2021-2022
IMPACT REPORT

The Centralized Process for
Student Initiative Funding








UNIVERSITY OF TORONTO
FACULTY OF APPLIED SCIENCE & ENGINEERING

Introduction

Diverse co-curricular opportunities are offered to engineering students to enhance their university experiences. Students have the opportunity to lead initiatives and participate in a variety of clubs including design, sports and recreation, cultural, arts and performance, professional development, departmental/disciplinary, and humanitarian. This report highlights the student groups' accomplishments for the 2021 – 2022 year.

The Centralized Process for Student Initiative Funding (CPSIF) reviewed and approved funds for 90 student clubs and initiatives for the 2021 –2022 academic year, for a total of $366,725.16.

The funding breakdown is as follows:

Number of Applications: 91

Number Approved: 90

Total Funding Awarded	**$366,725.16**
BME - Institute of Biomedical Engineering	$15,050.00
ChemE - Department of Chemical Engineering and Applied Chemistry	$14,850.00
CivMin - Department of Civil & Mineral Engineering	$15,172.00
EAN - Engineering Alumni Network	$92,025.00
ECE - The Edward S. Rogers Sr. Department of Electrical & Computer Engineering	$44,205.00
EngSci - Division of Engineering Science	$27,000.00
EngSoc - Engineering Society	$49,568.16
MIE - Department of Mechanical & Industrial Engineering	$85,730.00
MSE - Department of Materials Science & Engineering	$10,000.00
YNCN - You're Next Career Network	$13,125.00

A Note on COVID-19

Due to the uncertainty at the time of the CPSIF applications surrounding the possibility of in-person events during the year, many clubs and student groups which were hoping for a reopening of campus later in the year were not able to spend the entirety of their CPSIF funding.

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1% Inspiration Podcast

Total Funding Awarded	**$700**
MIE	$350
EAN	$250
ChemE	$100

1% Inspiration used CPSIF funding for the operational costs of the podcast and to purchase physical consumable equipment or items. This allowed us to double our episode recording and processing from 11 to 23 and expand to 2 seasons.

Operational expenses included 3 years of hosting for our final website as we archive the podcast's content as a part of our transition plan and multiple years of domain name renewal (1-inspiration.com). Additionally, this money was used to support the costs of key episode processing software:

- our podcast distribution and content management system software Simplecast,
- audio editing software (Hindenburg),
- graphics and tools software (Canva),
- remote recording contingency software (Riverside FM),
- audio transcription software for improving podcast accessibility (Otter AI), and
- workspace management software (Notion)

One-time and physical expenses included printing posters we hung up around the U of T Engineering campus to advertise our podcast, thank you gift cards for podcast guests, podcast stickers, stationery for team brainstorming, and a few books for continuous learning on cross-cultural communication.

Frosh Kit 2021 Message Cards

Funding from the Centralized Process for Student Initiative Fund allowed us to continue to record and publish episodes, engage with students and share more professional development resources.. For instance, we assembled a list of free/discounted resources available to U of T Engineering students, as well as a one-page undergraduate research guide for new students. We share both guides on our website (1-inspiration.com), and also hope to share them with first-year students this Summer 2022.

Over the past year, about 500 unique visitors from over a dozen countries visited our website, and we have about 1000 podcast downloads. Our podcast

has been a venue for our guests, who are frequently U of T Engineering Alumni to stay connected with the engineering community, as we maintain our guest network and frequently learn they have met students through the episode they were featured in. One podcast guest shared: "...Anecdotally, I really think that project had a huge reach. Over the last 6 months, there have been at least 4 times where I've randomly met or coffee chatted with someone new in the general Toronto student community who had listened to the podcast you did with me!"

As a relatively new and independent student initiative, the credibility and support of CPSIF funding have helped us access engagement with Faculty stakeholders, such as the First Year Office, Engineering Recruitment and departmental offices (notably our funders, Dept. Chem Eng., and Dept. Mech & Ind Eng). With these stronger relationships, we hope to integrate our work closer with FASE's student experience goals and impact student perspectives of a successful undergraduate experience using student voices further.

Our connection to a network of CPSIF recipients and facilitators has given us confidence and information to complete the Troost ILead Summer 2022 Fellowship to focus on expanding our podcast to in-person interactions and developing a transition plan once we (as co-founders) graduate. The fellowship is supporting our plans for an advice letter-writing campaign called Dear Frosh which will include contributions from Engineering Alumni and senior students.

As we are funded by the Engineering Alumni Network, we are glad to strengthen this alumni connection within the community. 1% Inspiration has had many U of T Engineering Alumni on our show as guests to share their stories of how they made the most of their engineering education and learning community. Each alumni guest is listed below with the link to their episode if it has been released at the time of submission of this Impact Statement.

Alumni guests

a. Phil De Luna (MSE PhD 1T9): Episode 14 - Being a Research Capitalist and How Engineers can Tackle Climate Change
b. David Boroto (EngSci Infrastructure 2018 + PEY): Episode 11 - Global Development, Engineers Without Borders, and Reflecting on Failure
c. Bella Zhang (IndE MASc 2T1, IndE 1T9 + PEY): Episode 10 - Designing Health Care, Human Factors, and Product Management
d. Hamza Arshad (Mech 2T1 + PEY): Episode 9 - Energy System Design and Collaborative CAD research
e. Netra Unni Rajesh (EngSci Biomedical Systems 1T9 + PEY): Episode 7 - Finding Cancer Therapies while Thinking Artfully
f. Laura Berneaga (Mech MASc 2T2, Mech 1T9 + PEY)): Episode 6 - Leadership and Learning (Non)human Languages
g. Hanna Zhang (EngSci Robotics 2T0 + PEY): Episode 4 - The Power of the Uncomfort Zone
h. Madeline Zhang (EngSci Aero 2T0): Episode 2 - Catching Up on Time while Making Planes Quieter
i. Robert Adragna (EngSci Machine Intelligence 2T0): Episode 1 - "Fundamentally, We are not Engineers"

j. Mikhail Burke (MSE 1T2, IBBME PhD 1T8): Episode 5 - Bettering Biomaterials and Breaking Barriers

Yet to be Released at time of statement submission

k. Yilin Huang (MSE 2T0 + PEY)

l. Dana Kokoska (ECE 2T0 + PEY)

m. Dean Chris Yip of FASE (ChemE)

Non-U of T Engineering Alumni

n. Benjamin Levy (BS 2019, Victoria College)

o. Cori Hanson (PhD OISE, MEd OISE, BS)

p. Elham Marzi (PhD, Masters, Rotman School of Management)

Season 1 of 1% Inspiration Podcast

Association of Chinese Engineers

Total Funding Awarded	$3,250
EAN	$1,000
ECE	$900
EngSoc	$800
CivMin	$200
YNCN	$100
MIE	$100
EngSci	$50
ChemE	$50
MSE	$50

The Association of Chinese Engineers, better known as ACE, has always been dedicated to promoting the spirit of multiculturalism, friendship, and healthy communication among all engineering students. During the school year of 2021 – 2022, ACE had over 500 active members on campus, which also made it one of the largest student associations in the U of T Engineering community. In the past year, the association received a total of $3250 from engineering departments and organizations, which was largely utilized for purchasing gift cards for our guest speakers, as well as gifts, props, and refreshments for various in-person events. ACE mainly held three types of events: academic, professional development, and student-life orientated.

Academic Events

CDS Hackathon Live Session in MY 150

As first year students, a lot of people found the Engineering Strategies and Practices courses especially challenging. Considering that CDS and LLS are two of the major assignments, most students could use and really wanted some additional help from both CIs and professors, we decided to host CDS and LLS Hackathon. The hackathon was hosted both in-person in MY150 and online via zoom. We were joined by a total of nine instructors to provide extra help on CDS and LLS to over 300 participants, and we also provided opportunities for each individual team to have one- on-one meetings with CIs, where they could get more specific suggestions and advice on their documents. In return, all the instructors who joined the Hackathon were appreciated with gift cards, which were purchased using our funding.

Apart from traditional academic events like our ESP hackathon for first year engineering students, this year we also introduced some new programs such as the mentorship project. Due to the impact of COVID-19, the majority of first year and second year students did not get a chance to experience the school life on campus and had plenty of

questions, which is why we encouraged third- and fourth-year students to sign as mentor, and help mentees by offering advice and support, as well as answering any of their questions about school life. As a sign of appreciation, Mentors who signed up voluntarily were given little gifts, which were purchased using our funding.

Professional Development Events

This year ACE has held two major professional skill development events, the PEY seminar and the summer research/internship workshop. The PEY seminar was held online on September 12 and was joined by more than 40 students. We invited several outstanding upper year engineering students to talk about their experiences in job searching and adapting to the work environment.

The summer research/internship workshop was held on January 21 and was designed to provide more information about summer professional development opportunities, as well as encourage students to have a relaxing but also meaningful summer semester. Similar to the PEY seminar, we invited multiple upper year students to talk about their experiences in searching for summer jobs or research opportunities, and then allowed students to privately chat with the speakers and ask any questions they have.

Student Life Events

Besides academy and professional development, ACE also cares about the everyday life of the students, which is why we held plenty of events aiming to improve the quality of their daily lives. Before the school year started, considering a lot of new students were not able to come to Canada due to COVID restriction, we specifically prepared a Summer Meetup event in Shanghai. This event was designed to let students meet up in person and make new friends after a year of online learning. The event was successfully held on July 17 and was joined by more than 30 students. The fundings was used for booking rooms and purchasing games, snacks, and drinks.

Shanghai Summer Meetup group photo

During the summer, ACE also organized a housing seminar, where we invited George Gan, an engineering alumnus (ECE 0T7), to give students advice and suggestions about how to invest and find desired housing resources around the campus. As a professional real estate agent, George has an active connection with ACE and provided a lot of useful information in the past years. After the speech, students also had opportunities to talk with George and get more specific suggestions based on their own preference on housing.

At the beginning of September, following the guidelines of public health and governments, ACE held the annual freshmen orientation, with both online seminars and an in-person campus tour. We organized two online live sessions where we

invited upper year students as guest speakers to share their experience in different Engineering departments, as well as introduce new students to various Engineering courses.

Campus tour group photo

For the in-person campus tour, ACE prepared frosh kits and introduced new students to the engineering buildings, libraries, and all kinds of resources and facilities available on campus. They also had a chance to chat with upper year students and ask questions campus life.

As a Chinese tradition, ACE also held an online Chinese New Year party, aiming to introduce traditional Chinese culture to the students. As the most important festival in Chinese culture, the Chinese New Year is the time when families reunite. Since most international students were studying alone in Toronto and not able to return home, ACE as the only Chinese culture club in the Engineering faculty tried our best to make them feel like home and encouraged them to celebrate the holiday as a big "U of T Engineering family". The event was hosted online on New Year's Eve, providing students with a variety of entertaining and festive activities. As the most important time of the year, it is essential for every student to feel warm and loved on New Year's.

In addition to this, we held Fall and Winter Retreat events to help the members relax and know more about their colleagues. To improve students' personal life at university, we also held our annual dating party on Valentine's Day.

Winter Retreat

Aside from the initiatives mentioned above, ACE successfully launched our new COVID information page, ACEKnow, which provides guides to international students on how to enter Canada and return to school safely. We also launched our own health code, which helps students quickly understand the vaccine status and health conditions of people around them. Through our social media platforms, we have posted dozens of articles covering every aspect of student life in U of T, including guides on scholarship applications, UHIP insurance, driver's license, vaccination, etc.

Overall, none of these events or activities would be possible without CPSIF support. We are grateful for the efforts and engagement of our members, and we look forward to continuing to provide excellent events and activities in the future.

Bangladeshi Students' Association

Total Funding Awarded	$650
ECE	$200
EAN	$200
MIE	$100
YNCN	$100
CivMin	$50

Throughout the year, BSA has held several events engaging the Bengali community at the University of Toronto. The funding was largely used to pay for food and venue expenses for our welcoming event at the beginning of the year and our Ramadan/ exam de-stressor event at the end of the year. Ramadan is a widely celebrated time in the Bangladeshi community (regardless of religion), that's marked by family and deep reflection, being away from family during this time is hard, and adding exams to the mix makes it even more stressful. Our event helped alleviate that stress and add a sense of community and oneness to the Bangladeshi community during this time.

Our Ramadan/exam de-stressor was one of our biggest in-person events of the year (since we couldn't host our annual cultural show). We had around 50 people attending the event from various faculties. Our attendees came from various parts of Bangladesh (and Canada) and all had a chance to network with each other and share their stories from back home and of things they enjoy doing with their family during Ramadan. We had encouraged our attendees to wear traditional clothing and most of our attendees gladly participated making this event a vibrant and colourful display of our community.

Attendees at the Ramadan/Exam de-stressor event.

BSA engaged alumni from the University of Toronto for our annual networking event that was held on the 4th of March 2022 in conjunction with the Bangladeshi Students Association of TMU (Formerly Ryerson University). Ashfar Bashar (Faculty of Arts and Science, Rotman Commerce, Class of 2021) and Faizah Haleem (Faculty of Arts and Science, Dept of Biology, Class of 2017) participated in this event as speakers providing insights into their careers to young undergraduates at U of T.

Biomedical Engineering Student Association (BESA)

Total Funding Awarded	**$7,800**
BME	$7,300
EAN	$500

The Biomedical Engineering Student Association (BESA) is a graduate student-run group whose mission is to enhance the Institute of Biomedical Engineering (BME) graduate student experience within the University of Toronto through organizing social, professional, academic, and outreach events. Additionally, BESA serves as the voice for the BME graduate student body to the larger U of T and Toronto community. The funding from CPSIP have greatly contributed to BESA's efforts to achieve this mission over the past year.

The first event of the year was the BESA Orientation Week which was organized to welcome incoming students and introduce those who would otherwise conduct their research at different sites across Toronto. This event was led by our committed and enthusiastic VP Events, and their team, which was held in early September and included activities such as "What to do in Toronto?", "Virtual Family Feud", and "Virtual Trivia", which was complemented with Uber EATS dinner vouchers for participants. This series of events was accomplished virtually due to the COVID-19 restrictions. The Orientation week ended with students' in-person visit to Rogers Arena and Blue Jays game against Minnesota Twins. The tickets to the game were distributed through a raffle several days before the game.

Blue Jays game at the end of orientation week.

Our VP Events additionally organized a Halloween Pub Quiz at Prenup Pub to introduce new students to Toronto sport culture. To promote student networking in a more casual setting, the Events team also organized Volleyball Intramural Competition. The last event of the year was ice skating session, followed by some hot chocolate, at Nathan Philips Square. Furthermore, the Events team organized Virtual Escape Room (awards for the winners were Amazon gift cards), New BESA Logo Contest (prize money for the top three logo designs), and Streaming Services Raffle (purchased monthly subscriptions for Crave, Amazon Prime, and Netflix) for students to binge on their favorite shows with friends. During the exam session, we wanted to give students an opportunity to relax and spend some time with their fellow BME students off campus. We held a

stroll from Trillum Park to Harbourfront Centre, where students enjoyed free beaver tails of their choice; and an end of the year board game café night at Snakes and Lattes, with a library of thousands of playable games, offered alongside food and drinks.

Our Professional Development team organized two successful Alumni Chats with a good turnout and successful connections that lead to job follow-up inquiries. Alumni Chats hosted 4 and 2 panelists, respectively, that consisted of BME alumni as well as leaders in the BME field ranging from consulting to start-ups to staying in academia. A large portion of the CPSIF funding was allocated for the annual Career Month - the Professional Development Team's main event that took place in April. It consisted of Career Center Workshop Series for students to perfect their resumes and job-hunting skills; and two Panel Discussions, with panelists with experience in both academia and industry for students to gain better insights and help make more informed decisions about next steps in their careers (list of panelists can be found below). As a token of our gratitude, we gave all panelists gift cards of their choice, while each attendee received a Starbucks gift card. The Career Month ended with an in-person BME networking session at Hart House, where there was also a professional photoshoot for students to update their headshots on LinkedIn and other social media.

Another academic event that received a substantial amount of CPSIF funding is Toronto Biomedical Engineering conference (ToBE) 2022, the longest running student-organized conference at the University of Toronto, that took place at Hart House on June 15th. This year the goal of ToBE team was to showcase the interdisciplinary advancements of personalized medicine, which are critical to the understanding, treatment, and diagnostics of many health conditions. This was the first major event organized since the start of the pandemic, thus the ToBE team was striving to create a space to reunite the biomedical engineering community at the University of Toronto and beyond. The conference hosted three international keynote speakers (Prof. Nancy Allbritton (University of Washington), Prof. Michael Snyder (Stanford University), and Prof. Andrew Tsourkas (University of Pennsylvania)). The CPSIF funding was spent on building ToBE website from scratch, conference merchandize for students, conference banners, student award plaques, and gifts for keynote speakers. The conference was the last event organized by this year's BESA executive committee before the AGM (took place one June 28th) and elections for a new executive committee (ongoing).

Brew of T

Total Funding Awarded	$377
EngSoc	$377

Brew of T is a club at the University of Toronto (UofT) dedicated to learning and experimenting with brewing. Since its conception in the spring of 2020, Brew of T has gained full status affiliation with the Engineering Society (EngSoc), ran 3 virtual brewing projects, and conducted 2 virtual industry panels. In Spring 2021 Brew of T was awarded EngSoc's Affiliated Club of the Year Award.

Brew of T was awarded a total of $377 in funding, which was used primarily for large equipment purchases, and training for our executive members. In particular, funding was used to purchase equipment for wine making, which was used by our brewing leads to test and research the process in preparation for a wine-making event. The funding was additionally used to acquire gifts for industry events and stickers to hand out to grow the Brew of T community.

The funding we received from CPSIF, in particular from the Engineering Society, has enabled us to build Brew of T from scratch, providing opportunities for students to gain hands-on experience using equipment, and simulating a design team experience. Without this funding, we would not have had access to the same quality or scope for our projects. In addition, investing in equipment that we will be able to reuse will help us ensure Brew of T has a sustaining presence on campus with the turnover of club members.

The unique way that Brew of T serves the UofT community has been proven by sustained interest from the community at large. Brew of T has a mailing list of 190 people, a community group containing 85 members, and received over 39 applications for exec positions. Brew of T was also recognized as the EngSoc Affiliated Club of the Year in recognition of our community engagement. This is illustrative of the excitement and support from the undergraduate engineering community, and the benefit of this club's presence at the University of Toronto.

In addition to our brewing projects, we also ran highly successful industry nights, and have talked to several other breweries who have expressed interest in hosting us. We were hosted by Fermentations!, a wine shop located on the Danforth, where community members were able to do some off-campus wine making. Brew of T was hosted on two occasions throughout the process and members were able to purchase their wine bottles at the end.

Brew of T Members at Fermentations! with their bottled wine

(Top row L-R: John Peri, TJ Price, Nicolas Kendler, Zachary LaPointe, Ziyad Burud. Bottom row L-R: Elisabeth Gagnon, Paloma Manterola, Sarah Kennelly Harrison Chan)

Canadian Association of Food Engineers (CAFE)

Total Funding Awarded	**$1,250**
EngSoc	$500
EAN	$300
ChemE	$200
EngSci	$100
YNCN	$100
CivMin	$50

The Canadian Association of Food Engineers (CAFE) is a nation-wide team of dedicated undergraduate and graduate engineering students committed to innovation in the food industry and promotion of the food industry profession among University of Toronto Engineering students. The food and beverage processing industry is the second largest manufacturing sector in Ontario. It feeds Canada and beyond a variety of foods ranging from meats to wine and more. Today's consumers need and desire foods that go beyond the basic nutritional needs -- foods capable of promoting better health or even playing a disease-prevention role. In order to meet this need for innovation, academic research must be combined with development and commercialization strategies. CAFE began here at the University of Toronto and will continue to bring awareness to the ever-growing industry of food production.

As for the 2021-2022 school year, CAFE received a total funding of $1780 from the Department of Chemical Engineering & Applied Chemistry, Department of Civil & Mineral Engineering, Department of Electrical & Computer Engineering, Engineering Society, Engineering Alumni Network, Department of Engineering Science, and You're Next Career Network (YNCN). The funding received through the CPSIF process was used towards hosting various events, and some of our major events include the Case Competition, PEY & Industry Mixer, Research Panel, and Coffee Chats.

In CAFE's annual Case Competition judged by UofT Engineering alumni Dr. Levente Diosady and Caroline Schnaider Brunstein, and food engineering industry professional Maharshi Vyas, we presented student teams the challenge to design a tool to combat public eating and drinking during the pandemic. This encouraged all participants to think critically and effectively to design solutions to current and relevant world food engineering problems.

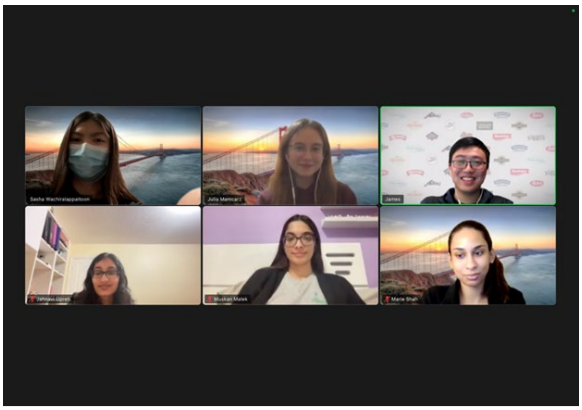
Additionally, CAFE held the PEY & Industry Mixer that had a panel of five UofT Engineering alumni (James Yin, Praneet Bagga, Caroline Brunstein, Michelle Parsons, Ian Chown), in which participants got an insight into the broad field of the food industry. The alumni each gave a presentation which discussed a range of food engineering opportunities ranging from project management, packaging development, manufacturing reliability, to food design. The speakers also provided relevant skills for job

hunting and resume building. During the break out rooms, each participant also had a chance to talk to the speakers in a smaller group to address any individual questions.

PEY & Industry Mixer Event

Moreover, we hosted a virtual research panel through Zoom, in which the incredible panelists included Professor Levente Diosady, as well as research students Folake Oyewole and Naayaab Nagree. Our event provided insight to the university community about research topics in food engineering and bioengineering that are currently being pursued while also providing information for students on research opportunities.

Finally, this year we established a strong mentorship program with many UofT alumni (including Praneet Bagga, Diana Teichman, James Yin, Caroline Schnaider-Brunstein, Ian Chown, Michelle Parsons, and Kallol Kumar Saikia). CAFE hosted monthly coffee chats during the Winter semester. These networking opportunities were provided to students with the intent to help them into the career path of food engineering by interacting with professionals in the food industry with an engineering background.



Coffee Chat with James Yin

Because of the online nature of this year's events, most of the funding was allocated for prizes and raffles to attract students to participate and gifts for our guest speakers and event judges. The funds allowed us to hold online events like those mentioned above (see the pictures for screenshots at those events), which connected students to alumni and professionals in the food engineering industry and got them excited about recent topics and potential careers in the food engineering field.

The funding also enabled us to develop the Annual CAFE Magazine, the CAFE website, and host other panel talks, and networking events. We partnered with other student clubs and teams for some of our events, which included The Hard Hat Cafe and Women's Mental Health Talks (WMHT) at York University, to connect the Skule community and the wider community among UofT and university students in general.

Canadian Electrical Contractors Association (CECA) – U of T Student Chapter

Total Funding Awarded	**$850**
EngSoc	$500
CivMin	$200
EAN	$150

One example of using the fund this year was during one of the club's bigger events, the Sustainable Buildings Case Competition. We purchased gift cards for all 4 students and 2 judges that participated in this challenge as a participant and offered a high honorarium for the judges who provided valuable feedback. Overall, the CPSIF funding has helped our club achieve our goals of engaging students and made our events successful

The funding was significant to our club as it promoted our club image and attracted new members. By providing prizes to the case competition and the mini LEED project, we were able to attract more participants. For instance, due to the price incentive, we have successfully attracted 4 students to participate in the LEED project. In past years, providing food during club events and workshops or printing posters for advertising on campus were the main ways to attract attendance to our event. These are where the CPSIF funding is beneficial to our club, however, due to the online circumstances, these could not be done. We hope in the future when students are back on campus, the club can continue to use the CPSIF funding for our campus events and workshops.

The sources of funding from the Centralized Process for Student Initiative Fund include the Engineering Society, Department of Civ/Min Engineering and Engineering Alumni Network.

CECA worked extensively with alumni Ernesto, Matheos, Greg, Rashad. Greg has been involved with the club since it was first started in 2016. He was one of the three judges at the Sustainable Building Case Competition held on November 10th, 2020. Greg's work while he was part of the club has deeply impacted us. Some of the methodology he developed in 2016 has continuously been used throughout the years in the club, as it proved to be efficient and intuitive. All the alumni have provided tremendous help along the way to make our events and competition possible.

Alumni Social through Zoom

Canadian Society for Chemical Engineering (CSChE) - U of T Chapter

Total Funding Awarded	**$3,000**
ChemE	$3,000

CPSIF funding was used to subsidize professional development and social events for chemical engineering students. The full event list includes:

<u>2012-22 Professional Development events</u>

- Summer Student Research Symposium
- PEY Mentorship Program
    - First Day Event
    - Resume Workshop
- Entrepreneurial Series Events
    - CEO Panel
    - Three Ships Solo Panel
- 71th Annual CCEC Conference (Virtual)
- Entrepreneurship Case Competition
- Li-Cycle Networking Event
- Research Days

<u>2021-2022 Social events</u>

- Professor Student Mixer Fall + Winter
- PEY Student Mixers
- Chemical Engineering Week
    - Element of the Day
    - Troost Cup
- Candy Grams for Valentine's Day
- Team Social (Fall and Winter)

CPSIF funding directly contributed to a vibrant Skule community, especially for Chemical Engineering students. Some highlights from the year include the following events.

Professor Student Mixers

Professor introductions at the Mixer

The Professor Student Mixer is a social event that is held twice during the school year. They provide a platform for students to communicate and interact with their professors in an intimate and friendly environment. The event is primarily aimed for first year ChemE students to meet their future professors who will teach their upper-year courses. During the event, the professors will provide introductions and descriptions of their courses to attending students and use breakout rooms for Q&A sessions. Trivia games are also played amongst the students and professors during this time. Upon reflection, student attendees remarked that the mixer helped them to

better connect with their professors in a non-academic environment and equipped them with a better grasp of the learning curriculum in the upcoming year.

Sector Information Night

The Sector Informiation Night is one of the most exciting events held by CSChE. Each semester, we invite alumni from the Chemical Engineering and Applied Chemistry department to speak about their careers in various sectors and their transition from academia to industry. To accommodate a variety of student interests, we contacted 16 alumni speakers from diverse backgrounds via the Engineering Connect network. For example, some sectors we covered include finance, consulting, environmental, bioengineering/biomedical, process management, data analytics, and manufacturing. This variety of sectors highlights the versatility of a chemical engineering degree. Students were also sent to different breakout rooms where alumni held Q&A sessions related to PEY and future career pathways.

Research Days

Research Days is a major annual event hosted by CSChE with the goal of providing the opportunity for faculty members to share current and future research projects in their labs for students in chemical engineering. We invited an alumnus, Monica Lecce, to discuss research funding applications, such as NSERC, UTEA, MITACs and more. This year, the Research Day event welcomed 7 professors and post-docs to cover 2 main fields of research: 1) environment and energy, and 2) biomedical and bioprocess engineering. The virtual event had a turnout of over 50 people.

Entrepreneurship Events

Due to overwhelming student demand, one of the biggest initiatives that our chapter took this year was to launch our new Entrepreneurship Program. Our events featured several outstanding chemical engineering alumni that founded their own company, including Laura Burget, the co-founder of Three Ships and a 2022 Forbes 30-Under-30 Retail/Ecommerce Honouree. Students were highly engaged with the insightful advice shared, and many were empowered to get involved with entrepreneurship at UofT.

Summer Research Symposium

At the end of every summer, CSChE hosts a Summer Research Symposium which serves as a prerequisite for the Reg Friesen Oral Paper and Robert G. Auld competition. This year, the Symposium drew nine participants for our Robert G. Auld technical paper competition, judged by a panel of three judges - consisting of Chemical Engineering professors and PhD candidates. The judges provided valuable feedback to participants to improve both their research and presentation skills. The top two presentations selected by the judges were sponsored by the Department and our Chapter to represent UofT at the annual CSChE Conference hosted virtually in Montreal. We announced the winners through a virtual Closing Ceremony and would eventually give the winners certificates and present a trophy to the first-place student.

71st CSChE Conference

Each year, our chapter provides our students with the opportunity to attend the annual Canadian Chemical Engineering Conference. This past year, the University of Toronto was represented by a record-breaking 60 student delegates who virtually attended the conference in Montreal. Our delegates participated in and excelled at the student competitions, with 2 of our students (Erin Ng and Eleanor Vaz) placing in the top 10 in the Robert G. Auld Technical Paper Competition. We had a large showing at these events, as our delegates attended to support the student presenters. Beyond the student competitions, our delegates showed great participation in workshops and used the Conference as a great opportunity to engage and network with other engineering students from across Canada and industry professionals from diverse backgrounds. The Conference is always an exciting chance for us to explore the opportunities available to us as future chemical engineers.

Team Socials

Due to the pandemic, our executive team met for the first time online via Zoom. Despite being connected only virtually, we all became fast friends after the first icebreaker. Our excellent team culture, communication and overall success can be attributed to the tight bonds that we have formed with one another throughout the year. Through these relationships, we have built a strong CSChE community that has been incredibly supportive towards all students through hectic academic schedules and the unprecedented pandemic. Fortunately, the team assembled in April to celebrate the hard work of the 16 executive team members at the end of the school year. We visited the Escape Manor (escape room), where the team split up into two groups and solved puzzles to escape the haunted wine cellar.

Candy Grams

Every year during Valentine's Day, it is tradition for CSChE to make and sell candy grams to the students. By February, students had started taking classes in-person again and we were quick to capitalize on the opportunity. Committee members hand-wrote the Valentine cards and attached Hershey's chocolate to each one. The candy grams were distributed to students during class hours. This year, CSChE was able to sell more than 120 candy grams to students in all years of study.

Canadian Society for Civil Engineering (CSCE) - U of T Chapter

Total Funding Awarded	**$1,550**
CivMin	$1,000
EAN	$350
YNCN	$200

The Canadian Society for Civil Engineering (CSCE) University of Toronto Chapter strives to build connections between civil engineering undergraduate students and their potential futures in both industry and academia. This is achieved by providing opportunities for students to learn about the current state of the civil engineering industry, the various avenues for students who are interested in research, and the potential paths of graduate education. CSCE aims to bring a holistic view of the potential futures available to civil engineering students, so that our colleagues are better equipped to make well-informed decisions about their futures. We also aim to demonstrate to undergraduate civil engineering students the importance of professionalism, philanthropy, and mentorship to their careers and to the lives of others. Building these values is important to their careers as future professionals serving the public.

Though COVID restrictions were loosened, this was a very unusual year for CSCE. However, CSCE was able to continue with many other usual events, after transitioning into a virtual space in 2020-2021. CSCE also took on two collaborations this year - including a Career Panel event with Engineers in Action, and a National Student Conference event in which we collaborated with 12 other CSCE student chapters across Canada. Along with other events, we are proud to have created the Mentorship Program, in which we had more than 25 civil engineering industry/academia members provide mentorship to undergraduate civil engineering students. We held many events in 2021-2022, with our most notable ones being,

1. Structural Engineering: An Opportunity to Shape the Skyline of Your City
2. CSCE Industry Mentorship Program
3. CSCE Holiday Food Drive
4. National Student Conference 2022

Despite this challenging year, CSCE made it its mission to continue to deliver quality and informative experiences to as many members of the civil engineering undergraduate community as possible. Through our events and programs CSCE did succeed in its mission and made a bigger impact on the community than has been seen in previous years. None of this would have been possible without the support of the engineering community via CPSIF. We look forward to many future years of success, thanks to the continued support of it and clubs like it through the CPSIF program.

Chemical Engineering Graduate Students' Association

Total Funding Awarded	$3000
ChemE	$3000

On behalf of the Chemical Engineering Graduate Students' Association (CEGSA) and the entire chemical engineering graduate student body, we would like to express deep gratitude to CPSIF for the $3000 in support during the 2021-2022 year. During another challenging pandemic year, with CPSIF support, CEGSA was able to organize, and re-kindle social, academic, and professional development events, with the funds going towards providing food, supplies, and other expenses.

In the past year, CEGSA members worked with the faculty to safely re-open the graduate common room to host in-person events and social gatherings like Fika Fridays which enrich the graduate community. With the graduate common room re-opened, CEGSA restarted another annual and highly popular tradition – the Ping-Pong tournament! CEGSA was able to replace the aging and lopsided ping-pong table with a new table for graduate students to enjoy for many years to come. Furthermore, CEGSA organized a BBQ day at a local park, where CEGSA prepared and served hotdogs, hamburgers and drinks to students in the department at Christie Pitts.

CEGSA was able to help organize the faculty-wide Graduate Research Days (GRD) and the and the Chemical Engineering & Applied Chemistry poster session. For yet another year CEGSA was proud to organize intriguing talks, and useful professional development events for our graduate students, in part thanks to the support of CPSIF.

Additionally, CEGSA was able to help run events and programs geared towards improving mental health and wellness of our students. At CEGSA, we were proud to continue our mentorship program for its third year, during which incoming students are paired with senior graduate students who can help them adjust, answer questions, and be one of their first contacts. We believe the mentorship program will help build our community, while allowing incoming students to adjust in their new roles. This also gives senior graduate students a chance to exercise leadership and mentoring skills. As our mentorship program continues to grow, we believe it will play a greater role in forming an inclusive, welcoming culture in the department. The mentorship program is also intended to give students support for their well-being and mental health during a trying transition period in their lives.

Civil Engineering Discipline Club

Total Funding Awarded	**$6382.71**
EngSoc	$3682.71
CivMin	$2000
EAA	$500
YNCN	$200

This year, the funding received through CPSIF allowed the Civil Engineering Discipline Club (Civ Club) to create a more engaging and inviting environment for the students. This was an especially important year as students were transitioning from an online to an in-person environment. Because of this, we really needed to provide students with as much support as possible so they could have an easier transition.

This funding allowed us to create more engaging opportunities which helped strengthen the sense of community. We held various events throughout the year such as a Halloween social, V-Candy Grams and our biggest event, the civil engineering dinner dance, in which we even had some of our alumni participating. In addition, we used this funding to improve the civ club common spaces so students can better use these spaces. We also had mentorship, health and wellness and academic initiatives throughout the year which helped to create an environment that allowed students to thrive. None of these events would have been possible without the hard work of our executives and the funding which we were awarded. We are truly grateful for this generosity which gave us the opportunity to assist students to thrive, so that one day they can shape a brighter future.

Civil Engineering Dinner Dance.

Civil and Mineral Graduate Students Association (CivMinGSA)

Total Funding Awarded	**$1,000**
CivMin	$1,000

During the academic year 2021-2022, CivMinGSA received financial support from the Department of Civil and Mineral Engineering in the form of CPSIF. The club is grateful for this funding, especially amidst a pandemic, as it allowed us to advance initiatives for students within our community.

Being the central representative of the graduate students within the department, our club aims to provide students with both academic and social events to promote and maintain our ever-growing community. This year, our goals were achieved by means of virtual and in-person events amongst others. This letter highlights how the club used this funding to promote such initiatives.

This year, the CivMinGSA hosted virtual coffee breaks and sessional challenges aimed at incentivizing students to be more active around their community in a safe way. The virtual coffee breaks often allowed students from various degree backgrounds and years of study to mix and mingle together. The funding was used towards providing students in attendance with amazon gift cards raffle of about $15 for participation and to award their student community spirit. Once the University of Toronto (UofT) and the Civil and Mineral Department allowed for in-person events and the re-opening of the graduate student lounge coffee social events were held in person following COVID guidelines. In the later case, funding was used to purchase coffee, donuts, etc.

Virtual September Coffee Break

The funding also supported sessional competition and challenges aimed to promote student wellbeing. Every completed challenge, submitted through an online form, allowed for participants to win prizes. For example, we organized a winter-holiday challenge titled “12 Days of CivMinGSA”, where each day a new challenge was presented, and students who participated in each event received a certain number of entries.

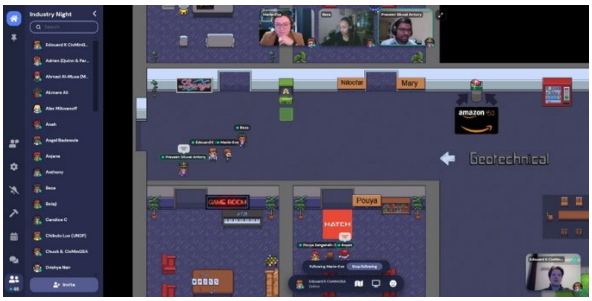
12 Days of CivMinGSA Flyer+List of Challenges

At the end of holiday session, student winners were randomly drawn from all participants entries. We found that this approach encourages participation, be it big or small.

After the COVID restrictions were lifted, the CivMinGSA team was able to organize in-person events where graduate students had the opportunity to widen their network and meet their colleagues. After two years of the pandemic, we found a great amount of interest from students to join the in- person pub night events.

Pubnight event at Madison Avenue Pub

The funding was used to provide appetizers and food during the events. The club's biggest event was the Industry Night event held on January 31st, 2022. This was the fourth year this event was held and it aimed to provide graduate students the opportunity to mingle with industry professionals and alumni in a more informal way while building connections in their respective work field. The event was held in a virtual space on called Gathertown. About 20 past alumni of UofT were invited to speak on behalf of their companies or organizations as industry professional representatives. The industry representatives were given a virtual private space on the Gathertown platform to interaction with graduate students. This event attracted over 60 students and the club received an abundance of feedback on the success of the event given that the event had to be held in an online format. The funding was put towards providing participants with food vouchers, a number of raffle prizes, and appreciation gifts to the industry professionals and alumni in attendance.



Industry Night: One of the Private Space Chats

Overall, the CivMinGSA aims to provide a positive and collaborative environment for graduate students. Our club provides them with an avenue to share their university experience with fellow peers in a social, academic, and professional way throughout the year. Part of the funding was used to organize Industry Night which engages graduate students with past alumni, working professionals and future employers. Given the mainly virtual environment this year, the funding received from the CPSIF grant was immensely useful to help adopt such changes. On behalf of the CivMinGSA team, we would like to express our gratitude to the departments and organizations associated with the Faculty of Applied Science and Engineering (FASE) for their financial support over this past academic year.

CloudClub

Total Funding Awarded	**$870**
ECE	$500
MIE	$100
EngSci	$170
EAN	$100

Funding uses:

- Buying web services and cloud credits from cloud service providers
- Hosting websites, applications, and databases
- Paying for domain names

CloudClub is an innovative club on campus that aims to leverage the power of cloud technologies and software development. Over the past year, many students have engaged in the club's ventures to develop websites, applications, and games to gain new skills and seek leadership opportunities. Project leaders have spent a considerable amount of time with members to work on games, websites and to provide training on new technologies. Members of the club's AI/ML team have become more adept at python and the intuition of the processes behind modern machine learning, such as optimization algorithms and neural networks. CloudAI, the AI/ML division of CloudClub, fosters a spirit of team building, initiative, and self-challenge in the new and vibrant field of artificial intelligence through projects with a very real, tangible result that can be easily demonstrated.

The initiative has proven beneficial to members because it has helped them work in a team on projects that they like. The funding received from CPSIF is important because it helps us share our creations with the rest of the Skule community and beyond. We can host our games and websites on servers and allow those who visit our website to look at students' hard work. Software development is quite challenging and by sustaining this effort we hope to give students the experience of working in a team setting and practicing their engineering knowledge. Since we started, multiple students have reached out to learn about web development, game development and learning algorithms to complement what they know from class.

This has positively impacted the Skule community in its own way because students come together to learn new languages and make new friends. Members of CloudClub Game have learned the fundamentals of JavaScript, PHP, and C# along with working in the Unity, Phaser, and Laravel frameworks. Throughout the development lifecycle, members have learned to work using the agile methodology, and other key software industry practices.

Through the above mentioned practices, the team has successfully developed and deployed two games, a Mario like platformer, and a rogue like dungeon crawler, and are currently working on a action RPG survival game. The team continued to be innovative and fosters a welcoming environment to new developers who wish to further their skills. The games are being hosted as a web service and can be accessed from the club website.

Furthermore, the website team has built the club website and added multiple features such as forums, publicly accessible APIs, and profile pages. A significant amount of time has been spent on front-end development to make the website appealing and organized. Recently, the club has taken on new members who are interested in building robust systems that are well tested. An initiative has been started to make the codebase more readable, organized, and conform to standards and best practices. We have not yet been able to find alumni who may be interested in supporting our endeavors. However, there is significant potential for mentorship and guidance from industry professionals and alumni alike to provide workshops, networking events and guidance on projects. Professor Johnathan Rose is our Faculty Advisor, and as the students return back to campus in the fall there is potential to bring in industry mentors and hosts to provide hands on training to students and share their knowledge.

As the club matures and we attract new members, the vision for the club is to become the most innovative club on campus. The goal is to provide students the opportunity to build something that will be useful to everyone in the Skule community and beyond. There is no better way to practice our engineering skills and ethics other than by building a system together.

Club for Undergraduate Biomedical Engineering (CUBE)

Total Funding Awarded	**$3,800**
BME	$1,100
ECE	$700
EngSoc	$500
EAN	$500
MIE	$450
YNCN	$200
EngSci	$200
ChemE	$100
MSE	$50

In the year 2021-2022, the Club for Undergraduate Biomedical Engineering (CUBE) has hosted more than 10 events to introduce and promote Biomedical Engineering in the undergraduate SKULE community. These events include a design competition, networking events, information sessions, lab workshops, and an alumni mentorship program.

Our most successful and impactful event was the Biomedical Design Competition (BMEC), which happened on February 19-20, 2022. This year, we had 44 student competitors in teams of 4-5 working towards a solution toward the problem statement entitled: Improving the Daily Lives of Parkinson's Dementia Patients. We used Discord as a platform for communication between competitors, CUBE execs, and student volunteers; and we used Zoom for Opening/Closing Ceremonies, judging, and workshops. Judging of the designs took place on the last day of the event, by industry professionals and professors. Funding for this event was mainly used as prizes for the top three winning teams, as well as tokens of appreciation for the judges, professors and students.

February 2022, Biomedical Design Competition through Zoom

CUBE has continued the Mentorship program, and this year we have 26 mentors who are either current graduate students or alumni of U of T Engineering. Mentees and Mentors are paired around the same time as the kickoff meeting and they are free to set up private, individual meetings on their own. Check-ins and smaller scaled events were made throughout the year to ensure continued interactions between mentors and mentees, as well as to provide any support they

needed to maintain this relationship. Funding was used towards gift cards that were given as event prizes during a smaller scale event, the Mentorship Mixer.

This year, CUBE has hosted five events under the theme “academia”, including the research fireside chats, professor mixers, and grad school workshop. Each event has engaged over 20 undergraduate students from both Engineering and Arts and Sciences, broadening the Biomedical Engineering community to beyond the SKULE community. Funding was used towards tokens of appreciation (gift cards) for the professors and graduate students who took their time to help out with our events.

CPSIF is the primary source of funding for our fully student-run club, and we are beyond grateful for the support of the departments and organization that have been providing CUBE funding in the past year. It is this funding that makes all our initiative possible and enables us to promote biomedical engineering within the undergraduate community both within and outside the SKULE community.

Engineers In Action (EIA) - University of Toronto Student Chapter

Total Funding Awarded	$3,900
EAN	$1,500
CivMin	$1,000
YNCN	$600
EngSci	$500
MIE	$300

This year, our team partnered with the University of Alberta to design and build a bridge over the Quinamara River, with a span of 62m. The construction of the bridge provides a safe route for the community to cross the Quinamara river, which is impossible without a bridge for approx.. 120 days per year due to heavy rainfall.

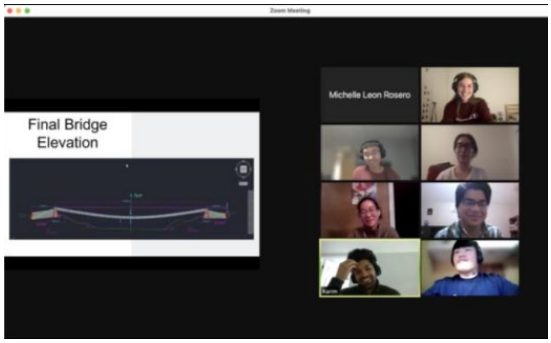
The bridge will directly serve 2 communities with approximately 350 community members and 30 children. This bridge will provide families with access to agricultural lands, markets, local schools and health posts. The primary source of economic stimulus for the Quinamara communities is from livestock and agriculture, which mostly consists of growing corn, wheat, and potatoes. Building this bridge provides improved access for farmers to tend their crops and to sell their crops at the market in Cochabamba, Bolivia. Community members will also have safe access to markets and shops in order to satisfy their familial needs. Access to health posts is also important in the case of illnesses or outbreaks, especially given the presence of the COVID-19 pandemic. The pandemic has highlighted the importance of having access to medical care, which is paramount for vulnerable communities to prevent further outbreaks. This bridge is not only crucial for connecting community members to economic opportunities and education but also life-saving medical care.

June 2022, the Quinamara Bridge and Plaque of completion

Unfortunately, our student team is once again unable to travel this summer to build the bridge due to a combination of COVID-19 circumstances as well as personal circumstances of members on our travel team. However, our parent organization (EIA-Bridge Program) along with our partnering

chapter (University of Alberta) were able to travel to Bolivia to build the student-designed bridge with help from local community members and guidance from EIA in-country staff. The bridge was completed at the end of May 2022 and the inauguration took place on June 2nd, 2022. The funding our team received through CPSIF had been used for procuring building materials and for hiring local laborers who have worked with us in the past during our summer bridge builds.

Not only does our club, EIA, make an impact globally, but we also create an environment where students at UofT can apply their technical and transferable skills in meaningful ways. EIA provides the opportunity for members of the club to become specialists or executive members, allowing them to learn about bridge design, sponsorship, media marketing and cultural awareness. This year, our team was able to host numerous events targeted toward educating the student body and engaging alumni. Through a series of workshops throughout the year, students were able to develop skills related to the structural design of bridges and other aspects of professional development. For example, on March 4th, EIA partnered with CSCE-UofT to host a career panel with UofT alumni currently working in different fields within Civil Engineering, including structural engineering, transportation engineering, water resources engineering, and project management. Similarly, EIA hosted a bridge design case competition in the Fall Semester, throughout October and November, that gave the opportunity for general members and non-club members of the student body to learn the skills of designing a pedestrian footbridge at a preliminary level. Both events were an excellent opportunity for students to meet industry professionals, learn more about the workforce, learn technical skills, and ask questions regarding their future career. Additionally, 2 alumni of our club participated in mentoring our current team throughout the bridge design process during the second semester via their role as ambassadors of the team, which not only gave opportunities for the alumni to engage in our club but also for current club members to learn from and network with our alumni.



November 2021, Bridge Design Case Competition through Zoom

Our team shows students that we are able to make an impact both locally and globally by applying our engineering skills. Students can take pride in knowing that they are assisting hundreds of rural citizens in South America and countries in southern Africa (e.g. our previous year's bridge project in eSwatini) through the design, funding, and construction of a bridge project each year. The funding received through CPSIF helps us come one step closer to our goal of bridging the gap of isolation in developing countries, allowing for economic invigoration. On behalf of Engineers in Action - UofT Chapter, thank you

Engineers Without Borders Canada - U of T Chapter

Total Funding Awarded	**$5,500**
EAN	$1,500
MIE	$1,250
BME	$1,000
EngSci	$500
ECE	$500
CivMin	$300
ChemE	$250
YNCN	$100
MSE	$100

We, the Engineers Without Borders Canada University of Toronto Chapter (EWB U of T), have had the privilege of receiving $5,500 for the 2021-2022 academic year through the Centralized Process for Student Initiative Funding. Through the generous support of the departments and organizations associated with the Faculty of Applied Science & Engineering, our Chapter was able to contribute to significant impact on campus, in Toronto, and globally, supporting a grassroots movement among the 40 university and professional chapters across Canada.

This year, our Chapter maintained an impactful online presence by engaging over 250 members through our club's Discord server. We invested in our members by organizing monthly community learning sessions on various social impact topics. Throughout the year our Chapter hosted a total of 8 learning sessions, each engaging around 8-10 participants on topics including Origins of Thanksgiving, Purple Day, "A Better Man" Documentary Night, Black History Month & Climate Change, and Diversity in Media. While we put an emphasis on educating our members, we also worked to share learnings with the rest of the U of T engineering community—our post to raise awareness on International Women's Day got 1632 reposts which raised awareness not only about the historic day but also promoted local women's shelters. This year we also launched a chapter-wide alumni mentorship initiative to connect our members with EWB U of T alumni and EWB Professional Chapter members. EWB U of T's members are also invited to join and contribute to one of our 6 portfolios: Cyber Ethics & Digital Rights (CEDR), Policy & Advocacy (PA), Indigenous Reconciliation (IR), Local Poverty Alleviation (LPA), Youth Engagement (YE), Sustainability & Environmental Justice (SEJ).

EWB members spelling out EWB to record a video for F!rosh Week matriculation

Our CEDR team ran regular events to teach engineering students about cyberattacks, censorship, surveillance capitalism, fake news, and digital communities. CEDR's Connect to

Educate project worked to provide marginalized populations with safe and reliable internet connections. PA also encouraged our members to learn more about their community off campus by sending a delegation to multiple Progress Toronto Sessions. Building on their strong work from last year, our PA team continued to invite in many speakers to produce regular episodes of the policy Podcast. Through listening to the podcast, other U of T engineering students are empowered to learn more about imposter syndrome and student finances. Our LPA team also collaborated with CEDR on their Connect to Educate project, in addition to their three own independent projects (Emergency Mailing Address, Foodbank, Transportation Equity). Many of the research initiatives undertaking by the LPA team have been shared with Faculty and have been used in U of T Engineering promotion. Our SEJ team continued on curriculum change work and used our strong social media partnership to introduce engineering undergraduate students to ways that they can promote green policy and take steps towards sustainability. Moreover, facilitated by IR, our Chapter hosted several Indigenous reconciliation focused events this year, including a virtual KAIROS Blanket Exercise and Cultural Competency Training, as well as continuing our relationship with Cat Lake First Nation. Lastly, we invested in the next generation of social change leaders through our continual engagement with high schools. This year, our Chapter engaged over 150 high school students in ongoing design projects and 3 programs (Volunteer YE, SCYLC, EWBeyond), working to expose students to engineering design thinking in a social context.

EWB U of T has worked in a wide array of collaborative projects with reputable non-profit organizations in Toronto including,

1. Transit Accessibility Project with the City of Toronto and the Toronto Transit Commission (TTC)
2. Permanent Mailing Address Project with the City of Toronto, Eva's Youth Shelter, and Horizons for Youth
3. Emergency Food Drive for students during COVID-19 in collaboration with FoodShare

In all three projects, students reached outside of the Chapter to engage with academics, non-profit organizations, and governments.

Please know that your support for our organization has made it possible for us to continue our work in creating positive social impact. You are not just supporting a student club; you are supporting a movement. On behalf of EWB U of T, thank you.

Future-Living Lab (FLL)

Total Funding Awarded	**$500**
CivMin	$200
EAN	$200
EngSci	$100

Future-Living Lab (FLL) received funding through the Centralized Process for Student Initiative Funding (CPSIF) which facilitated club activities that enhanced both our member's education in environmentally sustainable design and connections with professors, alumni, and industry professionals. The funds were used for our two-part "How to CAD for Engineers and Architects" AutoCAD and Rhino3D workshop series in the fall, our Professional Development Alumni Panel in November, our club socials, and most notably, our Annual Speaker's Night in February.

The first workshop was organized and realized in collaboration with U of T's Sustainable Building Network (SBN). It gave new club members the opportunity to learn drafting on CAD software and returning members to refresh their memory and refine their skills. It covered basic 2D drawing and 3D modelling, inaddition to coding in AutoCAD and Grasshopper for parametric design.

At the Professional Development Panel, previous members from the club answered questions about their paths after graduation. We received a lot of feedback from attendees that they really enjoyed this event, and it was really nice to connect with those who previously participated in the club. Our club socials helped bolster the FLL community, especially after a year of online meetings due to COVID-19.

Finally, our Annual Speaker's Night invited architectural designer and passive house planner, Nicholas Discenza; structural engineer, building designer and U of T professor, Pedram Mortazavi; and civil engineer, urban designer, and flood management professional Rehana Rajabali to speak on the topic of Designing in a Climate Emergency. The event concluded with a networking component/social where students could speak more freely with all speakers and attending industry professionals.

All leftover funding will be brought forward for this summer and the upcoming 2022-2023 academic year for the longevity of the club. As one of few U of T clubs focused on sustainable design-build projects, we are especially looking forward to putting it towards projects in their construction phase. Two of our current and upcoming projects that particularly enhance and engage the U of T community are the renovations to the existing U of T Outdoors Cabin in Collingwood and the Mother Earth Indigenous Learning Lodge Renewal Project in collaboration with the Engineers Without Borders chapter at U of T and New College.

Global Spark U of T

Total Funding Awarded	$2,500
EAN	$850
EngSoc	$675
ECE	$250
EngSci	$200
MIE	$150
YNC	$150
MSE	$100
CivMin	$75
ChemE	$50

The funding received from CPSIF supported our annual Hack the Globe social impact hackathon and our annual Speaker panel.

For Hack the Globe specifically, funding was used to waive registration fees for the event, making it completely free for the 318 participants across 48 countries, in disciplines ranging from the Humanities, to Social Sciences, to Engineering, and Business. We also financed several challenges and activities for our participants who won, including donation credits for teams to give to organizations of their choice. CPSIF funding was critical to helping Global Spark encourage students to apply their skills towards social innovation and the UN SDGs.

Team selfie challenge example from the Global Spark organizers

To keep participants engaged in a virtual setting, we led selfie competitions, solution logo and name challenges, coding challenges provided by Google, and Kahoots on global development facts; this kept our retention rate high throughout the hackathon (300/318 ended up making pitches to judges), and ensured students had a fun experience. 5 alumni supported us in various capacities for our Hack the Globe initiative, including Malik Ismail, Alyf Janmohammed, Ben Mucs, Phil Lu and Morris Huang.

CPSIF funding also supported gifts of appreciation for our annual speaker panel, in which we invite prominent multisectoral leaders working at the intersection of tech and global development to share their stories with students and networking. For the speaker panel, being able to engage with speakers who shared their insights on technologies for decarbonization has helped us foster positive relationships with industry leaders, all of whom indicated interested in supporting our future student-facing initiatives. For this event, we were supported by alumni, Katherine Bancroft and Henry Xu.

Graduate Super Women Engineers (GradSWE)

Total Funding Awarded	**$3,100**
BME	$900
EAN	$900
CivMin	$500
MIE	$425
ECE	$275
ChemE	$100

The vision of GradSWE is to build a supportive, inclusive, and diverse community to catalyze change for self-identified women engineers and their allies by promoting equity, dialogue, and action at the University of Toronto and beyond. Our mission is to support and contribute to the continual professional success of women in engineering. The funding awarded to us was used in alignment with our vision and mission.

During this year, we held a variety of in-person and online events. We were very excited to be able to meet each other in-person after two years of collaborating virtually. We began the year by holding welcome and info sessions in the middle of September for new graduate students interested in joining our clubs and participating in our events. Our executive members and volunteers ran these sessions, reaching a grand total of 65 grad students! While these info sessions were held online and had no associated cost, we asked participants what events they would like to be part of this year and used our funding to cover these events. Following the welcome and info sessions and up to June 2022, we have hosted 9 social events and 4 professional development events, with a few more summer outdoor events and the Annual General Meeting planned. We tried to hold approximately one social per month to bring together graduate students, instill a sense of community, and provide a safe space for talking about the challenges and strategies of being an engineering grad student. We also held many professional development events to connect with other women engineers and learn about life after grad school. Below is a complete breakdown of our events:

1. Welcome and Info Sessions
2. GradSWE online Fall Social
3. Toronto Walking Tours
4. GradSWE goes hiking at Rouge Park
5. Mentorship Kickoff Event
6. Winter Market Social
7. Holiday Coffee Chat with SQE Toronto
8. GradSWE goes skating
9. GradSWE Valentine's Day Movie Night
10. Bollywood Movie Night
11. ILead Gread X GradSWE Women Leaders Speaker Event
12. GradSWE goes Bowling
13. GradSWE Research Chat
14. Lakeside Social

The first day of our campus tour and downtown walk. Participants include Katya D'Costa, Sharon Ferguson, Dijuam Liang, Clara Phillips, Katie Allison, Hanna Groenewegan, Rachel D'Silva, Davia Dong, Emily Farrar

Our biggest most exciting event occurred in March where we invited a bestselling author and motivational speaker to give a talk on transitioning to the workplace. We collaborated with ILead Grad on this event, which helped to reduce the financial burden as the speaker fees were quite high. We had 27 attendees for this event, which led to a very lively Q&A period. The questions from the audience were so genuine and engaging that Stephanie stayed after her allotted time to make sure that she had provided everyone with advice. High-profile events like this would not be possible without CPSIF funding.

As this is only the third year that GradSWE has existed as a club, we are still learning which events are most exciting and beneficial for our members, which other clubs are best to collaborate with, and what other funding sources we might be eligible for. Thus, the generous funding from CPSIF allowed us to be more flexible and explore different types of events and partnerships. This funding allowed us to finally hold in-person events and bring together students who were so excited about connecting with their peers. We strive to make our events as inclusive as possible, so we aim to never charge our participants for attending. All events are free, or at the very least have optional (but not required) chances to purchase. We would not have been able to continue holding events in this inclusive way without the funding from CPSIF. Additionally, in the mission of inclusivity, we try to make accommodations on an individual basis when needed.

While we were unable to engage as many alumni as we would have liked to this year, we hope to engage more in the coming year by partnering more closely with SWE Toronto, posting our events on Engineering Connect, and holding more student & industry professional networking events.

June Lake Social! Participants include Shana Alexander, Kelsey Smyth, Amal Al-saqqaf, and Anupama Sharan

Hide and Seek Club

Total Funding Awarded	**$200**
EngSoc	$200

This year, the Hide and Seek club was awarded $200 in funding from EngSoc. We primarily used this funding to purchase coloured bandanas and pool noodles which were used to play hide and seek inside buildings on campus. The bandanas helped players identify other players who were playing the game from regular building users. It turns out that due to the nature of how the interior of buildings are laid out, there are surprisingly few good hiding spots where people can actually conceal themselves effectively, so we ended up adapting hide and seek into something more like socially distanced hide and seek tag where the seekers tagged the players hiding using the pool noodles, we purchased using our CPSIF funding. They were particularly helpful in enabling social distancing when COVID-19 was more prevalent.

This year we played hide and seek on four separate nights. The turnout for the last few games ranged from 20-30 students each who came out and played an hour and a half of hide and seek. We are not aware of having had any alumni come out to join our games of hide and seek.

Hopeful Romantics Society

Total Funding Awarded	**$85**
EngSoc	$50
MIE	$25
EngSci	$10

We started the Hopeful Romantics in December of 2020, and we have been committed to creating a safe space in which students from the Faculty of Applied Science and Engineering and the greater University of Toronto community can bond through the analysis and enjoyment of romantic comedies. These films are usually overlooked and deemed trivial, despite the fact that they often reflect the roles and rights of marginalized groups, such as women and those in the LGBTQ+ community. We believe that romantic comedies can be an excellent source of positive, complex representation, and we challenge our club members and the community at large to both love and think critically about the media that they consume, and how it affects their beliefs about their own relationships.

While we greatly appreciate the money that CPSIF offered us, we opted to run our in-person events by partnering with other clubs this year instead.

After facilitating several online watch parties throughout 2021, we ran our first in-person movie screening in the spring of 2022 in partnership with the Skule French-speaking Society, and acquired food for the event's attendees, while following COVID restrictions. The film watched was Amelie, a French film, which focuses on a young woman's romantic view on life and her mantra toward creating a positive impact in other people's lives; this was an excellent opportunity to help develop students' French knowledge but also interact with other students interested in critical film analysis and communication.

We also hosted an end-of-year social to thank our dedicated club executives and general members, and also celebrated the end of our tenure as co-Presidents; this social, again, was a wonderful and engaging opportunity for students within our Skule community and in our larger University of Toronto community to meet other students interested in film and media.

In-Person watch rom-com watch party (from left to right: Demetra, Kate, Edrianne-Alexa, Ruknoon, Jasmeen)

Human-Powered Vehicles Design Team

Total Funding Awarded	$4,000
MSE	$1,000
EAN	$1,000
MIE	$750
EngSci	$750
YNCN	$400
ChemE	$100

We are Human-Powered Vehicles Design Team (HPVDT). We focus on designing, analyzing, and constructing high-speed and performance vehicles that are powered exclusively by the human rider(s). Our vision is to innovate in the area of sustainable vehicles and encourage them instead of gas-based vehicles. Additionally, we participate in several international competitions and hold world records across a variety of vehicle classes.

A majority of the funding goes towards procuring raw materials and manufacturing equipment for constructing and maintaining our vehicles. This includes materials such as composite materials, epoxies, and mold materials, mechanical components for drivetrain systems, and new tooling required for the fabrication processes such as power tools, hand tools, and tool consumables.

Some of our ongoing projects include building the new Lowracer (still in construction), building and testing the systems of our Aircraft (such as wings and propeller), and finally, reviving older vehicles to maximize participation opportunities for team members (and potentially other students) in upcoming events.

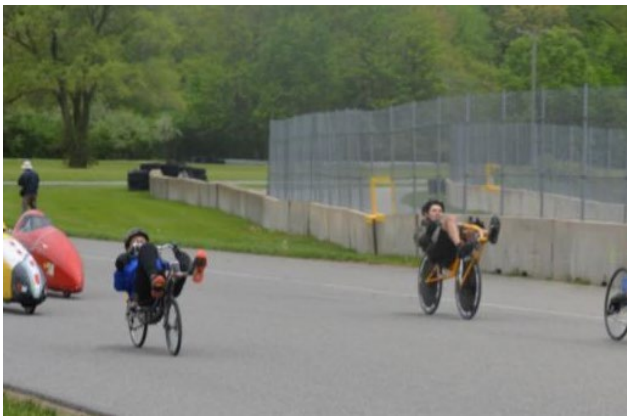
Speaking of events, since the number of covid cases have reduced, we were able to join a few events this year. This May, we went to Waterford in Michigan, and participated in the 37th Annual Michigan Human Powered Vehicle Rally. The rally was a weekend long and included many competitions such as races, hill-climbs, hot-lap, and coast downs. This was the first time many of the new members who joined the team during covid got the chance to participate in an event. This was a golden opportunity for them to try on and learn to ride the streamliners, to participate in more competitive events in the future.

Participants at the Human Powered Vehicle Rally with their Aircraft

Later, in June, for North York's 100th birthday, the Downsview airport runway was opened to the public for a Saturday. We used this opportunity to

bring our vehicles to the event and ride them around the runway strip to increase our outreach and attract public interest to our team.

In September, we will attend our biggest event this year, the World Human Powered Speed Challenge (WHPSC) at Battle Mountain, Nevada. There, we plan to break the world record for the fastest tandem bike, in addition to competing for the overall fastest human-powered land speed record.



Participants biking at the World Human Powered Speed Challenge and Battle Mountain, Nevada.

Finally, we also have regular involvement from alumni members in the team. Within the aircraft project they assist with aerodynamic elements of the vehicle design, run relevant technical seminars for the current students, and assist with piloting the vehicle. Additionally, alumni routinely participate in events and outreach like frosh week. This strong sense of cooperation and community within the team enables us to accomplish complex projects.

By designing our world class vehicles and participating in events mentioned above, and operating as a close-knit team, we enable the team members to experience our projects from the conceptualization to all the way to completion and participate in the competitions. Thus, the students get an opportunity to develop hands-on engineering skills and get practical experience through real-world design projects. This fosters great sense of pride for the members and increases the visibility and awareness of the Skule community.

Indian Students' Society

Total Funding Awarded	**$800**
EngSoc	$800

Thanks to Centralized Process for Student Initiative Funding, the Indian Students' Society was able to deliver events that brought together students from the Faculty of Applied Science & Engineering, along with other Faculties at the University of Toronto, in relaxed, informal settings where they could take a break from their rigorous academic schedule to network and enjoy with their peers and the University's alumni.

The funding received was used to support our various events throughout the academic year. Our virtual events included our Pride Event during Pride Month in 2021, and the Arrival to Canada event. The latter was held prior to the beginning of the 2021-22 academic year, and we invited members of the Consul General of India in Toronto who responded to students' queries about travel restrictions still being enforced at the time; alumnus Arshvir Bhangoo was also invited to speak with students. Some of the CPSIF funding was used to provide honorariums to the speakers at these events.

We also had in person events, starting the year with a Scavenger Hunt which brought our community together in person for the first time in 18 months. With the funding, we were able to award prizes to the winning team, which further motivated our community to meet up and engage.

When the 2021 T20 Cricket World Cup was being played, we held a screening of the India-Pakistan game which allowed the community to support their team in their favourite rivalry. CPSIF funding allowed us to secure a sizeable venue and offer Indian snacks, which brought together the community to support their national team.

Our biggest events of the year were Phuljhari (Diwali event) and Dil Se (our flagship event), which were each attended by over 200 students. As Dil Se is an annual event, we have interest from the University's alumni to attend this, with Dil Se 2022 (on April 2nd) having 36 alumni attendees.

Photo from ISS event

We are grateful for the funding received from EngSoc, and look forward to more collaboration between our club and the other funding avenues of CPSIF.

Industrial Engineering Club (Indy Club)

Total Funding Awarded	**$9,940.26**
MIE	$6,000
EngSoc	$3,940.26

The diverse quantity of events that Indy Club hosts throughout the academic year is something that we are proud of. The club's mission is to ensure all Industrial Engineering students feel welcome and have a chance to take part in activities they enjoy so that a sense of community is established. This is why we aim to host a fair ratio of academic, athletic, social and networking events throughout the year.

There are some events that we host on a regular basis. For example, Holiday Giveaways/Candy Grams are used to ensure students do not become engulfed in their school work. It gives them an opportunity to partake in an activity around the holidays to either win a prize (Thanksgiving Giveaway), remind someone they are loved (Valentine's Candy Grams), or to release some pressure (Halloween Pumpkin Smash). Raffles are a another way we engage our Indy community in months where there might not be any extravagant events happening. It helps keep up our presence in the community and online. In addition to this, we hold wellness events encourage the students to take a break from their studies to focus on their own well-being; these can range from paint nights to meditation with snacks. Another annual event, the MIE Dinner Dance, was postponed to November 2022, and therefore, last year's budget has not been completely used. However, with the restrictions surrounding COVID-19 reducing, the scale of Dinner Dance will likely increase to accommodate for higher demand for tickets

Every year, more initiatives and ideas are created as new club members join. Some of these suggestions call for more funding to be given to the club's subcommittees, possibly more subcommittees that need a bigger budget. For example, the Mentorship Program did not have the same scope as it has now. Indy Club is currently trying to increase the reach of the Mentorship Program. In order to do so, more socials and information sessions are required to be hosted. Indy Club is now branching outwards to not only focus on the first year Indy students, but all years. With this, the number of people involved and the volume of the events have significantly increased. Organizing information sessions to outline the program's goals and emphasizing that the best mentors were chosen for the program, the Mentorship Directors last year took the initiative to ensure first-year students were aware of the program and its benefits. Additional recruitment efforts and educational activities necessitated increased financing for the

Mentorship Program. The Mentorship Directors' presentation focused on how their new vision can connect more Indy students while outlining the advantages it would offer in terms of participation.

There have not been any activities this past year that required alumni attendance, however, the Academic Directors this year have some suggestions for prospective Alumni Mentorship and Alumni Panels. These new initiatives are still in its early stages, but there are high hopes for these programs to be implemented this upcoming year.

Moving forward, we will support our club's innovative thinking as they look for fresh ways to boost total attendance at all events. The most efficient method to get students to take time away from their studies is to properly market these activities and put the emphasis on what they need for a fulfilling and enjoyable university career.

Institute of Electrical and Electronics Engineers University of Toronto Student Branch (IEEE UofT Student Branch)

Total Funding Awarded	**$7,650**
ECE	$5,000
EngSci	$1,500
EAN	$500
MIE	$250
YNCN	$400

The Institute of Electrical and Electronics Engineers University of Toronto Student Branch (IEEE UofT Student Branch) received a total of $7 650 from CPSIF during the 2020-2021 academic year.

Throughout this school year, IEEE UofT hosted over 10 technical and professional development events mostly virtually, including speaker series, hackathons and competitions, conferences and workshops, welcoming students worldwide. None of these would have been possible without the support received from CPSIF. Specifically, the club spent $8300 on NewHacks and $18500 on MakeUofT, with the expenses mainly being used for participant prizes, hackathon swag, gifts for judges, shipping, and marketing costs. For the variety of workshops we hosted, we spent a total of $800, which consisted of the costs of electronics and hardware, gift certificates, and food for participants.

Julie, Smile, Himanish, and Floria streaming the closing ceremony toMake UofT

For 2021-2022, one of our highlights of the year was hosting MakeUofT, Canada's first and largest makeathon. Due to the ongoing pandemic, we continued to host this makeathon online, and with the capabilities awarded to us through CPSIF, we were able to make this an unforgettable experience for hackers. This year, we welcomed over 300 participants, 15 industry professionals, and over 50 organizers and volunteers to this event. The main objective of MakeUofT is to strengthen the design, teamwork, communication and technical skills of its participants. We were able to achieve this and foster determination throughout our participant pool to create a variety of projects, including a brain-controlled wheelchair aimed to aid people with muscle control impairments. Through MakeUofT and other events, we strive to provide the Skule community and beyond with opportunities to develop technical and professional skills, and to

serve as a bridge between Skule and a wider community of engineering students and professionals.

With CPSIF funding, we also held, for the fourth year running, NewHacks: a hackathon geared towards individuals who are just starting to scope the hackathon space. This year, we were able to expand NewHacks to have 300+ participants and an amazing group of mentors and judges from industry companies like Amazon and MATLAB. To many, NewHacks serves as an entry point into gaining their first hands-on technical experience, applying the knowledge learned in courses, collaborating with peers, and directly interacting with industry mentors.

Julie, Danielle (MLH), Himanish, and Floria announcing the winners to NewHacks

In addition to helping students develop their technical and professional skills through hackathons, we also held workshops throughout the year that, in addition to the knowledge of technical skills, incorporated networking and job-search opportunities. For the first time this year, we held Technical Interview Night, which provided students networking opportunities with innovative professionals and the ability to gain experience with technical interviews.

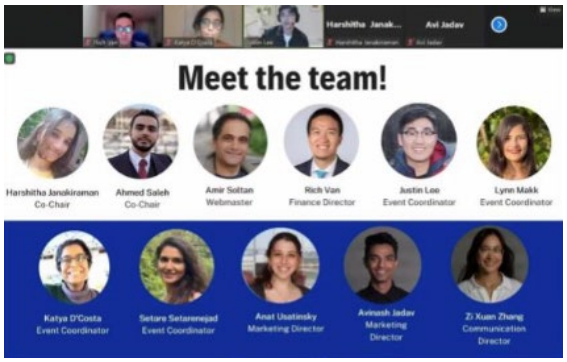
Overall, CPSIF is essential to our club because our events simply would not happen without funding. The funding provided our club with enough resources for our significant development this year: we diversified our event portfolio, scaled up our existing events, reached more students, and collaborated with more industry partners. For the second year running, we were also able to hold all our events this year completely free of charge for participants.

IEEE UofT also engaged a number of alumni this year. We had alumni as advisors, including Graham Hoyes (EngSci 2T0) and Lisa Li (EngSci 2T1), who also partook in NewHacks for judging and mentoring. At our Alumni Perspectives on Summer Research event in February 2022, we had Shervin Mehryar (ECE 1T2, current UofT research staff).

Institute for Leadership Education in Engineering: Graduate (ILead:Grad)

Total Funding Awarded	**$2,500**
EAN	$1,000
ChemE	$500
YNCN	$400
MSE	$350
MIE	$250

ILead:Grad is a cross-departmental student-run organization based out of the Troost Institute for Leadership Education in Engineering (Troost ILead) at the University of Toronto. ILead:Grad focuses on empowering engineering graduate students to identify, develop and strengthen leadership and professional development skills through engaging workshops and guest speakers. During the 2021-2022 academic year, with the support of CPSIF funds, ILead:Grad hosted 5 successful online workshops and guest speaker events which had a combined participant total of over 200 engineering graduate students. Funding was used to thank guest speakers for sharing their experiences, and to purchase prizes for a handful of participants.



ILead: Grad 2021 Team

This year with all events online due to the COVID-19 pandemic, we had the opportunity to have guest speakers and successful students from across Canada, the US, and the UK present and share their experiences and insights to the engineering graduate student community. Students had the opportunity to attend sessions led by University of Toronto staff, listen to academic and industry insights from abroad, and gain career and technical experiences by experts from within and out-of-province. We would like to thank all guest speakers and participants for attending our events this year.

Without funding from the CPSIF, ILead:Grad would not have been able to provide meaningful engagement and sufficient professional development and leadership workshops to the engineering graduate student community. We are deeply grateful for the support from the departments who funded us this year.

Interplanetary Space Exploration Team

Total Funding Awarded	**$1,150**
EAN	$200
ECE	$200
EngSoc	$200
YNCN	$200
MIE	$200
EngSci	$100
CivMin	$50

Here at Interplanetary Space Exploration Team (ISET), we focus on enabling undergraduate students to participate in the space design process and be exposed to the different considerations that arise in the field. We believe that students at the undergraduate level have the background knowledge needed to be able to strategically develop solutions for space exploration.

Interplanetary Space Exploration Team (ISET) received a total of $1150 in CPSIF Funding from various departments within the Faculty of Applied Science and Engineering, as well as the Alumni Association, Engineering Society, and YNCN. This year, ISET focused on designing a solution for an autonomous delivery system for humans and parcels, in continuation of making a Martian colony. The technical teams worked on developing software for automation of navigation as well as systems for producing air and collecting and analyzing Martian samples, separated into four different sub-teams.

As part of the projects we pursue, we aim to provide a delicate balance between the project's progress and providing ownership for our members in the projects we pursue. We split up our projects into smaller components that are manageable for a group of first-year students to work on with the guidance of a team lead who has knowledge of the systems involved and some technical concepts. This allows the general members to be directly involved in the design process as they learn not only the technical concepts involved but the necessary skills and assumptions that come into play when designing a space system. At the same time, the team lead can apply their knowledge and share it with others while also managing the progress of the project.

As a design team, our team's primary goal was to use the funding to build a prototype based on the final design proposal, as well as participate in space exploration-related conferences and present the final work. However, due to the continuing global COVID-19 pandemic, all team meetings were conducted virtually throughout the semester, preventing the team from utilizing the university's resources. Therefore, instead we applied $350 of funding to provide stickers for the upcoming F!rosh Week kits, and $400 was used to order the club merchandise such as patches and

hoodies. As capacity and gathering restrictions lift, ISET hopes to transition into in-person meetings in the upcoming school year.

ISET will be utilizing the remaining funding to attend different space-related conferences. SpaceEx is a conference being jointly hosted by Concordia University and Mars Society of Canada, happening in Montreal on November 19 to 20. ISET has successfully reserved a booth to present the final proposal from last year's Martian transportation project along with other previous projects such as the Martian colony layout and food production greenhouse unit. This will be a great opportunity for our technical team members to present their year-long work, as well as to advertise our team outside of the university network. Using CPSIF funding, the club hopes to reimburse at least 30% of the conference registration ($35 per student) and related travel costs (> $200 per member) so that any member can participate in the conference without any financial problems.

Finally, in the upcoming year, ISET wishes to host one community event, inviting U of T alumni in the space-exploration industry to share their journey with the team and the university community. This event will also serve as another opportunity for technical teams to showcase their projects and progress.

Virtual Full Team Picture (1st Row From Left) Raya Kouhifayeghdehkordi, Queena Chen, Somaita Tasnim, Aaliya Masood, Yolanda Chen, Christopher Jiang (2nd Row, From Left) Stephanie Lu, Sina Lakbala, Sohiel Hassan, Nilofer Hyder, Alex Brisebois, (3rd Row, From Left) Abdultayeb Huzeifa, Ruhaab Khan, Raian Ghafur, Jessie Jung, (4th Row, From Left) Vishal Radhakrishnan, Lillian Lysiuk, Justin Wang

Jewish Engineering Society

Total Funding Awarded	**$900**
EngSoc	$900

During the academic year of 2021-2022, the Jewish Engineering Society was approved for a budget of $900. Throughout the year, we used these funds to run all of our events, with its primary use being for venue rental, refreshments, and event decorations.

To welcome JES members back to school, we hosted a Sports Extravaganza event, where students got to play basketball, volleyball, and dodgeball. Teams were randomly assigned to help everyone get to know each other.

We celebrated Hanukkah of December 2022 by lighting the ceremonial menorah, listening to holiday songs, and enjoying each other's company. Traditional holiday foods and songs curated a Jewish holiday atmosphere for Skule students. Everyone enjoyed the holiday decorations, jelly donuts, latkes, and chocolate coins!

In March 2022, JES members celebrated Purim with the Bar/Bat Mitzvah party of every 12/13 year old's dreams! The night was full of holiday foods, cringey outfits, 2010's music, dancing, photo booth fun, limbo, and of course, stuffed animal prizes for the limbo and costume contest winners.

This important funding, which we received from the Engineering Society, allows us to create a space within Skule that celebrates and brings light to Jewish culture while strengthening the community of Jewish students and allies.

JES members: Zak, Avery, Seth, Maya, Iex, Eliezer, Gabriel, Shemaya, Dalya, Claire, Avishai, Rebecca, Rikki, Margalit, Dina, Exra, Jacob, Natalia, Layla, Atara, Daria

Let's Talk Science – U of T Chapter

Total Funding Awarded	**$8,500**
EAN	$6,000
BME	$1,000
ECE	$700
YNCN	$400
MSE	$300
EngSci	$200
ChemE	$100

Let's Talk Science is an award-winning, national charitable organization that aims to engage children, youth, and educators in science, technology, engineering, and mathematics (STEM) through a wide variety of outreach programming. Between September 2021 and April 2022, 46 unique volunteers at the University of Toronto, St. George (UTSG) dedicated ~1545 hours of STEM outreach preparation and delivery, reflecting a 292% increase from last year (394 hours). We also reached 37,873 youth in the Greater Toronto Area and beyond. In comparison, last year we reached 1804 youth, which means that this year we significantly increased our reach!

Let's Talk Science initiatives across the country are offered free of charge to educators in schools, after school programs, libraries, community groups, and more. Continued support from FASE ensures that the UTSG site can continue to offer the breadth and depth of programming developed over the past 26 years without the prohibitive costs frequently associated with STEM enrichment programs. We are particularly grateful for CPSIF funding this year because it helped us maintain a virtual format, while increasing youth engagement despite the COVID-19 pandemic.

Firstly, classroom outreach is one of the foundational pillars of the Let's Talk Science outreach program. This year, we reached 50 classrooms virtually with an almost 2000% increase in number of youths reached (~37,525 students. This large increase can be attributed to the expansion of our virtual outreach programs to reach more youth, with the help of CPSIF. With CPSIF funds, we were able to purchase a premium Zoom account for our volunteers to use and securely deliver virtual activities. Additionally, the funding was used to purchase materials for activities and for shipping costs to mail-out these supplies to educators and students. We are so proud of increasing both volunteer engagement and number of youth reached this year despite still being completely virtual!

Secondly, community partnerships are another pillar of LTS programming. This year, we are proud to have continued our partnerships with the Faculty of Medicine's Saturday Mentorship program, The STEAM League and underserved communities for at-risk youth such as Regent Park Community health program. With CPSIF funding,

we were able to purchase and ship out activity materials specifically to Regent Park Community Health Program where majority of the youth are at-risk and from underserved communities.

Thirdly, our site greatly values our volunteers who run these activities in their free time. To add value to our program and properly train our volunteers, we were able to hold our annual Equity, Diversity and Inclusivity (EDI) workshop and an Indigenous Worldviews workshop. Both of these were interactive workshops that encouraged participants to explore concepts in EDI and Indigenous Worldviews topics and to engage in discussion about tangible strategies to incorporate what they learned into everyday life and science outreach. These workshops sufficiently prepared our volunteers for our future Indigenous Programming happening in the summer, and for our partnership with the Regent Park Community Health Program for at-risk youth. CPSIF funding was used to provide speaker gifts for these highly sought after workshops.

Fourthly, the UTSG site of Let's Talk Science is widely recognized for our on-campus STEM enrichment events, including large-scale symposia. This year, we were able to successfully run 8 of these specialized symposia online and receive extremely positive feedback for the engaging virtual formats. Teachers and students who commented on how important these topics are in light of the COVID-19 situation and in keeping students engaged in STEM during this difficult learning period.

Although we were faced with a lot of difficulties this 2022, we are proud of the outreach we were able to do virtually thanks to the funding we received from FASE and CPSIF. Due to the situation, we were able to think of creative ways to implement our activities, keep students engaged in STEM, provide an enriching experience for our volunteers and even significantly expand our reach. We also delivered more outreach to at-risk youth. We hope to continue a mixed in-person and virtual format for the coming year and are excited to be able to deliver our symposia and visit classrooms in person, depending on public health guidelines pertaining to the COVID-19 pandemic. Every year, our activities have improved with the input of FASE volunteers and staff and we will continue to leverage these connections for the coming year.

On behalf of the volunteers, educators, and youth involved with Let's Talk Science this year, we would like to express our deepest gratitude and appreciation to FASE and all of the departments that supported our organization through CPSIF. The on-going support has played an extremely crucial role in helping us to expand the scope of our program, increase volunteer and educator involvement, and continue to offer free STEM programming to youth across the GTA. Thank you for helping us inspire the next generation!

Materials Industry Club (MIC)

Total Funding Awarded	**$770**
MSE	$330
EngSoc	$300
YNCN	$40

The Materials Industry Club aims to connect students with alumni and professionals in the materials industry and helps students with professional development. We do this by connecting students with organizations in the materials industry, publishing a monthly newsletter, and hosting events and workshops open to all students at U of T. Materials Industry Club (MIC) received $770 for the 2021-2022 Academic Year

In the fall term, MIC hosted a SolidWorks workshop via Zoom to help students familiarize themselves with CAD design for academic and professional development. Funding was used for a thank you gift card for the student instructor who helped us with the event.

In the winter term, the club hosted a virtual Research Showcase via Zoom. The event exposed undergraduate engineering students to research and internship opportunities within the Materials Science and Engineering department at U of T.

Eight professors from the faculty of Materials Science and Engineering spoke at the showcase and over 40 students attended the event. Funding was used to promote the event, for thank you gift cards, and gift card raffle prizes for students.

Finally, the club hosted its first two in-person events at the end of the winter semester, a club social and an exam study session. The purpose of these events was to promote the club's activities and recruit new members, and to foster a sense of community within the club. Funding was used to buy food for these events. Multiple students who attended these events later applied for club leadership positions for 2022-2023.

Funding from the CPSIF is essential to the Materials Industry Club since it helps us to better conduct the events as well as to maintain regular activities of our bank account. Additionally, the funding covers membership fees for the Electrochemical society, Materials Advantage, and other industry organizations that the club connects students with. The majority of MIC members are Materials Science Engineering students, and the funding we received was mostly from the Department of Materials Science and Engineering. The club plans to continue expanding the number of in-person events for the upcoming school year, including plant tours and more guest speakers, and will require more financial support from the university. We also aim to further expand our reach to graduate students and students in other disciplines.

Materials Science and Engineering Discipline Club (MSE Club)

Total Funding Awarded	**$5,915**
MSE	$2,980
EngSoc	$2,435
EAN	$500

This funding was used to enhance MSE students' social, academic, and networking activities. One major event that happened during the school year was Buckyball (March 18th, 2022), the largest MSE club event this year. Funding also went to other events such as the frosh event merch sale and year socials. Some events such as the PEY panel and reading week events were held online due to COVID restrictions on campus. MSE Club won the discipline club of the year by EngSoc for the 2021-2022 year. The main purpose of the MSE club is to hold events that bring together MSE students of all years. Buckyball was a big event and over 120 students and staff from the MSE department attended.

As the COVID restrictions unpredictable this year, MSE club had to get creative on spending our funding. This year, MSE club launched new merch so students can show off their MSE swag. It was a success and we sold ~50 hoodies this year to professors, graduate students and undergrad students. Funding from the CPSIF also allowed the club to order new patches, as the previous MSE patches were too small compared to the other disciplines.

MSE embroidered hoodies and new MSE logo patch

All in all, even though the year was conflicted with COVID, the club managed to spend its funding effectively through events and merchandise. In March, the annual MSE merch sale was held called "Home is Wallberg Day" where students come together and show their MSE spirit.

MSE club members at Buckyball 2T2

Materials Science and Engineering Graduate Students' Association (MSEGSA)

Total Funding Awarded	**$1,580**
MSE	$1,580

The 2021-2022 MSEGSA took office while the pandemic and the restrictions were still at their peak. Consequently, the graduate students' association focused on maintaining a sense of community among the graduate students in the Materials Science and Engineering Department and ensuring they had something to look forward to once the restrictions would be lifted. The MSEGSA organized monthly online hangouts accompanied by online games, from which students received gift cards to either pay for their dinner or because they won at one of the games.

We also created a Discord channel (social media) for our members to discuss various topics in a safe space. The MSEGSA ensured communication between undergraduate students, graduate students, and professors by partially paying for the meal of graduate students participating in the annual Materials Science and Engineering ball (The Bucky Ball), including every member of the Materials Science and Engineering Department. We also organized a photo contest among our members, in which the winners got to see their photos printed on canvas and hung in the Grad Common Room.

Printed Canva Hung in the Grad Common Room of One of the MSEGSA 2021-2022 Photo Contest Winners' Photo.

To give the students something to look forward to, the MSEGSA upgraded the Grad Common Room while it was closed due to the pandemic. We purchased multiple cleaning supplies such as a steam cleaner to clean the old dusty couch, garbage and recycle bins, a new coffee machine, coffee and snacks for students to enjoy daily, a Nintendo Switch and video games, multiple board games, and a storage cabinet for all the newly acquired entertainment accessories and devices. Since students can now gather in person on campus, the MSEGSA is so far holding a monthly board game night in the Grad Common Room.

Finally, the MSEGSA plans on holding a summer BBQ on campus in August, hosting video game and movie nights, purchasing lab coats and goggles to lend to students in need, and purchasing more commodities to further improve the ambiance in the Grad Common Room before the end of their 2021-2022 term.

Since the pandemic, the students' capacity to socialize has been reduced to a minimum, and it

was important for our club to get the funding to ensure our students a sense of belonging in an inclusive group which is the MSEGSA of the University of Toronto. Per an article from the BMC Public Health, social relations influence health, and social isolation contributes to anxiety, depression, and many other adverse health effects such as cognitive decline. That being so, obtaining funding to create online social activities and ways to motivate students to get out of their isolation was a priority for the 2021-2022 MSEGSA.

Moreover, with the perspective that the restrictions would loosen up at some point, the MSEGSA wanted to give its members something to look forward to and a place to resume their social activities. Our primary focus was to reconnect the Department of Materials Science and Engineering graduate students. Therefore, the MSEGSA needed a significant budget to update the highly outmoded and poorly maintained Grad Common Room. Since its reopening, the Grad Common Room has been busier than usual.

Mechanical Engineering Club

Total Funding Awarded	**$11,531.01**
MIE	$6,000
EngSoc	$5,531.01

Mech Club provides the Mechanical Engineering student body with resources for academic advocacy and support as well as networking and professional development. The main use of our funding is to finance all the events that we run throughout the year, whether it be for prizes, food, or to book a space. Additionally, the CPSIF 2021-22 funding was used for safety concerns, to buy things that kept people at a distance, allow for individually packaged snacks, or to get cleaning materials and provide personal protective equipment. The following includes events we hosted this past year.

Faux Frosh

This event was a campus tour for second-year students since that year those students had never been on campus, and we wanted them to get the chance to walk around and learn about the buildings and history of Skule like the first-year students do during Frosh. This isn't an event that was done in the past mainly because it was the COVID pandemic that made the necessity of this event. We would not have been able to host this event without the funding for food because many of these sessions were during meal times.

Spooky Scavenger Hunt

This event was a campus-wide scavenger hunt, where we placed 4 papers located at various location on campus that provided keywords with the next clues available when the right word(s) was used in a google form. The hunt gave students (individual/groups teams) a chance to explore locations they might not have been familiar with (Robarts cafeteria, SF library, Myhal balcony, and Mech common room) while working towards winning some Halloween candy prizes. The event received a good number of participants. The event hasn't been done in the past, with the pumpkin smash usually being the only Halloween-themed event in the past. We received a lot of positive feedback for this type of event, with very few technical difficulties; many asked for a repeat of this event in the same year or future years.

Pumpkin Smash

This event, a tradition with Mech club events, is exactly what it sounds like: people smashing pumpkins. In the past, large pumpkins were used to be smashed with a sledgehammer, however this year we couldn't get certain equipment or approval in time due to COVID, so we bought very small pumpkins (a bit larger than softballs), and these were thrown against a wall in Haultain alley against a garbage bag covering on the wall and

ground. Despite the slightly colder weather, we had around 20 or so people come out to the event for smashing pumpkins, and it was quite fun to watch.

Pumpkin Smash event

Valentine's Day Candy Gram

A Google form was sent out for people who wanted to send a candy gram to someone, where they could include a personalized message; the candy gram baggies had some gummy candies, kisses (chocolates), lollipops, and heart candy with words on them. We made the candy grams free for the first order, and one dollar for every additional one. The recipients picked them up in the common room during a specific time.

Mech/Chem Club Ski Trip

The ski trip was an over-the-day trip to Blue Mountain (between 8 am to 6 pm, roughly). We capped the event at 30 participants as we could only book one bus at a time; however, there was quite a bit of interest, so this event may expand in future years.

Engineering Olympics

This event was designed to allow students to explore different aspects of engineering student life and the Skule community through unique and varying challenges. Some of the challenges included; solving a crossword where the answers came from Skule history, running 20 km (continuous or separated), doing something cool with an Arduino, solving a leetcode daily challenge, swimming a 200 meter IM race, taking selfies with various engineering professors, etc. All of these challenges were created to have students step away from their textbooks and engage in the U of T student experience. The funding was very helpful as it was used for the prizes for the people who completed the most challenges, as an incentive to participate.

Additional events that required funding last year include class-representative pizza or donut parties/hangout, the Mech Iron Ring After Party, and various other Common Room improvements or mini-events, such as Pi Day, among many others.

CPSIF funding is our primary source of income. All of the money that we receive from funding goes directly back to our undergraduate students in the form of events, prizes, pizza parties, common room improvements/upkeep, and so on. These events allow us to continue engaging Mech students in the Skule community, and supports us in improving overall mental health and wellness by providing students with opportunities outside of studying and design clubs to socialize and connect with their peers

National Society of Black Engineers - U of T Chapter (NSBE U of T Chapter)

Total Funding Awarded	$4750
EAN	$1,000
EngSoc	$1,000
ECE	$700
ChemE	$500
BME	$300
MIE	$300
YNCN	$400
EngSci	$200
CivMin	$300
MSE	$50

General Operations

CPSIF funding supported our website platform payment on Wix editor. The website is https://nsbe.sa.utoronto.ca/ and it hosts information like the club's objectives, initiatives and sponsorship package, which enables potential partners and sponsors to gain better insights into our organization's activities and goals.

Highschool Conference

We hosted our first big event for the school term in November 2021, which is our annual high school conference. CPSIF funding supported payment for promotional material such as flyers and certificates of participation for the 60 students who attended, as well as prizes for second and third place winners.

NSBE Hacks

NSBE Hacks, our annual hackathon, is usually supported by external funding from sponsorship. However, the cost of the planning and operations was covered by CPSIF funding. This included payment for the hackathon website, Canva pro, Instagram and Facebook advertisements and typeform.

The event hosted about 300 participants virtually, from high school to alumni. We had individuals from varying educational background and ethnic background attend. It was 48 hours long with numerous challenges, workshops and speaker series. This year was our 4th year hosting the annual hackathon. We started this initiative to provide a safe space where minorities in STEM can develop their skills and create innovative solutions for our community.

Event hosted virtually on Gathertown

Overall, CPSIF funding has been pivotal to our club's operations like payments for social media advertisements, virtual and physical prizes for events and platform fees. With CPSIF funding, these expenses do not have to be the responsibility of key executive members. Next year, we plan to operate in a hybrid environment to take advantage of the benefits provided by both in-person and virtual activities. We hope to maintain continuous support from CPSIF to cover operations for in-person events especially.

Our biggest Alumni engagement activity last year was through NSBE Connect, in collaboration with the Alumni Mentorship Program and the Alumni Office. We began the process of creating a mentorship program with the Alumni through the platform but never got the opportunity to launch the program. So far, we have had fourteen students and two Alumni (Ama Ukala and Samson Kirk-Koffi) join the program and we are looking to increase that number for the following year.

Another event where we worked with Alumni was the Black Career Conference, hosted in collaboration with Black Rotman Commerce. We had Nnaziri Ihejirka, a U of T Alumni, be a speaker at the Engineering panel. The conference had over 500 attendees on the Air Meet virtual platform.

Overall, we plan to increase our Alumni engagement through our mentorship program and speaker series throughout the year. We hope to build a strong relationship with them and to better acquaint our undergraduate membership with them in a professional and social setting.

NeuroTechUofT

Total Funding Awarded	$1,750
ECE	$700
BME	$500
YNCN	$200
EAN	$200
EngSci	$100
MIE	$50

NeuroTechUofT is a community led by undergraduate and graduate students at the University of Toronto. We provide a space where those interested in the field of neurotechnology can learn together through mentorship and teamwork. We provide research-grade brain signal acquisition equipment worth thousands of dollars to students in the project teams.

We host beginner and advanced brain-computer-interface (BCI) development workshops to help students of all background levels gain an understanding of the various disciplines within neurotechnology, involving a variety of subjects from computer science and electrical engineering to neuroscience. These workshops empower students to pursue their own projects with a new or enhanced understanding of the field.

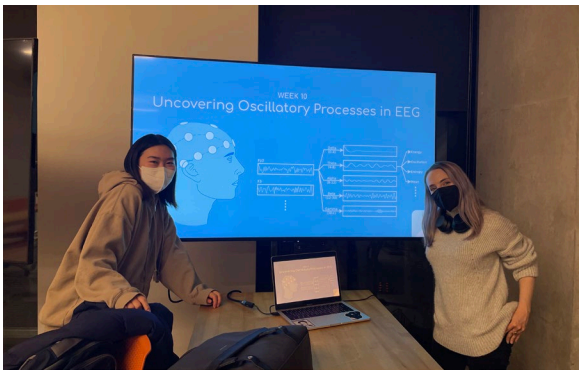
We also value our relationship with the community, by collaborating with organizations such as Autodesk to host social events, research fairs, and workshops to promote interdisciplinary idea exchange and networking among students, academia, and industry professionals.

For the school year 2021-2022, we were approved for $1,750 of funding from the CPSIF. Although the challenges of the COVID-19 pandemic persisted throughout this year, our teams came together for weekly in-person meetings to collaborate on our project submission to the NeuroTechX student competition (NTXSC) . When we submitted the application for CPSIF funding, we estimated the amount needed to purchase the necessary hardware to build a brain-computer interface project.

However, as the competition detail was released later in 2022, it was adapted to be entirely software based (due to considerations of clubs working remotely during the COVID-19 pandemic), which eliminated our need to purchase the hardware we originally budgeted. Instead, our expenses went toward building our own brain signal acquisition headsets (wiring, Arduino boards, screws, and batteries), providing refreshments for neurotech workshops, Neurostorm (neuroscience research discussion groups), and Hacknights (open-to-all project huddles/meet and greet).

Workshops, Hacknights, and Community Events

One of our main focuses this year is to build a strong and cohesive community, necessitated by the isolation we all felt during the lockdown. As COVID-19 restrictions were being lifted and on-campus activities resumed, we were finally able to launch our in-person workshops, which are open to all members at the club as well as the general community at UofT.



Neurotech workshop

A great example of our collaboration with prominent organizations that support student initiatives include our co-hosted workshop with Autodesk on how to create computer-aided designs (CAD) for 3D printing and prototyping. This series of workshops were open to the public and hosted through Zoom.

Our hybrid weekly meetings on (Hacknights) have also been running nearly uninterrupted to this day (Figure 4). These events are open to all members of the public. All our project teams are present during these meetings, and they work together on their projects, and members of the public can also attend the meeting and speak to and learn from these project members. They can also work on self-learning neurotech subjects, as explained in the next paragraph. The accumulation of our funding received from CPSIF allowed us to have multiple brain-signal acquisition headsets, such as the Muse headset shown in Figure 4, which can be used during Hacknights for people to gain a hands-on learning experience about neurotechnology and signal processing.

We have continued our subscription in a premium Slack workspace, which was partially paid for using the CPSIF funds. Last year, we secured an 85% discount by contacting Slack and requesting a discount or promotion based on the club's non-profit and student status. The premium workspace has allowed teams to hold spontaneous voice/video huddles which has improved productivity in a time where we are totally reliant on these tools. This workspace also allows us to focus file sharing, document sharing, and all else on one single platform, with all history accessible. The impact of our community efforts is quantified by us reaching our goal of achieving 400 followers on Instagram (Figure 5, our primary channel of social media promotions where we share event details and highlights).

Headset Team

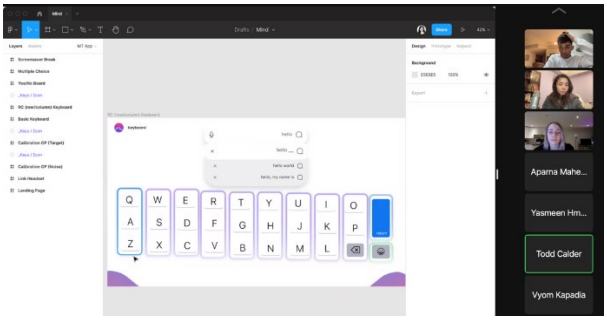
This team has been continuously working on developing prototypes of an open-source 3D-printable electroencephalography (EEG) headset. This year, we built off our progress from the previous year and were able to finally test our prototype for the first time (Figure 6). We purchased more screws and bolts, wires, and batteries to support the experimentation process. We also purchased more TPU and PLA (material used for 3D printing).

Hacknight meeting at Myhal using frame from opensci headset.

Xavier (Mind Controlled Keyboard)

For the NeurotechX (NTX) Competition this year, the challenge requires us to create a brain-computer interface (BCI) for communication based on a visual paradigm (Figure 7). Our team designed a mind-controlled keyboard that combines eye tracking with brain signals (EEG) with the ability to connect the device to an online server and communicate with the jury via their BCI alone. The 3 challenges are (1) Typing Sentences, (2) Yes/No Answers, and (3) Multiple Choices Answers (~3-5 options). Such a virtual international online BCI competition has never been done before and our team used the existing headset and the headset we are building to test this software-based project, minimizing the budget expense. Due to staffing issues and ongoing challenges posed by the COVID-19 pandemic, NTX decided to postpone this competition to 2022 Fall.

The CPSIF fund enables our club to build multiple iterations of our projects, improving our skills and knowledge year after year. On behalf of NeuroTechUofT, we are incredibly grateful for the generosity and the support. This summer, our club is focused on continuing to develop the Xavier Mind Controlled Keyboard, which will be submitted to the NTX Competition in 2022 Fall. We will also be hosting our next series of Neurotechnology workshops starting July 7th, 2022. As the foundational skills are built through these workshops, our club aims to expand our project scope to building a full-scale, mind-controlled robot, incorporating components from our previous projects made possible through the previous years' CPSIF funding. We hope to compete in more international competitions and act as a positive representation for the innovations and brilliant minds of UofT students.



Xavier, the mind controlled keyboard design prototype

PEARS Engineering Branch

Total Funding Awarded	$1,850
EAN	$500
ECE	$300
MIE	$300
EngSoc	$200
CivMin	$150
BME	$150
ChemE	$100
EngSci	$100
YNCN	$50

This past year, the PEARS Engineering Branch was very fortunate to receive $1850 in funding from CPSIF. Through the funding received, PEARS has began creating a culture of consent and educating people in the engineering community on issues surrounding sexual and gender-based violence. As a club we have facilitated programming, workshops, and community building events. With the funding we received, we were able to cooperate with Lotus Strength and Wellness to host a trauma informed yoga session that prioritized comfort and self-exploration over technique. Another program that was made possible thanks to contributions from the CPSIF is a free safe sex and menstrual supplies distribution program. The aim of this program was to normalize and encourage safe sex within the school community as well as to reduce the cost of menstruation. We aim to continue the inroads we have made with this program further into the 2022-2023 school year.

The club's highlight of the year came in April where we were able to support other branches of PEARS in the Students for Survivors Protest through a poster making workshop and community building event. The posters that we made were then used in the Students for Survivors protest organized by PEARS and the UTSU. This protest gave a voice to over 100 survivors to advocate for positive change in the university's policy on sexual violence. The posters we made helped to create an environment where survivors were prioritized and heard. The funding from CPSIF helped to create the a supportive and welcoming community at UofT.

Posters from the protest

Lastly, we used the funding from CPSIF to train over 50 students to identify and intervene in instances of sexual violence that may happen in the Skule community, This includes instances that may happen in the classroom, or in the broader Skule community. In particular, we have focused on training SUDS servers on how to make higher risk settings, like bars, safer and more inclusive. Additionally, we have provided training to over 30 students on how to support survivors who want to disclose or report and incidence of sexual violence. In providing training to students in the engineering community, we hope to invest in the future of Skule and in the idea that everyone deserves a safer space.

On behalf of The PEARS Engineering Branch, we would like to thank the Mechanical and Industrial, Chemical, Civil and Mineral, Engineering Science, Electrical and Computer Engineering, Biomedical Engineering departments as well as the Engineering Alumni Network, the Engineering Society and You're Next Career Network for supporting students in our goal of eliminating gender-based violence on campus.

QueerSphere

Total Funding Awarded	**$1,490**
EngSoc	$675
ECE	$130
MIE	$130
BME	$100
EAN	$90
CivMin	$90
ChemE	$90
YNCN	$85
ChemE	$50
MSE	$50

QueerSphere is the engineering 2SLGBTQ+ student group here at University of Toronto. We hold educational and social events with the goal of creating a safe and inclusive space for 2SLGBTQ+ individuals to engage in positive discussion, spread awareness, and increase visibility within the engineering department. The funds we received from CPSIF were essential to fulfilling this goal.

QueerSphere was honoured to receive $1,490 for the 2021-2022 academic year from the Departments of Materials Science and Engineering, Mechanical and Industrial Engineering, Chemical Engineering & Applied Chemistry, and Civil and Mineral Engineering, the Division of Engineering Science, the Edward S. Rogers Sr. Department of Electrical and Computer Engineering, the Engineering Alumni Network, the Engineering Society, the Institute of Biomedical Engineering, and the Your Next Career Network. These funds were used towards purchasing online/physical game services/incentives/supplies to support our Gay!me On and Murder Mystery Halloween event, hiring several drag performers for Pride Suds, and providing food and refreshments for our Grad x Undergrad Chapter Mixer event, all serving to increase participation and enhance our participants' experience together.

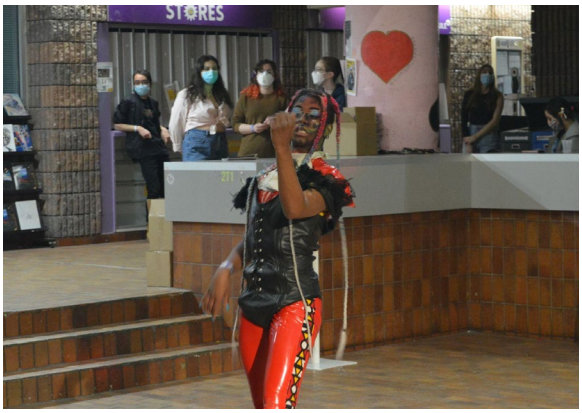
As we maintained our adaptability for both online and in person events, we hosted a Gay!me Night with prizes on the QueerSphere Discord server, which serves to offer people a support network to foster friendships and meaningful connections, one that is continuously available especially for those who are unable to attend events in person for safety and personal comfort reasons.

Our first in person event was a Halloween Murder Mystery, hosted at the board game café Snakes and Lattes. It was a fun and casual event for people to meet and see each other in person for the first time in a long while, with plenty of sharing and bonding opportunities via the games. We were happy to see our members mingle with each other and invite their friends from different departments.

Murder Mystery Night – Participants and Executives: (from right to left, from 1 over from the right) Kyra Poupore, Selena Chen, Katharine Armstrong

We also had our first collaboration and successful hybrid event with the newly formed Graduate Chapter of QueerSphere. We held a Grad x Undergrad Mixer night in the Village at O'Grady's where our students got to sit down and chat with 10 queer graduate students, many of whom were UofT alumni for their undergraduate education as well, and learn and ask about graduate school and industry. Graduate members also rotated around a laptop to provide the online accommodations for the students. Overall, the event was largely successful in introducing the two chapters, and we hope to expand this collaboration into a more structured mentorship program in the future.

Lastly, our biggest event was in collaboration with Pride Suds, where we brought in four drag performers to sing and dance live. Three were local to Toronto and one was visiting from Ireland. As our last major event of the year, turnout was high with several familiar and new faces brought in from both clubs' reaches. It was a memorable night of revelry and respite from work that we were celebrating together.



Pride Suds – Drag performer: Manny Dingo

Overall, this year has been a major success. We are very thankful for the support CPSIF gave us that enabled our successful reintegration to in-person events. It has been a long year for QueerSphere with the unexpected step down of our President and interruption in our operations, but we persevered and gave our fellow 2SLGBTQ+ members a space to thrive and belong to. To see all the different groups and backgrounds come together in solidarity instilled a sense of accomplishment as we carried out the mission on which this club was founded upon. The Skule student body, faculty, and alumni network is an ever-present and strong community.

Our executive team has put in a lot of effort into this year and is proud of the work we have done. We are continually growing as a club and a community, and we are excited for our future plans. Thank you again for all the support and a great Skule year!

Robotics for Space Exploration (RSX)

Total Funding Awarded	**$6,750**
ECE	$3,500
EAA	$1,000
MIE	$1,000
EngSci	$600
YNCN	$400
MSE	$250

Robotics for Space Exploration (RSX) would like to thank the Skule Alumni for their continued generous support in our initiatives. RSX is the University of Toronto's FASE design team that designs space robotics to compete in international competitions such as the University Rover Challenge (URC) in Utah, the European Rover Challenge (ERC) in Poland, and the Canadian International Rover Challenge (CIRC) in Alberta. Last year, the Robotics for Space Exploration team was provided $6750 by the Centralized Process for Student Initiative Funding (CPSIF) for use in our endeavors, and we as the team would like to thank the CPSIF committee and its sponsors for opening up opportunities for our team and its members.

The word of the year for our financial decisions in 2021-2022 was investing. We strived this past year to invest in our team for the years to come. We invested in our members, our tools, our facilities, and our branding and marketing. In addition this year, we were able to resume our normal operations in person halfway through the year; finally allowing our team to acquire parts and fabricate our designs once again. We also allocated a significant portion of funding to internal marketing to bring excitement in our team to attract and retain new members. We strived to inspire our young engineering students to not only recognize all the skill development that our club can offer in the long term but also to bring them into the international community of space robotics enthusiasts that we are lucky to be a part of since our establishment in 2014.

The impact of the funding provided to us can be seen in our new PPE investments, which provide a pair of safety goggles assigned to each member who needs one, or in our tool library, with new Bench power supplies, multimeters, LCR meters, and a library of SMD components. Moreover, funding has allowed us to invest more in the Space Science Division of our team through higher quality cameras and expanded experiments for detecting life and habitability on Mars. Through this effort, the Science Division was able to achieve a perfect score in our 2022 application for the University Rover Challenge (URC).

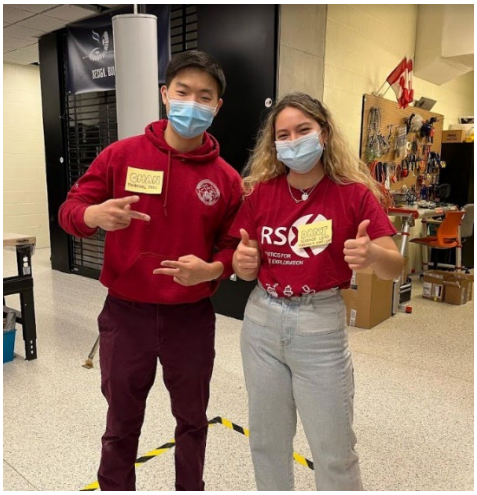
We have also engaged in rebranding efforts through a new logo and a more well-defined branding strategy to market to new students and rebuild our team after two years of virtual connection. Through CPSIF funding our team was

able to purchase and distribute merchandise last fall which allowed RSX to regain the sense of tight-knit family that we have always strived to maintain. This was shown to increase team spirit and morale as member retention improved twice-fold compared to last year.

In addition, through our marketing efforts, we were proud to have engaged with the RSX's co-founder and UofT alumni, Rahul Goel. The executive body met with him virtually and had a riveting conversation about the history, the present, and the future of RSX, in addition to how our team can improve our outreach efforts and what exciting things we can look forward to in the space robotics industry. Our connection also led to a sponsorship opportunity as Rahul graciously contributed a Gold Tier sponsorship through his start-up company, Nord Space.

The funding we receive is crucial to RSX's operations and enables our team to continue to foster technical skills in the areas of engineering, mechanical, electrical, and software design, scientific applications, (autonomous) robotics, marketing, project management, and finances.

We cannot thank the Skule Alumni enough for their support in helping remove big financial barriers and allowing our team of young space robotics enthusiasts to flourish and develop a range of skills through hands-on learning. Due to the pandemic, our sponsorship activities were severely affected, thus the financial support provided by CPSIF was especially valued in helping us purchase materials we needed during the year.



Chan and Daniela wearing new RSX merchandise

RSX's 2021 Rover: Road-Runner

Skule™ Badminton Club

Total Funding Awarded	$750
EngSoc	$500
ECE	$100
EngSci	$50
MIE	$50
MSE	$50

CPSIF funding was used to host a casual tournament amongst SBC members (the majority being engineering undergraduate students), and largely went towards booking the gym space needed to run the tournament, as well as prizes for winners. The tournament style was mens and womens doubles in collaboration with the University of Toronto Badminton Club. Remaining funds were used for court bookings at the Athletic Center for SBC's bi-weekly court hours, where members met up for casual play.

Funding was essential in allowing SBC to run the doubles tournament during the fall semester, as we were able to provide recreational, non-varsity undergraduates a chance to play the sport of badminton in a slightly more competitive setting. The tournament itself not only allowed students to challenge their badminton skills but also to interact amongst other badminton-savvy students. As the tournament was open to students of other majors and graduates, students of various years and programs were able to meet and network from areas ranging from undergraduate health sciences, to engineering graduate students. Overall, this event was successful in increasing awareness about the robust Skule community and eliminating any preconceived negative stigma about engineering students being absent in extracurricular activities and involvements, to other undergraduate students in different fields of study and academic programs.

CPSIF is our club's main source of revenue. We ask members to pay a small membership fee to assist with the budget, but this source of revenue is not nearly enough to keep the club afloat. Without CPSIF funding, the club would need to ask members to pay unreasonable amounts to support booking fees and miscellaneous expenses. Without CPSIF, we would not be able to organize larger events where students from engineering and other majors come together and connect as a larger badminton community.

This year, we had several members from the alumni community attend our in-person events. Specifically, at the SBC Court Hour on April 2nd 2022 and the SBC Tournament on November 28th 2021, around 5-10 alumni participated as players at both these events. SBC plans to engage future alumni in organizing tournaments for the upcoming year and the executive team is confident that alumni participation will continue to grow throughout the following years.

Skule™ Choir

Total Funding Awarded	**$750**
EAN	$250
ECE	$200
EngSci	$100
MIE	$100
MSE	$50
CivMin	$50

Skule Choir is very grateful for the support of the departments who contributed through the CPSIF. This was our club's sixth year, and this support is especially important to us as a young club. In particular, this year's funding allowed us to invite musical professionals from across Ontario to lead workshops on vocal techniques, providing unique educational opportunities for our choristers. The funding also allowed us to purchase sanitary and health protection supplies for returning to in-person rehearsals, providing our choristers with the opportunity of face-to-face choral practices with our conducting team for the first time since the COVID-19 outbreak. Unused funding will be carried forward to the next fiscal year to continue on our special project which involves commissioning original music from a local Canadian composer. With the support from the faculty, we were able to transition our operation online and provide engineers and the wider university community with the opportunity to make music together regardless of geographical location.

In the past, the main ways for alumni to engage with our club were joining as members or attending our concerts. This year, we continue to have alumni as our choir members. Moreover, our performances are posted as video recordings on our choir website and social media for access to the greater alumni community. Although the composition of the audience is not clearly gauged due to the nature of our performance, anecdotal evidence from our members still suggests that some alumni viewed our performance videos.

This funding is important to our club since it is impossible for us as a newly-formed music group to cover our costs. Concerts were our main source of revenue, which being limited to online activities deprived us from gathering revenue.

Hyperlink to choral recording of Deep Peace, Healing Light for Remembrance Day:

https://www.youtube.com/watch?v=PIrwJDXnZIM

Skule™ Dance Club

Total Funding Awarded	$500
EngSoc	$500

Skule Dance Club offers a great opportunity for students who are passionate about dance in Skule and the broader U of T community to come together, make new friends and dance. Especially during stressful times such as midterm and final exam season, dancing is a good way to stay active, relax and destress. Skule Dance Club's funding was used towards many different events including providing snacks for clubs fair, bringing in experienced dancers from the Toronto dance community to judge the frosh week dance battle, and offering food at general meetings with our members. In the past, the funding has also been used for buying costumes for performances and socials for our members; however, these events were cancelled in 20212-22 due to the COVID-19 situation.

Skule dance club welcomes any alumni that are interested in staying with or coming back to teach the SDC community. Three of our former presidents have continued to teach classes with us following their graduation, so our club provides an incredible forum to stay connected with past students and allows individuals to network and socialize in a comfortable, supportive and compassionate environment.

SDC Hip Hop Performance at Matriculation led by Justin Abella

The funding we received from CPSIF is important to us as it is our only source of financial support. It helps us provide engaging events for our members and help with performance opportunities. In the future, we hope to reallocate our funds to hosting social dance events and designing merchandise like T-shirts, hats or wristbands to encourage a sense of community among our members.

SDC K-Pop Dance Group for Festival of Dance (FOD) led by Kaitlyn Low

Skule™ Financial Literacy Club (SFLC)

Total Funding Awarded	**$2,050**
EngSoc	$900
EAN	$500
ECE	$200
YNCN	$200
EngSci	$100
MIE	$100
ChemE	$50

The Skule Financial Literacy Club (SFLC) is an organization that is dedicated to educating students about personal finances. We are a student-run organization at the University of Toronto that encourages the management of household income and consumer financial services and circumstances; these are essential life skills that are crucial for our day-to-day lives but aren't taught. Our goal is to bridge the gap between the financial world and the average student life. SFLC's funds were used to facilitate 13 financial literacy-based events, including 6 seminars, 4 workshops, 2 panels, and 1 booth event. SFLC used its funds to conduct its first in-person booth event on budgeting, for honorarium transactions, to maintain our website, to award students prizes for participating in the interactive portions of SFLC events, and to conduct social/team events.

Through our events and dedicated content on financial literacy, we have reached 1000+ students on our social media pages and a total of 194 attendees from faculties across the St. George Campus, including students from the Faculty of Applied Science and Engineering, the Faculty of Arts and Science, Rotman Commerce. The funds were used to maintain our website, which directed students to our content, and events and provided a platform for students to get more involved with the club and its mission as executive or general members. The honorarium has allowed us to involve engineering faculty, engineering alumni, other University of Toronto alumni, and industry leaders to create and spread financial literacy on campus. The funds used for feedback raffle and in-event Kahoot activities improved engaged participation, increased event attendance, and ensured timely feedback on our events. The funds directed towards in-person activities like the booth and giveaways, improved our club's reach, allowing us to engage more people in the financial literacy month content we had planned for the month.

The specific impact of these outreach, planning and executive mechanisms facilitated through the funds provided by the CPSIF is best explained through student testimonials:

"After attending SFLC's events, I feel so much more confident in handling my personal finances and staying out of debt after I graduate. I have learned about a variety of topics, including but not limited to: budgeting, filing taxes, credit & debt,

insurance, additional income strategies, finances for engineering students, investing in cryptocurrency, and money-saving strategies for grocery shopping and mental health resources. SFLC is supporting us with the essential financial education that every student deserves to have, however does not have the chance to gain from conventional schooling. I strongly recommend SFLC to continue delivering their events and spreading financial awareness to as many students as possible." - 3rd-year Electrical Engineering Student

"Having attended SFLC's events as a Life Science student, I can truly say their mission is universal. The events they host apply to all students, and I have become a lot more financially-literate with them. I have actually used a lot of the advice and knowledge provided by their amazing guests. The club itself is well-organized and are super friendly so you can reach out to give feedback and ask questions very easily! I would highly recommend this club for those looking to gain financial knowledge and real-world advice!" - 3rd-year Neuroscience Student.

This funding was important to our club for three main reasons:

1. We attracted students to our events with prizes, increasing not only attendance but participation.
    - We used a two-fold approach with our giveaways. We would give a prize for the first-place Kahoot winner, which incentivized active listening during our events and increased retention of information for students.
    - The feedback raffle ensured that we were receiving input from students for each of our events and helped us improve our events and optimize them.
2. We enticed students to our club via our booth and social media giveaways during Financial Literacy Month.
    - Through our giveaway boxes and prizes that our funding paid for, for our FLM booth activity, we were able to increase our follower count and Instagram activity.
3. We demonstrated gratitude to our speakers through honorariums.
    - It's important to SFLC that we show our speakers that we value their effort and time. In this way, we have built meaningful connections with multiple speakers.

Skule™ Orchestra

Total Funding Awarded	**$2,200**
EngSoc	$600
EAN	$600
ECE	$400
EngSci	$200
CivMin	$200
MIE	$100
MSE	$100

2022 was an interesting year for Skule Orchestra as it marked the transition from online back to in-person rehearsals and concerts. As classes returned to hybrid and in-person form, Skule Orchestra had to equally adapt and attempt to offer the in-person format its members desired, while ensuring that safety was the utmost priority of the orchestra. Ever conscious that having all members masked was not possible due to the nature of wind instruments, Skule Orchestra did conduct in-person rehearsals with adequate social distancing of 9 feet for wind instruments and 6ft for stringed instruments. This allowed us to have both concerts in person to some extent.

With Covid, Skule Orchestra inherited a large surplus compared to previous years. Covid had prevented the orchestra from renting out concert venues and performing for a live audience, and as such, saw a sharp decline in spending. Skule Orchestra entered the 2021-2022 season with a surplus of nearly $2450, compared to $800 in the last completely in-person year of 2018-2019 (a small surplus is generally maintained as most checks/deposits for the fall concert have to be made before CPSIF decisions are announced). As such, Skule Orchestra requested a far smaller stipend this year ($2200) compared to previous years (e.g. $3500). This was explicitly asked for to reduce surplus.

2021-22 CPSIF funding allowed Skule Orchestra to hold two concerts. The first concert was the pops concert held in November 2021. Though the concert was recorded in-person, the concert premiered online. In this concert, Skule Orchestra was able to perform a full hour of music, with the theme “pops across time”, taking our listeners on a journey from the Jurassic Era through to the industrial revolution. We played hits such as the Jurassic Park theme, The Pirates of Penzance Overture, and Bizet’s Carmen. This concert was performed at a cost of $1020, mostly in the cost of renting instruments, recording equipment, and appropriate lighting and cameras. This is far below the cost of an in-person concert. The revenue of this concert was expected to be reduced due to the online nature, and indeed it was, netting only $355 in revenue.

The second concert held was our return to in-person - Skule Orchestra's Symphonic Boom Concert. Though the semester started online, we were quickly able to return to in person and remain in person for the concert. We played a series of hits from Skule Orchestra's past, mixed in with a healthy dose of new pieces. We played pieces such as Saint-Saens Suite Algerienne, Debussy's Clair de Lune, Marquez' Danzon no. 2, and the ever-famous blue Danube Waltz. This concert was operated at a cost of nearly $2900, netting a modest $700 in ticket sales as we returned to in-person. This concert would have been impossible without the generous support various departments and organizations who fund us via CPSIF.

Without continued support from CPSIF, Skule Orchestra would never have been able to return to in person activities. As in-person concerts come back, we hope that Skule Orchestra will be able to provide a venue for engineers to express and experience music for years to come.

Skule™ Ski Club

Total Funding Awarded	**$1,500**
EngSoc	$1,000
ECE	$200
MIE	$200
EngSci	$100

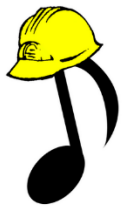
The Skule Ski Club strives to deliver accessible trips to students by reducing the barriers to entry associated with winter sports such as high costs, experience and lack of transportation. Through this fund we were able to not only meet our club mission, but exceed it.

Starting with our ski trips, we were able to facilitate multiple Blue Mountain trips with affordable skiing/snowboarding lessons subsidized by the club funds. During our Mont Tremblant trip, we were able to cover the costs of skating and snowshoe rentals for club members that chose not to ski on the last day, but still wanted to participate in an activity. Furthermore, we were able to continue the club spirit through off skiing hours by organizing night events. With our ability to rent out an entertainment room where drinks and prizes were being offered, we were able to gather everyone together for a fun time. Outside of skiing trips, we also had flexibility in hosting social events for the club with food and drinks covered.

Having the funds allowed the ski club to expand our active lifestyle mission beyond just skiing and snowboarding. We were able to open up other physical activity opportunities to inexperienced and experienced skiers and snowboarders. By covering the costs of the skating and snow shoeing experience, we eliminated a barrier to entry for students like the high costs associated with winter activities. This comes back to our club statement of welcoming all levels of experience thus being able to create an environment that cultivates a willingness to learn mindset.

It was important to our club to have these funds to deliver more affordable experiences to students. As students, there are many more items on our list of expenses that we would have to prioritize over skiing/snowboarding experiences. Having the funds allowed our club to lower the costs and encourage students to participate in an activity outside of academics. As we were able to provide students economical options to participate in our club activities, we were able to double the engagement from previous years! Engagement ranged from current undergrad students to alumni.

Skule™ Stage Band



Total Funding Awarded	**$300**
EAN	$300

The Skule Stage Band is a student-run organization which is composed of a big band, Stageband Gold, a smaller band, Stageband Blue, and Jazz Combo. Over the year, we have performed live jazz music at various Skule and community events. This year, we received $300 in CPSIF funding, all of which was from the Engineering Alumni Network.

The main focus of the band's executive team over the past year was determining how to restart band activities in person after operating fully virtually for a year. One key part of this was the Jazz Combo. Starting in the Fall, Jazz Combo (a smaller group of ~5 members) regularly booked a downtown rehearsal space for a set of socially distanced practice sessions over the year. CPSIF funding was instrumental in funding this, as well as paying for transportation to and from venues for Combo. CPSIF funding also allowed us to purchase a GoPro camera to record rehearsals as well as band performances. A hard drive purchased last year with CPSIF funding helps us make the most of the camera, as we can store recorded footage on the drive for reference. Post-show food for Stageband Gold was also ordered using CPSIF funding. This further built group spirit and identity, as the band could return to Myhal after one of our performances and eat pizza together, reflecting on the day's playing in the process, as opposed to having everyone get and eat dinner on their own.

Several purchases of charts and equipment were planned before the pandemic and lockdown made them impossible. Now, with this hopefully in the past we can move forward with these purchases over the coming years. One such planned purchase was a double bass, which would be a first-time addition to the Skule Stage Band.

This year, thanks to the funding provided through CPSIF, the Skule Stage Band was able to put together a string of well-attended performances in the community. In fact, our bands performed at 6 different events, surpassing the 5 pre-pandemic performances we had over the 2019-2020 year! These performances included the following:

- Gradball: Combo performed for ~1 hour
- Sports Association Dance: Combo performed for ~1 hour
- Cannonball Dinner Dance: Gold performed for ~1.5 hours
- Supermarket Bar: Gold, Blue, and Combo performed for ~3 hours
- Malcolm McGrath Memorial: Combo performed over 2 days
- Sandford Fleming Library Opening: Combo performed for 2 hours

All performances were extremely well-attended by the Skule and UofT community. Many alumni also attended these performances, with numerous alumni at the Supermarket show. We are especially grateful to the Engineering Alumni Network for their continued support and we look to extending event invitations to them.

CPSIF funding from previous years helped us found Stage Band Blue four years ago. The band was started to provide more musicians in the Skule community an opportunity to play in an ensemble, as Stage Band Gold could not accommodate all interested musicians in Skule. This year, the band has had an excellent in person season with one performance under their belt, and many promising musicians. We have restarted separate rehearsals for Blue this year, after discontinuing them over the pandemic and we look forward to continuing Stage Band Blue's success in the coming years.

Members of Stage Band Gold at the Cannonball Dinner Dance

Spark Design Club

Total Funding Awarded	**$4,150**
EngSoc	$1,700
ECE	$1,000
EAN	$800
MIE	$400
EngSci	$250

Using the $4150 funds received from the Centralized Process for Student Initiative Funding, Spark Design Club was able to complete two year-long display projects in parallel and expand to include a Manufacturing Group component to finish displays designed during the previous all-virtual year. The funds came from the support of the Engineering Society, the Engineering

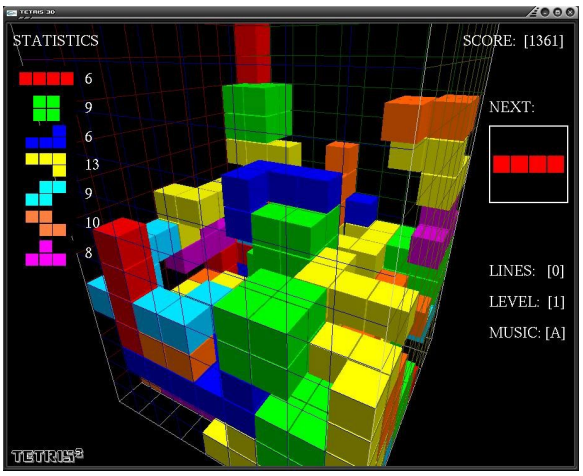
Alumni Association, the Department of Electrical and Computer Engineering, the Department of Engineering Science, and the Department of Mechanical and Industrial Engineering. We really appreciate all the help we have received and would like to thank each of these organizations; our club would not be able to continue sharing the joy of fun, creative engineering without their generous support.

Our main focus this year was to learn and build interactive electromechanical displays which could adapt to different settings. We recruited a group of 35 dedicated, diligent students (Sparkers) to design, source, and prototype via meetings held online and later build in person on campus. We believe that through prototyping and the design iterative process, students would gain valuable hands-on engineering skills as well as real-life problem solving. This year, CPSIF money funded two displays, which had a greater complexity than any Spark displays ever before. The money also allowed us to invest in new tools and equipment that will enable us to work in parallel and be more efficient in building our future displays. In the remainder of this document, we'll go over each of these projects in a bit more detail.

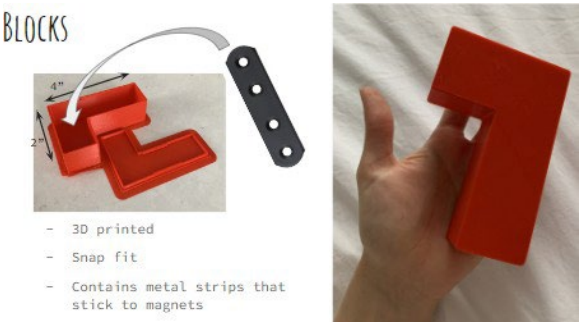
Display 1: 3D Tetris

Putting a twist on the classic game Tetris, Spark Design Club's has been developing 3D Tetris. In this updated iteration, the player must place 3 Dimensional Tetris blocks

During the process, general members were tasked with mini-projects to help determine future decisions. Using household items and the school's fabrication facilities, our team was able to create low-fidelity prototypes to test concepts and update models with a quick turn around. One of the main challenges for the system was the logistical difficulty of arranging and scoring the blocks. In the end, we created various iterations of a computer vision program for scoring, as well as several iterations on the design of the sorting mechanism.



Inspiration for our display



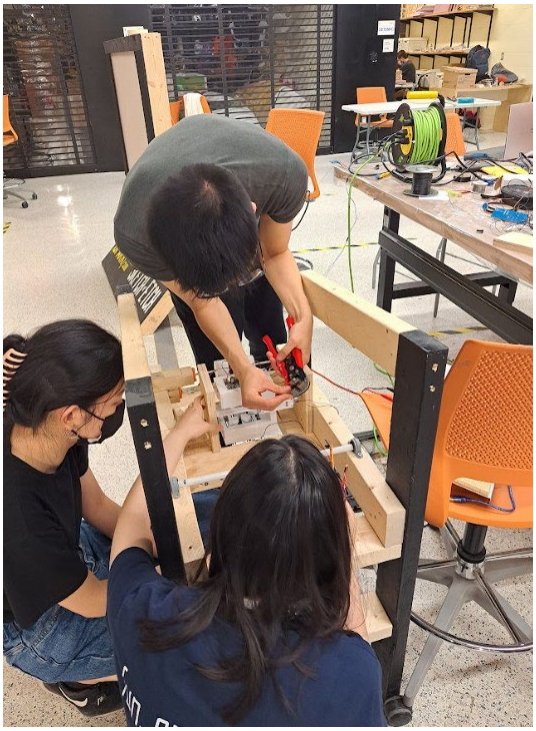
Prototype of one of the blocks

Display 2: Sketch N Etch

For this display, we sought to recreate a large, LED version of the original childhood handheld toy, Etch-a-Sketch. There is an additional charm of a receipt printer which mechanically punches holes in paper, so you can take away a snapshot of whatever you designed on the screen. In between active drawing time, our general and exec members designed and coded animations for students to enjoy as the machine is idle.

Our exec and general members created detailed CAD models as well as electrical schematics for the display. They had done many prototyping sessions with the solenoid design, PCB creation, the receipt printing mechanism and soldering various components. We focused on having modular components in our design, which allowed members to prototype modules separately. The modularity helped speed up the assembly process in May.

They finished assembling, building, and coding the display over the summer, and we are very excited for it to be displayed to the student body in the upcoming school year!



Action shot from a build day

Sports Analytics Group

Total Funding Awarded	**$950**
MIE	$400
EAN	$200
YNCN	$200
EngSci	$150

In our budget, we allocated slightly more than $4500 of our carry forward from last year of $4708 toward in-person events we could use to grow the club. These included monthly seminars, tutorials, watch parties, as well as many other in-person events. However, with the COVID shutdown in December as well as the majority of our events being moved online or cancelled in the case of our sports analytics hackathon, we did not use the funding provided to us for the most part, with the hope that next year we would be able to fund larger in-person events which would grow the sports analytics community at the University of Toronto.

Despite not using the funding provided to us through CPSIF, UTSPAN ran weekly "UTSPAN hour" events, where our executives provided tutorials on important topics including data visualization in python, an introduction to SQL, as well as assisted UTSPAN members brainstorm their own projects to allow them to gain recognition in the sports analytics community. At the end of the year, we held a showcase to exhibit all of the projects our club had developed over Zoom. These included projects in soccer, volleyball, ultimate frisbee, baseball, hockey, and basketball.

This funding is essential to our club as it allows us to hold events and invite guest speakers to grow the sports analytics community. While we were unable to host events in-person this year and apply our funding, we plan to use CPSIF to host our own yearly hackathons as well as run in-person seminars where we are able to bring in guest speakers and provide food for our events and learning opportunities for our members in the field of sports analytics.

In past years, our club has invited alumni back to speak at our events. This year, we were unable to host in-person events and we did not want to record our tutorial sessions as our guests were significantly less likely to participate if they were being recorded at our events. For our seminars, we recorded these events and posted them on our YouTube channel over the last two years, and these seminars can be found at the link below: https://www.youtube.com/channel/UC7AIGXzoWnONkFE8vC2neGg/videos

Sustainable Buildings Network

Total Funding Awarded	**$807**
CivMin	$507
YNCN	$200
EAN	$100

The funding was used to first develop and maintain SBN's website, which is a platform that connects anyone who is interested in SBN to our social media pages, all upcoming and past events descriptions and registration information, and introduces visitors to our network and other resources in the field of sustainable buildings. The website domain and service used to host the site requires a monthly fee, which was paid using the money received from CPSIF.

Secondly, funding was used to promote the network through custom promotional stickers as well as tote bags sent out to participants and judges of our annual Sustainable Buildings Challenge (SBC). Stickers were handed out to all students who attended our in-person grad research networking event series and all in-person workshops hosted in the winter semester. The tote bags were the sustainable option as they reduced the use of plastic bags and could be used for various activities. These methods of advertising allowed SBN to attract more students and reach a wider audience across all disciplines, not just civil engineering because sustainable buildings is a field that requires knowledge from other engineering disciplines and SBN will continue to strive for more diversity.

Thirdly, SBN held a few in-person social events, inviting all undergrad and grad students involved with the network to social gatherings where food was provided. The CPSIF funding was used to purchase food for one of the social events and another event was an escape room, which required a small fee per person, which was covered by the funding. These events allowed students to connect with each other and learn from one another's' experiences after a long time of just seeing each other and their classmates through a screen. It was an invaluable bonding experience and really improved the team environment, as well as provided an opportunity for grad and undergrad students in the field of sustainable buildings to network and learn from each other.

The CPSIF funding helped the network achieve its goals of engaging students and made our events and workshops successful, with a much larger turnout for SBC than previous years. We were able to engage with many more grad and undergrad students and industry professionals by creating a stronger presence in the engineering community at U of T and outside.

The funding was significant to our network as it drastically increased our presence at UofT. SBN is 2 years old and still not associated with EngSoc, so trying to build the foundations for future success for the network has been a struggle over the past few years, especially during COVID. This past year, the CPSIF funding allowed us to expand our website and online presence, as well as host captivating in-person events that caught the attention of many students. We are still a very young club with a lot of potential to expand our audience, but the funding allowed us to gain the interest of students interested in the field of sustainable buildings and get the word out to the engineering community to ensure SBN stays afloat in the years to come and continues to gauge the interests of a wider cohort of students. By providing promotional merch and food at social events and being able to conduct fun learning opportunities during our networking sessions, we were able to attract more students, therefore engaging with the broader student body, across more departments such as architecture and disciplines such as mechanical engineering. Due to some of our events being forced to remain online, SBN has a small amount of carryover funding for next year which will be very helpful in running more in-person events and continuing to expand our presence within UofT engineering, and to other departments and universities.

SBN worked with alumni Ernesto Diaz Lozano Patino (CIV 1T6 + PEY), Rashad Brugman (CIV1T9 + PEY), Wen Li (CIV1T1 + PEY) and Duncan Rowe (CIV0T4). Rashad and Ernesto each attended one of SBN's research networking events as previous students who conducted research at UofT and shared their experience and advice with our graduate research student attendees. Duncan attended the undergrad networking event as an industry professional currently working at RJC Engineers and talked about his work experience and participated in a mini case study with the undergrad attendees. Wen was a panelist at one of our SBC workshops where participating student teams had the chance to ask questions about the specific case study they were presented with at the competition and were also given the opportunity to clear up any questions about sustainable buildings on Feb.17, 2022. All 4 alumni continue to be great connections for SBN and have offered to be panelists, judges, and participants in any future events SBN hosts. Their involvement and dedication to university engineering students at UofT has been commendable and a great help to our network and SBN looks forward to welcoming them back in the future.

The end of year transition meeting/social

Sustainable Engineers Association (SEA)

Total Funding Awarded	**$5,150**
EAN	$2,000
MIE	$800
CivMin	$600
ChemE	$500
MSE	$500
YNCN	$400
EngSci	$350

Career Fair

We were able to host SEA's first online career fair using the Hopin event platform. This was a career fair designed to expose students to companies involved in sustainability. We had approximately 200 students from the University of Toronto community attend the event and contact companies such as LEA, TRIDEL, and Geosource Energy. Through the funding we were given, this event was able to occur despite moving online, and was able to allow SEA to continue to give students the opportunity to explore potential careers in sustainability and to learn more about what sustainability looks like in the industry.

Mentorship Program

Through the funding given to us, we were able to continue the SEA Mentorship Program, putting students in contact with industry professionals and academics working in sustainability. The 2021-2022 Mentorship Program was able to successfully pair 56 students with mentors working in sustainability and this success is partially due to a successful Mentorship Program Kickoff. The mentorship kickoff is an opportunity for students and mentors to meet and get to know each other a bit prior to completing the mentorship pairing process. This event allowed compatible students and mentors to be paired together, creating lasting connections between the mentors and students while allowing the students to meet and explore more aspects of sustainability through discussions with other mentors. Through this program we have been able to reach many students in the U of T community and provide them with opportunities to learn more about careers in sustainability and to learn more about aspects of sustainability that may be less common, furthering SEA's mission and contributing to the community.

Conference

This year, SEA's Annual Sustainability Conference was hosted virtually on Hopin on January 15, 2022. The conference is a day-long engaging event consisting of 10 global speakers, each with a unique background and insightful perspective. More than 200 students, young professionals,

entrepreneurs, and leaders attended the conference. The theme of the conference this year was: "Sustainable Technology: Building a Better Tomorrow". This theme gave attendees the opportunity to learn about different careers in sustainability as they explored how recent advancements in technology can be used to create a more sustainable world through topics including renewables, policy, and cleantech. Most notably, the funding made it possible for the conference team to donate 250 dollars to the Centre for Indigenous Environmental Resources (CIER) organization, and purchase gifts for the speakers as a token of appreciation for their time. We believe we were able to successfully foster an engaging event which resonates the principles of sustainability and environmentalism.

Sustainability Hackathon

This year, SEA Competitions hosted the second SEAHacks over the weekend of February 19th and 20th, jointly with the SEA Ryerson student chapter. SEAHacks, previously an initiative under SEA Student Academics, is a 24-hour, beginner-friendly, sustainability-related design competition. SEAHacks is designed to help introduce individuals from all walks of life to the world of sustainable design. In this design competition, we specifically promote innovative designs that serve practical purposes. The competition aims to explore different aspects of sustainability in our everyday lives. The theme of this year's competition is transportation, and during SEAHakcs 2022, students were encouraged to explore and discuss sustainable designs to showcase the sustainable designs that could make the transportation sector more sustainable.

Environmental Equity Panel Webinar

SEA hosted an event for UTERN's Ecofest 2022, which is a two week long event in which various groups, clubs and associations within all three campuses of UofT host individual events pertaining to the theme of Environmental Equity. SEA's event took place on March 18, 2022. The event was Environmental Equity Panel from 5 students advocates and energy industry leaders. These individuals provided an enlightening panel discussion, sharing their advice on environmental advocacy as a student and how it can be applied to an industry level for the audience to learn from. The funding was provided as an honorarium for each of the speakers for taking the time to prepare for the event and as an appreciation for participating in the event.

None of these innovative projects could have happened without the generous support from the CPSIF sources, and we are grateful for everything you have contributed to enrich our club's mission and vision. This past academic year has been extremely challenging, and the financial support gave us the confidence to move forward with power but, also, be mindful of conscious spending and to save wherever we could. Apart from the aforementioned projects, the club has taken on numerous ad-hoc projects and has sustained an influential contribution on social media (instagram: @seauoft) with over 500 followers. On behalf of the Sustainable Engineers Association, we thank you.

Toronto Science Policy Network

Total Funding Awarded	**$400**
YNCN	$200
EAN	$100
EngSci	$50
ChemE	$50

The Toronto Science Policy Network would like to thank the Department of Engineering's Centralized Process for Student Initiative Funding Program for their support. This funding allowed us to host a panel event titled Digital Economy – Impact of Big Data and AI on Privacy & Justice.

The Toronto Science Policy Network (TSPN) is a student-run group at the University of Toronto which aims to provide a platform for students (graduate & undergraduate) and post-doctoral fellows to learn more about and engage in the interface between science, engineering, and policy. Since its start in July 2018, TSPN has engaged over 400 students, researchers, and members of the public by hosting public panels, 101-series workshops, talks, and several large-scale advocacy initiatives, including national campaigns and surveys. These events foster important discussions on key STEM-related topics that impact society, provide learning and networking opportunities for students and community members, and also support learning around various STEM-related career options.

This year, through CPSIF, we held a panel as part of our Just The Facts panel series, where we bring in experts on key science policy topics and discuss scientific evidence, potential policy solutions, as well as engage in a broader question and answer period with the audience. The CPSIF fund supported our April 27th, 2022 panel hosted on Zoom.

In an increasingly connected world, we share a large amount of data through our daily activities. More and more companies are using this data to create algorithms or AI which are used on us without our knowledge. This panel focused on how big data and AI have enormous impacts not only individually on our identity, but also collectively on civil society and democracy. This funding provided honorariums to bring together an outstanding panel of leading experts to share their diverse perspectives from academia, industry and nonprofit organizations. The event consisted of a moderated discussion as well as a live Q&A session with the audience. The panelists included Dr. Brenda McPhail, the Directory of Privacy, Technology and Surveillance at the Canadian Civil Liberties Association, Dr. Christopher Parsons, a Senior Research Associate at Citizen Lab and the Munk School of Global Affairs and Public Policy at the University of Toronto, and Ms. Allison Cohen, Applied AI Projects Lead at the MILA-Quebec AI Institute. The panel was moderated by Mr. Philip

Dawson, AI Policy Lead at the Schwartz Reisman Institute for Technology and Society.

A screenshot of the Zoom event recording. Image includes Bipin Kumar, TSPN Executive-at-Large.

Of the 72 attendees registered for the event, 31 of those who voluntarily provided their affiliation were graduate students at the University of Toronto and four listed affiliations with a U of T Engineering Department. Other attendees were associated with various other university departments as well as organizations outside of the university. This event was organized by four TPSN members, including one who is a graduate student affiliated with the Faculty of Engineering, Dawn Bannerman (PhD in Chemical Engineering). This panel provided an opportunity for students and community members to learn about how engineering technologies, such as AI, intersect with public policy, government and the implications on society. The panel also fostered discussion on the ways in which academic, private and public sectors can interact and collaborate to make evidence-informed decisions. The panel is available through TSPN's YouTube channel to allow for additional viewing following the event: https://www.youtube.com/watch?v=I_edo7teFDc

Undergraduate Chemical Engineering Council (Chem Club)

Total Funding Awarded	**$6,556.41**
EngSoc	$4,056.41
ChemE	$2,000
EAN	$500

This past year the Undergraduate Chemical Engineering Council was able to safely and successfully run numerous events due to the financial support received through CPSIF funding. This included the annual dinner dance, ski trip, wellness initiatives, iron ring party, and various community building events including first year scavenger hunts through the club's mentorship program, and class wide socials. CPSIF helped to remove financial barriers for the chemical engineering student population by subsidizing the club's initiatives to create more affordable experiences. While the Undergraduate Chemical Engineering Council did not directly interact with alumni this past year, their generosity helped fund some of the Chemical Engineering department's most important traditions.

A pillar to the Undergraduate Chemical Engineering council's work is the annual dinner dance. This event had not been conducted since November 2019, and was a focus for the team this year, to bring together the community (or "Chemmunity"). This year, it was hosted on March 4th, and acted as the department's mark to the beginning of large-scale in person events post COVID-shutdowns. The event cost nearly $24,000 for just under 200 students and faculty. This cost is significantly more than previous years due to the inflation post COVID-19 and the requirement to rent a large enough space for physical distancing.

Images of the class of 2T3 (top) and 2T1 (bottom) present at the dinner dance.

The majority of the CPSIF funding granted to the club was used to subsidize the cost of this event to

allow student participation at a more reasonable rate with tickets ranging from $75-$100. Without CPSIF subsidizing the cost of the venue, the tickets would have cost within the range of $90-$115, making the event less accessible.

In addition to the dinner dance, some of the CPSIF funding (in particular the alumni donations) were used towards subsidizing an iron ring party for fourth years. This money combined with fundraised proceeds from the year were used to host an event for professors and fourth year students to celebrate the end of their undergraduate chemical engineering journey. This event included space rental, cake, decorations, and A/V equipment.

Iron ring cake cutting (in focus: Vashish Ramoutar)

The iron ring party is a tradition within the chemical engineering community, and is a final opportunity for the entire class to connect with each other and their professors in a social capacity. This event also acts as an engaging fundraising effort for next year's iron ring party. Receiving funding from CPSIF ensured the event was accessible to all graduating students, with free entry and refreshments for all attendees.

Without the generosity of the departmental and organizational funding provided through CPSIF, the Undergraduate Chemical Engineering Council would have not been able to host the events at an accessible price point for students. These events are an integral part of the Skule and Chemical Engineering culture and are highlights from not only the academic year, but the entire undergraduate experience for hundreds of students. For those who didn't attend the two large scale events, they also benefited from discounted/free prices for the ski trip, wellness events like therapy dogs, and first year mentorship initiatives. The impact of CPSIF funding this year can be seen by nearly every single one of the five thousand undergraduate chemical engineering students who engage in the social and academic support of the Undergraduate Chemical Engineering Council.

University of Toronto Aerospace Team

Total Funding Awarded	**$9700**
EAN	$3000
MIE	$2400
EngSci	$2000
ECE	$1700
YNCN	$600

The University of Toronto Aerospace Team (UTAT) had a very successful 2021-2022 year. After overcoming the challenges presented by the pandemic, the team emerged in a fiery display of vigor. With the help of CPSIF's generous support, the team's exceptional members were at last able to execute their long-planned builds, launches, and tests.

This year, the team continued to develop its vision for Aerospace at the University of Toronto. Space Systems, Aerospace Policy, Unmanned Aerial Systems, and Rocketry, four of our brilliant divisions, have all worked on unique and forward-thinking ideas and initiatives aimed at advancing the industry on both a university and national level:

The Space Systems Division specializes in creating satellites to be launched with rockets into space and conduct various missions. This year, they have continued the design of the FINCH satellite, which has re-scoped its remote sensing mission to map the impact of crop residue farming. Careful consideration was given in accounting the division with all the software and hardware involved - a key step that would prove vital in the later stages of the project. Furthermore, Space Systems developed a remote windows server that allows members to learn and use various software tools including Code V, NX Siemens, and STK that would be unavailable or too costly otherwise. The division's HERON spacecraft went through its proto qualification vibration testing and began its ground station assembly and spacecraft operations work, including final licensing. Launch for HERON is scheduled to occur in the next year. Most of these activities were conducted in the team's lab, on lease in the Banting Institute.

UTAT Space Systems members (from left to right) Adyn Miles, Benjamin Nero, Prachi Sukhnani at a vibration testing facility (left); vibration testing of the HERON satellite (right)

The Aerospace Policy Division focuses on the exploration and creation of professional and conference papers to spread awareness of the policy aspect of the Aerospace Industry. They

have several ongoing, parallel projects that have had immense success this year. The team's podcast, "The Sound of Space", has grown to 800 monthly listeners with people tuning in from 30 different countries!

Additionally, numerous academic papers written by our members have been accepted and presented at conferences in the UAE, USA, France, and Greece. Finally, the division's magazine, "UTAT Space Review", has also had success with several entries submitted by curious university members and high school students!

UTAT Aerospace Policy member Theodora Girgis hosting the "The Sound of Space" podcast (left); UTAT Aerospace Policy members (from left to right) Dominik Adamiak, Olivia Sun, Natacha Hughes, and Cindy Chen attending the 72nd International Astronautical Congress in Dubai (right)

The Unmanned Aerial Systems (UAS) division works primarily with unmanned aerial vehicles (UAVs) including fixed wing and multi-rotor variations. Over the past year, they worked on three major competition projects which mirrored real-world scenarios. These were Aerial Evolution Association of Canada, a critical infrastructure security mission; AUVSI SUAS, an airdrop and target identification mission, and SAE Aero Design, a forest fire fighting-mission. Through preparation for these competitions, members were able to gain critical hands-on experience with various design and manufacturing techniques, including carbon fiber layups, CFD simulations, and conducting FEA analysis. Moreover, significant progress was made by the Research and Development subteam in designing a tracker mechanism to follow the team's UAV through its direct flight path.

UTAT Unmanned Aerial Systems members (from left to right) David Leong, Birva Shah and Terry Wu working on an airfoil (left); first iteration of the TEMPEST fixed wing UAV (right)

The Rocketry Division's focus is in its name, they design and manufacture rockets! The primary focus this year was the completion of several long term projects. They were able to complete and test a hybrid rocket engine in preparation for launch. The solid rocket program, previously on pause due to pandemic-era issues, was finally restarted: this venture program has engaged many university scholars whilst providing them with invaluable experience. In regards to competitions, the team is going on to compete in the inaugural 2022 Launch Canada Competition in August to spar with Canada's best, proudly representing the University of Toronto.

Rocketry conducting a hot fire test of the hybrid rocket engine

Outside of divisional project work, the team is continually expanding on its outreach efforts, striving to make STEM more accessible, especially to underrepresented groups, through educational and community events. The **Outreach portfolio** has supported numerous initiatives over the past two years, shifting its focus to online events for increased accessibility to participants from around the world. With the incredible work of our dedicated community, UTAT continues to grow, turning what was once considered impossible for students, into sustainable, successful aerospace operations. We are incredibly thankful for all the support we receive as we look to grow our impact in the community through outreach and advocacy.

UTAT is grateful for forging robust relationships and partnerships with many stakeholders over the years, throughout the U of T community including: student governments, faculty members and professors, and alumni. Every year, we stay connected with U of T Engineering alumni who volunteer their time and participate in our team as advisors and mentors. They attend design reviews and provide valuable input, mentor new students and leads, and participate in many UTAT events, such as our Annual Showcase and outreach activities.

We have been tremendously fortunate to have received continued support from the departments and organizations who participate in CPSIF grants. CPSIF funding was integral in supporting UTAT accomplishments this past year, providing a robust funding source at a critical time. Every year we look to grow our team's membership and provide new students with the resources, support, and opportunities to grow as leaders and innovators. These funds make traditionally expensive projects accessible to all members of our community, provide unique opportunities for new students to engage with the field of aerospace, and improve its equity, diversity, and inclusion.

For the coming year, UTAT will continue to deliver on its promise of providing all students with an unparalleled experience in aerospace design through education of sought-after technical and leadership skills, while fostering an ever-growing community of students passionate about aerospace. This will further the team's mission to provide unwavering support, opportunity, and training to its growing community of students and volunteers. The entire team is looking forward to another exciting and successful year! For updates and more information, visit our Instagram (@uoft_aerospaceteam), our Facebook page (@uoftaerospaceteam), our website (utat.ca) or email execdirector@utat.ca.

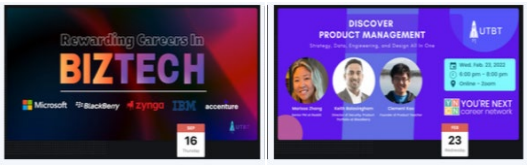
University of Toronto BizTech Association

Total Funding Awarded	$500
YNCN	$150
MIE	$100
EAN	$100
ECE	$100
EngSci	$50

We, the University of Toronto BizTech Association, were grateful to receive funding through CPSIF during the 2021-2022 academic year. We are a new club, established in 2021, and our goal is to enable students to navigate the intersection of technology and business in the career building space. We used our CPSIF funding primarily to kickstart our online presence and build a name that is recognized and respected across the University of Toronto campus, and among our industry partners. Specifically we bought a domain, built our website, and designed a logo for the club.

Highlights of this past year include: a career mentorship program with a cohort of 20+ students across 4 years of undergraduate study and 13 academic programs; excellent online and social media growth and engagement; and the hosting of four well-received events with a cumulative registration of over 200 students, engaging with 13 professional speakers from the business side of tech. We also built on our online presence by developing a job board, compiling a set of recruitment resources, starting a newsletter which now has over 200 subscribers, and growing our community-driven Slack workspace which has nearly 150 undergraduate students

We are a new club, started in mid-2021 by two undergraduate students with a passion for educating fellow students about meaningful opportunities on the business side of tech. The money we were granted through CPSIF was the first this club had ever received. Without that funding we would not have been able to build the community and reputation that we have, and we would not have been able to make an impact on students trying to launch their careers. For evidence of that look no further than the fact our student community has received offers from top global brands, including IBM, Blackberry, Zynga, PwC, Scotiabank, KPMG, and Deloitte for work in BizTech roles. We are truly excited for what has been achieved this past year, and what will be achieved in future years. For that, we thank the CPSIF program for making it possible.



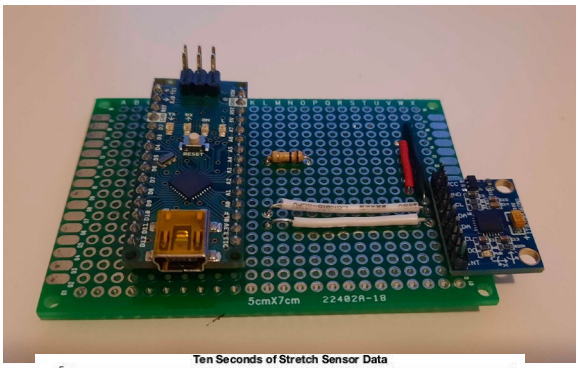
Advertising material for our 2021-2022 BizTech events

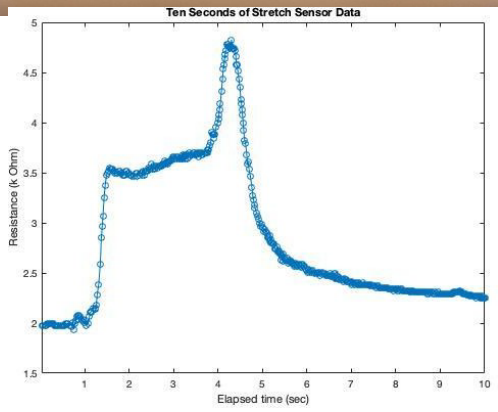
University of Toronto Bioengineering Design Team (UT BIOME)

Total Funding Awarded	**$3,200**
BME	$1,000
MIE	$600
EngSci	$500
EAN	$500
YNCN	$200
ECE	$200
EngSoc	$150
ChemE	$50

The University of Toronto Biomedical Engineering Design Team (UT BIOME) is a group of passionate students from multiple disciplines and majors, working together to develop medical designs and provide exposure to the Skule community. In this past year, we achieved our mission with our three Project Teams and Director Board. UT BIOME was generously funded with $3200 for this year, which supported all of our initiatives, including purchasing new hardware and running alumni events.

This year, our teams explored a wide range of topics. The first was our Health Monitoring and Rehabilitation Device Team, focusing on a smart, wearable device for users with high risk of injuries. Our next team was the Clinical Device Team, whose work consisted of research into the design of ventilators. Finally, we had our Synthetic Data Generation Team who focused on developing an algorithm to generate synthetic skin lesion images as a tool to improve diagnosis. Funds from this year were used to buy electrical sensors, electronics, soldering iron and Arduino kits for our members to provide a hands-on experience and research-gather primary health data. Some pictures from our primary research phase are shown below.





As part of our goal to provide professional development and growth to undergraduates, our Director Board provided multiple events throughout the year with collaborations with other clubs, graduate students, and alumni.

<u>BME Professor Panel: Research Event</u>

This event was hosted virtually on November 15th, 2021 to provide students with the chance to learn about ongoing research from Skule's very own professors and participate in an networking session

too connect with the faculty! Special thanks to the following professors for presenting and engaging with attendees:

- Prof. Warren Chan
- Prof. Lidan You
- Prof. Omar Khan

Gene Therapy Workshop

Hosted on November 16, 2021, students were presented with an introduction to gene therapy. Medical Genomics graduate students Daniel Kiss and Jordan Chalmers provided an informative and interactive session covering topics such as CRISPR-Cas9, toggle switches, biotechnology prevalence, bioethics, etc.

Graduate Research Panel Event

Our Graduate Research Panel Event was hosted on March 7, 2022 to provide a networking and exposure opportunity to what students can look forward to in the research field. The event also allowed graduate students to showcase their research and network with the undergraduate students, The following graduate students took the time to present:

- Joseph Sebastian - PhD Candidate, BME
- Stefan Mladjenovic - PhD Candidate, BME
- Julien Couture-Senécal - PhD Candidate, BME
- Kimberly Seaman – MASc Candidate, MIE

General Member Program and Outreach

In addition to our events and project teams, UT BIOME also launched a new initiative this year: the General Member Program. This program is a space for undergraduates to connect more with each other and with UT BIOME. Specialized workshops, such as our Journal Club and our past-year's online modules, were created for our group of General Members. This year, we had 273 sign-ups, ranging from all engineering disciplines and different UofT faculties!

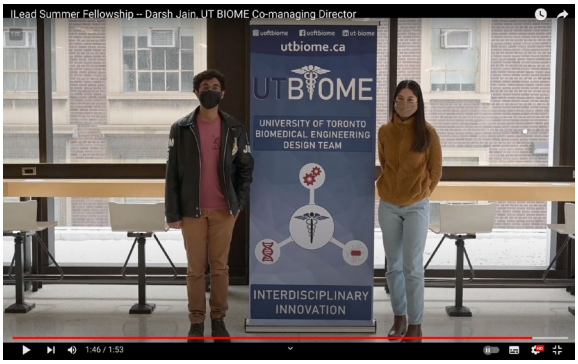
Every month we sent out newsletters to our community which detailed on the progress of the team, joining opportunities, research info, interesting BME finds and details about out workshops. Moreover, our social media team also focused on creating wonderful graphics to advertise about our team and events.

UT BIOME Social Media Post

UT BIOME 2T1-2T2's First Team Social

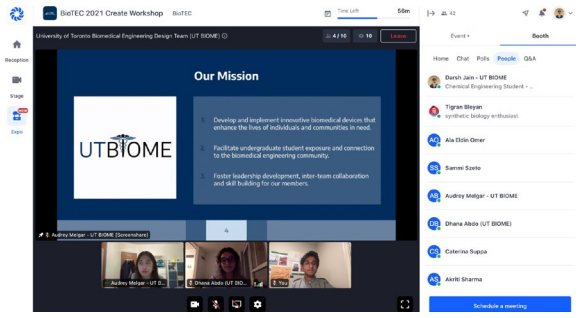
This year, UT BIOME had the opportunity to run in-person events and socials. Lots of inter-team

Our group was also recognized by Troost iLead where Darsh Jain - our Co-Managing Director - was taken through a summer long fellowship where he learnt about leadership and group management which was directly used to make improvements to the club. iLead also reconized our team's efforts and created a video featuring the club.



UT BIOME Video by iLead

Our work was also featured at the Biotec conference 2021 and members of our community were panelist on the woman in engineering panel as well.



UT BIOME at Biotec Conference

Upcoming Goals

Looking forward to 2022-2023, UT BIOME will continue to support existing and new project teams, with the aim of developing high-fidelity, working prototypes for all projects. We plan to establish two new project teams, and continue the work of the Health Monitoring and Rehabilitation Team as it moves into the prototyping stage.

Additionally, UT BIOME hopes to maintain engagement within the project teams, director board, and the General Member Program throughout the year. We plan to restructure the director board to further support the project teams with workshops and mentorship opportunities, and plan additional events and activities for the General Member Program, expanding UT BIOME's reach within the UofT community.

We are continuously growing as a community and are beyond excited to continue our initiatives into the upcoming academic year. Two of our projects will be continuing, with more knowledge and opportunities than before. We'd like to thank all of the CPSIF departments and organizations for their continuous support and generous contributions towards UT BIOME.

University of Toronto Blue Sky Solar Racing

Total Funding Awarded	**$41,150**
EAN	$20,000
ECE	$9,000
MIE	$9,000
EngSci	$2,000
YNCN	$600
MSE	$300
ChemE	$250

In our last cycle our CPSIF funding contributed directly towards our Gen 11 Solar Car, Borealis. Some examples include the mechanical system, electrical system and shipping and freight.

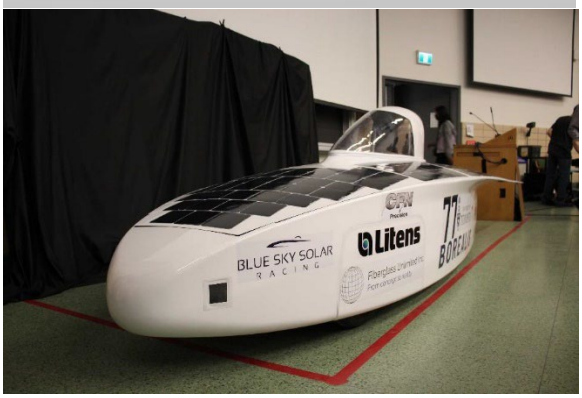
We are one of the largest multidisciplinary clubs at U of T consisting of over 50 core members spanning multiple faculties including Engineering, Arts & Science, and Rotman Commerce with 95% of the team being U of T Engineering Students. The Blue Sky Solar Racing team aims to provide a rich learning environment for students of all faculties to thrive. Students are encouraged to think critically and generate innovative solutions to design the most optimal car to race both in America and Australia with zero emissions. Throughout their time on the team, students gain invaluable practical skills and experience in a professional and high-performing work-environment.

Funding from CPSIF allows sub teams such as our structural and fabrication teams work with top-notch composite materials and where team members are able to experiment with multiple processing techniques with the support of industry partners. The Mechanical team not only works on designing a safe, light and strong wheel and suspension system that we see in traditional racing cars but also invests their knowledge and creativity to design components and systems that are unique to solar racing cars. Electrical and Array teams get first-hand experience to work with the implementation and optimization of solar panel systems. Members who want to develop business skills also have an opportunity to do so as part of the Advancement team, as they closely interact with companies and organizations through networking, pitching and negotiations. All in all, Blue Sky Solar Racing works together and provides opportunities for members both in the SKULE community and the UofT community over all to gain hands-on experience by solving real-world complex applications with quality workmanship, dedication, and teamwork, to promote sustainability and education.

CPSIF Funding is important to the University of Toronto Blue Sky Solar Racing team as the funding goes directly into our project of building a solar race car. This funding is able to support the learning and development of our generational vehicles in a safe and functional environment. From material procurement to learning resources the funding helps our team get closer to our goal

of being able to race a 100% solar powered car that is optimized to race against some of the best collegiate solar car teams in the World.

In general, Blue Sky has fostered a lively alumni community which not only provides a platform for current team members and alumni to exchange ideas on design and team management but also give career advice from time to time. Alumni are always invited to our major events such as unveiling and are welcome to join the team.



Images from current cycle

Safety Board: January 2021, May 14th 2021, June 21st, 2022

Check in meetings between alumni and current cycle team to ensure overall safety of the car in a mentorship type environment

Zhe Gong, Jane Liu, Amy Bilton, Andreas Marouchos, Tomek Bartczak

Gen 11 Unveiling: June 20th, 2022

Blue Sky Solar Racing event in which alumni, sponsors and faculty can check out the new solar car and talk to active team members about the process: Jervis Liu, Tomek Bartczak, Andrew Maksymowsky, Brant Zeeman, Kevin Quan, Andreas Marouchos, Grace Lloyd, Zeenat Habiby, James Liu, Cindy Chen, Paul Park, Maria Xie, Eugene Du, Gobind Vasir

University of Toronto Business Association (UTBA)

Total Funding Awarded	**$850**
YNCN	$300
EAA	$250
ECE	$100
EngSci	$100
MIE	$100

The University of Toronto Business Association (UTBA) received funding of $850 from CPSIF to deliver its 2022 Case Conference and supporting workshop events. This allowed UTBA to purchase awards for top performing teams in its case competition and gift cards to attract top industry representatives to judge this competition and participate in panel discussions and networking sessions with students looking to gain professional skills. Nearly 300 U of T students attended our supporting speaker series events,

- January 29: Student Investor Challenge
- February 13: main 2022 Case Conference
- March 7: Tactical in Tech: Consulting

We are immensely grateful to have received support from the Department of Mechanical & Industrial Engineering, Division of Engineering Science, Department of Electrical and Computer Engineering, Engineering Alumni Network, and You're Next Career Network (YNCN) in this endeavour by way of the CPSIF. In these events, students developed skills to make them better candidates in the professional world and better equipped to pursue their chosen career paths.

University of Toronto Chemical Vehicles Design Team (UTCV)

Total Funding Awarded	**$2,900**
ChemE	$1,000
EngSoc	$1,000
EAN	$500
MIE	$150
EngSci	$100
MSE	$100
YNCN	$50

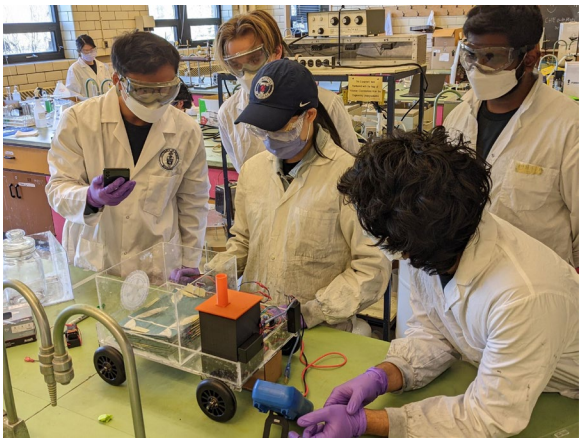
The University of Toronto Chemical Vehicles Design Team (UTCV) is a multidisciplinary design club where students collaborate to build an operational model of a small, autonomous, chemically powered car each year to attend American Institute of Chemical Engineers (AIChE) Chem-E-Car competition (See Figure #1). The 2022 AIChE Northeast Regional occurred virtually on April 3. The team won first place and beat the reigning champion teams from Clarkson University and Cornell University. UTCV first competed in the regional competition in 2018 and placed ninth out of 21 teams. The next year, we reached sixth place out of 12 teams. This year's victory is a great accomplishment for the team after two-year absence due to COVID-19 restrictions. The success was shared on UofT News and we hope to continue this spirit for the future years to come.

UTCV's tremendous success in the growth of the club would not have been possible without the generous support of the Faculty of Engineering, Engineering Society, and the Engineering Alumni Network.

During the 2021-2022 academic year, the club's 4 divisions collaborated to design, build, and test our final competition car. These divisions are Power, Reactions, Mechatronics, and Operations. The support that we received through the CPSIF has made it possible for these teams to operate and achieve our design goal.

The funding provided from CPSIF allowed the members of UTCV to purchase the materials they needed to gain hands-on experience, for example copper mesh and carbon black that are essential for building the car's battery. With sufficient funding, the team was able to conduct dynamic team research, testing involving iterations to achieve design milestones without any financial stress. More specifically, we were able to purchase chemical, electrical, and mechanical equipment for the design and construction of our final competition car model. These purchases included solvents and pipette needed to perform wet chemistry laboratories and further research. Other examples included various sensors that are needed for stopping mechanism of the car and arduino uno for coding purposes. Part of the funding was also used on marketing and

operational expense include poster printing, website maintenance, team t-shirts, etc.



Car pretest on Competition day April 30, 2022

Yong Qi (Tony) Luo, Laszlo Toth, Ami Zeng, Pasindu (Freddie) Perera, Amogh Manivannan from left to right

UTCV's 2020-2021 Team Photo

First row: Professor Cathy Chin, Ami Zeng, Yong Qi (Tony) Luo, Jinmyung Jang

Second row: Ivy Hwang, Julia Kim, , Dina Castelletto

Third row: Mackenzie Gole, Pasindu (Freddie) Perera, Amogh Manivannan, Michael Chan

After the regional competition, the team attended the 5th ChemE Exhibition & 36th Dinner to present and celebrate success of this year (See Figure #3 and #4). At the event, the team had chances to showcase the design and give out postcards to professors and alumni that attended as well. It was a great opportunity for the team to gain more recognition and network. Omar Hamdy (UTCV President 19/20, ChemE 1T9+PEY) was also remotely supporting the team last year with regard to operational advice and leadership inspirations. As a team, we would love to stay connected with past members and share our journey and growth.

UTCV keeps attracting new student members and we aim to fulfill our goal of offering true multidisciplinary experience for engineering students. We will continue to expand our student engagement and continue to work on collaborating with alumni in order to foster professional development. In the future, we hope to inspire more students to contribute to a better future where transportation is no longer dependent on fossil fuels.

UTCV at 5th ChemE Exhibition

From left to right: Yao Sheng Chai, Amogh Manivannan, Julia Kim, Pasindu(Freddie) Perera, Michael Chan, Xingyu(Fred) Feng, Jinmyung Jang, Yuqi(Lisa) Zhou

University of Toronto Concrete Canoe Team (UTCCT)

Total Funding Awarded	**$3,750**
EAN	$1,500
CivMin	$800
ECE	$500
YNCN	$400
MIE	$200
ChemE	$200
EngSci	$100
MSE	$50

The University of Toronto Concrete Canoe Team is grateful to receive the CPSIF 2021-2022 funding that led to the construction of our 2022 canoe "Fenrir", which had tremendous success in the Canadian National Concrete Canoe Competition (CNCCC) 2022. After 2020's canceled competition and 2021's online competition, the team overcame numerous COVID-19 logistics challenges and obstacles from the lack of construction experience to achieve amazing results at the CNCCC 2022. The team achieved Third Place overall, First Place in Enhanced Focus Area Report, Second Place in Technical Report, Third Place in Final Product at the CNCCC 2022. The CPSIF funding was really important for the team to implement innovative ideas on better quality control measures and improving the student's health and safe working environment.

To monitor the thickness of the concrete canoe after curing, the team connected with a professor at the Mechanical & Industrial Engineering department to come up with an innovative idea of measuring the capacitance across the concrete surface between two metal plates. Therefore, we purchased a multimeter and some metal pieces for the measurement. With the success of a new creative way to measure thickness, along with developing a concrete mix without Portland Cement, our team was awarded the Most Innovative Award at CNCCC 2022.

Third place overall and other awards at the CNCCC 2022 at Quebec.

(Top from left: Maggie, Tian, Chielotam, Iris, Ashlyn, Grace, Ethan, Michael, Jenny, Andrew, Julia, Michael, Jia, Elliot, Madeline; Front kneeling from left: Ellen, Ernie, William)

In light of the ongoing COVID-19 pandemic, the team purchased more personal protective equipment (PPE) such as respirators, N95 masks, hand sanitizers to ensure that members do not need to share PPE throughout the construction period for better hygiene. Due to limited access to concrete beam testing facilities, our team also had to budget more on purchasing concrete cylinder molds to conduct cylinder tests to obtain experimental values on concrete strength. These extra budgets were fortunately able to be covered by the CPSIF funding.

After being relocated from 704 Spadina to Myhal Arena, the team had to find a new location for outdoor sanding and sealing work. With luck and support from faculty members, our team was able to establish a temporary workstation south of the Wallberg Building. To prevent adverse rain or snow weather events, and complications with nearby pedestrians, our team invested in a 6-meter by 3-meter tent and some wood supplies to shield the canoe at the sanding workstation. The CPSIF funding enabled us to make these additional purchases for more secured work environments. These tools are also reusable for further years, benefitting the team long term.

With the YNCN funding, the team hosted alumni reunion socials where current team members networked with University of Toronto alumni who used to be part of the Concrete Canoe team. It was a great team bonding experience, while also building networks for professional development, taking advantage of the over 25 years of concrete canoe team history and diverse engineering backgrounds of alumni. The team also used the CPSIF budget on paddling practice sessions at the Sunnyside Paddling Club by inviting Concrete Canoe Team alumni to coach current team members on canoe paddling techniques.

Race day on water.

(From left: Jenny, William, Andrew, Michael, Chielotam, Ellen, Ernie)

March 5th 2022 was casting day where the team casted all the concrete for the canoe construction in a single day. CPSIF funding was used to purchase some of the PPE and concrete materials used on that day. Over 40 people in the Skule community participated in the 8 hour event including representatives from the Toronto Section of Canadian Society of Civil Engineering (CSCE). The overall casting day experience was also a celebration of Skule spirit where we gathered undergraduate and graduate students from all engineering disciplines to collaboratively complete the canoe construction.

Casting day with CSCE Toronto Section's visit.

(Concrete Canoe Team members and representatives from the Canadian Society of Civil Engineering, Toronto Section)

Within the Skule community, the team was invited to represent the Faculty of Engineering at the Alumni Fest event in May 2022. The team was really proud to showcase all the hard work invested over the year to everyone at the event and also connect with alumni who came by our booth and told us they were part of the Concrete Canoe Team at University of Toronto back in 1992. CPSIF funding was used to purchase art supplies needed for the booth set up and display.

Overall, the CPSIF funding allowed the University of Toronto Concrete Canoe Team to finance materials and tools needed to safely construct Fenrir the concrete canoe and achieve great results at the CNCCC competition. The funding was important to resurrect the Skule spirit through the design team competitiveness and experience of teamwork across various engineering disciplines. The CPSIF funding also enabled events to engage with alumni and industry professionals for networking and demonstrating how the engineering training learnt in school is practical in a real-world construction setting.

University of Toronto Concrete Toboggan Team

Total Funding Awarded	**$7,750**
EAN	$2,500
MIE	$2,000
CivMin	$1,500
ECE	$800
YNCN	$600
EngSci	$250
ChemE	$100

The University of Toronto Concrete Toboggan Team is incredibly grateful for the support our team receives from CPSIF. As a student design team, CPSIF makes up a large portion of our funding and allows us to design, manufacture, and compete in the Great Northern Concrete Toboggan Race (GNCTR).

GNCTR is the largest engineering competition in Canada, bringing together over 600 engineering students from across Canada and the US. The funding that we receive through CPSIF goes directly towards the purchase of materials to produce our Toboggan, towards the purchase of Solidworks licenses, and (when the competition is in person) towards subsidizing the cost for our members to attend the GNCTR competition.

One of our largest costs for our toboggan is the carbon fibre we use for our monocoque shell. Our use of carbon fibre allows our team to consider factors other teams can't, such as aerodynamics. This provides opportunities for our members to learn about aerodynamic design and how to use programs such as ANSYS to perform analysis on the shell's performance. Additionally, hands-on experience with composites can be difficult to find. Our use of carbon fibre allows our members to learn how to use these materials that they will likely come across in an engineering field in the future. Without the funding from CPSIF, it is unlikely we would be able to afford the high cost associated with this material.

Carbon fibre being laid up into our mould before infusion

The GNCTR competition includes a spirit aspect in the scoring in addition to the toboggan design and performance. Each team selects a theme complete with costumes and a decorated exhibition where we present our toboggan to people from industry, the general public, and other schools. This exhibit is constructed from a wooden crate that we ship our toboggan and

supplies in. The funding CPSIF provides our team goes towards the purchase of the wood and other materials used to build this display. The spirit aspect of our team draws many students to join as it is a unique feature not seen in other design clubs. Our members enjoy that in addition to the technical design opportunities our club provides it is also a creative outlet.

Our team after winning the 2021 GNCTR Competition

Mark McCutcheon spraying sealant on the female mould for our carbon fibre shell

Catherine Ye pouring the concrete into our ski moulds

University of Toronto Design League (UTDL)

Total Funding Awarded	$10,900
MIE	$8,000
EngSoc	$750
ECE	$500
EngSci	$500
EAN	$500
YNCN	$400
MSE	$250

The University of Toronto Design League (UTDL) greatly appreciates the contributions from the following organizations and divisions: the Department of Mechanical and Industrial Engineering (MIE), Division of Engineering Science (EngSci), Department of Electrical and Computer Engineering (ECE), Department of Material Science and Engineering (MSE), the Engineering Alumni Network (EAN), the Engineering Society (EngSoc) and Your Next Career Network (YNCN).

UTDL was founded as a chapter of the National Design League in February 2019. The purpose of the UTDL is to provide engineering students of all disciplines and backgrounds an opportunity to learn and develop core mechanical design skills. There is an emphasis on real- world applications of additive manufacturing, rapid prototyping and CAD. All the events held by UTDL provide attendees across Ontario and beyond with a platform to learn technical skills as well as to design, fabricate and showcase their innovative solutions for real-life mechanical engineering design problems faced by our diverse industry partners.

For 2021-22, the funding received by UTDL was used by our Educational Technology department ("Ed. Tech"), newly formed UTDL Design Team, Operations department ("Ops"), and Media department.

Our Ed. Tech team hosted numerous mini-competitions and workshops throughout the year. These events were educational in nature and provided students of all backgrounds with a base in relevant core mechanical design tools and concepts (for example, Fusion 360 in collaboration with Autodesk, SOLIDWORKS, Ansys etc.). Due to the generous CPSIF funding, UTDL was able to implement a "raffle system" for students attending Ed. Tech events. Attending more events resulted in opportunities for better prizes including but not limited to cash rewards, gift-cards and e-vouchers, 3-D printers, software access etc.

With a strong financial position due to years of planning, UTDL was finally able to launch its in-house design team. The design team sought to work on long-term projects that would make an impact to the community. For the 2021-22-year, two major design projects were initiated. The first

was a precision agriculture drone. The second was a robodog exoskeleton. Funding was used to procure key elements and parts used in the design including but not limited to gears, screws, Arduino toolkits, batteries, superglue, micro-controller, MPU, voltage regulators, PWM Driver, encoders and more! The two projects directly impacted ~10 selected Skule students while also roping in a team lead from UWaterloo.

Funding allocated to the Ops team was primarily used in planning and executing our annual flagship hardware hackathon: “Designathon”. Due to the generous funding, we were able to give out thirteen 3D printers as prizes to our first-place winners, further encouraging students to design, build and prototype in their future projects and course work.

Although COVID-19 restrictions required all events to be held exclusively online, our virtual Designathon once again had over 150+ participants from several different countries! Our participants came from various engineering disciplines along with several non-engineering students from multiple universities (including from the USA), as well as high school students. Participants were able to work towards providing innovative solutions to different design challenges posed by industry partners such as Huawei, Autodesk, and Zebra Technologies. Our Skule alumni and faculty greatly assisted with our Designathon as well. Our judges were predominantly from UofT, including UofT alumni, professors, graduate students and teaching assistants such as Ali Radhi and Peter Serles.

All of the above events were supplemented by work from our Media team. The funding received was able to cover important aspects of marketing and hosting our workshops and events. More specifically, we were able market our workshop and events through Facebook and Instagram advertisement, host online events through Hopin, and demonstrate we would provide enticing prizes to winners.

After our events, we received countless comments from participants about how much they enjoyed the design experience! Almost all participants mentioned that the UTDL workshops held over the year were helpful, and they are looking forward to attending UTDL’s competitions once again in the coming year. The University of Toronto Design League would like to thank the organizations and divisions part of CPSIF for their support, without whom our workshops and events would not have been possible!

One of three winning teams and their prototype design

(From left to right: Christopher Tong, Andres Cervera Rozo, Vanessa Bottero, Liam Toner)

University of Toronto Digital Music Sphere

Total Funding Awarded	$200
EngSoc	$200

The U of T Digital Music Sphere received $200 in funding from EngSoc specifically in CPSIF for the "Hackatune" music hackathon event related expenses and prize money. The event was very successful in providing an opportunity for the digital music community in U of T's engineering community and the U of T community at large to flourish, by giving digital music artists at U of T a chance to challenge themselves and showcase their talents to the rest of their peers. In addition, tutorials, panels and talks were held to help students learn more about the digital music community and improve their music-making skills. The funding we received from CPSIF was invaluable for providing awards and merch to students who participated and won the Hackatune event and running the event would not have been possible without the generous support of the U of T Engineering Society.

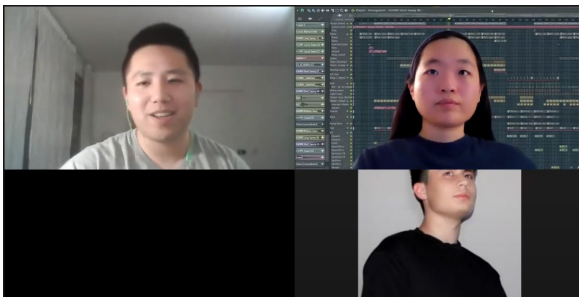


Image provided by University of Toronto Digital Music Sphere

Image provided by University of Toronto Digital Music Sphere

Attached below are videos documenting various panels and events from the Hackatune.

- https://www.youtube.com/watch?v=LHUskl5NNGc
- https://www.youtube.com/watch?v=nLp-FaCwsvQ&ab_channel=UofTDigitalMusicSphere

University of Toronto Emergency First Responders (UTEFR)

Total Funding Awarded	**$2,200**
EAN	$1,200
EngSoc	$500
ECE	$250
MIE	$100
EngSci	$100
MSE	$50

Founded by a small group of engineers, the University of Toronto Emergency First Responders (UTEFR) is student-led volunteer group whose goal is to provide first-aid education and quality pre-hospital care to the entire U of T St. George community. In the past, we have been dispatched to a variety of high-profile campus events, such as Convocation, Frosh Week, and Skule Nite, where our members have worked alongside Campus Police and various student organizations to ensure the safety of U of T students. It is thanks to the generosity of the Faculty of Applied Science and Engineering that we are able to operate, and we are very grateful for your contributions.

This past year we received $2200 through the CPSIF. Much of this funding was used to purchase important medical equipment, supplies, PPE and responder uniforms. In addition, this funding will be utilized for the planning of an Emergency First Responder (EFR) first aid certification course allowing UTEFR responders to broaden their first aid skills and thus serve the University of Toronto community better when responding to events.

Building on our work from previous years, we also wanted to continue our commitment to producing highly skilled responders even through the COVID-19 pandemic. CPSIF funding was critical in helping run our training sessions that we provide for free throughout the entire year. These training sessions are important for the professional development of our members and help students from various disciplines come together and bond over their mutual interest in first- aid.

None of this would be possible without donations from CPSIF and all the Engineering Departments that provided funding for UTEFR events/trainings throughout the year. We are truly thankful for your help and hope to continue providing first-aid training/services and promoting safety to students throughout the U of T community.

University of Toronto Emergency First Responders (UTEFR) responding at this year's Convocation

University of Toronto Engineering Finance Association (UTEFA)

Total Funding Awarded	**$2150**
EngSoc	$500
MIE	$400
ECE	$350
EAN	$300
YNCN	$300
EngSci	$200
ChemE	$50
CivMin	$50

The uses of the fund consists of three parts:

1. Purchases of online courses
2. Charges for maintaining our website
3. Expenses for events.

For example, in the 2021-2022 school year, we spent $27 CAD on purchasing Udacity courses on Taobao (Appendix A), $142 CAD on Amazon web services that include monthly charge and server renewal charge, and $330 CAD for distribution of gift cards to participants that attend our Consulting in Tech event.

UTEFA is a club that aims to educate engineering students with knowledge of finance, providing members utilizing their skills to prepare stock pitch recommendations and connect members to members of the finance industry in various networking events.

Consulting in Tech is the networking and panel event we held in the 2021-2022 school year. We invited multiple speakers from tech and accounting companies, including EY, KPMG, TESLA and so on. Engineering students gained the opportunity to hear stories about the development process, and in doing so assess their suitability of working in such firms. To increase outreach and exposure, we spent funds on marketing to promote it to more students and gift cards used as prizes for a challenge and as courtesy gifts to speakers. Through broader outreach, we helped more engineering students learn about their potential career paths and plan their academic and professional careers

The fund allows UTEFA to retain its presence in the Skule community, helping us promote our central goal of spreading finance knowledge and developing relevant skills. We find that finance is becoming increasingly valued by engineers, evidenced by the increasing number of engineering students pursuing Business Minor. This generous support helps our club complement the academic program and provide a supportive environment for members to realize their interests.

The funding we received was invaluable to generating an inclusive, vibrant, and intellectually stimulating club environment throughout the year.

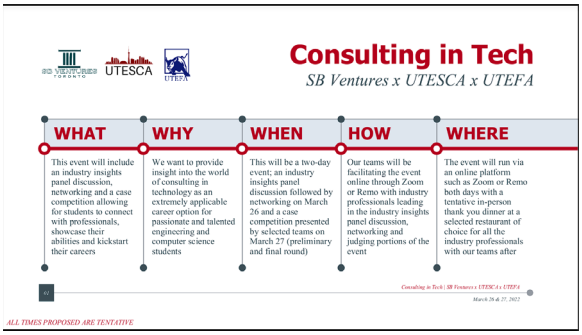
In response to popular requests for members to be exposed to quantitative finance, we were able to sponsor members to take the Udemy Quant Course. In turn, this knowledge was shared across the organization, such as at our Info Session on Quantitative Finance.

Although stock and case competitions align with the interests of our students, the opportunities to partake in such events are rarely offered to engineering students. One of UTEFA's key motivations is to expose students to the experience and refine the skills needed in the finance industry. Enabled by the funding, we were able to host three competitions for students to learn key skills and put them to practice.

Finally, funding consistently goes to operating costs, including website maintenance and trading transaction costs. While these are not specialized activities, their importance on generating a consistent presence for our club warrants their discussion.

These are just a few examples of how funding allowed our members to grow their skills and act on their interests. The generous contributions helped foster a collaborative learning and social space.

Due to extraordinary circumstances regarding COVID-19, we did not involve alumni in our events last year. We will reapproach alumni this year in the finance, technology, and consulting industries to be speakers. We will also hold networking events for members to engage with more established individuals in the field.



Promoting material of Consulting in Tech event

University of Toronto Engineering Competitions (UTEK)

Total Funding Awarded	**$6,600**
EAN	$2,000
ECE	$2,000
MIE	$1,250
EngSci	$1,000
YNCN	$300
CivMin	$50

UTEK 2022 was attended by about 300 undergraduate students.

UTEK received a total funding of $6600.00 through CPSIF this year. This contributed to over 60% of UTEK 2022's total revenues thus this money was used for UTEK's major expenses.

This year's major expenses were winner prizes and materials purchase for Junior Design and Senior Design Kompetitions. The prizes were given in the form of cash to the students earning first, second and third places in their respective competitions. The CPSIF funding was also used to buy merches for the members of the UTEK 2022 planning committee. The merch was bought to show appreciation to these students who worked hard to organize this event.

On behalf of the UTEK 2021-2022 planning committee, we would like to thank the CPSIF committee for financially helping us in organizing this event and we hope to collaborate in organizing more successful UTEKs in the future.

University of Toronto Engineering Student's Consulting Association (UTESCA)

Total Funding Awarded	**$2,450**
ECE	$750
EngSoc	$500
MIE	$400
YNCN	$300
EAN	$250
EngSci	$200
ChemE	$50

We effectively and efficiently used the funds provided by CPSIF in 2021-2022 to majorly benefit the Skule community and grow UTESCA's member base. With the goal of providing real-world consulting experiences and applicable skills for success in any career, we created dynamic events and forged strong corporate relations. Our overall applications of the funds can be divided into 2 major categories:

1. Events for the UofT Community
2. Networking-Based Events

Events for the UofT Community

The specific funding for each of these events went into honorariums (in the form of gift cards) for all invited speakers and corporate representatives, marketing raffles on social media to encourage UofT student attendance and hosting the website. We were able to host 8 major events throughout the year for the UofT Engineering community. These are engineering consulting-based events that are meant to further expose the Skule community to real-world consulting careers and experiences.

- Curious About Consulting Panel
- Crack the Case Event
- Isaac x UTESCA Event
- RCCA x UTESCA Casual Connections
- Resume Coffee Chat
- LIDD x UTESCA Presenting with Impact
- EngBus x UTESCA Case Competition
- SB x UTEFA x UTESCA Consulting in Tech

Networking-Based Events

We invited 3 groups to UTESCA social events: UofT undergraduate students (mainly engineering students), UTESCA executives, and clients from the consulting projects that UTESCA undertakes annually. Very minimal funding has gone to these events in comparison to other events because they have been largely online so far. When more of these events become in-person, UTESCA will likely have to secure food and venues for these incredibly important events. Since these events connect the Skule community to professionals and help undergraduates take on engineering consulting cases while being paired with professionals through our pro-bono consulting initiative, these networking events are integral to

our club's success and have the potential to change the careers of UofT students. Each project has 4 UofT students who are paired with a professional consultant to work with a unique company. The following is an overview of each of our 5 consulting projects:

- Hospice Palliative Care Ontario(HPCO)
- Kiwanis
- Let's Talk Science
- Softeem
- The Happenin Company

Therefore, we created a more vibrant community since engineering students had access to major engineering firms and real-life experiences to understand how engineering consulting projects are executed in the corporate world. We educated students about engineering consulting by teaching how to crack a case study, present and communicate effectively, etc. We exposed them to different tools that can be helpful in their careers through anecdotes from employees based on presentation quirks and networking tips.

We secured 5 engineering consulting projects throughout the academic year and recruited 4 UofT Undergraduate students to work on each one of them. This finally gives students an opportunity to apply what they have learned in a real-world scenario. The budget helped create social events to link UofT undergraduate students working on the projects with the UTESCA executive team and their corresponding clients.

These projects build work experiences for Skule members, give them invaluable consulting experiences, create close corporate bonds for Skule members, and can provide more connections for future UofT students.

This funding aided in leveraging strong relationships with other UofT Clubs and Industry Partners because we had the funding to support joint initiatives and major ideas as long as we saw the benefit to the Skule community. For example, we were able to work with industry professionals like LIDD and Isaac and UofT clubs like UTEFA and RCCA. These close connections will be invaluable in the future when hosting in-person events and targeting larger consulting firms that many engineering students are interested in.

This funding was imperative to our club because it aided in 4 major aspects of our club operations.

1. Managing COVID-19
2. Securing Speakers
3. Effectively Marketing UTESCA
4. Engaging New Members

We engaged over 14 alumni throughout the school year who served as mentors or speakers at our events. Alumni make up a large portion of all the corporate representatives that our members are able to engage with in these networking-based events, so each of these alumni were able to connect with UofT students across various engineering disciplines through Zoom breakout rooms and more.

University of Toronto Ethical Principles in Artificial Intelligence (EPAI) Team

Total Funding Awarded	$200
EngSoc	$200

EPAI used funding to coordinate EPAI's speaker series, a technical project on bias in facial recognition, and merchandise to strengthen EPAI's student community.

EPAI hosted four unique speaker series for undergraduate engineering students that covered topics including auditing AI models for verified deployments, ethical pluralism and decolonizing AI, responsible AI in disaster risk management, and lastly, AI recognizing race in medical imaging. Each speaker received a $25 gift card to show EPAI's appreciation of them taking the time to coordinate with EPAI and present their research. The speaker series was EPAI's primary mode of connecting with non-members to spread awareness of issues in AI, particularly to undergraduate students as they have limited exposure in-depth knowledge of Implications. The infographics of these speaker series have been included below.

EPAI used CPSIF funding on a Google Colab Pro subscirption to aid development of a project on bias in facial recognition systems. Facial recognition systems can be found almost anywhere, from police departments to the face-lock feature in your phone. However, these systems can be biased, often in ways that reflect current social inequalities. This applied project explored bias in facial recognition systems, while introducing machine learning code to undergraduate students. Having Google Colab Pro makes testing the system faster, and therefore a more fruitful process for the project lead (Chris Mountain) and project members.

EPAI exec members.
L-R, top to bottom: Gary Wei, Chase McDougall, Chris Mountain, Adele Wechsler, Emily Traynor, Jasmine Zhang, and, Sarina Xi.

EPAI used funding to subsidize merchandise to strengthen the club community. The merchandise allows club members to represent EPAI outside of club events and provides a sense of officiality to a new club which is beneficial in advertising EPAI to student

University of Toronto Fashion Club

Total Funding Awarded	**$400**
EngSoc	$200
EAN	$200

The UTFaC is UofT's first ever fashion club that will encourage students to participate in its annual fashion show by providing them with knowledge and practice of modelling and fashion designing. The funding from CPSIF allowed the University of Toronto Fashion Club to pay its monthly bank fees as well as create a magazine showcasing different styles that people can purchase and keep for a lifetime. It also spreads the name of the club across the University of Toronto and students who are interested in fashion can join the club as an extra-curricular activity to enhance their undergraduate experience.

As this is a new club, and due to the unforeseen situation of the COVID-19 pandemic, the club was unable to execute the in-person fashion show as planned earlier in the year. Instead, the club hosted photoshoots of differing styles and fashion eras to be put into a Vogue style magazine and printed for the models and their families to keep. The magazine will be sold for $7 and the revenue from this would be used for the following academic year. The magazine is in production right now and will be available to students starting September 2022.

Featured: Lily Turmel, Emilia Deborah, Ali Syed, Luis Sanchez, Rachel Zhou, Shreya Gupta

University of Toronto Formula Student Racing Team (UTFR)

Total Funding Awarded	$30,200
EAN	$15,000
MIE	$14,000
ECE	$600
YNCN	$400
EngSci	$200

The University of Toronto Formula Racing (UTFR) team used the generously awarded CPSIF funds to develop and build their first electric vehicle, UT22, which competed at the Formula SAE Michigan competition in June 2022, placing 21st out of 55 teams. While UTFR is supported by its generous sponsors and community partners, CPSIF funding was crucial for purchasing electric powertrain components such as our electric motor, inverter, battery management system, and lithium-ion battery cells. CPSIF funding also allowed us to begin developing driverless systems.

The team consists of 50+ highly active members who thrive under the support of CPSIF and annually build a brand-new race car to compete with around the world. The students gain industry standard, hands-on experience to complement their academic studies, developing diverse, highly sought-after skill sets not taught in the classroom. To highlight our technical achievements, the team placed 8th out of 122 universities in the international Formula SAE 2021 virtual design event. In addition to building technical skills, members become part of a tight-knit community which includes our extensive alumni network, forming connections and learning the true value of being part of a team.

UTFR is proud to represent the University of Toronto and display the team's work, inspiring the minds of our fellow Skule community and beyond by showing off current and past vehicles at events and around campus. Although the past year's showings have been limited by the pandemic, we were able to display our vehicles at several public events. In March, our booth was visited by approximately 2,000 people at the International Motorcycle Supershow, and we unveiled our first electric vehicle at UofT's 2022 Alumni Reunion Alumni Fest in May. By attending these events, members can share their experiences with the team, engineering, and the university, and promote sustainability through emissions-free electric vehicles.

At the 2022 UofT Alumni Reunion Alumni Fest, we brought our last combustion vehicle (right) and our first electric vehicle (left) to share the story of our transition from combustion to

emissions-free racing with the UofT community. Photo creds to Chris Yip (IG: @uoftengdean)

UTFR received CPSIF funding from the Department of Mechanical & Industrial Engineering, the Engineering Alumni Network, the Edward S. Rogers Sr. Department of Electrical & Computer Engineering, Your Next Career Network, and the Division of Engineering Science. Using the generous funding, we were able to buy critical materials and parts to build our first electric race car and compete against other top engineering schools. Funding is also crucial for us to compete overseas. Since the pandemic cancelled our European competition, we diverted funding to develop our forthcoming driverless vehicle, starting with our perception and localization systems.

The team with UT22 at the 2022 Formula SAE Michigan competition where we placed 21st out of 55 teams. This achievement will serve as the beginnings of our electric, sustainable, and emissions-free future. (IG: @uoftfsae)

The UTFR community includes a diverse network of alumni, who frequently engaged with the team by mentoring newer members and design leads and offered technical expertise from their time on the team and from their experience in industry. UTFR alumni frequently came to visit the team at our shop and events to follow the progress of our new electric vehicle and had high engagement on our social media channels. The team focused on increasing alumni and community engagement on our social media, reaching approximately 38,200 unique accounts and 108,600 impressions on Instagram (@uoftfsae) in our most recent quarter at time of writing.

Our alumni and sponsors also came to our annual UTFR Shootout event, which puts other Formula SAE teams from around North America on track together for a full day of competition. Although limited due to the pandemic, our 2021 October shootout hosted nine teams with around 250 students and 200 spectators. At Shootout, we maintained our relationship with several alumni who continue to seek out PEY and full-time students from the Faculty of Engineering, and help students transition into professional environments.

We plan to carry our momentum into the 2022-2023 season where we will continue competing in the North American FSAE electric competitions, and where we will return to Europe to compete at the prestigious Formula Student Germany as an electric, driverless vehicle. Continued CPSIF support will be critical to our success on the world stage so we can continue spreading our message of an electric, sustainable, and emissions-free future.

University of Toronto Hyperloop Team

Total Funding Awarded	**$19,100**
MIE	$12,000
EngSci	$3,000
EAN	$2,500
MSE	$1,000
YNCN	$600
ChemE	$100
CivMin	$100

CPSIF was critical to the operations of University of Toronto Hyperloop Team in 2021-22 as it was the first year of competition. Many logistical challenges (pod shipping) and acquiring critical components (e.g., motor fittings) were supported through this funding. More specifically, CPSIF supported Equipment & Material costs, Capstone & Thesis, and European Hyperloop Week.

Equipment, Material & Tools

A variety of materials and tools were used in the team's projects. Major expenses include carbon fibre, honeycomb Nomex, industrial-grade electrical safety equipment, a computer, and other power tools.

Capstone & Thesis

One interdisciplinary capstone project and an EngSci thesis hyperloop related were financed with this funding.

European Hyperloop Week

The funding helped bring our prototype (logistics & transportation) and essential members to the competition in Delft, Netherlands. It also served to cover expenses incurred during testing and assembly at 256 McCaul and Waterloo Track.

UTHT brought engineering alumni working at Metrolinx and TTC to contribute to our Hyperloop Feasibility Study with research strategies and insight. This study encompasses the technical design and socio-economic impact of large-scale high-speed transportation. This study also was awarded the 'Sustainability Design Award" at the European Hyperloop Week.

Another example of alumni involvement is working with Prof. Tom Ma (ECE), who provided technical guidance in testing the pod's powertrain. Support from Prof. Ma accelerated the integration and assembling of our power systems for competition.

Team at EHW with the pod and its shell

Competition makes a great part of what the team aims for. Our takeaway was plenty of motivation, technical insight, and a clear path moving forward for the team projects.

University of Toronto Iron Dragons

Total Funding Awarded	**$6,400**
EAN	$3,000
ECE	$1,700
MIE	$1,000
EngSci	$300
YNCN	$200
ChemE	$100
CivMin	$100

Funding was used for the registration of regattas; spring camp facility booking in Pickering from Alkame Dragon Boat Services; hotel accommodations for going to Nationals this year in Montreal; Cardio-Go and Afterburn gym booking fees; outrigger canoe rental fees; dragon boat mooring fees at Sunnyside Paddling Club; Dragonboat Canada membership and Sunnyside Paddling Club membership fees (these memberships are needed to compete in nationals and store/dock our dragon boat); subsidizing coaches' parking and gas expenses; paddle ergometer maintenance expenses (change of worn-out ropes and bungee ropes); jersey expenses for competitive crew; etc.

The funds allowed us to book dragon boat specific gyms such as Cardio-go and Afterburn during the school year. As we welcome diverse individuals from all experience and fitness levels, the booking of these gyms ensures that we are able to help our members build and grow together to be prepared for dragon boat regattas in the summer.

During the school year, while we closely followed Covid guidelines, we were foster a welcoming environment for in-person team workouts. These sessions helped our team members achieve personal growth in strength and endurance. Furthermore, it enhances the experience of students inside and outside the Skule community by providing small and large group settings to build friendships and provide an outlet for stress. Iron Dragons not only provides opportunities for students to learn an exciting new sport, but also provides a tight-knit community that motivates each individual to be the best version of themselves.

In the summer, a big chunk of the funds are used for registering for regattas, which includes the 2022 Canadian Dragon Boat Championship in Montreal. Along with the registration fees, the funds are used for subsidizing hotel accommodation and travel expenses, so we are able to represent the Skule community at the

National competition. At various regattas throughout the season, we strive to perform to our best. Currently for this season, we have won gold in the University Mixed Division at the Milton Dragonboat Festival and bronze in the Mixed Division B Championship Finals at the Toronto International Dragon Boat Race Festival. The involvement in regattas increases the visibility and awareness of the Skule community and the discipline of engineering itself.

The funding is important to us as it allows us to book the necessary facilities and equipment to train our team. Especially during this semi-post-Covid time, where our team has raced for the first time since 2019. The funding helped us rebuild our team as most of our team members from our past 2019 team have graduated. This 2021-2022 season consists of individuals totally new to the sport with a completely new management team. With less experience in the team, the funding as well as strong alumni support was crucial to rebuild Iron Dragons. With the funding, it allowed us to continue what we have done in pre-Covid times, which is to enhance the undergraduate and/or graduate student experience in the Engineering Faculty, build an inclusive community among students and alumni, contribute to leadership and/or the professional development of students in the Engineering Faculty by providing leadership roles, and increase the visibility of the Engineering Faculty by representing Skule at regattas.

Alumni are essential to our club; they act as our team's coaches in the sport of dragon boat.

During the school year, coaches devise fitness plans to help our team build and run group workout sessions weekly.

During the summer, the competitive Blue team is coached at 3 practices weekly from the start of May to near the end of August. This year the Blue team is participating in 5 regattas, including:

- Milton Dragon Boat Festival (May 28) Pickering Dragon Boat Festival (June 4)
- Toronto International Dragon Boat Race Festival (June 18, 19) GWN Sport Regatta (July 9)
- Dragonboat Canada Nationals (August 17-21)

During the summer, the recreational Gold team is coached at 2 weekly practices each week which are mainly outrigger canoe practices, but occasionally include dragon boat practices. Gold competed at Battle of the Canal in Montreal (June 25, 26). Our coaches include the following:

- Blue Coaches: Micheal Lucky (MechE 1T5+PEY), Desmond Chan (CivE 1T3+PEY)
- Blue Junior Coaches: Ehren Chang (KPE 2T2), Yca Meriel (MSE 1T9+PEY)
- Gold Coaches: Hannah Fletcher (INDY 1T9+1+PEY), Courtney Siu (CS 1T8+PEY)

University of Toronto Machine Intelligence Student Team (UTMIST)

UTMIST

Total Funding Awarded	**$850**
EAN	$200
ECE	$200
EngSci	$150
MIE	$100
MSE	$100
YNCN	$100

University of Toronto Machine Intelligence Student Team (UTMIST) is a student club dedicated to clearing the mist surrounding machine intelligence for U of T undergrads. We provide opportunities for members to discuss, participate, and research on the latest machine learning techniques and their emerging applications. A list of this year's projects can be seen here: https://utmist.gitlab.io/projects/2021-2022/.

We aim to ignite interests and promote undergraduate students' involvement in the field of machine intelligence by hosting activities across the following areas:

1. Academic Talk Series and Engineering Workshops
2. Themed Machine Learning Competition
3. Hackathon for the intersection of business and technology
4. MIST Machine Learning Projects
5. Study groups in Machine Learning
6. Technical writing and research paper reading group.

At the end of the past school year, we were able to benefit more than 500 members.

We are very grateful for the funding from CPSIF, as it gave us critical financial resources to organize various online events in order to advance our goals of promoting student engagement and participation in the learning, discussion and research in machine intelligence.

The funding facilitated our administrative work such as recruiting members at clubs fairs and events by providing an excellent streaming platform and viewing experience for our event attendees as well as covering the thank-you gifts costs for our guest speakers. All UTMIST's events for this school year can be found at: https://utmist.gitlab.io/events/, starting with Annual General Meeting (AGM) 2021.

In the past school year, we hosted two speaker series (Breaking into AI: Industry Speaker Panel and Ethics in AI Speaker Panel)and one technical skills workshop (From Zero to Hero - Intro to Python AI Workshop) where we invited graduate students, professors and research scientists to share their expertise. Student participants were able to learn about the latest frontier research

from researchers firsthand. One of our video has more than 100 views. The networking session at the end of these events provided opportunities for students to connect with researchers from industry and academia.

UTMIST believes in machine learning for a good cause. Last year, we collaborated with 25 student communities of universities leading in CS and AI from across the United States, the United Kingdom and Canada to take a lead in the fight against climate change in the format of hackathon, Climate Hack.AI. In a 2 month period, teams compete for the best machine learning algorithm using satellite data from Open Climate Fix for weather forecasting. A team of 3 representing U of T beat top universities including Harvard, MIT and Stanford. The event was a success with 8 teams of U of T students participated, all placed 100 or above in the competition.

Award ceremony of Climate Hacks AI in New York. A U of T team won second place.

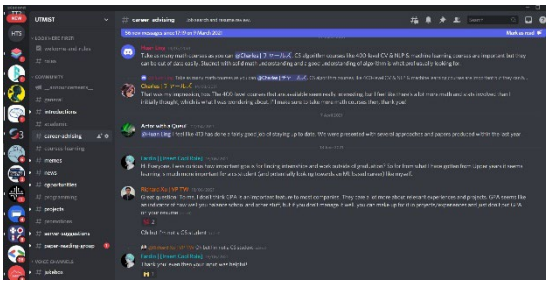
In parallel with Climate Hack AI, we hosted an hackathon event in collaboration with Rotman Commerce in the Winter semester with an industry partner, Flybits. It was a great opportunity for students to build their portfolio by building projects and working with students in a different discipline. The engineering students had a chance to learn business side of computation, and vice versa. We had 41 participants in the event, 9 teams presented, and 3 final winners of the hackathon. A list of projects developed during the hackathon can be found here: https://biztech-virtuathon.devpost.com/project-gallery.

This year, we also continued our initiative called MIST Projects, where students form groups of up to 6 members to work on projects with an experienced project lead. The initiative provides practical opportunities for members to develop their ability to comprehend ideas from papers, and implement them into projects, and produce similar results, which is very important in real-life research. Members were not only able to learn about existing research but also had a chance to contribute their own innovative ideas. We facilitated the development of their projects by organizing recruitments and a matchmaking event, provided computing resources and advice, conducted regular meetings, and at the end of the school year, hosted an annual project showcase. The annual project showcase was recorded and posted on our media channel for students who cannot attend. We had more than 90 views.

For those that are new to machine learning, we created a series of eight machine learning introductory tutorials, which were hosted online during Fall (6 workshops) and winter (7 workshops), with assignments and giveaway contests to encourage students from different fields to gain a better understanding of machine learning and learn at their comfortable pace. The

tutorial series of last year can be found here: https://utmist.gitlab.io/mist101-102/. This year, the machine learning initiative goes a step further, by forming a study group where mentors will lead students to complete a certificated course on Coursera sponsored by U of T on Deep Learning, which is a subdomain of Machine Learning. More than 50 students have signed up for the study group.

To continue to foster a community of machine learning student enthusiasts, we built a Discord server to engage our club members with relevant conversations virtually, where we regularly posted career and research opportunities, offered help and advice in programming and job searching, and hosted online socials.



Active conservations on UTMIST's Discord server to discuss the ML courses offered at University of Toronto and career advising which members found the channel to be helpful.

To make our content accessible to more students and people in other communities, we posted blogs on Medium platform and, new for this year, monthly newsletters. We had 7 issues throughout last school year. These mediums are used to share our technical events and relevant news in the industry, academic, and research, in a detailed, yet beginner-friendly way, aiming to benefit a larger general public that is not only limited to UofT students. This year's collection of newsletters can be viewed here: https://utmist.gitlab.io/newsletter/

We also engaged alumni in our programming, including:

- Anqi Joyce Yang, Ph.D. Candidate (February 05, 2022, Guest lecturer at From Zero to Hero - Intro to Python AI Workshop)
- Sheldon Huang, EngSci Alumni (September 18, 2021, Keynote Speaker at UTMIST Annual General Meeting)
- Frank Rudzicz, Ph.D., Ph.D. Alumni in Computer Science (May 3, 2021, Guest Speaker at Discovery AI Challenge Live Event)

Together, the combination of these events helped create a vibrant and inclusive platform for on-campus AI enthusiasts to meet, discuss, learn and innovate, and bridge the undergrad community with the AI graduate research community.

University of Toronto Ontario Water Works Association Student Chapter (U of T OWWA-SC)

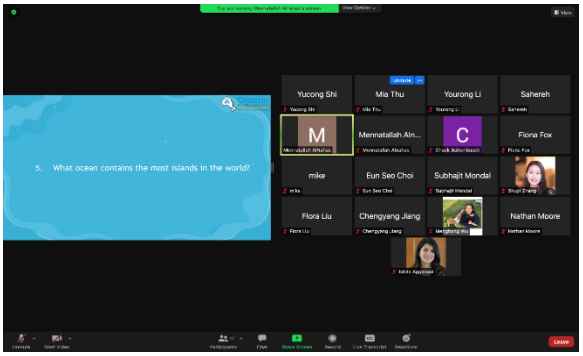
Ontario Water Works Association
a Section of the American Water Works Association
University of Toronto Student Chapter

Total Funding Awarded	**$700**
EAN	$250
CivMin	$200
EngSci	$100
YNCN	$100
ChemE	$50

The Ontario Water Works Association Student Chapter at the University of Toronto (U of T OWWA-SC) would like to cordially thank all of the organizations and departments listed above for supporting our events during the 2021-2022 school year. During this year, we hosted all our events online following the safety guidelines imposed due to the constraints brought by the COVID-19 pandemic. Despite the challenges of virtual events, our club still managed to provide the vibrant Skule community with opportunities to learn and explore potential career options in the water industry through various events, to explore global water issues, and to expand their technical knowledge while networking with fellow students and alumni with similar interests.

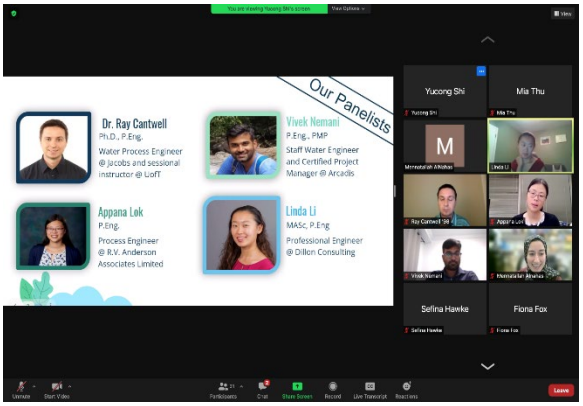
The U of T OWWA-SC also hosted webinars to raise awareness and promote exposure to advanced scientific issues including emerging topics in the water industry. Topics of the webinars included i) Performance Criteria for Source Water Protection, ii) Women in Water – Inform. Influence. Impact, and iii) PFAS, Forever Yours. These events helped to improve the participants knowledge on leading water technologies and raised their awareness on global drinking water sustainability while promoting diversity and inclusivity. During the events, we set up interactive polls to highlight the important takeaways for our audience. In this regard, we are immensely grateful for the CPSIF funding, which enabled us to hold raffles with e-gift cards as prizes to encourage participation from students and alumni in our events.

On September 30th, 2021, the U of T OWWA-SC hosted a Jeopardy-style Water Trivia Night focusing on water-related issues. The funding support received from CPSIF provided raffle prizes as well as gift coupons for the winning team on the trivia night. The event attracted around 20 students and alumni in total and provided an interactive platform for the audience to expand their general water industry knowledge and provided an opportunity for networking with other students/alumni with similar career interests.



September 30, 2021: OWWA Water Trivia Night

On November 4th, 2021, the U of T OWWA-SC hosted a panel discussion on the Impacts of the Pandemic on the Water Industry, which attracted over 20 participants. The funding again helped to provide gift coupons for our 4 speakers (3 being U of T alumni) and raffle winners. The event enabled students to virtually gather and connect with our speakers and fellow students, which has been otherwise challenging due to the pandemic constraints.



November 04, 2021: Panel Discussion: Impacts of the Pandemic on the Water Industry

On February 17th, 2022, the U of T OWWA-SC hosted an online Networking Night with 6 speakers from the water industry, with 4 of them being U of T alumni. The event attracted over 30 students from different departments. The networking event enabled the students to network with our speakers and have one-to-one conversations related to potential opportunities in the water industry for upcoming graduates. The funding received helped to provide gift cards for our speakers and raffle winners.

Overall, in a completely virtual environment, the CPSIF funding continued to be very important for our club, which allowed us to encourage participation from students and alumni and promoting their interests to dive deeper into the water industry and the water environment. In addition, the funding helped us to provide a socializing platform for students, alumni, and industry professionals with similar career interests. The technical knowledge and the interpersonal skills gained through these events will benefit the career development of our members immensely in the Skule community.

Once again, we would like to cordially thank each of the departments and organizations that supported the U of T OWWA-SC this year; moreover, we would like to thank all the alumni whose participation was integral to the success of our events. These supports have been extremely meaningful to our club and our members, especially under this challenging time. From the 2021-2022 U of T OWWA-SC and all of its members, we look forward to working with the Faculty of Applied Science and Engineering again in the upcoming year to serve the vibrant Skule community.

University of Toronto Robotics Association (UTRA)

Total Funding Awarded	**$5,400**
MIE	$2,000
EngSci	$1,500
EAN	$1,500
YNCN	$400

The University of Toronto Robotics Association (UTRA) is sincerely appreciative and thankful to the departments of the Faculty of Applied Science and Engineering, as well as to the various organizations and divisions who all collectively contributed $5,400 through the Centralized Process for Student Initiative Funding. The funding allowed us to bounce back from the pandemic induced hiatus by allowing two of our teams to travel internationally to compete and setting the foundation for two more to continue in the upcoming year. Additionally, we were able to host our introductory SUMO workshops and a series of robonars to help lower barriers of entry to robotics for students at UofT

During the part of the year that was plagued by the COVID-19 pandemic, the physical development of robots was limited to what members could do in their own homes. As a whole, we instead chose to focus spending the start of the year specifically on software to enhance the experience of each of our six sub-teams.

Because of this funding, our autonomous rover team was able to replace costly but outdated equipment that was prohibiting them from meaningfully attending competitions. With new motors, GPS sensors, and chassis components, the team was able to represent Skule at the Intelligent Ground Vehicle Competition (IGVC) in June this year.

A similar success story is shared from our robosoccer team, who with this funding, is able to travel to Thailand to represent Skule at the Robocup competition. This is a huge win for us as a design team to be able to start returning to these competitions in a post-pandemic world.

Our combat team was also able to invest in upgrades to Annie, our mid-weight combat robot. The team is aiming to return to competition in the 2022/2023 season.

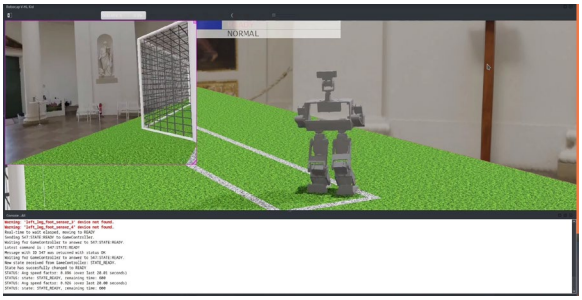
Through the technical development that UTRA was able to undertake thanks to the funding, we are currently on track to attend the following competitions in the upcoming academic year: Intelligent Ground Vehicle Competition (IGVC), Harvard Pacbot Competition, UIUC Robobrawl Competition, RoboCup.

Due to the limitations of in person activities set by covid restrictions, UTRA was unable to provide

the robonars platform for alumni to speak as we had wanted to this year. Our members are always encouraged to be virtually engaged with Alumni through Connect. We look forward to returning to inviting alumni to our workshops and hackathons now that in person activities have resumed.

We look forward to returning to campus full time this year, and once again, are very thankful for the support the Centralized Process for Student Initiative Funding has provided us in previous years and the unusual 2021-2022 academic year.

The Autonomous Rover Team at IGVC in Michigan. From left to right: Peter Shadrin, Michael Ruan, Vicky Huang, Spencer Teetaert, Ammar Vora, Katrina Meng, Satvick Acharya



Demonstration of our robot soccer player walking in simulation

University of Toronto Seismic Design Team

Total Funding Awarded	**$2,100**
CivMin	$1,000
EAN	$500
EngSoc	$500
EngSci	$100

Thanks to the funding provided through CPSIF, our team was able to design and construct an earthquake resistant Balsa wood tower to compete at the 2022 EERI Seismic Design Competition in Salt Lake City, Utah, United States.

As the only UofT engineering design team that focuses on structural and seismic engineering, our team provides our members with valuable opportunities to explore civil, structural, and seismic engineering concepts through a hands-on design project. Working in a multidisciplinary team of civil engineering, engineering science, and architecture students, our members learn how to independently manage projects, use industry standard modelling and analysis software, and expand their knowledge of seismic engineering concepts. We also host tutorials and workshops where students from the Skule community and beyond can learn how to use modelling software and participate in the construction process. The experience and skills that our members gain are often hard to develop through other civil engineering design teams and course projects, and will continue to benefit them in their professional and academic careers.

Moreover, the team actively collaborated with other clubs and design teams at the University to help build a vibrant spirt in the broader community. The team invited members from the Concrete Canoe to aid in the construction of the tower and we also had our own members go work on the concrete design in the other team.

We also organized a series of recorded earthquake-engineering tutorials that are publicly posted on our YouTube channel. These tutorial sessions helped train new members of our team and attracted participants from the Skule community and beyond.

The funding provided freedom to pursue our club's primary purpose without any financial limitations was important for us to maintain our values of pursuing and promoting an understanding of structural engineering and seismically resilient structures.

The majority of CPSIF funding used to buy equipment and materials to construct towers to submit to competition. This included adhesives, balsa wood, saws, wood for shipping crate, etc.

The funds also paid for our posters and other advertisements to represent the University and our design team at the competition. Due to an increase in cost of supplies due to inflation and supply chain issues we were only able to build one tower, as it was more expensive than previous years. After the competition, we got more ideas about how to improve our construction. Without the funding, it will be harder for us to try new technology like laser cutting, 3D prints, jigs and constructing the tower.

Picture of the Tower that the Team Constructed

Our team worked closely with the University of Toronto Earthquake Engineering Research Institute (UT-EERI) Student Chapter for mentorship and industry relations building. The team often met with UT-EERI members to update them on our progress and seek advice on technical challenges. We had active communication with two PHD students Marawan Zaki and Pedram Mortazavi, who assisted the team with any technical issues and provided advice. Moreover, we had recent undergraduate alumni, Daniel, Kota, Liam, and Jinbo meet with the team on May 27th, June 5th , and June 18th for our final design review and construction of the tower.

Our Design Team during the Competition. Left to right the member's names are Grace, Kaison, Ashraf Habibullah (the founder of CSI and Seismic Design Competition), Michael, and Eliza.

Our Design Team won First Place in the Best Architecture Category of the Competition

UTWind

Total Funding Awarded	**$1,800**
ECE	$1,000
EngSci	$300
EAN	$250
MIE	$250

UTWind is the University of Toronto's first wind turbine design team and in our first year of operation we succeeded in building a turbine that won the award for best overall turbine in the International Small Wind Turbine Contest (ISWTC) in the Netherlands this June (2022). The funding received from the CPSIF was instrumental to our success as it enabled our team to dream big and make that dream a reality.

The funding in the amount of $1,800 in total was used to machine several components critical to the wind turbine's functionality - namely the blade stubs and hub center. The blade stubs enabled the blades to be secured to the hub such that their pitch could be dynamically adjusted while the hub center connected the shaft of the turbine to the rest of the hub. Both components are important to the wind turbine. Another area the funding was used in was to purchase electronics such as a raspberry pi and several PCBs to control various aspects of the turbine such as the pitch control mechanism. The funding was also used to cover the cost of the overweight baggage that contained the pieces of the turbine when the team traveled to the Netherlands so that the students could compete in the ISWTC.

The CPSIF helped foster the development of a strong community within our club. When the project began, our team was composed of a wide variety of members from many different disciplines of engineering including ChemEng, MechEng, MSE, ECE, and EngSci. Many of these students hadn't interacted with others outside of their discipline - an issue made worse by the recent pandemic. However, through the year and a half of continually working with one another, these students formed great friendships and developed a strong sense of community amongst themselves, learning an incredible amount about not just wind turbines, but also topics from other disciplines that their own courses never taught them. The funds provided by the CPSIF ensured that UTWind had the resources necessary to keep the project going, which enabled the students to form a strong interdisciplinary community. In the future, we hope to continue to expand our community, where we plan to invite some alumni and industry professionals to be speakers and coaches in subsequent years.

The funding provided by the CPSIF was important to UTWind because it enabled us to not only

realize our goals but surpass them. It helped us obtain the materials and resources needed to give the students the ability to design, build, and test their very own wind turbine. This led to us competing in the ISWTC and ultimately winning the prize for the best overall wind turbine.

The primary goal of UTWind has always been to provide students an opportunity to apply their classroom knowledge to a real-world engineering project so that they can learn from all the challenges that normally would not present themselves in a classroom environment. We provided numerous workshops and training to our members, and created an environment where students worked collaboratively with one another to learn how to function in a diverse and interdisciplinary engineering team while also forging deep professional connections and friendships on the way. UTWind succeeded in achieving both these goals this year - the success owing to the club's ability to carry the project through to its completion as a direct result of the funding we received from the CPSIF.

Pictured are several members from UTWind standing in front of their wind turbine after testing its performance in the wind tunnel for the ISWTC in the Delft Institute of Technology in the Netherlands.

From left to right, back row: David Petriw, Andrew Ilersich, Abir Shahid, Abnash Bassi, Ashley Best

Front row: Ben Gibson, Julia Bains, Patty Liu

Water Environment Association of Ontario (WEAO) - U of T Student Chapter

Total Funding Awarded	**$1,800**
EAN	$800
MIE	$250
ChemE	$200
EngSci	$200
YNCN	$200
CivMin	$150

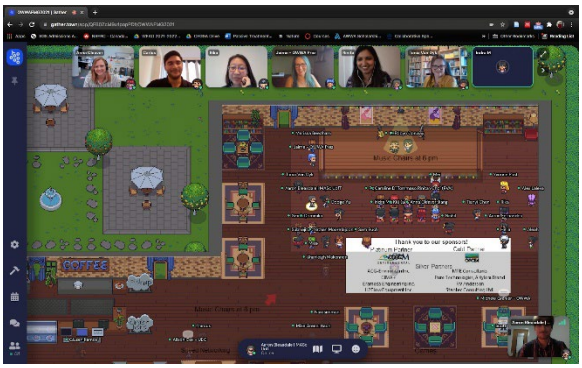
As the outgoing Vice President – Finance of the Water Environment Association of Ontario (U of T Chapter), I would like to gratefully acknowledge the CPSIF funding that we received for the 2021-2022 academic year. In particular, I would like to pay special thanks to the following departments/organizations for their contribution: Mechanical and Industrial Engineering, Chemical Engineering, Civil and Mineral Engineering, Engineering Science, the Engineering Alumni Network, and You're Next Career Network. Without your valued contribution, we would not be able to execute our mission of introducing graduate/undergraduate students to engineering/scientific concepts and career paths in the water/wastewater industry. Despite continued (but easing) COVID-19 restrictions, we had a very successful year filled with engaging and informative online events.

We began our term with a panel discussion titled: "An Introduction to the Waste and Drinking Water Industry: Career Perspectives and Options", whose purpose was to provide our members with a broad overview of their potential career opportunities in the water/wastewater industry. The panel included Aleah Henry (IBI Group), Sabrina Chang (C3 Water Inc.), and Priya Persaud (Region of Peel). Our second event, a technical seminar by Dr Saeed Hashemi gave our members a detailed overview of hydraulic modelling in water/wastewater distribution systems, and how such modelling can be used to plan for future capacity additions and infrastructure improvements to accommodate growing populations. Our Resume-building workshop drew significant interest from our members, who found it to be very practical and useful for tailoring their resumes as they embark on the search for their first post-graduation job.

Instagram post for panel discussion on opportunities in the water/wastewater industry.

In the Winter term we hosted a movie night which aired “The Last Drop”, a documentary film that highlights the growing scarcity of freshwater and clean water sources around the world. We firmly believe in the importance of educating our members on environmental, social, and governance topics related to water/wastewater, and enable them to develop the conviction that they can make a difference. We then hosted Jordan Smyth of Jacobs Engineering Group for an invited lecture on engineering consulting in the water/wastewater industry. Jordan is a recent M.A.Sc graduate, and he was able to offer our members clear a sense of what they might expect in their first few years as young professionals. Finally, we hosted an end-of-term Panel Discussion with two of our recent alumni, Yvonne Zhang (TY Lin Inc.) and Yourong Li (Toronto Inspection Ltd.), who provided an excellent perspective to our members regarding how to land their first job (often quite a difficult task!). Additionally, their insights on the near-term transition between academia and industry was very much appreciated. Finally, we had the opportunity to co-host a networking session with the U of T chapter of OWWA (Ontario Water Works Association), allowing members and alumni of both clubs to interact with one another, build connections, and share their perspectives on the similarities and differences of drinking water versus wastewater treatment.

Instagram post for guest lecture with Jordan Smyth.



Joint networking event with OWWA in Gather Town.

As a club, WEAO U of T is very much looking forward to a return to fully in-person programming in the Fall of 2022. Our executive team recruitment for the upcoming 2022-2023 academic year has already been completed, and we look forward to having several talented individuals joining the team. During the course of the COVID-19 pandemic we have had the opportunity to reflect and analyze on what has worked for us as a club, as well as those things that can improve. Going into 2022-2023, we intend to deliver an academic and networking program that is bigger, better, and more engaging than ever before. None of this would be possible without the generous support from CPSIF.