

ABOUT UBC

The University of British Columbia (UBC) is a global centre for research and teaching, consistently ranked among the top 40 universities in the world.

Our two main campuses — the Vancouver campus and the Okanagan campus — attract and educate more than 58,000 students from 140 countries and employ over 15,000 staff and faculty.

UBC's Vancouver campus is home to a vibrant, sustainable residential community, where some 20,000 students, faculty, staff and other residents live, work and learn together. UBC's Okanagan campus, which has nearly doubled in size since 2007, is home to 1,700 students.



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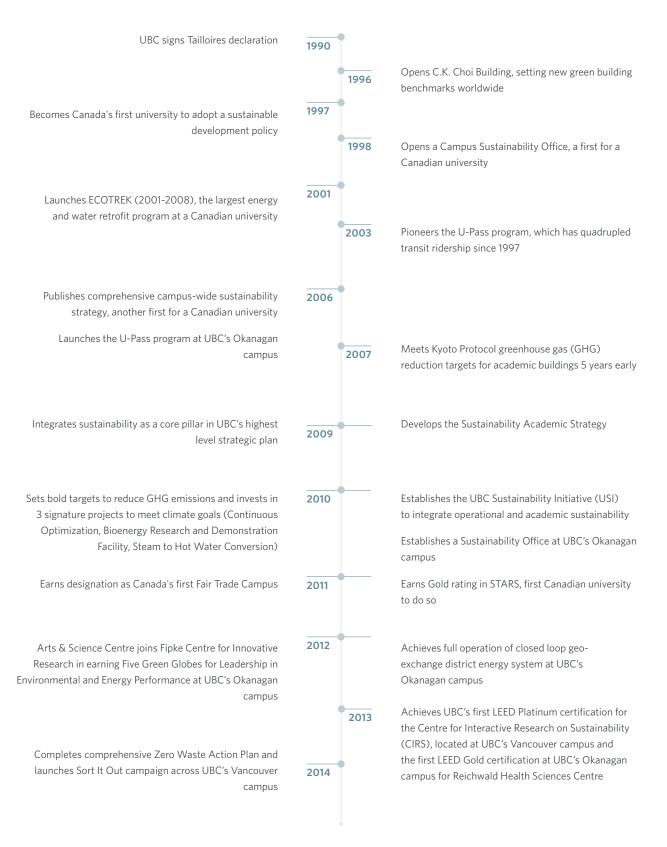


ACCOMPANYING DOCUMENTS

- 2013-2014 UBC Annual Sustainability Report
 Addendum to the 2013-2014 UBC Annual Sustainability Report: Performance Charts



UBC SUSTAINABILITY MILESTONES





About this Report

UBC's 2013-14 ISCN-GULF Sustainable Campus Charter Report provides a discussion of our sustainability management approach and alignment with ISCN Charter Principles and acts as a companion document to the 2013-14 UBC Annual Sustainability Report. For additional details on UBC's sustainability initiatives, goals, targets, and performance, please read the full 2013-14 UBC Annual Sustainability Report.

About UBC

The University of British Columbia (UBC) is a global centre for research and teaching, consistently ranked among the 40 best universities in the world. UBC is a public institution with a \$2 billion annual operating budget. In 2013-14, UBC received over \$564 million in research funding, supporting a total of 8,442 projects.

UBC's two main campuses – the Vancouver campus and the Okanagan campus – are located in Vancouver and Kelowna in British Columbia, Canada. More than 400 hectares in size, UBC's Vancouver campus is located at the western tip of the Point Grey Peninsula and has been located on this site for most of its 100 year history on land that is traditional territory of the Musqueam people. UBC's Okanagan campus opened in 2005 and is located in the Okanagan Valley, on the territory of the Okanagan Nation.

UBC educates more than 58,000 students each year from 149 countries and holds an international reputation for excellence in advanced research and learning, offering a wide-range of innovative programs in the arts, sciences, medicine, law, business, and other faculties. One of the largest employers in the Province of British Columbia, UBC employs over 15,000 staff

and faculty, has an annual economic impact of more than \$12 billion and 150 spin-off companies generated from UBC research. Home to a vibrant, sustainable, residential community, some 20,000 students, faculty, staff, and other residents live, work and learn together at UBC's Vancouver campus and 1,700 students live at UBC's Okanagan campus.

University Governance

UBC's two main campuses are governed by a single Board of Governors, a President, and two Senates (one at each campus) whose activities are coordinated by a Council of Senates. UBC's Board of Governors is comprised of 21 members. By legislation, the Board is responsible for the management, administration and control of the property, revenue, business and affairs of the University, including the appointment of senior officials and faculty on the recommendation of the President. Under the terms of the British Columbia University Act, academic governance is vested in the Senate. Executive officers and management (including the President, Chancellor, Deputy Vice-Chancellor & Principal UBC Okanagan, seven Vice Presidents, and associated systems) provide general supervision and direction of the business and academic work of the University, in accordance with, and to effectively implement, the strategic framework and oversight directions of the Board of Governors and the Senates.

About Sustainability at UBC

UBC has a <u>strong track record</u> in both academic and operational sustainability. In 1997, UBC was the first Canadian university to adopt a sustainable development policy and, a year later, to open a Campus Sustainability office. Continuing to demonstrate leadership in the field, in 2006, UBC was Canada's first university to



publish a campus-wide sustainability strategy. Further, in 2009, UBC's Strategic Plan, Place and Promise included sustainability as one of nine key commitments, embedding sustainability into the University's strategic direction and committing UBC to explore and exemplify all aspects of economic, environmental and social sustainability. That same year, UBC developed a Sustainability Academic Strategy (SAS) as a framework to enhance integration of academic and operational sustainability.

In 2010, the <u>UBC Sustainability Initiative</u> (USI) was established and commenced work to implement the SAS. Under the USI umbrella, many UBC offices, committees and groups work collaboratively under two cross-cutting themes: campus as a living laboratory and the University as an agent of change. Also in 2010, UBC announced the Vancouver Campus Climate Action Plan, committing to ambitious greenhouse gas reduction targets, and established a sustainability office at the Okanagan campus. Building on this long history of achievements, in 2014 UBC updated the SAS through the 20-year Sustainability Strategy, providing a long-term strategic direction for nextgeneration sustainability at UBC's Vancouver campus.

UBC has produced <u>annual reports</u> on sustainability activities and performance metrics since 1998. Annual Sustainability Reports are presented to the Board of Governors, and key performance indicators are also included as part of UBC's Place and Promise Reports, in addition to Carbon Neutral Action Reports prepared for the Province of British Columbia's Climate Action Secretariat, as required

under Carbon Neutral Governmental Regulation.

UBC also participates in the Sustainability Tracking, Assessment & Rating System (STARS), a comprehensive external sustainability benchmarking system administered by the Association for the Advancement of Sustainability in Higher Education (AASHE). In 2011, UBC received Canada's first Gold rating in STARS and is currently completing an updated submission for STARS 2.0.

For questions on this report, please contact:

Dr. John Robinson Associate Provost, Sustainability UBC Sustainability Initiative john.robinson@ubc.ca





ISCN CHARTER ALIGNMENT

ISCN Charter Principles & Management Approach

As a signatory to the <u>ISCN-GULF Sustainable Campus Charter</u>, UBC is committed to implementing the Charter's three principles, setting sustainability targets, and reporting regularly to the ISCN on our progress. The following sections provide a summary of UBC's management approach and organizational structure for advancing sustainability and meeting the ISCN-GULF Charter Principles.

Each section includes a reference table with corresponding sections in the full 2013-14 UBC Annual Sustainability Report which provides further detail on initiatives, actions, targets and performance metrics.

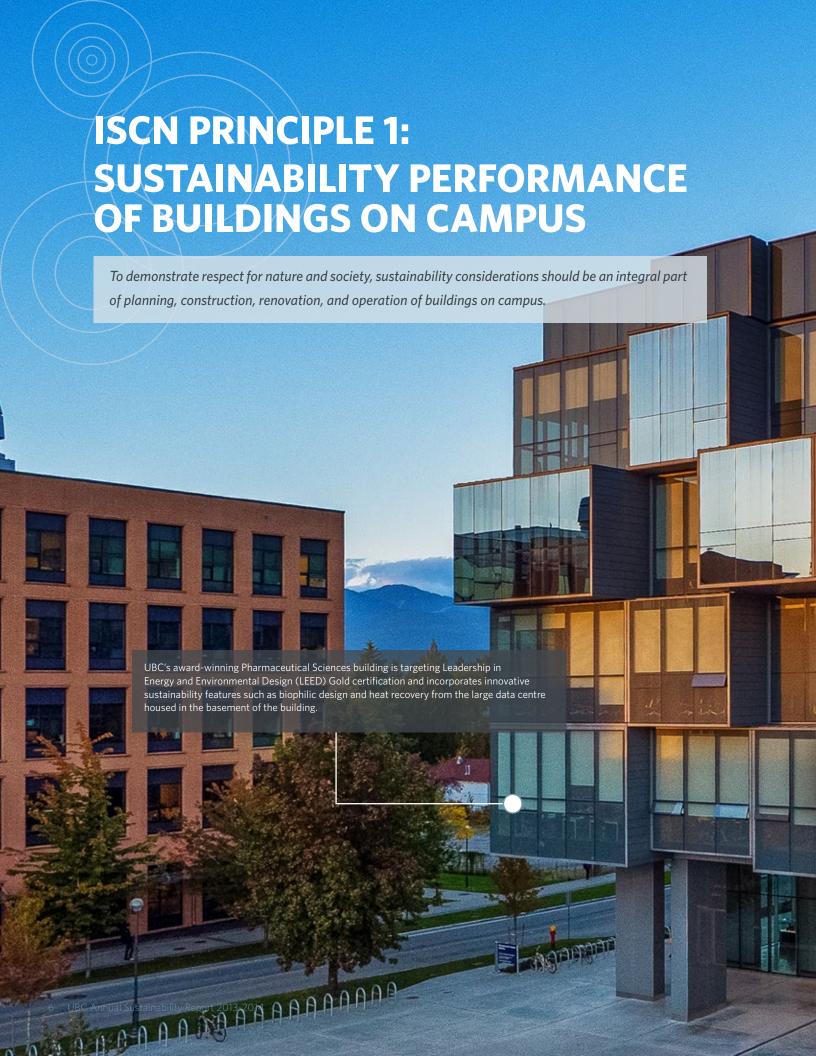
2013-14 Sustainability Achievements

UBC Sustainability activities over the past year have contributed to the integration of academic and operational sustainability on campus and have led to progress on two UBC cross-cutting sustainability goals: i) to turn our campuses into living laboratories for sustainability; and ii) to consolidate UBC's role as an agent of change for sustainability in the community.

The 2013-14 Annual Sustainability Report highlights key achievements for UBC's Vancouver and Okanagan campuses from the 2013-14 fiscal year in Teaching, Learning & Research, Campus as a Living Lab, Operations & Infrastructure, Community, and Communications & Engagement. The full report is available online at: http://sustain.ubc.ca/2013-2014-annual-sustainability-report-ISCN.

Further details on sustainability initiatives and progress toward meeting defined targets can be found in UBC's STARS reports, available online at: http://www.stars.aashe.org.

For a full list of UBC Sustainability plans, policies and reports, refer to: http://sustain.ubc.ca/our-commitment/strategic-plans-policies-and-reports.





MANAGEMENT APPROACH

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To access referenced pages, refer to the full report available at: http://sustain.ubc.ca/2013-2014-annual-sustainability-report-ISCN.

Building Design & Commissioning



UBC's Campus + Community Planning (C+CP) department provides regulatory structure and develops policy for the design and construction of buildings on campus, including the coordination of the University's numerous green building initiatives. Green building policies and guidelines for University-owned institutional buildings are summarized in the UBC Vancouver Campus Plan Design Guidelines and detailed design requirements are included in the Technical Guidelines.

A key aspect of UBC's green building policy is to promote design processes that encourage integrated design. To this end, C+CP requires that design teams follow the UBC Sustainability Process for major academic projects which includes the development of a Project Design Brief identifying each project's social, economic and environmental sustainability goals and sustainability workshop requirements.

All new buildings must be certified green buildings: <u>LEED</u> Gold for academic lands and <u>REAP</u> Gold in the residential neighbourhoods. For LEED projects, UBC developed a <u>LEED Implementation Guide</u> to assist with credit administration and to create better alignment with UBC's sustainability goals. For residential neighbourhoods, UBC developed the <u>Residential Environmental Assessment Program</u> (REAP) for green building certification of multi-unit residential buildings.





Building Systems Performance

UBC institutional buildings are maintained and operated by Building Operations and student residences are managed by Student Housing and Hospitality Services (SHHS). Both departments are committed to optimizing the performance of building systems on campus. This includes implementing operations and controls strategies, mechanical and water system upgrades and repairs along with preventative maintenance. C+CP provides strategic policy direction and advisory support to these departments by assisting with the planning and piloting of new initiatives. Further strategies are outlined in departmental sustainability frameworks for Building Operations and SHHS.

Green IT



UBC's Information Technology (UBC IT) department is implementing initiatives that reduce energy demand associated with the operation of IT infrastructure and equipment and identifying ways to promote purchasing of environmentally preferable products and reduce paper consumption and e-waste. C+CP provides advisory support to UBC IT by assisting with the planning of new sustainability initiatives and promotion of sustainable purchasing of computers and power management. Further strategies are outlined in the UBC IT Sustainability Framework.

Materials & Waste



The purchasing of materials and products on campus is not centralized. UBC's Payment & Procurement Services (PPS) department provides expertise and advice when purchasing goods and services to the campus community. UBC's waste collection is managed by Building Operations for academic buildings and by SHHS for residential buildings. C+CP works closely with Building Operations, PPS and SHHS in planning new sustainability initiatives to promote sustainable purchasing, reduce waste generation and increase waste diversion. The mandate and direction for taking action on what UBC purchases and how we manage waste on campus is defined in UBC's Zero Waste Action Plan and outlined in departmental sustainability frameworks.

Engagement Programs



UBC delivers award-winning engagement programs to build awareness and enable individuals to exemplify sustainable practices and behaviours on campus. Key programs include: Sustainability Ambassadors, Sustainability Coordinator Program, Sustainability in Residence, Green Labs Program and the <u>UBC SEEDS Program</u>. The UBC Sustainability Initiative, C+CP, SHHS, Risk Management Services and PPS play key roles in implementing these programs. In 2013, UBC completed a Campus Sustainability Engagement Strategy which informs how our engagement programs can encourage high-impact resource conservation behaviours.



UBC Okanagan



<u>UBC's Okanagan campus</u> is committed to the sustainable planning, construction, renovation, and operation of its buildings on campus. Targeted measures are focused on district energy, green buildings, resource conservation, waste reduction and campus community engagement.

New institutional buildings are designed to conserve energy, water and reduce greenhouse gas (GHG) emissions. A district energy system sources renewable earth energy from aquifer groundwater to heat and cool new academic buildings, and heat original campus buildings. The performance of original campus buildings is further optimized through technical retrofits and controls measures. Solar-powered waste and recycling infrastructure reduces operational costs and emissions from transport. Server virtualization, power reduction software and energy efficient equipment supports sustainable power management.

Complementing the sustainability of the physical campus buildings and infrastructure, engagement programs targeting the reduction of waste, energy and emissions through behavior change are in place. Key programs include, "Your Waste, Your Responsibility" desk-side waste and recycling, and "the Power of You", a behavior change energy conservation program.





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To access referenced pages, refer to the full report available at:

http://sustain.ubc.ca/2013-2014-annual-sustainability-report-ISCN.

Master Planning



C+CP provides the planning and regulatory structure for buildings, infrastructure and spaces on campus lands. UBC's Strategic Plan, Place and Promise: The UBC Plan, together with the Vancouver Campus Plan, UBC Land Use Plan, and Public Realm Plan, guide the physical planning of UBC's Vancouver campus and provide the foundation for developing and evaluating proposed physical changes, and help shape the University's form, character, and landscape. UBC's Development and Building Regulations provide a municipal-like regulatory structure for the development of institutional and non-institutional lands at UBC Vancouver. The UBC Development Handbook establishes additional regulations in accordance with the Land Use and Permitting Policy, UBC's Land Use Plan and UBC Vancouver Campus' Neighbourhood Plans by balancing public objectives and development interests. As part of UBC's commitment to engaging with the community, the UBC Board of Governors adopted ten Engagement Principles to enable constructive dialogue with our community.



Okanagan Campus Master Plan and Sustainability



UBC is currently updating its 2009 Okanagan Campus Master Plan to address campus development needs. Since the 2009 Master Plan's adoption, the campus has met its growth projections, with student enrolment more than doubling, and campus floor space nearly tripling since 2005. Having reached 2009 Master Plan capacity, an update is required to accommodate future growth. Recent work on the Okanagan Campus Master Plan has identified the opportunity to take a whole systems approach to the planning process to optimize the campus' sustainability resources (energy, water, waste), facilities, infrastructure (above ground and below ground), and ecosystems planning. This planning approach strategizes smart and sustainable development, resource efficiency, and cost effective design and is a prerequisite to the development of a long-term sustainability plan customized for the Okanagan campus.

20 Year Sustainability Strategy



In Fall 2013, UBC began a comprehensive process to develop a 20-year Sustainability Strategy for next generation sustainability at UBC's Vancouver campus, across teaching, learning, research, partnerships, operations and infrastructure, and the community. In developing the strategy, UBC convened a Steering Committee chaired by the Associate Provost, Sustainability and composed of 21 community members, including, students, faculty, staff, external partners, the University Neighbourhoods Association and the Musqueam First Nation. The Steering Committee provided oversight on the engagement process, considered community feedback and drafted the strategy. The process engaged over 2,000 people, both online and in-person. The strategy was approved by the USI Steering Committee and presented to the Board of Governors in Fall 2014

Operational Sustainability Strategy



In 2013, UBC began development of an Operational Sustainability Strategy, which will outline UBC's strategic framework for improving the campus' operational sustainability performance. As part of this process, C+CP began working with key operational departments, helping them identify strategic sustainability objectives and actions that will enable UBC to achieve long-term campus wide targets in energy, climate, waste, and water. Department-level sustainability frameworks which identified a series of actions toward meeting departmental targets and goals were completed for UBC Building Operations, Student Housing and Hospitality Services, Payment and Procurement Services and UBC Information Technology departments.

Energy & Emissions



In 2010, UBC announced our Vancouver Campus Climate Action Plan, committing to reduce GHG emissions 33 per cent by 2015, 67 per cent by 2020, and 100 per cent by 2050, compared to 2007 levels. Several operating units are responsible for implementing the plan. UBC's core climate action projects will together achieve our target of reducing emissions by 33 per cent by 2015. UBC produces an annual Carbon Neutral Action Reports which includes a detailed GHG inventory and is submitted



to the Province of British Columbia as required under Carbon Neutral Government Regulation. In 2015, UBC will begin developing an updated Climate Action Plan to outline steps towards achieving our 2020 GHG reduction targets.

UBC's Energy & Water Services department updates and implements UBC's Energy Management Plan, designed to maintain energy savings and identify further electricity and natural gas conservation opportunities and efficiencies.

In 2013, UBC completed a Community Energy and Emissions Plan in conjunction with BC Hydro and the University Neighborhoods Association which identifies solutions to reduce emissions from UBC's residential community. In 2014, UBC completed feasibility studies and selected a utility partner to develop and implement a Neighborhood District Energy System to provide low-carbon thermal energy for current and future residential neighborhoods.

Water



In 2014, UBC completed a long-range Integrated Stormwater Management Plan to improve the handling of stormwater and rainwater run off on campus and continued development of UBC's Water Conservation Action Plan in support of establishing a campus-wide closed loop water system at UBC.

Materials & Waste



In 2014, UBC completed and began implementation of our Zero Waste Action Plan, which outlines goals, targets, and actions for reducing waste generation and increasing waste diversion on campus. The plan will be implemented over the next three to five years and will help us meet or exceed what is required by regional waste management regulations, including the upcoming Metro Vancouver regional organics disposal ban in 2015.

Transportation







C+CP works to reduce automobile trips to and from UBC, by promoting more sustainable modes of transportation including transit, carpooling, walking and cycling and expanding campus housing options targeted toward students, staff and faculty. Updated in 2014, the <u>UBC Transportation Plan</u> is the guiding document for transportation objectives and initiatives on UBC's Vancouver campus and in turn informs the development of other transportation related plans, policies and projects.

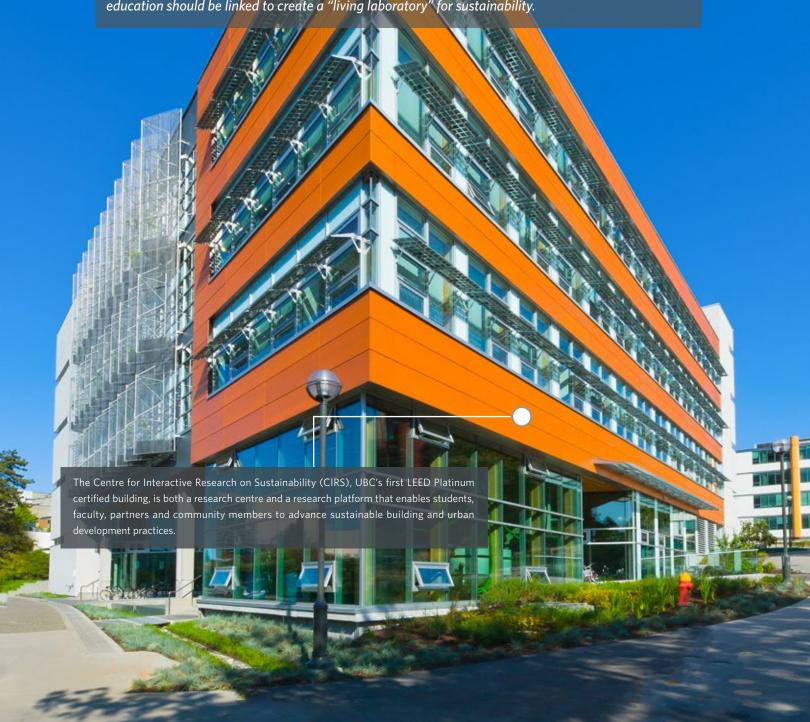
Housing Action Plan



In 2010, UBC's Board of Governors adopted The University Community on Campus - UBC's Housing Action Plan, UBC's comprehensive plan to improve housing affordability and choice on the Vancouver campus for faculty, staff and students. UBC continues to implement the plan in support of the long-term development of a thriving, diverse, and sustainable community on the Vancouver campus.



To align the organization's core mission with sustainable development, facilities, research, and education should be linked to create a "living laboratory" for sustainability.





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UBC Sustainability Initiative



UBC has committed, at the corporate level, to the deep integration of our operational and academic efforts in sustainability. In 2010, the <u>UBC Sustainability Initiative</u> (USI) was established and began its work on deeply integrating UBC's academic and operational efforts in sustainability across the campus. Under the USI umbrella, many UBC offices, committees and groups work collaboratively under two crosscutting themes: campus as a living laboratory and the University as an agent of change.

The USI is led by the Associate Provost, Sustainability for the UBC Vancouver campus, and reports directly to a Steering Committee composed of UBC's Vice President Finance, Resources and Operations; Vice President Research and International; Provost and Vice President Academic; Dean, Faculty of Applied Science; Dean, Faculty of Science; and a student representative.

The USI is comprised of four groups:

- A central office that oversees all USI efforts
- A Teaching, Learning and Research Office
- A Communications and Community Engagement Office
- A Management Team comprised of administrators.

Within Campus + Community Planning, the Sustainability and Engineering and Community Development offices work closely with the USI and coordinate UBC's numerous operational sustainability initiatives. Co-located in the Centre for Interactive Research on Sustainability (CIRS), UBC's central sustainability offices provide a central hub on UBC's Vancouver campus to engage with the campus community and facilitate sustainability learning, capacity building and practice throughout the organizational units across the university.





Sustainability Governance

The <u>USI Steering Committee</u> provides strategic guidance and oversight to the UBC's campus-wide sustainability initiatives including academic, research, operational, and policy decisions.

The USI is supported by sustainability councils representing staff, students, faculty and the external community and teaching, learning and research fellowship programs comprised of faculty across disciplines:

- The Student Sustainability Council serves as an advisory body to the USI in regards to sustainabilityrelated issues and concerns pertaining to UBC students. The Council is a conduit for communicating student-originated sustainability priorities in teaching and learning programs, research and partnerships opportunities, and campus operations.
- The Regional Sustainability Council provides guidance to the USI and help it establish productive partnerships with the many communities of which it is part. The Council provides input on priorities in research and partnerships, teaching and learning, operations and policy recommendations and meets twice a year. It is composed of leaders in the sustainability community from the private, public and NGO sectors in the Vancouver region.
- The USI Fellows are faculty champions who guide the advancement of sustainability education and research at UBC, both within and across disciplines, using the Sustainability Academic Strategy as a road map. The 2013-2014 cohort was comprised of eight fellows, spanning six faculties and representing a wealth of experience and expertise in curriculum development, innovative pedagogies, and research.

The USI is further supported by the Sustainability Management Team, comprised of senior operational, teaching, learning, and research staff.

Okanagan Sustainability Institute



The Okanagan Sustainability Institute (OSI) is a research-focused, partnership-based and externally supported academic unit of UBC, based at the Okanagan campus. Founded in 2006, the OSI is an academic unit of UBC's Okanagan campus operating under the governance requirements of Okanagan Senate Policy O-5. With a growing network of partners in the interior region of British Columbia and with national and international links to similarly situated researchers and institutes, the Institute enables UBC to pursue inter-faculty, collaborative, interdisciplinary sustainability research and scholarly inquiry that generate transferable, scalable results and give rise to first-rate academic publications.



Okanagan Sustainability Office



The Okanagan Sustainability Office - Campus Planning and Development - is responsible for campus sustainability planning, strategy and initiatives at the Okanagan campus. The office engages campus constituents and provides advisory support, measurement and reporting toward the achievement of campus sustainability performance. Supporting UBC's Place and Promise sustainability commitments, the office aspires to build capacity and leadership across the campus to broaden the impact of sustainability, working closely with colleagues at the Vancouver campus, the Okanagan Sustainability Institute and others in the <u>Campus as a Living Laboratory Initiative</u>.

PHOTO CREDITS

Cover UBC Vancouver campus water

feature Don Erhardt

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pg 6 Hover Collective

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