UBC Sustainability Scholars Program 2019

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 organizational sustainability goals.

For more information about the Sustainability Scholars Program and to apply to work on this project, please visit the <u>Student Opportunities</u> page.

Please review the application guide (PDF) before applying.

Applications close midnight Monday February 25, 2019.

Research project title

Investigating the development of an analysis tool to support the business case for medium- and heavy-duty ZEVs (zero emission vehicles) in local government fleets.

Goal or Operations Plan objective

Clean Transportation Long Term Goal: Advance to a future where all new vehicles produce zero emissions.

Outline scope of project and why it is of value to your organization. Describe how and when the scholar's work will be actionable.

- Support the pilot study for the development of a toolkit for medium and heavy duty vehicle fleets, that will assist fleets to make informed decisions to reduce costs as well as expedite the procurement of ZEVs.
- Assist with the understanding of current fleet operations' energy efficiency and the potential to reduce GHG emissions.
- Develop a data collection plan that will be required for a medium and heavy duty vehicle analysis tool
- Develop an optimization strategy for the toolkit to provide meaningful decision making output with minimum number of inputs.
- Consult partners to generate ideas to build the toolkit. (We will be participating in this pilot project with a number of other Canadian and international institutions.)
- Plug In BC works to encourage the uptake of Zero Emissions Vehicles (ZEVs) in Fleets through various programs.
- The proposed pilot study will help to build the framework of the toolkit that in turn later will advance the adoption rate of ZEVs.

Deliverables

Note that a final deliverable either a full report or, if the report contains confidential information, an executive summary is required by the end of the program (August 10, 2019). The deliverable will be archived in the online Scholars Project Library and made publicly available.

• A final report, containing a summary of completed work with recommendations, complemented by a final presentation to key stakeholders.

- A summary report of case studies on existing tools and calculators (Light-duty vehicle toolkits are available), their cost, ease of implementation, and ability to meet intended outcomes.
- A summary of the data acquisition plan for the development of the toolkit
- A summary of universal data required to be used in the tool to produce meaningful output that will assist all fleets.
- Executive Summary for the UBC Sustainability Scholars online project library.

Time Commitment

Please indicate the total numbers of hours your scholar will need to complete the project, the time frame (within April 30 to August 10), any critical dates for the project, and the optimal schedule for your scholar's work.

- This project will take **250*** hours to complete.
- This project must be completed between [start date] and [end date]
- The scholar is to complete hours between (work hours for your department, and days of week), approximately ## hours per week.
- If applicable, list dates of any mandatory meetings, special events, etc. for which you require your Scholar to be available

Skill set/background required/preferred

This section will be used to match students with your project. Please be as specific as possible in describing the skillsets you require—they will be used to guide the application shortlisting and in developing skills training and professional development workshops. Please add to or delete from the list below as necessary. Excellent research and writing skills.

- Strong writing skills
- Strong presentation and public speaking skills
- Strong analytical skills
- Ability to work independently
- ☑ Project management and organizational skills
- ☑ Familiarity with qualitative research methodologies and implementation
- **Experience** with financial modelling and analysis
- ☑ Familiarity with electric vehicles
- Search Familiarity with the Local Government Act and the Vancouver Charter

Applications close midnight Monday February 25.

Apply here:

https://sustain.ubc.ca/student-opportunities

To learn more about the program here: https://sustain.ubc.ca/ubc-sustainability-scholars-program

Read the application guidelines to confirm your eligibility to participate in the program here: <u>https://sustain.ubc.ca/student-opportunities</u>

Contact Karen Taylor at <u>sustainability.scholars@ubc.ca</u> if you have questions.