single use substances and waste processes such as biomedical and infectious waste. This module further educates and addresses the role of Green Teams, recycling and facility optimization, and national organizations such as the Canadian Association of Nurses for the Environment (CANE).

**NURS 418:** Introduction to Community Health and Nursing - Week 7 - Global Health. Planetary Health Student-led Seminar examines the carbon footprint of the Canadian Healthcare Systems from an international context with further discussion of methods to address key determinants through temperature regulation, energy consumption, and waste reduction.

• Week 7 - Reading of CFNU-CANE <u>Nursing Toolkit for Planetary Health</u>, discusses the overall carbon footprint of health services and strategies for mitigation.

NURS 418: Introduction to Community Health and Nursing - Week 7 - Global Health. Required Reading of CFNU-CANE Nursing Toolkit for Planetary Health which highlights the waste generation in the provision of healthcare services. Moreover, it provides nurses and nursing students with the resources to engage in positive sustainability changes in the workplace including facilitation of Green Teams. These teams play a key role in promoting environmentally conscious practices, such as waste reduction, recycling programs, and energy-efficient solutions in healthcare settings.

NURS 498/680 (elective course): Health, Justice and the Environment includes a module on healthcare sustainability, including an online training from Cascades Canada on Sustainable Healthcare Systems. Other readings include content on anaesthetic gases and climate change, the use of propellants in inhaled medications and their impact on climate change, and an article by Lenzen et al, "The environmental footprint of healthcare: a global assessment".

# 1.19\*. Does your nursing program curriculum or coursework highlight the waste generated by healthcare provision?

This topic was explored **in depth** by the **core** curriculum. (3 points)

This topic was **briefly** covered in the **core** curriculum. (2 points)

This topic was covered in **elective** coursework. (1 point)

This topic was **not** covered. (0 points)

Score Assigned:

3

#### *Score explanation:*

NURS 329 - Objective Structured Clinical Examination - Self-Paced Module 1 discusses the large scale waste generation in health provision, highlighting Canada's position of energy inefficiency on an international scale. This module examines the production of pollutants such as dioxins and furans, the use of incineration practices, and other key waste indicators as outlined in Metric 1.17.

**NURS 418:** Introduction to Community Health and Nursing - Week 7 - Global Health. Required Reading of CFNU-CANE Nursing Toolkit for Planetary Health which highlights the waste generation in the provision of healthcare services. Moreover, it provides nurses and nursing students with the resources to engage in positive sustainability changes in the workplace including facilitation of Green Teams. These teams play a key role in promoting environmentally conscious practices, such as waste reduction, recycling programs, and energy-efficient solutions in healthcare settings.

NURS 498/680 (elective course): Health, Justice and the Environment includes a module on healthcare sustainability, including an online training from Cascades Canada on Sustainable Healthcare Systems. Other readings include an article by Lenzen et al, "The environmental footprint of healthcare: a global assessment" and module content on hospital food waste, energy use, and examples of nurses who are actively working to reduce waste in healthcare.

environmental degradation and climate change resistance, etc.)?	e (e.g., anesthetic gases, inhalers, antibiotic	
This topic was explored <b>in depth</b> by the <b>core</b> curriculum. (3 points)		
This topic was <b>briefly</b> covered in the <b>core</b> curriculum. (2 points)		
This topic was covered in <b>elective</b> coursework. (1	point)	
This topic was <b>not</b> covered. (0 points)		
Score Assigned:	3	
environmental impact imposed by compressed gaprimarily the role of insufficient inhaler disposal substances. Further highlighting the need for impromote sustainable inhaler disposal methods.  NURS 418: Introduction to Community Health at Health Student-led Seminar examined the role of Health. Discussing the leaching of excessive phat chains. Moreover, examining the overconsumption this practice contributes to increased exposure to associated risk of developing antimicrobial resists.  NURS 498/680 (elective course): Health, Justice healthcare sustainability, including an online train Healthcare Systems. Other readings include contruse of propellants in inhaled medications and the	<u>329 - Objective Structured Clinical Examination</u> - Self-Paced Module 1 discusses the amental impact imposed by compressed gasses utilized in the healthcare infrastructure, illy the role of insufficient inhaler disposal practices in emission of Ozone-harming aces. Further highlighting the need for improved protocols and education initiatives to	
1.21 Door your nameing cahool's answinglum in	tuoduse stuatogies for having conversations	
1.21. Does your nursing school's curriculum in with patients, nursing home residents, visitors, health effects of climate change and other envir	and other health professionals about the	
Yes, the <b>core</b> curriculum includes strategies for conversing with patients and other health professionals regarding climate change and environmental disruptions. (2 points)		
There are <b>elective</b> courses that include strategies for professionals regarding climate change and environments.	· ·	
This topic was <b>not</b> covered. (0 points)		
Score Assigned:	2	
Score explanation:  NURS 418: Introduction to Community Health a Reading of CFNU-CANE Nursing Toolkit for Pl		

operationalize theoretical frameworks into actionable praxis for addressing the aggregate of healthcare pollution. This tool kit provides nurses and nursing students with relevant policies and position statements, sample emails, and methods to achieve knowledge translation. Moreover, it introduces key patient education pieces regarding links between their health and climate with instruction on preparation for climate events.

**NURS 329 -** Objective Structured Clinical Examination - Self-Paced Module 1 provides an educational overview of strategies to address ecological inefficiencies within the healthcare system. It provides foundational knowledge on waste mitigation practices designed for practical implementation, equipping students with tools to translate sustainable practices into healthcare settings.

# 1.22. Does your school have an appointed faculty or staff responsible for planetary health and environmental nursing?

Yes, the nursing program has **at least one** appointed faculty or staff responsible for planetary health and environmental nursing. (1 point)

This topic was **not** covered. (0 points)

Score Assigned:

0

#### Score explanation:

The school of nursing does not have a direct appointee dedicated to planetary health and/or environmental nursing, however there is notable interest within the work of faculty. Amy Klepetar, faculty mentor for UNBC's PHRC, actively engages in planetary health research and nursing; focusing on the health effects of industrial development in Northern British Columbia. While not directly within the school of nursing, Dr. Darlene Sanderson: Dr. Donald B. Rix B.C. Leadership Chair for Indigenous Environmental Health, and faculty member of human and health sciences is a nursing leader with an extensive record of publications and presentations that significantly contribute to the discourse and knowledge translation of planetary health, particularly in relation to Indigenous perspectives and environmental equity.

# 1.23\*. Does your program offer Interdisciplinary Education (IPE) simulations or experiences regarding the health risks of climate change and other environmental disruptions?

Yes, the school of nursing has been involved with IPE simulations or experiences in the **past year**. (2 points)

Yes, the school of nursing has been involved with IPE simulations or experiences in the **past three years.** (1 point)

No, the school of nursing has not been involved with IPE simulations in the past three year. (0 points)

Score Assigned:

0

# Score explanation:

No, the school of nursing has not been involved with IPE simulations regarding the health risks of climate change or environmental disruptions in the past three years.

Section Total (56 out of 65)	86%
Section Total (50 out of 65)	0070

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# **Interdisciplinary Research**

Section Overview: This section evaluates the quality and quantity of interdisciplinary planetary health research at the broader institution. Interactions between health and the environment are complex and multifactorial. While climate change has been extensively studied from an environmental science perspective, planetary health is an emerging field. As leading health institutions with talented researchers and research resources, institutions should fund research studying the health effects of climate change and anthropogenic environmental toxins. This obligation is particularly strong because the public and policymakers are more attentive to climate change when its implications for human health are emphasised.

# 2.1. Are there researchers engaged in planetary health research and healthcare sustainability research at your <u>institution</u>?

Yes, there are faculty members at the **institution** who have a **primary** research focus in planetary health **or** sustainable healthcare/vetcare. (3 points)

Yes, there are individual faculty members at the **institution** who are conducting research **related** to planetary health or healthcare sustainability, OR are part of a national/international sustainability working group, but it is not their primary research focus. (2 points)

There are sustainability researchers at the **institution**, but not specifically associated with healthcare/vetcare. (1 point)

No, there are **no** planetary health and/or sustainability researchers at the **institution** at this time. (0 points)

Score Assigned: 3

Score explanation:

Amy Klepetar (MScPH, RN) is presently conducting research under the guidance of Dr. Margot Parkes, examining the impacts of local industrialization and regional development on populations residing in proximal areas of expansion. This research explores the intersection of environmental health and community well-being, with a particular focus on the ecological implications of industrial encroachment on local populations.

# 2.2. Is there a dedicated department or institute for interdisciplinary planetary health research at your <u>institution</u>?

There is **at least one** dedicated department or institute for interdisciplinary planetary health research. (3 points)

There is **not currently** a department or institute for interdisciplinary planetary health research, but there are **plans** to open one in the next 3 years. (2 points)

There is an **Occupational and Environmental Health department**, but no interdisciplinary department or institute for planetary health research. (1 points)

There is <b>no</b> dedicated department or institute. (0 points)	
Score Assigned:	3

#### Score explanation:

There is no current institute explicitly titled Planetary Health. However, UNBC hosts a multitude of centers, departments, & consortiums which directly address the aggregate of Planetary Health

- Pacific Institute for Climate Solutions
- Urban Aboriginal Knowledge Network Western Research Centre
- Natural Resources and Environmental Studies Institute (NRESi)
- Cumulative and Community Impacts Research Consortium
- Community Development Institute (CDI)
- Health Research Institute (HRI)

# 2.3. Is there a process by which communities disproportionately impacted by climate change and environmental injustice give input or make decisions about the research agenda at your institution?

Yes, there is a process in which community members impacted by climate and environmental injustice have **decision-making power** in the climate + environmental research agenda. (3 points)

Yes, there is a process in which community members impacted by climate and environmental injustice **advise** the climate + environmental research agenda. (2 points)

**No**, but there are **current efforts** to establish a process for community members to advise or make decisions on the research agenda. (1 points)

There is **no** process, and **no** efforts to create such a process. (0 points)

Score Assigned: 1

#### Score explanation:

While there exist multiple mechanisms for eliciting community feedback, such as the <u>Sustainable Advisory Council</u> (SAC), <u>G-Force</u>, and <u>Students for a Green University</u> (SGU), there is currently no direct or formalized process specifically designed to engage communities disproportionately impacted by climate change and environmental injustice in shaping the institutional research agenda. However, beginning in 2025, the university will implement annual town halls aimed at integrating community perspectives into UNBC's strategic plan, thereby laying the groundwork for more inclusive decision-making in climate and environmental research.

# 2.4. Does your <u>institution</u> have a planetary health website that centralises ongoing and past research related to health and the environment?

There is an **easy-to-use**, **adequately comprehensive** website that **centralises** various campus resources related to health and the environment including all of the following: upcoming events, leaders in planetary health at your institution, and relevant funding opportunities. (3 points)

There is a website that **attempts to centralise** various campus resources related to health and the environment, but it is hard-to-use, not updated, or not adequately comprehensive. (2 points)

The **institution** has an **Office of Sustainability website** that includes **some** resources related to health and the environment. (1 point)

There is **no** website. (0 points)

Score Assigned:

2

#### Score explanation:

The <u>UNBC Sustainability Page</u> attempts to centralize various campus resources regarding health and the environment. The website is particularly comprehensive in terms of environmental foci discussing funding opportunities, education resources, local economy, waste reduction etc. It also emphasizes the integration of health and environmental objectives through initiatives such as active transportation systems, the regenerative potential of composting, and the promotion of local food systems. Furthermore, the platform actively encourages ongoing research in sustainability. However, the website lacks a thorough representation of institutional leaders in planetary health.

# 2.5. Has your <u>institution</u> recently hosted a conference or symposium on topics related to planetary health?

Yes, the **institution** has hosted at least one conference or symposium on topics related to planetary health in the past year. (4 points)

Yes, the **institution** has hosted at least one conference or symposium on topics related to sustainable healthcare/vetcare in the past year. (3 points)

Yes, the **institution** has hosted a conference on topics related to planetary health / sustainable healthcare/vetcare in the past three years. (2 points)

The **institution** has not hosted any conferences directly, but they have provided financial support for a local planetary health event. (1 point)

No, the **institution** has not hosted a conference on topics related to planetary health in the past three years. (0 points)

Score Assigned:

2

#### Score explanation:

In March 2024, UNBC hosted a month-long <u>Green Event</u>, engaging the entire community in a series of seminars centered on planetary health and sustainability. This event featured a variety of high-impact discussions on critical topics, including:

Climate Change and Environmental Justice - Exploration of climate equity, hosted by Dr. Daniel Sims, Dr. Gabrielle Daoust, and Dr. June Garcia-Becerra, addressing the intersection of environmental policy and social justice.

Sustainable Lab Presentation and Workshop - Presentation and workshop led by Phillip Thorne and Theresa Degenhard, focusing on sustainable lab methodologies and practices aimed at reducing the environmental footprint within scientific research settings.

Empowering the next Generation: Panel on the role of youth leadership in shaping a sustainable future, facilitated by Mackenzie Kerr, Sara Squakin, Kyle Ross, and Skw'akw'as Dustin-Moore, emphasizing youth advocacy and sustainable development goals.

Indigenous Perspectives on Sustainability: Seminar by Harry Nyce, highlighting the invaluable insights from Indigenous knowledge systems and traditional ecological practices in sustainability.

Climate Cook in: Plant Based food - Experiential event dedicated to sustainable food practices, promoting plant-based cuisine as an accessible, low-impact dietary choice for planetary health.

# 2.6. Is your <u>institution</u> a member of a national or international planetary health or ESH/ESV organisation?

Yes, the institution is a member of a national or international planetary health **or** ESH/ESV organisation. (1 points)

No, the institution is **not** a member of such an organisation. (0 points)

Score Assigned:

0

Score explanation:

No, the UNBC School of Nursing is not a member of national, nor international planetary health or ESH organization.

Individual members of faculty and students have joined respective Planetary Health organizations. Amy Klepetar, Faculty Lead of this audit is a member of the Canadian Association of Nurses for the Environment (CANE), Alliance of Nurses for Healthy Environments (ANHE), and Nursing Climate Challenge (NCC).

#### Section Total (11 out of 17)

65%

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# **Community Outreach and Advocacy**

Section Overview: This section evaluates nursing school engagement in community outreach and advocacy efforts associated with planetary health. Researching and teaching planetary health is necessary but not sufficient. It is critical that institutions also directly engage with communities most affected by environmental health harms. Although climate change is a problem largely created by those with power and resources, its impacts fall disproportionately on under-resourced populations and communities of colour. Institutions should partner with local communities affected by climate change and pollution to share information about environmental health threats, advocate together for change, and provide opportunities for students to be a part of this work.

# 3.1. Does your <u>institution</u> partner with community organisations to promote planetary and health?

Yes, the **institution** meaningfully partners with **multiple** community organisations to promote planetary and environmental health. (3 points)

Yes, the **institution** meaningfully partners with **one** community organisation to promote planetary and environmental health. (2 points)

The **institution** does not partner with community organisations, but has participating in community focused events relating to planetary health. (1 point)

3

No, there is **no** such meaningful community partnership. (0 points)

Score Assigned:

#### Score explanation:

UNBC maintains substantive and multi-faceted partnerships with community organizations to advance planetary and environmental health. Through collaboration with the Recycling and Environmental Action Planning Society (REAPS), UNBC actively engages in waste reduction initiatives, contributing to broader sustainability objectives. Further, its development of the Prince George Energy Transition Group alongside the Prince George Electric Vehicle Association (PG EVA), substantiates its efforts to facilitate equitable energy transitions; effectively advancing education and awareness on energy transition, climate policy, and sustainable practices. Furthermore, UNBC works alongside Everyone at the Table Prince George to address food security and promote ecological conservation, particularly through the Gleaning Abundance program, which mitigates food waste while supporting local biodiversity.

# 3.2. Does your <u>institution</u> offer community-facing courses or events regarding planetary health?

The **institution** offers community-facing courses or events at least once every year. (3 points)

The **institution** offers courses or events open to the community at least once per year, but they are not primarily created for a community audience. (2 points)

The **institution** has promoted community-facing courses or events, but was not involved in planning those courses or events. (1 point)

The **institution/nursing school** have not offered such community-facing courses or events. (0 points)

Score Assigned:

# Score explanation:

NURS 418: Introduction to Community Health and Nursing is an integral course to the UNBC BScN curriculum. This course examines nursing practice in promoting and preserving the health of populations while working with individuals, families, groups, and communities. Modules primarily addressing planetary health topics include critical areas such as public health policy, advocacy in public health nursing, global health dynamics, Indigenous health perspectives, and the impacts of poverty, homelessness, and food insecurity. Each of these areas is explored in dedicated weekly sessions, ensuring a comprehensive understanding of community health through a planetary health lens.

3

Moreover, this project facilitated discussion regarding the curricula of this course and culminated in the inclusion of a planetary health chapter into the global health week of study.

# 3.3. Does your <u>institution</u> have regular coverage of issues related to planetary health and/or sustainable healthcare in university update communications?

Yes, all students **regularly** receive communication updates dedicated to planetary health and/or sustainable healthcare. (2 points)

Yes, planetary health and/or sustainable healthcare topics are regularly included in communication updates to **some courses**. (1 point)

Students **do not** receive communications about planetary health or sustainable healthcare. (0 points)

Score Assigned: 0

#### Score explanation:

Students do not receive regular coverage of issues related to planetary health and/or sustainable healthcare in university update communications nor core curriculum.

NURS 498/680: Health, Justice and the Environment - is an elective course that serves as a platform for disseminating and receiving updates on planetary health and sustainable healthcare initiatives.

3.4. Does the <u>institution</u> or <u>main affiliated hospital trust</u> engage in professional education activities targeting individuals post graduation with the aim of ensuring their knowledge and skills in planetary health and sustainable healthcare remain up to date during their professional career?

Yes, the **institution** or **main affiliated hospital trust** offers multiple in-person or online courses relating to planetary health and/or sustainable healthcare for post-graduate providers, including at least one with a primary focus of planetary health. (2 points)

Yes, the **institution** or **main affiliated hospital trust** offers one course relating to planetary health and/or sustainable healthcare for post-graduate provider. (1 point)

There are **no** such accessible courses for post-graduate providers. (0 points)

Score Assigned:

2

Score explanation:

Score explanation:

NURS 680: Special Topics in Nursing and Health: Health, Justice and the Environment - "This course explores the health impacts of pressing ecological crises including pollution, climate change, and biodiversity loss and the equity dimensions of these crises. A systems thinking approach is taken to explore both social and ecological determinants of health. Equity focus considers environmental racism in Northern British Columbia and the need to develop environmental and climate health justice praxis in Canadian nursing and health professions" (Course Description).

NURS 604: The Healing and Well-being of Indigenous Peoples - "This course provides a critical examination of Indigenous healing and well-being in relation to the historical influences of European contact and colonization, government social policy, environmental change, migration, and evolving lifestyles. Traditional and contemporary knowledge, world-views and spirituality, as well as Indigenous approaches to healing and well-being within families and communities are explored" (Course Description).

NURS 621: Health and Global Interconnections - "This course provides students with opportunities to develop a critical understanding of key issues related to the relevance of health and global interconnections including the following: links between health, social justice and poverty; health disparities and health equity; and gender, diversity and health. Particular attention is given to cross-cutting global health topics such as global health care, geographical health policy, and the effects of significant world events. Opportunity to develop an appreciation of political, social and economic responsibility, global citizenship in health, planetary health, and actions being taken to effectively deal with important global health challenges" (Course Description).

# 3.5. Does your <u>institution</u> or its <u>affiliated teaching hospitals</u> have accessible educational materials for patients about environmental health exposures?

Yes, the **nursing school** or <u>all</u> **affiliated hospitals** have accessible educational materials for patients. (2 points)

**Some** affiliated hospitals have accessible educational materials for patients. (1 point)

No affiliated medical/nursing centres have accessible educational materials for patients. (0 points)

Score Assigned:

0

# Score explanation:

UNBC as an institution offers a comprehensive repository of educational resources designed to enhance healthcare providers' understanding of environmental health exposures. These resources encompass a diverse array of scholarly initiatives, including an extensive speaker series, digital learning modules available through H.E.A.L. Healthcare, and an interdisciplinary seminar series. However, despite the breadth of provider-focused materials, there remains a conspicuous absence of patient-oriented educational resources specifically addressing the health implications of environmental exposures.

# 3.6. Does your <u>institution</u> or its <u>affiliated teaching hospitals</u> have accessible educational materials for patients about the health impacts of climate change?

Yes, the nursing **school** or <u>all</u> **affiliated hospitals** have accessible educational materials for patients. (2 points)

**Some** affiliated hospitals have accessible educational materials for patients. (1 point)

No affiliated hospitals have accessible educational materials for patients. (0 points)

Score Assigned:

0

Score explanation:

As mentioned in metric 1.9:

UNBC as an institution offers a comprehensive repository of educational resources designed to enhance healthcare providers' understanding of environmental health exposures. These resources encompass a diverse array of scholarly initiatives, including an <a href="extensive speaker series">extensive speaker series</a>, digital learning modules available through H.E.A.L. Healthcare, and an interdisciplinary seminar series. However, despite the breadth of provider-focused materials, there remains a conspicuous absence of patient-oriented educational resources specifically addressing the health implications of environmental exposures.

Section Total (8 out of 14)

57\*%

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# **Support for Student-Led Planetary Health Initiatives**

<u>Section Overview:</u> This section evaluates institutional support for student-led planetary health initiatives, such as funding, fellowships, programming, and student groups. Planetary health is a young field and, as young people facing a future deeply shaped by climate change, students are often some of the first at an institution to engage with it. Institutions should provide support for students to engage in sustainability quality improvement (QI) initiatives, discover mentors in their area of interest, and receive funding for planetary health projects.

4.1. Does your <u>institution</u> offer support for students interested in enacting a sustainability initiative/QI project?
Yes, the <b>institution</b> <i>either</i> offers grants for students to enact sustainability initiatives/QI projec

sustainability QI projects are part of the core curriculum. (2 points)

The **institution** encourages sustainability QI projects (to fulfil clerkship or longitudinal

The **institution** encourages sustainability QI projects (to fulfil clerkship or longitudinal requirements) and offers resources to help students succeed in these projects, **but** there is no student funding available and there is no requirement to participate. (1 point)

No, **neither** the nursing school or the institution offer opportunities or support for sustainability initiatives or QI projects. (0 points)

2

Score Assigned:

Score explanation: Insert explanation here.

Yes, UNBC implements the <u>Green Grant Program</u> for financial assistance to all members of the university community, including students, staff, faculty, and campus-based organizations. These grants are specifically designed to support research, educational initiatives, and civic engagement projects that advance sustainability within the university. In addition, the Office of Sustainability at UNBC has established the <u>G-Force initiative</u>, a collaborative team of students, staff, and faculty dedicated to implementing projects that encourage sustainable practices on campus.

4.2. Does your institution offer opportunities for students to do research related to pla	netary
health and/or sustainable healthcare/vetcare?	

The **institution** has a **specific** research program or fellowship for students interested in doing planetary health/sustainable healthcare/vetcare research. (2 points)

There are research opportunities for students to perform research related to planetary health/sustainable healthcare, but these **require student initiative** to seek these out and carry them out in their spare time. (1 point)

There are **no opportunities** for students to engage in planetary health/sustainable healthcare research. (0 points)

Score Assigned:	1
Score explanation:	

At UNBC, there are ample <u>opportunities</u> for students to engage in planetary health research & receive <u>funding</u> for their own research projects; however, these opportunities necessitate proactive initiative from students to prioritize planetary health as a central area of study.

Research positions are allocated based on institutional needs and availability. Currently, opportunities exist within the broader domain of planetary health:

- Climate Education in Teacher Education (CETE) Research Assistant
- Research Assistant Position: Climate change and mental health promotion for the rural and remote health emergency management workforce in British Columbia
- PhD Position The effects of glyphosate-based herbicide on the populations and physiology of mammals in a forest food web

4.3. Does the <u>institution</u> have a webpage where students can find specific information related to planetary health and/or sustainable healthcare/vetcare activities and mentors within the institution? For example, projects achieved, current initiatives underway at the nursing school and/or contact of information of potential mentors.

The institution has a webpage with specific information related to planetary health or sustainable healthcare/vetcare that includes up-to-date information on relevant initiatives and contact information of potential mentors. (2 points)

There is an institution webpage that features some information on projects and mentors within planetary health and sustainable healthcare within the nursing school, but it lacks key information. (1 point)

There is **no institution** specific webpage for locating planetary health and/or sustainable healthcare projects or mentors. (0 points)

1

Score Assigned:

Score explanation:

See Metric 2.4.

The <u>UNBC Sustainability Page</u> attempts to centralize various campus resources regarding health and the environment. The website is particularly comprehensive in terms of environmental foci discussing funding opportunities, education resources, local economy, waste reduction etc. It also emphasizes the integration of health and environmental objectives through initiatives such as active transportation systems, the regenerative potential of composting, and the promotion of local food systems. Furthermore, the platform actively encourages ongoing research in sustainability. However, the website lacks a thorough representation of institutional leaders in planetary health.

4.4. Does your institution have registered student groups dedicated towards fostering a

# culture of planetary health engagement, scholarship, and advocacy on campus, supported by faculty advisors?

Yes, there is a student organisation **with faculty support** at my nursing school dedicated to planetary health or sustainability in healthcare. (2 points)

Yes, there is a student organisation at my nursing school dedicated to planetary health or sustainability in healthcare but it **lacks faculty support.** (1 point)

No, there is **not** a student organisation at my institution dedicated to planetary health or sustainability in healthcare. (0 points)

Score Assigned:

Score explanation:

There are no registered student organizations dedicated to planetary health or sustainability in healthcare at present targeting planetary health or sustainability in healthcare.

0

# 4.5. Is there a student liaison representing sustainability interests who serves on a <u>department or institutional</u> decision-making council to advocate for curriculum reform and/or sustainability best practices?

Yes, there is a student representative that serves on a department or institutional decision-making council/committee. (1 points)

No, there is no such student representative. (0 points)

Score Assigned:

1

## Score explanation:

Yes, there is apt student representation within <u>UNBC's Sustainability Advisory Committee</u>, with ½ of all voting members comprised of students, ensuring that the perspectives and concerns of the student body are effectively integrated into sustainability initiatives and decision-making processes.

4.6. In the past year, has the <u>institution</u> had one or more co-curricular planetary health programs or initiatives in the following categories? (1 point each)	
Projects where students are able to gain experience in organic agriculture and sustainable food systems, such as gardens, farms, community supported agriculture (CSA), fishery programs, or urban agriculture projects.	1
Panels, speaker series, or similar events related to planetary health that have students as an intended audience.	1

Events in which students learn directly from members of a local environmental justice community about the climate and environmental challenges they face, and how health professionals can partner with their community to address these exposures and impacts.	1
Cultural arts events, installations or performances related to planetary health that have students as an intended audience.	1
Local volunteer opportunities related to building community resilience to anthropogenic environmental impacts.	1
Wilderness or outdoors programs (e.g., that organise hiking, backpacking, kayaking, or other outings for students)	1

#### Score explanation:

UNBC excels in providing experiential events in the field of Planetary Health/Sustainability Practice

A few examples of events available to the student population in the 2024 year:

- 1. <u>Students for a Green University (SGU) Gardening Workshops</u> This workshop enables students to engage in university-wide organic agriculture and sustainable gardening initiatives. It offers hands-on sessions that educate participants on plant potting and sustainable growth practices.
- 2. Climate Change and Human Rights Panel This expert local panel discussed the intersectionality of human and planetary health, highlighting the integration of Indigenous knowledge as a framework for achieving actionable and equitable change for the health of our communities.
- 3. Empowering the Next Generation: The Role of Youth Leaders in Shaping a Sustainable Future This panel of political and community leaders examined and delineated the role of youth climate leaders in creating and facilitating community resilience
- 4. <u>Sustainable Labs Presentation</u> This presentation, led by graduate students from McGill University, focused on the creation, implementation, and adaptation of sustainability initiatives across post-secondary institutions nationwide. The project educated and empowered both faculty and students on contemporary sustainability practices in lab environments and procurement of supplies, equipping attendees to act as ambassadors for change in their respective educational environments.\
- 5. The UNBC Campus is adorned with Indigenous artwork and displays across the site. One in particular is on display in the *Geoffry R. Weller Library*, dubbed *Reconciling Light* from Kwakwaka'wakw artist Simon Daniel James— also known as Winadzi. Winadzi utilized this medium to tell the truth of what occurred at residential schools. Planetary Health **is** Indigenous, for one to engage with its knowledge and ideologies, appropriate understanding, respect and reverence must be given to the Indigenous Truth; "The bright colours, including orange, contrast with the grimacing face of the sun. The red hand prints around the rim and head of the sun to represent both the children affected by residential schools and those who never made it home"

UNBC has multiple outdoors programs and clubs available to the student population. The UNBC Outdoors Club is a student club which "run weekly mountain biking, indoor rock climbing, and trail running events for all ability levels as well as day hikes and backpacking trips on weekends. In the winter [they] run weekly cross-country skiing days at Otway, trail running nights, climbing at OVERhang, and the occasional downhill skiing day at Powerking Ski Resort. Moreover, the

University has frequent outdoor bike ride events such as the "Group Bike Ride" led by Kyle Ross which explores the local outdoors and bike infrastructure while advocating for increased active transportation.

Section Total (11 out of 15) 73%

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# **Campus Sustainability**

Section Overview: This section evaluates the support and engagement in sustainability initiatives by the institution. The healthcare industry is a major contributor to greenhouse gas emissions as well as pollution that harms local, regional, and global ecosystems. While healthcare is, by nature, a resource-intensive endeavour, the healthcare sector is well poised to lead the world to a more sustainable future. This will involve scrutinising every aspect of how our systems operate, from where we source our energy, to how we build our infrastructure, to what companies we invest in. Our nursing schools, clinics, and hospitals must set the standard for sustainable practices, and show other sectors what is possible when it comes to minimising environmental impact.

#### 5.1. Does your <u>institution</u> have an Office of Sustainability?

Yes, there is an Office of Sustainability with multiple full-time staff dedicated to campus sustainability. If the Office of Sustainability serves the entire campus, there is **at least one designated staff member** for sustainability at the hospital. (3 points)

There is an Office of Sustainability with one or more full-time staff dedicated to campus sustainability, but **no specific staff member** in charge of hospital sustainability. (2 points)

There are **no salaried sustainability staff**, but there is a sustainability task force or committee. (1 point)

There are **no** staff members **or** task force responsible for overseeing campus sustainability. (0 points)

Score Assigned: 2

Score explanation:

UNBC has a dedicated Office of Sustainability with salaried staff members committed to advancing a comprehensive array of sustainability initiatives. This office is responsible for monitoring waste disposal practices, managing energy consumption, and implementing effective strategies for pollution mitigation. This office serves a pivotal role in promoting environmental stewardship, enhancing resource efficiency, and raising awareness of sustainable practices within the university community; however, there is no specific staff member in charge of the school of nursing and/or hospital sustainability.

# 5.2. How ambitious is your <u>institution's</u> plan to reduce its own carbon footprint?

The institution has a written and approved plan to achieve carbon neutrality by 2030 (5 points)

The institution has a written and approved plan to achieve carbon neutrality by 2040 (3 points)

The institution has a stated goal of carbon neutrality by **2040** but has **not created a plan** to reach that goal or the **plan is inadequate** (1 point)

The institution/nursing school does **not** meet any of the requirements listed above (0 points)

Score Assigned:

5

# Score explanation:

As a public sector organization (PSO) in British Columbia, UNBC is governed by the <u>Climate Change Accountability Act</u>, which mandates that the university achieve net-zero emissions. This involves actively reducing emissions, acquiring offsets to reach neutrality, and releasing <u>annual reports</u> on its actions.

# 5.3. Do buildings/infrastructure used by the institution for teaching (not including the hospital) utilize renewable energy?

Yes institution buildings are 100% powered by renewable energy. (3 points)

Institution buildings source >80% of energy needs from off-site and/or on-site renewable energy. (2 points)

Institution buildings source >20% of energy needs from off-site and/or on-site renewable energy. (1 point)

Institution buildings source <20% of energy needs from off-site and/or on-site renewable energy. (0 points)

Score Assigned:

2

#### Score explanation:

Over 80% of the UNBC **central** campus is heated and cooled by <u>bioenergy</u>. Additionally, <u>solar</u> panels have been installed across the campus to further harness renewable energy.

A detailed list of UNBC's distinct energy projects can be located here, including:

"UNBC installed Canada's first university-owned wood pellet heating system. With much higher energy efficiency than the previous fossil fuel-based heating system, this project reduces emissions by 140 tons of CO2/year."

"UNBC's bioenergy plant won the Best Campus Case Study Award from The Association for the Advancement of Sustainability in Higher Education (AASHE) in 2011 .The plant is also certified to the prestigious LEED Platinum standard and emits among the lowest emissions of any bioenergy plant in North America."

5.4. Are sustainable building practices utilised for new and old buildings on the <u>institution's</u> campus, with design and construction of new buildings and remodelling of old buildings conforming to a published sustainability rating system or building code/guideline?

Yes, sustainable building practices are utilised for new buildings on the institution's campus and the **majority** of old buildings **have been retrofitted** to be more sustainable. (3 points)

Sustainable building practices are utilised for new buildings on the institution's campus, but most old buildings have **not been retrofitted.** (2 points)

Sustainable building practices are **inadequately or incompletely** implemented for new buildings. (1 point)

Sustainability is **not considered** in the construction of new buildings. (0 points)

Score Assigned:

3

#### Score explanation:

All new buildings are designed and constructed to comply with the <u>Passive House sustainability standard</u>, ensuring high energy efficiency and minimal environmental impact. Additionally, the majority of existing buildings have undergone retrofitting to enhance their sustainability, aligning them more closely with contemporary energy performance standards. "Certified Passive House buildings use up to 90 per cent less energy for heating and cooling when compared with standard buildings and use up to 70 per cent less energy overall."

5.5. Has the <u>institution</u> implemented strategies to encourage and provide environmentally-friendly transportation options for students and reduce the environmental impact of commuting?

Yes, the institution has implemented strategies to encourage and provide **environmentally-friendly transportation options** such as safe active transport, public transport, or carpooling and these options are well-utilised by students. Alternatively, the campus location is not amenable to unsustainable forms of transportation by default. (2 points)

The institution has implemented **some** strategies to provide environmentally-friendly transportation options, but the options are **unsatisfactorily** accessible or advertised. (1 point)

The institution has **not** implemented strategies to encourage and provide environmentally-friendly transportation options. (0 points)

Score Assigned:

2

## Score explanation:

UNBC promotes the use of active and public transportation for students whenever possible. The university's tuition includes a mandatory fee for the U-Pass, which provides students with unlimited access to BC Transit within the municipality.

The UNBC School of Nursing further encourages carpooling to practicum placements, emphasizing the importance of collaborative commuting as a means of reducing the environmental & financial impact of transportation. Additionally, the school provides complimentary access to the <a href="health authority's shuttle bus">health authority's shuttle bus</a> for long-distance placements, facilitating efficient and eco-friendly travel.

# 5.6. Does your <u>institution</u> have an organics recycling program (compost) and a conventional recycling program (aluminium/paper/plastic/glass)?

Yes, the institution has **both** compost **and** recycling programs accessible to students and faculty. (2 points)

The institution has **either** recycling **or** compost programs accessible to students and faculty, but not both. (1 point)

There is **no** compost or recycling program at the nursing school. (0 points)

Score Assigned:

2

Score explanation:

There are numerous recycling and compost bins readily available for use by nursing students and faculty throughout the various facilities.

# 5.7. Does the <u>institution</u> apply sustainability criteria when making decisions about the campus food and beverage selections (e.g. local sourcing, reduced meat, decreased plastic packaging)?

Yes, the institution has adequate sustainability requirements for food and beverages, including meat-free days or no red-meat, and is engaged in efforts to increase food and beverage sustainability. (3 points)

There are sustainability guidelines for food and beverages, but they are **insufficient or optional**. The institution **is engaged** in efforts to increase food and beverage sustainability. (2 points)

There are sustainability guidelines for food and beverages, but they are **insufficient or optional.** The institution is **not** engaged in efforts to increase food and beverage sustainability. (1 point)

There are **no** sustainability guidelines for food and beverages. (0 points)

Score Assigned:

2

Score explanation:

The Agora Dining Hall integrates local food sourcing as a fundamental component of its operational key performance indicators (KPIs), with a mandated minimum threshold of 30%. Additionally, the dining facility has implemented a transition to compostable packaging as a strategic initiative aimed at mitigating its environmental footprint.

Moreover, the UNBC Sustainability Department has established a comprehensive food waste composting system, with continuous enhancements informed by the directives outlined in the Sustainability Strategic Plan.

(Nick Yang, Conference and Events Coordinator, Hospitality Services)

Further, UNBC is engaged toward sustainability in event planning through the introduction of the <u>Sustainable Event Certification program</u>. This initiative, developed in collaboration with McGill University's Office of Sustainability, encourages event organizers to adhere to rigorous environmental standards, aiming to reduce the carbon footprint and waste associated with campus events. The program employs a points-based model to assess sustainability efforts, with certification levels ranging from Bronze to Platinum. Platinum certification, for instance, requires that events engage in carbon emission calculations and offsetting, provide exclusively vegan or vegetarian food options, use only reusable dishware, and adhere to zero-waste practices.

# **5.8.** Does the <u>institution</u> apply sustainability criteria when making decisions about supply procurement?

Yes, the institution has **adequate** sustainability requirements for supply procurement **and** is **engaged** in efforts to increase sustainability of procurement. (3 points)

There are sustainability guidelines for supply procurement, but they are **insufficient or optional.** The institution is **engaged** in efforts to increase sustainability of procurement. (2 points)

There are sustainability guidelines for supply procurement, but they are **insufficient or optional.** The institution is **not engaged** in efforts to increase sustainability of procurement. (1 point)

There are **no** sustainability guidelines for supply procurement. (0 points)

Score Assigned:

# Score explanation:

The <u>UNBC Sustainability Module #1</u> outlines optional sustainability criteria guidelines for supply procurement, applicable to all instructors. The Office of Sustainability is actively working to enhance and expand these criteria to further align with institutional sustainability objectives.

This module delineates responsible and sustainability purchasing, discussing the crucial nature of environmental stewardship and social responsibility through supply chain procurement including critical assessment, environmental impact assessments (EIA), cost and efficiency, and support services for subdevelopment of interdepartmental procurement policies.

# 5.9. Are there sustainability requirements or guidelines for events hosted at the institution?

Every event hosted at the institution **must** abide by sustainability criteria. (2 points)

The institution **strongly recommends or incentivizes** sustainability measures, but they are **not required.** (1 point)

There are **no** sustainability guidelines for institution events. (0 points)

Score Assigned:

1

#### Score explanation:

As per metric 5.7: UNBC is engaged toward sustainability in event planning through the introduction of the <u>Sustainable Event Certification program</u>. This initiative, developed in collaboration with McGill University's Office of Sustainability, encourages event organizers to adhere to rigorous environmental standards, aiming to reduce the carbon footprint and waste associated with campus events. The program employs a points-based model to assess sustainability efforts, with certification levels ranging from Bronze to Platinum. Platinum certification, for instance, requires that events engage in carbon emission calculations and offsetting, provide exclusively vegan or vegetarian food options, use only reusable dishware, and adhere to zero-waste practices.

# 5.10. Does your <u>institution</u> have programs and initiatives to assist with making lab spaces more environmentally sustainable?

Yes, the institution has **programs** and **initiatives** to assist with making lab spaces more environmentally sustainable. (2 points)

There are **guidelines** on how to make lab spaces more environmentally sustainable, but not programs or initiatives. (1 point)

There are **no** efforts at the institution to make lab spaces more sustainable. (0 points)

Score Assigned:

2

#### Score explanation:

The School of Nursing requires students to retain all equipment from their clinical skill lab kits for continuous practice and reuse. Additionally, students must ensure that kits are fully reassembled and maintained in preparation for Objective Structured Clinical Examinations. To further support skill development, lab faculty provide supplementary used/expired lab supplies, enabling students to engage in additional practice during both scheduled lab sessions and supplemental practice opportunities.

#### 5.11. Does your <u>institution's</u> endowment portfolio investments include fossil-fuel companies?

The institution is **entirely divested** from fossil fuels **and** has made a **commitment to reinvest divested funds** into renewable energy companies or renewable energy campus initiatives. (4 points)

The institution is **entirely divested** from fossil fuels. (3 points)

The institution has **partially divested** from fossil fuel companies **or** has made a **commitment to fully divest**, but **currently** still has fossil fuel investments. (2 points)

The institution has **not divested** from fossil-fuel companies, but faculty and/or students are **conducting organised advocacy** for divestment. (1 point)

Yes, the institution has investments with fossil-fuel companies and there have been **no efforts** to change that. (0 points)

Score Assigned:

1

Score explanation:

The institution has not yet divested from fossil fuels; however, there is an <u>organized divestment</u> <u>campaign</u>, which has thus far accumulated 500 signatures in support of the initiative.

Section Total (24 out of 32)

75%

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# Grading

#### **Section Overview**

This section focuses on the grading of the report card. The institution received a grade for each of the individual sections as well as an overall institutional grade. Section point totals were tallied, divided by the total points available for the section, and converted to a percentage. The overall institutional grade is a weighted average of the section grades, with curriculum receiving a higher weight owing to its larger number of metrics. Letter grades for each section and the institution overall were then assigned according to the table below.

Letter Grade*	Percentage		
A	80% - 100%		
В	60% - 79%		
С	40% - 59%		
D	20% - 39%		
F	0% - 19%		

Planetary Health Grades for the University of Northern British Columbia School of Nursing The following table presents the individual section grades and overall institutional grade for the UNBC School of Nursing on this nursing-school-specific Planetary Health Report Card.

Section	Raw Score %	Letter Grade
Planetary Health Curriculum (30%)	86%	A
Interdisciplinary Research (17.5%)	65%	В-
Community Outreach and Advocacy (17.5%)	57%	C+
Support for Student-led Planetary Health Initiatives (17.5%)	73%	В
Campus Sustainability (17.5%)	75%	B+
Institutional Grade	73%	В

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