

UNIVERSITY OF TORONTO 15 King's College Circle, Toronto, ON, M5S 3H7 www.uc.utoronto.ca

Office of the Principal <u>uc.principal@utoronto.ca</u>

College Council

Tel. 416-978-7516 Fax. 416-978-8854

Friday, October 1, 2021 1:30-3:30pm

Zoom

Present:			
Markus Stock	Emily Gilbert	Siobhan O'Flynn	Michael Widener
Ryan Woolfrey	Naeem Ordóñez	Yvonne MacNeil	Margaret Fulford
Naomi Handley	Jerry Plotnick	Youssef Metwally	Emerson Hachinski
Dayna Waltman	John Marshall	Yang Xu	Djanet Sears
Seika Boye	Scott Rayter	Paul Hamel	Suzanne Stevenson
Antje Budde	Maricar Velasco	Fazeela Amiri	Ayush Kumar
Asma Jaseem	Kiana Ravanasa	Neha Sultana	Mrinmayee Sengupta
Ryan Borochovitz	Sue Ropchan		

Regrets:

John Vervaeke	Nikki Cesare Schotzko	Dana Seitler	Barbara Fischer
Juliana Melino	Walid Saleh	Sarah Wakefield	Michael Cobb
Elizabeth Legge	Naveen Minai	Julia Rodriguez	Hannah Fleisch
Shreyansi Gandhi	Jad El Ghali	Muskan Nagra	Nayli Mohamad Zaki

Officers:

David Klausner	Melissa Szopa	

Guests:

Hannah Anderson	Jessie Chen	Gabrielle Fournier	Myrto Grigoroglou
Scott Hendershot	Smaro Kamboureli	Pia Kleber	Angela Paschalidis

Quorum (1/3 of College Council Voting Members) – Met.

WELCOME

1. College Council Zoom Protocol

(By: University College Council Secretary, Melissa Szopa)

- Please ensure microphone remains muted unless speaking
- 'Raise hand' function for seconding motions, and signaling comment or question
- Motions voted upon by using 'yes' and 'no' buttons, with 'go slower' as abstention
- Chat comments monitored by the Secretary

2. Introductions

• All attendees present briefly introduced themselves

3. Motion to approve minutes of the meeting held on March 12, 2021

Motion called by Emily Gilbert Motion seconded by John Marshall Motion approved unanimously

4. Motion to approve committee membership for 2021-22

I. Appointments Committee

Vice-Principal (ex-officio)	Emily Gilbert
Registrar (ex-officio)	Ryan Woolfrey
1 Program Director	Michael Widener
4 Teaching Staff	Walid Saleh
	Tania Li
	Giancarla Periti
	Cynthia Goh
2 undergraduate students	Juliana Melino
(Appointed by UC Lit)	Lucy Stark

Motion called by Emily Gilbert Motion seconded by Kiana Ravanasa Motion approved unanimously

II. Curriculum Committee

Vice-Principal (ex-officio)	Emily Gilbert
Registrar (ex-officio)	Ryan Woolfrey
All Brogrom Directors from College	Siobhan O'Flynn
All Program Directors from Conege	Michael Widener
r rograms (ex-ornelo)	John Vervaeke
	Hannah Anderson
3 Teaching Staff	Myrto Grigoroglou
	Sarah Wakefield
2 students appointed by Program Course	Daniella Ekmekjian (HST)
Unions	Karl Abian (CDN)

Motion called by Emily Gilbert Motion seconded by Smaro Kamboureli Motion approved unanimously

5. REPORTS

- I. Update from the Principal, Markus Stock
 - (Presentation attached Appendix 1)

Land Acknowledgement

- I would like to start by acknowledging that we operate on the traditional lands of Huron-Wendat peoples, of Haudenosaunee peoples, and of Anishinaabe peoples. We continue to appreciate having the partnerships with our Indigenous colleagues, students, and staff in this institution.
- I encourage those on this call to reflect upon the land from where you are viewing UC College Council.

Orange Shirt Day and National Day for Truth and Reconciliation (Sept. 30)

- Orange Shirt Day has been acknowledged by U of T and by University College
 - Please see UC website for full statement
 - uc.utoronto.ca/news/uc-recognizes-inaugural-ntrd
 - UC Library Twitter has provided resources
 - @UCLibrary_UofT
 - Faculty of Arts & Science has provided resources
 - artsci.utoronto.ca/about/strategic-overview/indigenous-learning -knowledge/national-day-truth-and-reconciliation
- I hope you were able to reflect on significance of Orange Shirt Day yesterday (Sept. 30), and attend an event, if possible
 - Events still open for registration that have not yet taken place
 - Including virtual tours of former residential school sites
 - Encourage UC community members to participate
- Training and professional development available for faculty and staff; student sessions also available
 - UC as a College has participated in EDIA training and plans to continue to do so
- Attended event at Woodland Cultural Centre (former Mohawk Institute) yesterday evening
 - Woodland Cultural Centre, like many other former residential schools, provides virtual tours
- Reminder that UC released UC's Response to the Truth and Reconciliation Report in November 2019 after ratification at College Council
 - UC due for biennial check-in on our progress on recommendations this November 2021
 - Update will be brought to November College Council meeting (Nov. 19)
 - Grateful to Gabrielle Fournier, UC's Indigenous Initiatives Advisor, for dedicating her work to documenting UC's progress and making new recommendations
- Heartened by active engagement and activism that UC students participate in and their overall awareness of societal issues that require our ongoing and persistent action
 - Student-led developments in continuing conversations in UC community on the TRC report are commendable and have not gone unnoticed

COVID-19 Response and Resources

- UC has been engaged and participating in safe return to campus
 - Committed to health and safety of students, faculty, and staff
- Everyone is aware of vaccination requirement and face masks being mandatory indoors
 - Noticed that students are very responsible with face masks
- UC Classrooms have been tested for air flow and ventilation
 - Learning Space Management (LSM, formerly ACE) responsible for classroom spaces
 - LSM is central university body responsible for classrooms, including UC classrooms
 - Changes have been made in classrooms
 - Issues to work through including finding alternate classrooms for classes that were close to capacity
 - Thank you to Emily Gilbert, UC Vice-Principal, for leading these conversations
- Fung Dining Hall and Café Reznikoff open with limited capacity
 - Open to U of T students, faculty, and staff; not open to the public
- Reminder to fill in UCheck when planning to be present on any U of T campus
 - There are some U of T buildings where UCheck green screen is checked, i.e. Robarts Library
 - Unfortunately, not feasible for UC to be monitored in this way due to many entrances
 - Personally, when teaching, ask students whether they have done UCheck before coming to campus and whether they all have a green screen
- Larger meetings and events virtual for the Fall term
 - i.e. College Council, Senior Common Room, etc.
 - Unfortunate as University College is an 'event College' and public lectures draw many people
 - Benefit of wider audience with virtual events
- Links to resources
 - UTogether: A Roadmap for the University of Toronto
 - <u>utoronto.ca/utogether</u>
 - UCheck
 - <u>utoronto.ca/utogether/ucheck</u>

UC Academic Staffing Announcements

- Prof. Michael Widener New Director of Health Studies Program (2021-26)
 - Associate Professor in Department of Geography & Planning
 - Holds Canada Research Chair in Transportation and Health
 - Thank you for taking on this role, great to have new energetic people in this role
- Thank you to Prof. Paul Hamel for service as interim Director of Health Studies Program (2020-21)
 - Interim Director of Health Studies Program in difficult year
 - In addition to the regular responsibilities of the Program Director:
 - Managed challenges that students and instructors faced due to pandemic
 - Taught two sections of course (HST464 Nature of International Health)
 - Served on several successful hiring committees
 - Assisted the Health Studies Student Union in organizing student events throughout the year

- Professor Siobhan O'Flynn will continue to serve as Director of the Canadian Studies Program (2021-23), and also as UC Experiential Learning and Online Teaching advisor for academic year (2021-22)
 - Research focuses on digital media, narrativity in the digital realm, and data privacy of minors in Canada and internationally
 - Recognized through a Faculty of Arts and Science Superior Teaching Award

MOTION of gratitude to outgoing interim Director of Health Studies, Paul Hamel, for his hard work and dedication to UC over his year of service.

Motion called by Markus Stock Motion seconded by Michael Widener Motion approved unanimously

UC Faculty Announcements

- Hannah Anderson
 - UC Fellow in Early American History
- Prof. Naveen Minai
 - Assistant Professor, Teaching Steam at Mark S. Bonham Centre for Sexual Diversity Studies
- Prof. Jason Sonnenschein
 - Assistant Professor, Teaching Stream in Health Studies Program, UC
- Emily Gilbert, Vice-Principal, to introduce these new faculty members in agenda item

UC Staffing Announcement

- Gabrielle Fournier
 - UC Indigenous Initiatives Advisor
 - Gabrielle recently filled in as University College Librarian while Margaret Fulford was on research leave, Jan. 1 – June 30, 2021
 - In role as Librarian, Gabrielle was instrumental in highlighting Indigenous authors and working on actions recommended by UC's response to the TRC Report
 - Gabrielle has a Master of Information degree (2019, specializing in Library & Information Science and in Book History & Print Culture) and an Honours B.A. in English (2014), both from U of T
 - Gabrielle working on biennial report to log progress and add recommendations to UC's Response to TRC report (2019)
 - In conversation with many different members and groups of the College
- UC also has many new staff members in the areas of Student Life and Student Advising and Registrarial services
 - Pressing needs in these areas of College right now
 - Deeply grateful for work UC staff members are doing in the background to help our students navigate difficult situations

Faculty Search in Progress

- Richard Charles Lee Chair in Chinese Canadian Studies
 - Search started last year (2020-21), paused, and now being reissued (2021-22)
 - External and international search
 - At the rank of Assistant, Associate, or Full Professor
 - Key position in Canadian Studies Program

- Job advertisement to be posted in near future
- Will keep UC community updated on progress

Ongoing Committees

- UC Sustainability Committee
 - Successful committee from 2020-21, renewed for 2021-22
 - Co-Chaired by UC Principal and UC Lit Sustainability Commissioner, Willow Cabral
- UC International Student Committee
 - Successful committee from 2020-21, renewed for 2021-22
 - Chance for international students to talk directly to administration about ideas and concerns
- Not official Council committees
 - Smaller groups of staff, faculty, and students

UC Building Revitalization

- UC Building Revitalization Project is completed after many years
 - Offices have moved back to the front of UC building
 - Classes and tutorials are taking place in UC building
- Video featuring virtual tour of revitalized spaces to be circulated to UC and U of T community on Tuesday, October 5

UC Library

- Won Ontario Library Association (OLA) Architectural and Design Transformation Award
 - Congratulations to Margaret Fulford, UC Librarian
 - Thank you to everyone involved in this project
- UC Library will be opening soon

UC Quad Project/Clark Quadrangle

- Renovation possible by major gift by Ed and Frances Clark
- Currently under renovation
- Notified of noise complaints during teaching
 - Working with contractors on minimizing disturbances
- Renovated UC Quad will retain heritage and character
 - Renovations include improving accessibility, repairing walls, improving electrical A/V outlets, and adding seating
- Project running on time, scheduled to be completed November 2021

Upcoming Virtual Events

• Please see item 7 Other Business (page 18) for details

II. Update from the Vice-President of the Lit, Youssef Metwally

on behalf of President of the Lit, Juliana Melino

Updates

- Thank you to UC Orientation Co-Chairs Anne Yolland and Aiyana Harvey for successful UC Orientation 2021
- Currently in the midst of UC Lit elections
 - Working to fill full Council
 - Once Council is filled, to have team-bonding event

- Encouraging UC Lit commissioners to hold more in-person events
 - Following health and safety protocols
 - To interact more with first- and second-year students who have not had the opportunity to participate in any in-person UC Lit events
 - Working on community outreach to get more students involved

III. Update from the Chief Administrative Officer, Yvonne MacNeil COVID-19 Updates

- COVID-19 protocols in place for those continuing to work from home and those that have returned to offices
- Food services and residence staff working under current COVID-19 protocols
 - Approximately 600 students in residence
 - Opened Fung Dining Hall to limited seating abiding by distancing protocols from central administration
 - Opened Café Reznikoff with limited seating in adherence to physical distancing rules
 - Health and Safety reviewed and approved seating arrangements
- Faculty and staff are reminded to use UCheck self-assessment each time they enter UC building

Space

- Moved main office staff back to UC 173
 - Maricar and Susan in office daily
 - Marley in office on shift basis
 - Jessie and Khamla returning after Thanksgiving long weekend on staggered schedule
- Still have items to move back from H-Wing
 - Some moves need to be paused until UC Quad ramp is completed as they are larger items and difficult to move via Croft Chapter House ramp
- Mailroom and photocopier have been moved into UC 158
 - Difficulties with IT/photocopier/printers, working to have this fixed for next week
 - Access to mailroom is now via key fob
 - Most people have picked up new keys from Susan, please contact Susan if you have not already

UC Quad Project/Clark Quadrangle

- Quad project moving along well
 - Completed dry wall rebuild, laid paving stones for seating area, replaced pavers in front of Art Museum and set up area for new benches
 - Both new ramps are underway, one up to Art Museum area and one leading out to Laidlaw Lane
 - Planting has started
 - Irrigation infrastructure and lawn will be done last in order to ensure these are not damaged by equipment
 - Furniture to arrive November or December
 - Still on schedule to be completed in November 2021

Landmark Project

• Landmark project is moving along well

- Sir Dan's Quad portion completed
- Paving up to Hoskin Avenue completed
- Now encircled by work on Soldiers' Tower Road and Hart House Circle
 - UC building closed off on east side

Financials

- Beginning process of creating ancillary budget for submission in November for 2022-23 academic year
- Will be doing a financial reconciliation of budgets to actuals now that term and teaching assignment pay has started
 - To report back on where we are thus far for budget year 2021-22

IV. Update from the Registrar, Ryan Woolfrey

Operational & Staffing Updates

- Academic Advising and Registrar's Office (AARO) has resumed in-person operations
 - Aligned start with first day of in-person classes
 - Offering in-person front line advising to students
- Front Line Advisors, Associate Registrars, and Academic & Financial Advisors will work on a hybrid schedule for Fall Term
 - Six staff in office and four staff working remotely from home at one time
 - Staff are responding to student email inquiries from 8:45am-5:00pm
 - In-person office hours limited to Monday through Friday, 10:00am-4:00pm
- Health and safety measures in place prior to re-opening front line services
 - Includes directional wayfinding, protective equipment and barriers, enhanced daily cleaning services, and visitor screening through UCheck app
- Most one-on-one scheduled advising appointments will continue to take place virtually by staff in office and at home, through Microsoft Teams, Zoom, or by phone
 - To limit volume of students in small spaces in AARO
 - Students enjoy virtual advising appointment option, lower no-show rate
- Virtual drop-in advising sessions for students on Zoom will be launching later this month
- This summer, welcomed two new Academic Advisors to team
 - Carol Ye
 - Portfolio focuses on support for international students
 - Eduardo Padilla
 - Portfolio focuses on students who are in upper years of study

Advising Updates

- New student advising and events took place virtually over summer due to pandemic
- UC continued to collaborate with six other colleges in creation of academic advising and orientation content for new students on Quercus via UC 101: Your New Student Guide
 Successful again this year
- Working closely with Office of the Dean of Students
 - Offices partnered to run two successful summer welcome sessions for newly admitted students over Zoom
 - At these newly developed sessions, students learned about course selection, fees and finances, student life, and got a live tour of residences from Kimiya and Jen on Residence team
 - Thank you to team at Office of the Dean of Students for great partnership
- Student requests for advising and support continue to increase significantly compared to same time period last year

- In five-month period from May-September of 2021, responded to over 14,000 emails from students, which represents a 10% increase compared to same time period in 2020
- Also continue to see increased demand on phone lines; average about 650 phone calls per month for front line advising services
 - Over 80% of phone calls to office are answered in less than three minutes
- Has been an incredibly challenging year for students and advising staff as a result of complications around return to in-person classes
- Significant number of students in Arts & Science faced travel bans from India and Morocco, and many students seeing significant delays with processing of study permits by IRCC
 - As a result, some special accommodations have been made to enrol these students in limited online sections of certain courses with help of college advisors, but lack of online course options has resulted in a higher than usual number of admission deferral requests and leaves of absence for international students
 - Advisors in AARO are working hard to help advise students in these situations determine their best options and next steps
- Additionally, U of T's recently introduced vaccination requirement has driven high levels of traffic and inquiries to AARO, especially from international students who are arriving late, participating in mandatory quarantine, and/or are not able to meet vaccination deadlines set by Office of the Vice-Provost, Students (OVPS)
 - Working to support students who have been denied exemptions to vaccination requirements, and assisting with leaves of absence or enrolment in limited online course options

Recruitment, Admissions & Enrolment Updates

- Healthy first-year enrolment at UC and in Arts & Science
 - On track to meet overall targets for both domestic and international enrolment for 2021-22
- University College has registered 1,339 newly admitted students for September 2021
 - This represents 18.8% of total Arts & Science new student population (n=7,106)
 - 864 (65%) Domestic [Canadian Citizen/Permanent Resident]
 - 475 (35%) International [Study Permit/Other Visa] [2021 A&S: 35%]
 - In total, UC has registered approximately 5,321 students in 2021-22 Fall/Winter Session
- By Year of Study
 - 1416 Year 1
 - 1358 Year 2
 - 1185 Year 3
 - 1318 Year 4
 - 44 Non-Degree
- By Attendance Status
 - 4,864 Full-Time
 - 457 Part-Time
- By Domestic/International
 - 3,774 (71%) Domestic [Canadian Citizen/Permanent Resident]
 - 1,547 (29%) International [Study Permit/Other Visa]

Financial Aid & Awards Updates

- Newly admitted registrants in September 2021 include following major scholarship recipients:
 - 5 Pearson Scholars
 - Highest number yet; two are deferrals from 2020
 - 1 National Scholar
 - 2 Schulich Leader Scholars
 - 11 President's Scholars of Excellence
 - 3 Arts & Science International Scholars
 - 6 Arts & Science International Merit Scholars
- U of T nominated three University College student for Rhodes Scholarship this year
 - May recall that Jeffrey Fasegha was successful in Rhodes Scholarship last year, began studies at Oxford this year
- Breakdown of UC's 2020-21 award expenditures will be brought to November Council meeting
- UC Scholarship & Bursary Committee membership almost finalized
 - Motion to approve 2021-22 committee will be presented at November Council meeting

MOTION: Be it resolved that University College Council approve the following new scholarship that has been reviewed by the 2020-21 Scholarship Committee (Appendix 2):

• The Brenda Evans Memorial Scholarship

Motion called by Ryan Woolfrey Motion seconded by Djanet Sears Motion approved unanimously

Upcoming Award Deadlines

- Harcourt Brown Travel Fellowship
 - To provide assistance to graduate students, junior (i.e. untenured) faculty members or post-doctoral students with research-related visits to archives, libraries, museums, galleries or sites essential to the conduct of their research in the humanities and history of ideas. There is no restriction as to location but the award is meant to encourage access to documents.
 - Application Deadline December 1, 2021
 - uc.utoronto.ca/scholarships-awards/harcourt-brown-travel-fellowship

V. Update from the Director of Advancement, Naomi Handley *Fundraising Updates*

- Recently UC received a generous donation of five hundred thousand dollars (\$500,000) to be applied to existing Fletcher-Clark Scholarship in Science and Economics
 - Earned income, approximately \$25,000, will assist UC Indigenous and Black students, using same award criteria as Fletcher-Clark Scholarship in Science and Economics
 - UC is grateful for this generous support from alumni Ed and Fran Clark

UC Building Virtual Tour

- UC Revitalization tour video to be unveiled to UC community on Tuesday, October 5
- Video was first debuted to lead donors of project at virtual event on September 23

- Ed and Fran Clark, namesakes of Clark Reading Room and Clark Quadrangle and Paul Cadario, namesake of the Paul Cadario Conference Centre at Croft Chapter House were present at this event
- The following individuals should be acknowledged for their involvement in the video:
 - Aiyana Harvey, student who led the tour of the College
 - Yvonne MacNeil and Marley Rosen for assistance during filming
 - Margaret Fulford for fact-checking script
 - Emily Sands for unwavering commitment to the project
- Look out for virtual tour link in email inboxes, UC website, or UC Alumni Youtube channel

UC Alumni Career Mentorship Program

- Advancement Office is collaborating with Office of Student Life on Alumni Career Mentorship program
 - 151 alumni mentors signed up to participate this year
- Jean Chow will be keynote speaker at Kick-Off Event, offering both mentors and mentees guidance on how to make the most of this mentorship opportunity

Launch Panel Event for Certificate in Black Canadian Studies

- Working with Siobhan O'Flynn, Director of Canadian Studies, on promotions for launch of new certificate in Black Canadian Studies
- Panel discussion event to promote new certificate to take place in November
- Article highlighting new certificate to be published next week on UC website

Queer and Trans Research Lab (QTRL)

- Worked with Mark S. Bonham Centre for Sexual Diversity Studies (SDS) on articles promoting the launch of Queer and Trans Research Lab (QTRL)
 - Article recently picked up by central U of T news

UC Magazine

- Fall issue will be digital version only
- New UC magazine in development and will be published November 25
- Issue will include an interview with new Barker Fairley Distinguished Visitor (BFV), Donna-Michelle St. Bernard, and an article on the Clement-Coutts family who has five generations of UC grads
- Unveiled in this issue: 2021 recipients of UC Alumni of Influence Awards

Public Lecture Series

- Working with Principal's Office on F.E.L. Priestley Memorial Lecture Series
- Prof. Lorraine Daston, Director emerita, Max Planck Institute for the History of Science: *"How Rules Succeed and Fail: An Intellectual History of the Particular"*
- November 2, 3, & 4; 4:30pm over Zoom

Welcome

- Welcome Dayna Waltman, new Chair of UCAA, ex-officio member of College Council
- Welcome Sue Ropchan, new alumni representative on College Council

MOTION: of gratitude to Erika Bailey for her year of service, dedication, and hard work as Chair of the University College Alumni Association.

Motion called by Naomi Handley Motion seconded by Michael Widener Motion approved unanimously

Comment by UC College Council Speaker, David Klausner: I had the opportunity to view UC Revitalization Virtual Tour video, and it is stunningly well done. I encourage everyone to view this video when it is made available.

VI. Update from the Dean of Students, Naeem Ordóñez

Programming

- Significant amount of transition programming and virtual programming over summer
- Welcome sessions hosted in partnership with AARO
 - Thank you to Ryan Woolfrey and his team at AARO
 - Successful and will continue similar programming in future years
- E-mentorship program •
 - Launched in June
 - Effort to connect with incoming students to support pre-arrival and transition
 - Program wrapped up at end of September
 - Evaluations of e-mentors being collected
 - 60 e-mentors _
 - _ Grateful for their work
- Hosted event for second year students two weeks ago •
 - This group essentially did not have in-person experience for first year
 - Continue to support this group in making connections and introductions
- First in-person activity taking place right now in Clark Reading Room
 - Make Fridays Matter series of programs
 - Creates space for students to connect and refocus on academics
 - Hoping to continue this programming weekly
- UC Career Mentorship Program •
 - Collaboration with colleagues in Advancement Office
 - Launch event taking place in late October
 - Provides third- and fourth- year students with mentorship opportunities
- Looking to add more programming to increase student access to UC community that is • both safe and meets needs of students for space to spend time outside of classes

Student Staffing

- Residence Don and Community Coordinator Training •
 - Two weeks of in-person, all-day, intensive pre-service training
 - Last two weeks of August
 - To prepare for arrival of residence students and to support off-campus students
- Residence Dons and Community Coordinators have been working very hard to support • UC students

Residence Operations

- Managing vaccination requirements for students and evolving public health guidelines Significant challenge to respond to changing guidelines
- Continuing to support small residence population over summer •
 - Approximately 60 students
- Successful move-in •
 - Majority of students moved in over labour day long weekend

- Scheduled move-ins over period of two weeks
 - To better help accommodate students in safe manner
 - Many students navigating quarantine, delayed Visa issues, vaccination requirements, etc.
- Residence occupancy effectively full
 - Capacity of just over 600 students
 - Few withdraws and some no shows; working to backfill
 - Reaching out to UC students in overflow residences at Chelsea hotel
 - Reaching out to students on waiting list

Orientation

- Successful orientation week
 - Tabulating results from feedback tools and surveys
 - Vast majority particularly highlighted exemplary work from orientation leaders and student leaders that took time and effort to facilitate connections and build community among students

Office of the Dean of Students

- Always at least one staff members available in-person as of September 13
 - Monday Friday 8:45am 4:30pm
 - Available on-call and off-hours for emergencies
 - Available to support students with afterhours programming and activities

Student Spaces

- Working on opening more spaces for students to use between classes
- Commuter Student Centre (CSC) in UC Union building opened on Sept. 27
- Supporting UC Lit in reopening spaces
 - Look to UC Lit social media accounts for reopening dates

UC Residence Council (UCRC) Elections

- Elections took place this week
- Congratulations to Emerson Hachinski and team elected to respective roles
 - Team eager to get to work right away to support constituents in residence
 - Training and development for UCRC supported by Office of the Dean of Students this weekend

U of T Student Leadership Awards

- Formerly Cressy Awards
- For graduating students
- Nomination process concludes in November
 - Office of the Dean of Students welcoming nominations

MOTION of gratitude to the 2020-21 UC Lit members for their hard work and service.

Motion called by Naeem Ordóñez Motion seconded by Emily Gilbert Motion Approved unanimously

MOTION of gratitude to the UC Orientation 2021 Co-Chairs, Anne Yolland and Aiyana Harvey, for their hard work and service.

Motion called by Naeem Ordóñez Motion seconded by Yvonne MacNeil Motion Approved unanimously

VII. Update from the Vice-Principal, Emily Gilbert

Updates

- Challenging and hectic start of term, even more complicated than last year
 - Working with both online and in-person instruction
 - Feeling both excitement and anxiety from both instructors and students
 - Thank you to course instructors, and students for helping things run smoothly
 - Special thanks to Program Directors for taking on more work that is usual to ensure everyone has best possible experience despite the circumstances

Programs

- Canadian Studies Program
 - Welcoming Barker Fairley Distinguished Visitor, Donna-Michelle St. Bernard
 - Siobhan O'Flynn, Director, Canadian Studies Program, working with Advancement Office to host event in Winter term in conjunction with Donna-Michelle St. Bernard
 - Donna-Michelle visiting students in classes, and working one-on-one by appointment through UC Writing Centre
 - Planning for public launch event for Black Canadian Studies Certificate
 - Delighted to introduce this as option for all Arts and Science students at the St. George campus
- Cognitive Science Program
 - Successful online welcome event
 - Included presentations by instructors about their courses and research projects, as well as information from students
 - Well attended
 - Many questions from students
 - Great opportunity for everyone to meet at this forum
- Health Studies Program
 - Successful online welcome event
 - Hosted by the Health Studies Student Union
 - Had many instructors present
 - Included trivia games
 - Introducing new mentorship program
 - Upper-year students available to advise lower-year students, and help them navigate the program
- All programs will be submitting curriculum changes
 - To be brought to November UC Council meeting for approval
 - To update and innovate curriculum
- UC One: Engaging Toronto
 - First-year program for incoming students
 - First plenary class, held in-person in largest classroom, UC 140
 - Guest speaker: Diana Chan McNally, Toronto Drop-in Network, Training and Engagement Coordinator
 - Develops and delivers proprietary workshops serving a network of 51 drop-in centers and affiliates across Toronto

- Talked about tent encampments across City of Toronto, particularly those that received much attention, and egregious ways that encampments were cleared by Toronto Police this summer
- History of tent encampments across Toronto, not a new problem
- Has become much bigger issue during pandemic
- Many students engaged, asking how they can become more involved

Equity Committee

- Chaired by UC Vice-Principal
- Created in Winter term 2020-21
 - Met once last year, at end of academic term
 - Gathered ideas on how to move forward
- Seeing need to address issues within the College, what we have accomplished, and what we can do better, more of, or differently
- Committee will be reconstituted soon
 - Will be looking for additional members: among students, staff, and faculty
- Work Study students
 - One student working over summer and one student working now
 - Researching information about equity, diversity, inclusion, and
 - accessibility programs and policies at U of T and other universities
 - Looking at best practices and other strategies we might use moving forward
 - Land Acknowledgements workshop for all UC staff over summer
 - Lead by John Croutch, Indigenous Training Coordinator at U of T
- Hope to be able to continue with workshops as anticipated
 - Addressing UC's, FAS's and U of T' responses to TRC
 - Addressing U of T's Anti-Black Racism Report issued March 2021
 - Trying to take on board the calls to action put upon us
 - Addressing racism is taken very seriously

New Faculty Members

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- Dr. Hannah Anderson
 - UC Fellow in Early American History
 - Teaching courses for both Canadian Studies Program at UC and Department of History, as well as two first year courses for incoming students
 - Current research is on environmental history of early British North America, with a focus on how non-scientists in settler communities understood and sorted plants that they encountered
 - Will be giving talk at Senior Common Room (SCR) on Nov. 22
- Prof. Naveen Minai
 - Assistant Professor, Teaching Stream at Mark S. Bonham Centre for Sexual Diversity Studies
 - Undergraduate Coordinator at Centre for Sexual Diversity Studies (SDS)
 - Current work is on digital archives, sexualities, and queer affect within a transnational framework
 - Will be giving talk at Senior Common Room (SCR) on Dec. 6
- Prof. Jason Sonnenschein
 - Assistant Professor, Teaching Stream in Health Studies Program, UC
 - Brings over a decade of experience working as a health practitioner

- Will teach courses on topics including clinical environments, clinical ethics, and inequality and COVID-19
- Welcome to new faculty members, looking forward to working with you and getting to know you over the next year
- 6. Presentation on U of T Sustainability Office and Sustainable Buildings Network (SBN) Scott Hendershot

Senior Manager, Sustainability Office at U of T

• Markus introduces Scott Hendershot

Scott Hendershot

(Presentation attached – Appendix 3)

- Sustainable Buildings Network (SBN)
 - Student-based network
 - sustainablebuildingsnetwork.com/index.php/past-projects-and-events
 - Design challenge
 - Last challenge took place April 2021 low rise in midtown Toronto
 - Two day technical/policy design challenge
 - Open to undergraduate or graduate students across Ontario
 - Invited to look at a building, provided with baseline and left to create a proposal for technical or policy-centered innovations that relate with any Sustainable Development Goals (SDGs)
 - Present suggestions on energy consumption, space optimization, demographics, policy, etc.
 - Different teams had different outputs
 - Judging panel chooses winner
 - UC's Whitney Hall is the building that the challenge will be centered on this year
 - Great opportunity for U of T Sustainability Office, but also for UC to see what types of creative innovations and fresh ideas students may come up with
 - Keeping heritage value, but building in sustainability elements to increase efficiency
 - Vision: *state of the art heritage building*
- Low Carbon Action Plan
 - 2030 goals to cut down approx. 10,000 metric tons GHG emissions
 - 2050 goals for 80% reduction, to cut approx. 20,000 metric tons GHG emissions, plus offset
 - Plan to mitigate more carbon than putting out, net positive
 - Main portion of carbon footprint at U of T is our buildings
 - Tied to central steam plant and usage of natural gas to create energy
 - Buildings to operate at much lower energy intensity, via energy retrofits
 - Launched in 2020, Building Energy Performance Design Standard, state of the art for all new buildings
 - Driving performance of building efficiency
 - Central Steam Plant Renewal
 - Currently primarily based on natural gas
 - Plan to electrify
 - GHG Retrofit Program, completed 2018/19

- Solar energy, thermal energy, chiller optimization, technical upgrades including building automation systems
- Government funded
- Large impact, short amount of time
- 100-year old district energy system, plan to utilize to distribute more energy efficient heating and cooling
- Geo Exchange Program
 - Just finished drilling geo thermal exchange wells, half a CN tower height down
 - Using earth as battery; sends heat down in summer, use stored heat in winter to heat buildings
 - Immense GHG savings, low environmental impact
 - Estimated to reduce approx. 15,000 tons GHG emissions a year
 - Two levels of parking, subterranean classroom
 - Plans to also build geo exchange at UTM & UTSC
- Solar Energy
 - Adding more panels to existing buildings
 - Building renewable site, off-site U of T owned
- Carbon Capture
 - To install on St. George campus, capture excess energy from steam plant and convert escaped energy into fuel

• Climate Positive Campus Plan

- Plan has not yet been revealed (this presentation unavailable in Appendix 3)
- Plan for 2030-50, building on previous Low Carbon Action Plan
- Climate positive by 2050
 - Also plan for campus to almost double in size by 2050
 - Managing Growth Carbon and Energy Budget
 - New building proposals must go through Facilities and Services Offices: Sustainability Office and Energy Management Office to ensure building will be as efficient as possible
 - Extend district energy system through all new buildings
 - Building renewable energy sources off-campus
- Renewal of Aging Infrastructure
 - Eliminating fossil fuel-based heating
 - Replacing natural gas to electric
 - Steam to hot water conversion, much more efficient method of transferring energy
 - Heating and cooling efficiency upgrades via retrofits
- Resiliency
 - Adding nodes, interconnected across campus, to central energy system
 - Increase redundancy and resiliency, also increases reliability

• Facilities and Services Website – Sustainability Office

- Website has been recently overhauled
 - <u>fs.utoronto.ca/sustainability</u>
 - Will be continually updated
- Sustainable Action Awards relaunching later this Fall
 - Previously Green Ribbon Awards
- Sustainable Change Programs

- Encourages behavioural change
- Updated versions of Green Suite program
- Certifications for Sustainable Labs, Events, Residences, Offices, Courses
- Ranking, leaderboards for comparison, provides resources

Question: Is there a plan to implement a dashboard or monitoring system for those of us interested in keeping up to date on the current progress of the projects?

Answer: Communications and cultural shifts are a large part of improving sustainability. Progress data on each project is currently decentralized due to the size of the institution. Planning to develop centralized dashboard system to keep all constituents informed, both internally and publicly.

7. Other Business

Upcoming Virtual Events

- F.E.L. Priestley Memorial Lectures in the History of Ideas Prof. Lorraine Daston, Director emerita, Max Planck Institute for the History of Science: "How Rules Succeed and Fail: An Intellectual History of the Particular" Tues. Nov. 2, Wed. Nov. 3, & Thurs. Nov. 4, 2021, 4:30pm – Zoom
- **R. K. Teetzel Lecture in Architecture** *Prof. Łukasz Stanek, Professor, Manchester Architecture Research Group, School of Environment, Education & Development, University of Manchester: TBA* Thurs. Jan. 13, 2022, 4:30pm – Zoom
- S.J. Stubbs Lecture in Classic Literature *Prof. Phiroze Vasunia, Professor, Greek and Latin, University College London: TBA* Wed. March 9, 2022, 4:30pm – Zoom

Please check back on our website for event details and registration: uc.utoronto.ca/about-uc-connect-us-events

8. Adjournment

Council adjourned at 3:30pm.

Appendix 1



College Council

October 1, 2021

UC Recognizes Inaugural National Day for Truth and Reconciliation

See UC Website for full statement

uc.utoronto.ca

• UC Library Twitter

@UCLibrary_UofT

• Faculty of Arts & Science – Resources and Events

artsci.utoronto.ca/about/strategic-overview/indigenous-learning -knowledge/national-day-truth-and-reconciliation



COVID-19 Response and Resources

- Safe return to campus
- Vaccination requirement
- Face masks in indoor spaces
- UTogether: A Roadmap for the University of Toronto

https://www.utoronto.ca/utogether

• UCheck

https://www.utoronto.ca/utogether/ucheck

UC Academic Staffing Announcements

- Welcome to new Director of Health Studies Program at UC
 - **Prof. Michael Widener**, Department of Geography & Planning Director of Health Studies Program (2021-26)
- Thank you to outgoing Director of Health Studies Program at UC
 - **Prof. Paul Hamel**, Department of Laboratory Medicine & Pathobiology Interim Director of Health Studies Program (2020-21)
- Renewed Director of Canadian Studies Program at UC
 - Prof. Siobhan O'Flynn, Canadian Studies Program, UC Director of Canadian Studies Program (2021-23) UC Experiential Learning and Online Teaching Advisor (2021-22)

UC Faculty Announcements

- Welcome incoming & renewed appointments
 - **Prof. Hannah Anderson**, Assistant Professor UC Fellow in Early American History
 - **Prof. Naveen Minai**, Assistant Professor, Teaching Steam Mark S. Bonham Centre for Sexual Diversity Studies; UC
 - **Prof. Jason Sonnenschein**, Assistant Professor, Teaching Stream Health Studies Program, UC

UC Staffing Announcement

- Welcome
 - Gabrielle Fournier
 UC Indigenous Initiatives Advisor

Faculty Search in Progress

Richard Charles Lee Chair in Chinese Canadian Studies

Ongoing Committees

- UC Sustainability Committee
- UC International Student Committee

UC Building Revitalization

- UC Building Revitalization Project is now completed
- Video featuring virtual tour of revitalized spaces to be circulated to UC and U of T community on Tuesday, October 5



UC Library

- UC Library won Ontario Library Association Architectural and Design Transformation Award
- Opening soon



Clark Quadrangle

- Renovation made possible through a major gift by Ed and Frances Clark
- Projected to be completed by November 2021



Upcoming Virtual Events

- F.E.L. Priestley Memorial Lectures in the History of Ideas Prof. Lorraine Daston, Director emerita, Max Planck Institute for the History of Science: "How Rules Succeed and Fail: An Intellectual History of the Particular" Tues. Nov. 2, Wed. Nov. 3, & Thurs. Nov. 4, 2021, 4:30pm – Zoom
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- Please check back on our website for event details and registration: <u>https://www.uc.utoronto.ca/about-uc-connect-us-events</u>

Appendix 2

UC Scholarship Committee

New Award for UC College Council Approval

The following new award has been reviewed and approved by the UC Scholarship Committee and is now being presented to College Council for final approval.

New Award

Brenda Evans Memorial Scholarship

Awarded to second- or third-year University College students pursuing a Near & Middle Eastern Civilizations program based on demonstrated financial need.

Appendix 3













Low-Carbon Action Plan (2019-2024) Released 2019 Available online: uoft.me/LowCarbon19







Low-Carbon **Action Plan** 2019-2024











A Message from the President

The University of Toronto's Low-Carbon Action Plan, 2019-2024 is the result of diligent work from staff in operations across all three campuses and outlines the University of Toronto's ambitious plan to meet our climate change commitments. Last year, U of T joined the University Climate Change Coalition (UC3), a group of leading North American research institutions dedicated to accelerating the reduction of greenhouse gas (GHG) emissions. As part of the coalition, and under a 2015 agreement with the Province of Ontario, U of T has set an impressive goal: to reduce GHG emissions by 37 per cent from 1990 levels by the year 2030. We are also developing programming to engage the Toronto area community to galvanize local, regional, and national action on climate change.

Operating in an urban setting with cold winters and hot, humid summers presents unique operational challenges. Balancing the needs of a large research intensive institution while designing and fostering spaces that promote sustainability is no small feat. As indicated in this report, to meet our goal we will implement strategies that make our existing spaces more efficient, build to ambitious energy performance standards, and seek out innovative solutions to remove carbon from our three campuses.

In fact, efforts are already well underway. In 2018, we designed and developed a series of projects to reduce GHG levels; using the capture of exhaust heat from our main stack; smart building controls; high efficiency boilers; ground source heat pumps; and solar energy. These actions are expected to reduce 8,600 tonnes of eCO₂ emissions.

U of T's dedication to reducing GHG emissions significantly draws from our recognition that universities have a crucial role in meeting the urgent challenge of climate change. We have an outstanding record when it comes to both research in the field and carbon reduction efforts on our campuses, and we look forward to building on that foundation to maximize our positive impact.

On behalf of the University of Toronto, I extend congratulations on the development of the Low-Carbon Action Plan, and I thank the dedicated team at University Operations for their leadership, hard work and creativity in responding to the pressing challenge of climate change.

Sincerely,

Win's Stetle

Meric S. Gertler President

Traditional Land Acknowledgment

We wish to acknowledge this land on which the University of Toronto operates. For thousands of years it has been the traditional land of the Huron-Wendat, the Seneca, and most recently, the Mississaugas of the Credit River. Today, this meeting place is still the home to many Indigenous people from across Turtle Island and we are grateful to have the opportunity to work on this land.

Table ofContents



Who We Are Our Commitm

Our Plan

Where we are Where we nee How we plan 2019 GGRP P **Produce: Clea** Geoexchange Solar Energy Carbon Captu **Distribute: Ef District Energy** Waste Heat R Steam to Hot Consume: Re **Existing Build** Managing Oui Lighting U of T Trees **Fostering Inn** Pathway to 20

	5
ient	7
	9
in 2019	9
ed to be in 2030	11
to achieve our goal	12
Projects	12
an Energy and Carbon Capture	13
	14
	17
re, Sequestration, and Use	18
ficient Distribution	19
y System Efficiencies	20
ecovery and Use	21
Water Conversion	22
duced Consumption	23
ing Optimization	25
Growth	29
	30
	31
ovative Solutions	32
030	33



A Message from Chief **Operating Officer, Property** Services & Sustainability

The University of Toronto is taking action to meet the challenge of climate change. We have set a 2030 goal to reduce greenhouse gas emissions across our three campuses by 37 per cent from 1990 levels.

We have been working hard to balance the needs of a growing, researchintensive institution, to design spaces that promote well-being, and to reduce our energy consumption. With an increase in student population and building area, the University has lowered its carbon and energy intensity over the last two decades.

Achieving our 2030 goal requires a diverse mix of strategies and solutions that we will implement across our campuses. We will improve power and thermal production, distribute energy more efficiently, and reduce energy consumption. We will also collaborate with our brilliant faculty and students to foster innovative solutions in-house.

Sustainability and continuous improvement are embedded in the fabric of University of Toronto operations. We create smart, resilient, and welcoming spaces for our students, faculty and staff. Climate change is one of our society's most important challenges, and we believe we have the plan, the people, the expertise, and the drive to achieve our low-carbon goal and improve the well-being of our community.

RS

Ron Saporta Chief Operating Officer **Property Services & Sustainability**

Acknowledgements

Our Tri-Campus Sustainability Board works to effectively embed sustainability into the fabric of University of Toronto's operations. Thank you to the members of the Tri-Campus Sustainability Board and associates for making our Low-Carbon Action Plan (2019-2024) possible. The team will play a crucial role in executing and advancing initiatives described in this document to achieve our low-carbon commitment.

Facilities and Services,

Operations & Real Estate Partnerships Ron Saporta Paul Leitch Gordon Robins Radu Ciotirca Kevin Leong Dione Dias Adriana Dossena Jennifer Puskar

Christine Burke

Saher Fazilat Ahmed Azhari Chelsea Dalton

Jeff Miller Tim Lang Deepal Patel

Faculty Bryan Karney

Key Definitions

Carbon Carbon is referred to throughout this plan as the carbon dioxide equivalent, unless otherwise stated.

Carbon capture (and storage) A method for trapping carbon dioxide (CO₂) emissions thereby preventing the CO₂ from entering the atmosphere.

Carbon dioxide equivalent (eCO₂) A standard unit for measuring and comparing carbon footprints. Each greenhouse gas has a different global warming potential (GWP) and persists for a different length of time in the atmosphere. eCO₂ expresses the impact of different GHGs in terms of the amount of CO₂ that would have the equivalent GWP.

GHG intensity (or carbon intensity) The rate of GHGs or carbon emitted relative to a specific unit or activity. For example: eCO₂ emitted per square meter of building floor space.

Energy intensity The rate of energy used relative to a specific unit or activity. For example: energy used for

heating, cooling, or lighting per square meter of building floor space.

Greenhouse Gas (GHG) Gases that trap heat in the atmosphere, for example, carbon dioxide (CO_a). These gases differ on how long they stay in the atmosphere and how strongly they impact the atmosphere.

Gross Square Metres (GSM) The sum of all floor areas within the outside faces of exterior walls.

Scope 1, 2, 3 emissions An organization's greenhouse gas emissions can be classified into three categories: Scope 1 emissions are direct emissions from sources that are owned or controlled by the organization, like the burning of natural gas to generate steam for heating and cooling. Scope 2 emissions are indirect emissions from the generation of purchased energy, like purchasing and consuming electricity from a utility provider. Scope 3 emissions are indirect emissions (not included in scope 2) that occur in the value chain of the organization, such as emissions associated with travel. Scope 3 is not covered in this document.

University Planning Design and Construction, **Operations & Real Estate Partnerships**

- Gilbert Delgado
- Adam Trotter

University of Toronto Mississauga

- University of Toronto Scarborough
- Andrew Arifuzzaman
- John Robinson

Who We Are: One School, Three Campuses

2018 Facts & Figures

1827 Year Established

266

7,198

Buildings

1,790,704 Gross square meters (floor space)

Staff

Grad and Undergrad **Students** 90,077

Faculty



14,434

Building on a History of Excellence

The University of Toronto holds a strong record of operational sustainability, including some of the following achievements:

Awarded Canada's Greenest Employer 6 times. Canada's Greenest Employer is an editorial competition organized by the Canada's Top 100 Employers project. This special designation recognizes the employers that lead the nation in creating a culture of environmental awareness in their organizations.

]
<u> </u>

\$8.5M green revolving fund — one of the largest in North America, providing funding for significant energy reduction projects and building retrofits.

[1]

100+ years of district energy. We currently

produce more than 80 per cent of our

heating and 20 per cent of our electricity needs for our downtown Toronto campus.

(l)



In 2017, we created the Committee on the Environment, Climate Change and

Sustainability. Its mandate is to identify ways to advance the University's contribution to sustainability and meeting the challenge of climate change, with a particular focus on research and innovation, teaching, and University operations.



1st post-secondary institution in Canada to have an on-site embedded Energy Manager.

Dedicated St. George campus projects from 2009/10 to 2018/19 have:



Achieved a reduction of more than 55 thousand tonnes of equivalent carbon dioxide (eCO₂) emissions.



Saved over 1.25 billion litres of water (equivalent to 500 Olympic-size pools).



Avoided over \$30 million in utilities costs.

Our Commitment



Scott Mabury Vice-President, Operations and Real Estate Partnerships

"The University of Toronto has set a goal to advance towards a 37% reduction in greenhouse gas emissions by 2030, from a 1990 level baseline." -Scott Mabury

Our university has a long-standing commitment to operational sustainability and environmental stewardship that continues to grow in momentum. In 2018, the University of Toronto joined the University Climate Change Coalition (UC3); a group of leading research universities in North America committed to reducing greenhouse gas (GHG) emissions on their own campuses and in their communities. In line with this commitment, the University of Toronto set a goal to reduce GHG emissions 37 per cent by 2030, below a 1990 baseline level.





Our Plan

Where we are in 2019

In the last two decades, all three University of Toronto campuses have undergone immense growth—both in student enrollment and building space. Even with this growth, we have reduced our GHG emissions and energy consumption (per capita and per gross square meter*).

University of Toronto: Tri-Campus Total Scope 1 + 2 eCO₂ Emissions**



The chart above shows how we have been reducing total scope 1 and 2 GHG emissions and where we need to be to meet our 2030 reduction goal. The gap from where we are now to where we need to be in 2030 is being addressed by our reduction plans and projects, many of which are described in the following pages.

*Gross square meter (GSM)



Breakdown of GHG Emissions by Campus

Operating one of the world's top research-intensive universities is an immense task. In 2017-2018, U of T emitted 114,265 tonnes of eCO₂ (carbon dioxide equivalents) for all operated or owned assets. The downtown University of Toronto St. George campus (St. George) is the largest campus in size and student population and represented 83 per cent of those emissions. University of Toronto Mississauga (UTM) accounted for 9 per cent and University of Toronto Scarborough (UTSC) 8 per cent.



We use a lot of energy at U of T for lighting, comfort, teaching, research, and equipment. What factors influence our energy use?

Size—We are big. U of T has three campuses with 266 buildings—1,790,704 gross square metres of building floor space.

Age—We've been around for a while. Many of the buildings at U of T's downtown St. George campus are over 80 years old, and use more heating and cooling than newer buildings. Existing building stock is a large contributor to our GHG emissions.

Climate—We live in a climate of extremes. Toronto has hot, humid summers and cold, windy winters, which means we need more heating and cooling for comfort.

Activities—We do research. A lot of it. U of T is a research-intensive university with many laboratories, which require more energy than offices or classrooms.

Distribution—We purchase, convert, and distribute energy (steam, hot water, chilled water, and electricity) to buildings on our campuses and in some cases, off-campus sites as well.

^{**}This data represents all purchased utility sources including Toronto Hydro, Hydro One, Enbridge Gas, Enwave and other natural gas suppliers. Purchased utilities and GSM data include all 3 campuses, federated colleges, and external entities for scope 1 & 2 emissions.

Our Plan

Where we need to be in 2030

In 1990, U of T emitted 116,959 tonnes of eCO₂. To reach our 2030 reduction goal of 37 per cent from our 1990 baseline, we will need to reduce our annual emissions to below 73,684 tonnes eCO₂. The "Reducing Our Footprint" diagram below illustrates our 2018 year-end starting point, where we plan to be after this 5 year plan, and our 2030 goal. Where we project to be includes our 2019-2024 target GHG reductions (yellow boxes outlined in this plan), and accounts for smart growth across our campuses.



We will optimize how we produce, distribute, and consume electricity and natural gas on our campuses.

How we plan to achieve our goal

We have developed a five-year plan (2019-2024) to implement carbon reduction strategies across our campuses. To meet our 2030 GHG target, we will focus on optimizing how we produce, distribute, and consume electricity and natural gas. These efforts will result in substantial energy and GHG reductions while improving comfort. This document details some of the strategies and projects we are pursuing over the next five years. All target GHG reductions in this plan represent future projects and savings. Total target GHG reductions in the yellow boxes represent the sum of the projects described in each section.

PRODUCE

DISTRIBUTE





Clean Energy & Carbon Capture

Efficient Distribution

2019 Greenhouse Gas Campus Retrofits Program (GGRP)

In 2018-19, the University of Toronto completed major projects aimed at reducing current and future greenhouse gas emissions across its three campuses. We combined support leveraged from the provincial government with our own investments to complete projects ranging from rooftop solar systems to ground source heat pumps. These projects represent over \$50 million in investment and more than 8,600 tonnes in annual GHG emission reductions. Meeting these tight project schedules confirms our capacity and ability to develop and implement high performing energy and carbon reduction projects with timely efficiency.







Reduced Consumption

Total Target GHG Reduction =



Produce: Clean Energy & Carbon Capture



To meet our GHG reduction target, we will reduce the use of natural gas and use cleaner energy along with strategies to capture carbon. In the next five years, we plan to increase the energy we generate on campuses from renewable sources such as solar and geoexchange technologies. Combined with energy recovery, high

performance building designs, and optimization of existing facilities, these low-carbon solutions will guide us to meeting our target. Further to this, our operations staff are collaborating with U of T's world-class researchers to develop new methods of capturing carbon to convert CO₂ into useable feedstock.



13

to the ground (and used the following

winter). All of this is powered using

low-carbon electricity.

heating and cooling.

St. George: Geoexchange on **Front Campus**

For the proposed St. George geoexchange project, over 350 deep boreholes will be drilled under Front Campus, creating Canada's largest known ground source heat pump in an urban setting. The low-carbon, electric heat pumps will be used to produce heating for buildings around King's College Circle. These buildings are currently heated by natural gas, a high-carbon fuel, and will be renovated to fully attain the benefits of the geoexchange energy.

UTM: New Science Building Geoexchange

The UTM Science Building will be one of the most energy-efficient biological and chemical research laboratory buildings in the world modelled to use 65 per cent less energy than a conventional building. The geoexchange system will provide 60 per cent of the heating and cooling for the building.

UTSC: Geoexchange Phase 2 on South Campus

This proposed geoexchange system will build on the existing system serving the UTSC Science Building on the South Campus that currently provides an installed rated capacity of 1,115 kW for heating and supplanting natural gas-based heating. Plans are also underway at UTSC for a North Campus distributed energy system. Target GHG reductions for these new projects are 315 and 290 tonnes eCO₂ respectively.











Total Target GHG Reduction from Geoexchange =



Produce: Clean Energy & Carbon Capture



Exam Centre Solar Installation St. Geroge Credit: Jing Tey



Solar Energy

Harnessing solar power will enable the university to reduce the use of electricity from the grid, and gas-heated hot water. In addition to the solar capacity already at U of T, new solar panels will be installed across our three campuses to reduce the amount of GHGs that would have been produced from purchased electricity or natural gas.

Total Target GHG Reduction from Solar =

> 200 Tonnes eCO,/ year

Doubling Our Renewable Solar Energy

- We will double the solar capacity on our downtown campus
- We will increase the use of solar energy to heat water for pools and showers

Carbon Capture, Sequestration and Use: Collaborating with Our Innovative Researchers

In addition to reducing GHG emissions, the university is testing and implementing innovative methods for carbon capture, sequestration, and use. Examples of U of T academic teams working with U of T operations to capture and use carbon, and apply research to real world conditions are described below.

Professor David Sinton, Professor Ted Sargent, and the Carbon Electrocatalytic Recycling Toronto (CERT) team are developing and scaling a system that uses solar-powered electricity to process water and CO_2 into ethylene feedstocks—the raw material most used to create petrochemicals. The CERT team is collaborating with U of T to scale up technologies that capture and re-purpose CO_2 into valuable ethylene and ethanol feedstocks used around the world.



Professor Geoffrey Ozin and the Solar Fuels team are working to turn CO₂ into biofuels using renewable solar energy to split the hydrogen out of water. Using their combination of photocatalytic technologies and expertise, they are working toward a way to take carbon out of the boiler exhaust and convert it into valuable biodiesels that would normally come from petroleum feedstocks.

These and other game-changing solutions are being developed here with the assistance of our operations staff. The objective is to help us reduce our emissions and to get these technologies from the labs to a commercial setting.

Distribute: Efficient Distribution



We will improve the efficiency of our energy distribution systems, reduce losses, maximize heat recovery, and distribute more low-carbon heating and cooling energy on our campuses.



The University of Toronto has over a century of innovation with district energy systems. For example, the district energy system on the St. George campus was established in 1912! At St. George, the Central Plant distributes electricity and steam to buildings on-campus and off-campus sites such as the Royal Ontario Museum and Gardiner Museum. The Central Plant uses natural gas to make steam and electricity,

which is a more efficient way to distribute energy than placing boilers in every building or connecting directly to the electricity grid. We plan to reduce the use of natural gas through conservation, optimization, and switching from steam to low-temperature water through the use of geoexchange and energy recovery.

¥ **Distribute:** Efficient Distribution

St. George: Waste Heat **Recovery and Use**

The exhaust system collects heat in the stack at the Central Plant and converts it to hot water for heating buildings. This captured waste heat is considered zero incremental carbon, as additional natural gas is not used to heat the

water. We are increasing our heat recovery by expanding the system to capture even more heat that would have otherwise been wasted. We will retrofit the heating systems that are currently steam-heated in order to increase the use of recovered heat.



UTSC: South Campus Steam to Hot Water Conversion Phase 2

The University of Toronto Scarborough is continuing to convert campus building heating systems from steam to hot water. Building on renovations on the original Science Wing building, UTSC will continue to convert heating systems in



UTSC Science Wing, Credit: Ken Jones

Total Target GHG Reduction from Distribution Improvements =



the Humanities Wing, including the installation of high-efficiency boilers and ground source heat pumps. Combined with improved delivery and controls, the new system will result in better comfort and substantially lower GHG emissions.

Consume: Reduced Consumption



We will reduce energy consumption in our existing and new buildings through retrofits, building systems optimization, and by designing to standards with superior performance in energy and carbon intensity.

U of T is large and growing. We have an extensive portfolio of existing buildings, many of which are aged and require significant retrofits to reduce energy use and GHG footprints. We also have many new buildings planned for all three campuses over the next ten years. We will need to reduce our energy consumption in existing buildings and apply our design standard to all new buildings to ensure we meet our low-carbon goal. Through engagement programs, we will continue to interact with occupants to monitor and analyze operations and to safeguard conduct is in alignment with U of T's building performance standards and carbon reduction goals. We will also further learning opportunities from our reduced consumption efforts.





U of T's existing buildings account for the bulk of our current GHG emissions. We have a large range in building GHG intensities at St. George (as illustrated in the chart below), with a current average of about 69 kg eCO_2/m^2 . We need to reduce this intensity to below 32 kg eCO₂/m²/ year to meet our 2030 goal. We have developed an \$8.5 million Utilities Reduction Revolving Fund (URRF) to invest in deep retrofit energy conservation measures. By taking advantage of in-house expertise combined with specialists





in significant energy conservation solutions, we will define and implement projects that result in large energy reductions across our campuses. For example, we regularly evaluate strategies for improving how we control the buildings, distribute air, optimize equipment, enhance insulation, upgrade windows, and reduce air leakage. Investing in existing building energy performance will significantly reduce our carbon footprint and improve comfort.

Existing Buildings at St. George: Exploring Energy Recovery

A U of T team based on an Energy Services Company (U-ESCo) model is being established at St. George. Consisting of internal energy managers, engineers, and other building science experts, the team will collaboratively develop deep-dive energy conservation projects. One such opportunity for exploration is the capture and reuse of heat. For example, a large data centre on campus generates excess thermal energy. We can capture this energy waste and use it to heat and cool the building year round—treating these systems like computational boilers. This example renovation will offset over 700 tonnes of GHGs and reduce the need for conventional heating supplies by 73 per cent. We will evaluate energy recovery options in other buildings to reduce our energy consumption and GHG emissions.

Target GHG Reduction From Reducing Energy Consumption in Existing Buildings at St. George =

UTSC: Science Wing **Dedicated Outdoor Air System** Phase 2

UTSC's Science Wing is a laboratory intensive building that places elevated demand on utilities in order to operate. Compared to office spaces, laboratories require high air exchange rates in order to provide adequate ventilation for the handling of volatile substances used for research purposes. The air handling units that service this building are the largest on the UTSC campus and represent a major portion of the heating and cooling demand. The original building air handling units required replacement as they approached end of life. The air handling units had original steam heating coils replaced with higher efficiency hot water coils. The new air handling units have also been configured to take advantage of unique existing dual duct infrastructure to provide an innovative control system that supplies dedicated outdoor air to spaces served according to varying occupancy and fresh air requirements.

Target GHG Reduction =

> 300 Tonnes eCO₂/ year

UTM: HVAC Upgrades & **Optimization**

The University of Toronto Mississauga is upgrading the heating, ventilation, and air conditioning (HVAC) systems of several buildings. Projects include boiler and rooftop unit replacements, chiller replacement and optimization, installation of variable frequency drives, and conversion of domestic hot water systems to on-demand. Upgrades will save both electricity and natural gas, and result in more comfortable conditions for building occupants. Upgrades and retrofits will take place in the Central Utilities Plant, Student Centre, Erindale Hall, Oscar Peterson Hall, and Davis Building.



Total Target GHG Reduction from Building Optimization =

6,000

Tonnes eCO₂/ year

More buildings with old control technologies will also be updated in the next five years. Advanced controls allow our operators to monitor and adjust heating, cooling, and ventilation to better suit actual conditions and time of day. They will also be able to watch the performance of the buildings from a control centre, and react to wayward conditions before they affect energy performance and the comfort of building occupants.







Managing Our Growth: Enhancing Design Standards for New Building Construction and Renovation

All new buildings and major renovations will be designed to high standards that define superior performance for energy intensity, carbon intensity, and comfort. All new buildings and major renovations will have energy and carbon use indices +40 per cent more efficient than the industry-respected American Society of Heating, Refrigerating and Air-Conditioning Engineers (ASHRAE) standard 90.1. Our standards will be updated to reflect superior performance potential as new technologies and practices improve. We expect these advanced building design performance standards to account for close to 8,325 tonnes of avoided eCO₂/ year by 2024.

Target GHG Avoidance from Designing to New Building Performance Standards =

> **8,325** Tonnes eCO,/ year

St. George Academic Wood Tower

The University of Toronto is planning to build a 14-storey academic tower made of timber on its downtown Toronto campus—expected to be the tallest mass timber and concrete hybrid building in North America. The Academic Wood Tower is an example of low-carbon and high performance design, incorporating new design standards. Designed to achieve a GHG intensity performance of 14-15 kg eCO_2/m^2 , our Academic Wood Tower will perform well below our 32 kg eCO_2/m^2 target for 2030.







Quality lighting is an important influence on high performance work and learning. We will be replacing a significant number of interior and exterior lights with far more efficient LEDs. These new lights, combined with state of the art controls, will save about 40 per cent of the electricity costs and last longer than traditional bulbs. Savings will be used to invest in projects with higher GHG reductions. We are planning to replace over 3,000 lights over the next 5 years across our campuses.

Target GHG Reduction from Lighting Retrofits =



U of T Trees: Carbon Stock & Sequestration



Trees are natural carbon sinks due to their ability to uptake CO₂ from the atmosphere and store carbon in their wood. As such, they are one of the most important long-term and nature-based solutions to climate change. U of T properties, including, St. George, UTM, UTSC, Hart House Farm, Koffler Scientific Reserve at Jokers Hill, and Gull Lake, have a significant number of forests and trees that have been capturing and storing carbon for decades. Working with the Faculty of Forestry, we calculated that about 44,288 tonnes of elemental carbon (equivalent to 162,540 tonnes CO₂) has been captured and held by our trees.

Each year, our trees continue to capture an additional 5,260 tonnes of CO₂ (equivalent to 1,433 tonnes of elemental carbon). Our forests, trees and green space provide many other co-benefits and contribute to achieving a lowcarbon future in other ways. They are critical

for ameliorating local climate, mitigating urban heat island and water runoff, trapping pollutants, providing wildlife habitat, and enhancing human well-being. We will continue to work with forestry experts to pursue strategic forest conservation, planning, management, and restoration strategies. This integrated approach will promote maintaining stored carbon, and maximize carbon sequestration, while protecting and enhancing forest biodiversity, ensuring its sustainability and resilience.

CO₂ Captured by Trees on U of T Urban Properties (St. George, UTM, UTSC, U of T Institute for Aerospace Studies (UTIAS)) =

1.097 Tonnes eCO₂/ year

Fostering Innovative Solutions

Campus as a Living Lab & **Experiential Learning**

Students and faculty apply skills in teaching and research to real-world operational settings through course work, collaborations with research teams, Work Study, and programs like Campus as a Living Lab (CLL). The mandate of the CLL approach is to bring faculty members, students, staff, and, where appropriate, external partners together to collaborate on developing sustainability projects that combine operational and academic activities. Such projects will contribute to the operational sustainability goals of the University, and also provide an opportunity for research and experiential learning. In 2018, the Committee for Environment, Climate Change, and Sustainability (CECCS) CLL subcommittee identified and approved six projects to act as living labs—one new project and one retrofit project per campus.

U of T's size and location uniquely position its operations at a dynamic urban intersection that provides opportunities for collaboration with the wider community. One such opportunity is the Net-Zero Laneway pilot project in the Huron-Sussex neighbourhood, which served as a Campus as a Living Lab course project in Fall 2018. These opportunities facilitate the development of hand-on-skills, crucial for the creation of the next generation of leaders and problem solvers tackling climate change. We will continue to encourage and facilitate the integration of students and faculty within operations in piloting and developing tomorrow's solutions.

Research-intensive universities have many laboratory fume hoods that exhaust large amounts of energy. With more than 1,200 fume hoods in labs across our campuses, U of T is no exception. We have the opportunity to optimize fume hood use to save energy, improve safety, and reduce GHGs. Student researchers, the Sustainability Office, and the Environmental Health & Safety department have collaborated to create a unique way to improve fume hood efficiency. This project has resulted in energy savings and GHG reductions, while maintaining optimum safety.



Example Project: Fume Hood Performance Optimization

Pathway to 2030

Summary of Target **GHG Reductions:**





To put us on a path to achieve our 2030 low-carbon goal, we will improve energy and thermal production, enhance energy distribution efficiency, and reduce our energy consumption. The chart above illustrates the types of projects we will implement over the next five years to reduce GHG emissions across all three University of Toronto campuses. With this 2019-2024

low-carbon action plan in place, we will be 80 per cent closer to achieving our goal. Beyond our five-year plan, we will continue to find ways to use the best low-carbon, high performance solutions to maintain long-term savings. Our staff, industry experts, faculty, and students are laying the important groundwork for achieving our 2030 goal.



Total Planned Reductions by 2024

Optimization =



GHG Avoidance from **Designing to New Building Standards =**

8.325 Tonnes eCO₂/ year

Lighting Retrofits =



GHGs Captured from Trees on Urban **U** of **T** Properties =





Tonnes eCO₂/ year