

Instructor	Thomas Garvey, BID, MSc, PhD thomas.garvey@carleton.ca Location: Remote Office hours: During lecture hours or by appointment
Teaching Assistant	Zahra Alizadeh / ZAHRAALIZADEHELIZEI@cmail.carleton.ca Office hours: During lecture hours or by appointment
Time and location	Wednesday 11:35-14:25 This course will be conducted remotely using a number of applications.

Course Description

Topics vary yearly and address key contemporary industrial design issues. There is a focus on writing, discussion, and debate. Students organize a seminar with design professionals and other community experts including student and professional presentations, interaction, and discussion.

Learning Outcomes

1. Demonstrate ability to research contemporary design issues
2. Apply critical thinking skills
3. Discuss and debate theoretical and critical design perspectives with classmates and experts
4. Apply course resources to support opinions expressed
5. Effectively communicate ideas through written work and/or oral presentations
6. Cooperate with team members in working through class exercises, assignments, and seminar logistics
7. Organize, participate in, and produce a seminar with design professionals and other experts
8. Design and produce a published record or proceedings document

Topic: DESIGN for the UNIMAGINED

The topic will be explored from the professional viewpoint of industrial design with the aim to share perspectives and explore trends that better prepare young design professionals for new challenges and opportunities. We will invite the participation of academics and industry leaders, in thought provoking dialogue that focuses on more human-centered approaches to designing for a better world.

The aim is also to create bridges between these worlds in the belief that together we can further enhance the future of design research and education.

The topic will be explored along three themes.

Theme 1. Responses in Extreme Times

(world pandemics, climate crises and human impact, population migrations)

- Changes in personal work patterns, commuting, home/work environments
- New visions of products, interiors, environments, urban planning, and cities
- Impacts on mental and physical health, daily schedules, and how to 'design' better lifestyles
- Understanding how designers approach complex problems and the inherent challenges and limits
- Contrasts between using people as beta testers and systems for human survival that have no tolerance for failure

Theme 2. Technologies for Social and Environmental Benefit

- Showcasing human centered technology vs performance-based technologies, best and worst cases
- Comprehending what sustainability really means, now and for generations to come, given the enormous human and environmental impacts of previous ideas of progress
- The IoT and the interconnectedness of future environments for living, working and designing
- AI, robotics, and virtual reality in the pursuit of the UN SDGs
- Technology development funding models across industry types

Theme 3. Birth of New Learning

- Open education and the challenge of making higher education accessible to students in need
- Using virtual and augmented reality in design studios to enhance student experience
- Mobile phones as learning tools and access points to knowledge, particularly in developing countries
- Changing needs and aspirations of students and young designers around the world, and methods for increasing engagement and participation at all stages of education
- Identifying the essential core of design learning, learning by doing, the value of apprenticeships, and the proper balance between professional practitioners versus academics as educators

Course Format

This course is unique in that it provides students with the opportunity of presenting the results of the course work to subject experts through in-class presentations, and to the extended School and external community in a final public event.

- The first meeting will include an introduction to the course and learning outcomes. This will be followed by a discussion of the topic/context, and the range of sub-topics students may choose from. Students will participate in the development of sub-topics and will arrive at individual areas of interest within the prescribed areas.
- Founded on individual research and interest, in the first weeks, students decide to work alone or in teams of 2-3, based on a set of shared features or attributes to develop a paper for presentation to the class.
- Towards the end of the semester there will be a public event where student papers will be presented as posters along with select sample oral presentations. The content of the in-class presentations and posters will be organized into a final publication, which will constitute a record of the course. It is expected that students will be actively involved in the organization of the public event and the final publication.

- Weekly meetings will include presentations on a range of topics from national and international guests. These presentations are meant to be a source of general inspiration and not necessarily to be applied in the student papers. At the same time, approximately half the time each week will be dedicated to discussion on assigned readings.
- This structure has been set up to support students in achieving the learning outcomes.
- While general sources will be presented to the class, students will be expected to find additional sources of information relevant to their chosen sub-topics. At the same time there will be a focus on time management, in order to allow the greatest success and most rewarding experience within the time limits of the course, and with respect to the many academic and other obligations that students are balancing.

Course Deliverables and Evaluation

Paper*	60%	(Abstract 5% / Interim paper 35% / Final paper 20%)
Poster	25%	(Interim poster 20% / Final poster 5%)
Audiovisual presentation files	10%	(For public presentation)
Public event	5%	(Organization of event, agenda, invitations, guest lists, etc.)

**Abstract 450-500 words / Interim Paper 2500-3500 words / Final Paper / 3000-4000 words*

Specific requirements regarding content and format (papers, posters, audiovisuals, presentations), and process activities (final documentation, organization and conducting of the event) will be discussed and announced at appropriate points in the process. These will constitute the criteria for evaluation.

Course Schedule (key dates)

10-Sep	Fri	Start
24-Sep	Fri	Topics and teams chosen
01-Oct	Fri	DUE: Abstract
15-Oct	Fri	DUE: Interim paper
29-Oct	Fri	Fall break / no classes
12-Nov	Fri	DUE: Interim poster and presentation files for public event
19-Nov	Fri	Public presentation (evening)
03-Dec	Fri	DUE: Final paper and poster
10-Dec	Fri	No class (Follows Monday schedule)

Individual/Group Work

Courses may include individual and group work. It is important in collaborative work that students clearly demonstrate their individual contribution.

Seminar Attendance

Attendance at the scheduled Seminars is mandatory. Failure to attend the Seminar without reasonable cause will result in a grade of F. Students arriving late for the Seminar or not remaining for the complete session without approval from the instructor, will be addressed on a case-by-case basis at the discretion of the instructor. If you are not able to attend a Seminar it is important that you provide a reasonable rationale for your absence, late arrival or early departure.

Late Submission of Required Material

All work submitted late will receive a 10% per day deduction from the determined grade, to a maximum of 3 days, from the original deadline time and date. Failure to submit within 3 days, without approval from the instructor, will result in a grade of F.

Participation and Professionalism

Active participation and professional conduct (e.g. class discussion, consultations with instructors, work ethic, etc.) are important in lecture and studio courses and may be formally evaluated by a grade. Professionalism also includes Carleton's Policy on Academic Integrity described in more detail below with links to content which you are required to review.

Academic Integrity

Carleton's Policy on Academic Integrity is available at: <https://carleton.ca/registrar/academic-integrity/> and covers the following topics:

- Plagiarism (e.g. submitting work in whole or in part by someone else, failing to acknowledge sources through the use of proper citations when using another's work)
- Other Violations (e.g. improper access to confidential information, disruption in classroom activities, misrepresentation of facts for any academic purpose)

The policy governs the academic behavior of students. In industrial design, ideas and concepts come from a multitude of sources and may be modified and utilized in the design and development process. The student should reference such sources appropriately and it is strongly advised that you read Carleton's Policy on Academic Integrity prior to conducting any work at the University.

Requests for Academic Accommodation

You may require special arrangements to meet your academic obligations during the term. For an accommodation request for any of the following topics below, refer to the link provided for more information: <https://students.carleton.ca/course-outline/>

- Parental Leave
- Religious/Spiritual Obligation
- Academic Accommodations for Students with Disabilities
- Survivors of Sexual Violence
- Accommodations for Student Activities

Student Responsibility

The student is responsible for knowing the content of this course outline, the schedule of classes and assignments, and material covered during any absence. Unless otherwise arranged, the class will meet during scheduled class hours. Please note that attendance is important since issues and questions may be raised in class, and announcements made, along with information disseminated through cuLearn.

Changes to the Course Outline and Schedule

The course outline may be subject to change in the event of extenuating circumstances. In such a case, every effort will be made to advise students as early as possible.