

Student Design Competition



2022 WEAO Student Design Competition Winners – University of Waterloo

About the Student Design Competition

The Student Design Competition (SDC) is an annual challenge that provides an opportunity for student teams to apply their knowledge to a current real-world problem. Since 2014, the Water Environment Association of Ontario (WEAO) has collaborated with the Ontario Ministry of the Environment, Conservation and Parks to use the SDC to promote emerging topics within the water industry such as resource recovery and sustainable infrastructure. The competition is supported by a municipality that provides a current and relevant problem. The winner of the WEAO SDC will receive financial support from WEAO to compete at the Water Environment Federation's (WEF) annual SDC at the WEF Technical Exhibition and Conference (WEFTEC) in New Orleans, Louisiana in October 2022. With over 25,000 attendees, this is the world's largest water quality event. Student teams representing WEAO have consistently had strong showings at the international WEFTEC competition. In 2020, a team from the University of Guelph placed first at the WEAO SDC and continued on to place first at the WEFTEC'20 SDC with their Innovative Stormwater Management design in the City of Richmond Hill.

The 2023 Project Scope

The topic of the 2022-23 WEAO SDC is hosted in partnership with the Regional Municipality of Halton, to review a wastewater treatment process at the Mid Halton WWTP. Of the six facilities within Halton Region, the majority of the wastewater drains to the Mid Halton WWTP. The current plant has a significant side stream loading from on and off-site dewatering activities

which account for the majority of the organic load. The SDC project scope will include investigating potential side stream treatment solutions to increase plant capacity, reduce energy and greenhouse gas emissions, chemical consumption, and more.

The SDC is open to all full-time university and college students in Ontario. Professors and students who are interested in learning more about the SDC can contact yp@weaocommittee.org for more information and to be added to our mailing list.

Registration for the **2022/23 SDC closes on October 1, 2022 at 11:59 p.m.**

2023 Project Scope:

<https://s3.amazonaws.com/xcdshared/weao/WEAO SDC 2023 Project Statement.pdf>

Guidelines:

<https://s3.amazonaws.com/xcdshared/weao/WEAO SDC 2023 Guidelines.pdf>

Application form:

<https://s3.amazonaws.com/xcdshared/weao/WEAO SDC 2023 Entry Form.pdf>

Previous SDC Projects:

[2022](#)

[2020](#)

[2019](#)

[2018](#)

[2017](#)

[2016](#)

[2015](#)

[2014](#)

[2013](#)

[2012](#)

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