Summer 2022 Sustainability Scholars Program Internship Opportunity

The UBC Sustainability Initiative (USI) is pleased to offer current UBC graduate students the opportunity to work on funded sustainability internship projects. Successful candidates work under the mentorship of a partner organization, and are immersed in real world learning where they can apply their research skills and contribute to advancing sustainability across the region.

- Visit the Sustainability Scholars Program website to learn how the program works and to apply.
- Be sure to review the application guide to confirm your eligibility before applying.

Applicants close at midnight on Sunday January 30, 2022.

Project Title: Research to understand stakeholder needs to ensure equitable energy retrofits of multi-unit residential buildings

Project Background & Overview:
Buildings accounted for approximately 40% of regional greenhouse gas emissions (GHG) in the capital region (CRD) in 2020. While new construction standards are continuously improving in energy efficiency, the existing stock of the capital region's homes will need to be retrofitted to reduce energy consumption and shift to lower-carbon sources of energy. A significant proportion of the building sector in CRD communities is made up of multi-unit residential buildings (MURBs), both strata owned and rental, and will require dedicated retrofit programming to meet local and provincial emission reduction ambitions. Rental housing retrofits, and associated demographic challenges, economic barriers, and split incentive problems, was identified as one of the seven key challenges by the CRD’s Transition 2050 initiative and identified as a sector in need of a targeted outreach program by the CRD Residential Energy Retrofit Program.

Purpose-built rental buildings are a complex target as the sort of guidance, support, and incentives needed for this ownership type differ dramatically from the single-family or strata stock. However, an engagement program focused on rental MURBS is likely of high value for several reasons:
- the urgency for electrifying these buildings remains as great or greater than for single-family dwellings, as there are fewer opportunities to replace commercial-scale boilers and furnaces (due to their longer service lives)
- the overall age of the rental stock is older than the strata stock; 15 of the 30 largest rental MURB buildings were built before 1977
- in the capital region, there are 30 purpose-built rental buildings over 100,000 ft2, accounting for 20% of the rental floor area in the region but only 2.5% of the 1,187 buildings
- demographic analyses tend to show that lower-income households disproportionately inhabit multi-family buildings (particularly purpose-built rental) and are more likely to be affected by the health impacts associated with poorly performing buildings and/or those that are ill-equipped to manage the impacts of climate change

Targeted outreach to the owners, property managers, and tenants of these buildings could have a significant impact on community emissions across the region and would benefit a greater proportion of below median-income households and those disproportionately impacted by the effects of climate change. As such, the CRD wants to investigate the development of a targeted program for purpose-built rental housing be developed in partnership with capital region municipalities.
This research project will form the foundational understanding for the development of effective and equitable retrofit programming for rental MURBs for the CRD and will also be helpful to other local governments in the region and beyond.

**Project description**
In order to develop effective outreach and programming, the CRD seeks to understand the motivations and concerns of key stakeholders in the purpose-built rental MURB sector, what (if any) retrofits of rental MURBs are taking place in the capital region, and identify opportunities and barriers along the pathway to implementing these retrofits.

MURBs face several unique challenges in the retrofit process: energy audit process is different and retrofits are often more complex; low to moderate-income earners are also more likely to be renters and occupy MURBs, and as such present an equity challenge; split incentives between the tenant and the building management (i.e. the actor footing the bill for a retrofit is not the same actor that receives the resultant benefits in the form of energy and cost savings). The CRD wants to identify how it can help rental MURBs overcome these challenges and facilitate successful retrofits in this sector through education, engagement and supportive retrofit programming and policy.

The researcher will apply qualitative and/or ethnographic research techniques to further understanding of stakeholders in the rental MURB space (including tenants, property managers, owners, and contractors) and explore their perspectives on energy retrofits to identify opportunities and barriers. This could include economic, social, technological factors among others. Future design of these programs will use input from this research to help inform an effective and equitable approach. The scholar will have the opportunity to work with multiple members the climate team at the CRD. We will assist in networking with contacts and stakeholders in the community.

**Project scope**
- Review of MURB retrofit programs in BC and other jurisdictions and available research and reference documents
- Survey key stakeholders to gauge levels of interest and understanding of retrofit processes; identify motivations and key knowledge gaps
- Identify rental MURB retrofits (if any) that have taken place in the region and conduct a case study of the process and outcomes of one such retrofit project
- If a suitable case study is not available to analyze, conduct research through engagement with stakeholders, identify opportunities and barriers along the pathway to implementation of rental MURB retrofits

**Deliverables**
- A final report containing a summary of the work completed
- A presentation to the Capital Regional District Climate Action Inter-municipal Working Group
- A final report for the online public-facing Scholars Project Library.

**Time Commitment**
- This project will take **250** hours to complete.
- This project must be completed between **May 2 and August 12**.
- The scholar is to complete the majority hours between **8:30 and 4:30, Monday to Friday but some hours can be flexible**, approximately **20** hours per week.
**Required/preferred Skills and Background**

☒ Excellent research and writing skills
☒ Demonstrated interest in sustainability
☒ Familiarity with building retrofits and/or green building practices and policies is an asset
☒ Experience conducting stakeholder engagement events, including facilitation skills, is an asset
☒ Familiarity with research methodologies and survey techniques
☒ Community engagement experience
☒ Ability to work independently
☒ Comfortable interacting with strangers to conduct public/in person surveys
☒ The project can be conducted remotely but a scholar located in the Greater Victoria region would be an asset.

Applications close **midnight Sunday January 30, 2022**

Apply here: [Click here to apply](#)

Contact Karen Taylor at sustainability.scholars@ubc.ca if you have questions

**Useful Resources**

We are holding a special **resume preparation workshop for prospective Scholars** on January 19. [Click here for details and to register](#).

Below are some links to useful resources to help you with your resume and cover letter (there are many more online). Some of these resources also provide information on preparing for your interview.

[https://students.ubc.ca/career/career-resources/resumes-cover-letters-curricula-vitae](https://students.ubc.ca/career/career-resources/resumes-cover-letters-curricula-vitae)

[https://www.grad.ubc.ca/current-students/graduate-pathways-success](https://www.grad.ubc.ca/current-students/graduate-pathways-success)

[https://www.grad.ubc.ca/cover-letter-cv-resume-templates-ubc-career-services](https://www.grad.ubc.ca/cover-letter-cv-resume-templates-ubc-career-services)