

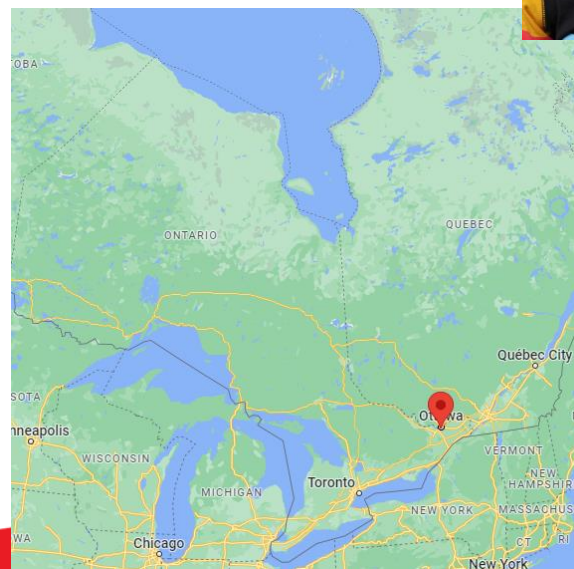
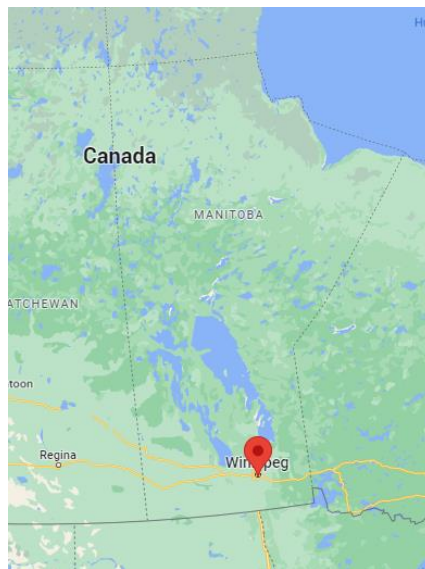
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Department of Systems and Computer Engineering, Carleton University

# ECOR 1041

## Course Introduction and Expectations

# Land Acknowledgement

I would like to acknowledge that the land I grew up on is located on the original lands of **Anishinaabeg, Cree, Oji-Cree, Dakota, and Dene peoples, and on the homeland of the Métis Nation**, and that the land on which we gather is the **Traditional and Unceded Territory of the Algonquin Nation**.



# Important Information: Lecture Room HS 1301

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- **Emergency Exits:**

- There is an exit just outside the doors at the front of the room.
- From the back of the room, go down the stairs and then out the door near the bottom of the stairs.

- **Washrooms:**

- The nearest men's and women's washrooms are HS 1103 and HS 1102: exit at the front of the room and turn left three times.
- The nearest gender-inclusive washrooms are HS 2101 and HS 2102: 2nd floor, next to stairwell A, around the corner from the elevators, across from lab HS 2201A.

- **Drinking Fountain:**

- The men's and women's washrooms each have a sink with a cold-water tap where water bottles can be filled.
- The nearest fountain is on the second floor near HS2107 (down the hall from the gender-inclusive washrooms).

# Important Information: Lab Room CB 4301

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- **Emergency Exits:**

- From the front door, turn left (go past the elevators) and then right and go down the stairs.
- From the back door, turn right and then turn left and go down the stairs.

- **Washrooms:**

- The nearest men's and women's washrooms are CB 4911 and CB 4912: exit at the front of the room, turn left (go past the elevators), and then turn left.
- The nearest gender-inclusive washroom is currently ME 2282 (second floor, block A, near block B). We have heard that CB's sixth floor washrooms (CB 6911 and 6912) will soon be converted to gender-inclusive.

- **Drinking Fountain:**

- The nearest fountain is between the men's and women's washrooms.

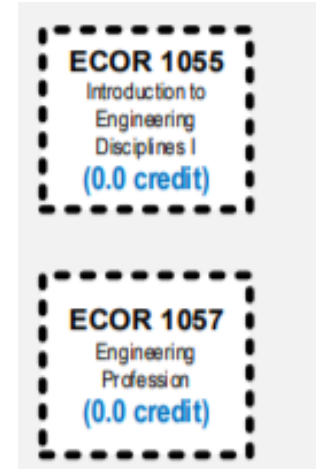
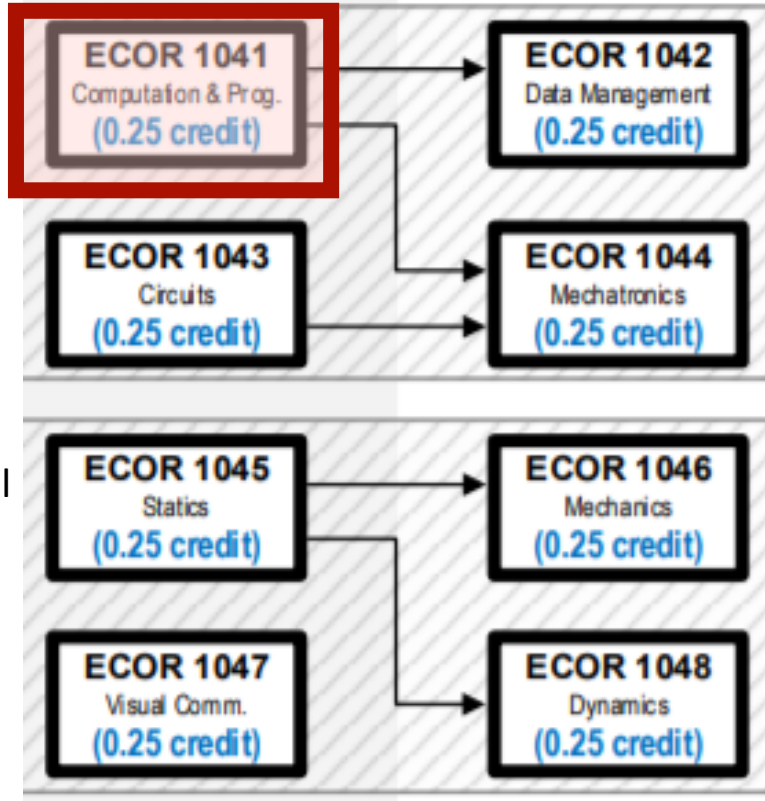
# Objectives

- ❑ Understand the big picture of the ECOR104x courses.
- ❑ Be familiar with the expectations in your 1<sup>st</sup> year: requirements to progress in your program and course projects.
- ❑ Introduce ECOR1041: expectations, code of conduct, course objectives, topics, learning outcomes, grading schema.

# Understand the big picture of the ECOR104x courses

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SCE



Three non-credit courses introducing you to the disciplines in engineering and the professional standards expected of engineering students and professionals.

# Understand the big picture of the ECOR104x courses

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- Take into account the pre-requisites.
  - Example: ECOR1042 requires at least C- in ECOR1041.
- To take 2<sup>nd</sup> year engineering courses, students are required to achieve a grade of C- or better in each ECOR104x.

# ECOR 104x Projects

Four ECOR courses (1042, 1044, 1046 and 1047) have group projects.

- Students will work in teams of four (with the intention of each team having one student from each department).
- The teams built by the Instructors.
- One member from each team will be the team leader.
  - For each course, as much as possible, the leader will be a student from the department in charge of the course.
  - Example: Leaders of ECOR 1042 will be students in SCE.



# ECOR1041 and ECOR 1042

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Broadly speaking, these are your programming courses.

- ECOR 1041: You will learn the core fundamentals of Python.
- ECOR 1042: You will learn the data structures provided by Python. You will use them to implement algorithms and while developing your course project.

We will focus on ECOR 1041...

# ECOR1041: Course Expectations

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- You are expected to take the initiative to read and make use of the resources provided to you.
  - You must read the course outline, the course web page BEFORE asking questions about the course.
  - You must read the forums BEFORE you ask for help.
  - You must read the assigned readings BEFORE attempting the lectures.
  - You must read and substantially start the labs BEFORE going to your lab.
- Why my email has been ignored?
  - The email ask for information already provided. If you already read the resources and still need clarification, state that in your email.

# ECOR1041: Course Expectations

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## Multitasking is a Myth

- Read about *cognitive loads of attention shifts*
- We recommend undivided attention and taking notes when attending the lectures.
  - Take advantage of the lecture time and ask anything you consider is not clear
- When attempting your labs, do not get distracted with your phone, Facebook or video-games. Programming requires your full attention.
- Take advantage of the time you dedicate to the course. Do not get distracted.
  - Schedule breaks. You can use those breaks to check Facebook, WhatsApp, etc. or even better take a break from screens.

- "Flipped classroom" in many lectures.
  - We expect you come to “*class*” prepared, reading assignments complete and practice exercises done.
  - We do not teach everything from scratch, we assume that you have read the basics.
    - If something is not clear from the reading ASK! The lecture is a good time while we are addressing the topic.
  - You may feel left behind if you come to class without reading first.
- Learning programming is best done **without** the computer!
  - OK to use tablet/laptop, but learning how to write (and trace execution of code) triggers the correct neural pathways and builds good habits in observation and detailed work.

# ECOR1041: Course Expectations

- A deadline is final
  - Brightspace will not allow submissions even 1 second after the deadline
- Failure is real
  - If I do badly on a test, can I write the deferred test? Or can I just use my final exam mark instead of lab marks? → No
- Emails/Postings are professional correspondence
  - Your text must have capitalized letters at start of sentences and proper punctuation.
  - Use informative headings for both emails/postings
  - Email Subjects – MUST have ECOR1041 in the subject line

# ECOR1041: Code of Conduct

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- Be respectful with the other students, instructors, staff, TAs, etc.
- Address your instructors, TAs, and colleagues with the right pronoun.
  - If you are not sure if the person responds to she, he, they, etc. feel free to ask.
  - If your instructor holds a PhD, the preferred way to address them will be as **Dr.** followed by their last name regardless of their gender identity.
- TASK: Check your rights and responsibilities
  - <https://carleton.ca/studentaffairs/student-rights-and-responsibilities/>

# Succeeding in Higher Education

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- We mentioned that multi-tasking will not help you succeed in your classes. What will?
  - A Growth Mindset
  - Metacognition
  - Attention to Detail
  - Taking Good Notes
  - Taking Care of Yourself!

- Embrace challenges: They are an opportunity for growth
- Practice persistence and resilience
- Learn from failure (rather than being discouraged by setbacks)
- Reframing (find a positive viewpoint)



# Metacognition

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- Learning in University is very different from in High School
- Bloom's Taxonomy specifies levels of cognitive learning:
  - Remembering → High School
  - **Understanding → First Year University**
  - **Applying → First Year University**
  - Analyzing
  - Evaluating
  - Creating

- How do you know if you understand something?
  - You can **explain** it to someone else (i.e., teach)
- How can you practice applying the concepts?
  - In this course: **program**, program, program

- Follow the “Study Cycle”:
  - **Preview:** look over the textbook before class
  - **Attend:** take notes in lectures, participate, ask questions
  - **Review:** summarize ideas, where do you need clarification?
  - **Practice:** solve problems, do exercises, can you explain the concepts?
- Repeat!

- Did you read the instructions?
  - Re-read them!
- Do you know the dates and deadlines?
  - Double-check!
- Do you know where to find information?
  - Check the Course Outline and Brightspace!

# Taking Good Notes in Lectures

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(<https://www.youtube.com/watch?v=ATmJb3bH2E0>)

- Do not write every word or even exact phrases
  - **Summarize** in your own words (**understand**)
  - Ask **questions** if you cannot do this
- Spend 10 minutes adding “**flesh**” to the “bones” of your notes within 24 hours
  - Most will not do this!
- Unless you have a disability, **write** with pen or pencil
  - Research shows **typing** leads to lower grades!

- Sleep: James Healey, who was awarded Carleton's President's Medal at the June 2024 convocation *says: "Aim for eight hours of sleep and structure your life around that. If you make that a priority and organize your day around it, a lot of other things will fall into place. It helps your mental and physical health and your ability to manage problems."*
  - Sleep is also important for learning and memory
- Nutrition
- Exercise
- Social Life

- There are many students with learning disabilities who struggle in the classroom.
- How can the instructor and students help them?
  - ✓ Instructor should post the slides before class
  - ✓ Instructor should use a microphone during class
  - ? **Students need to remain silent when the instructor is speaking**

# One Additional Thing: Support Your Colleagues

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- I recognize that it is tempting to talk or whisper to your colleagues.
- Can we all agree to avoid this?
- What can I do to make this easier?



# How to Succeed in the Course

- Attend lectures and ask questions
- Attend labs and get help from the TAs
- Attend PASS sessions and get help from your peers and the PASS Facilitator
- Complete all course components
- Know the deadlines and ensure that you do not miss them
- Attention to detail
- Attend student hours if you have questions
- Use the Elsie MacGill Learning Centre: <https://carleton.ca/engineering-design/emlc/>
- Practice, practice, practice

# Grading Schema

Component	Weight
Quizzes (best 5 out of 6)	5%
Labs (best 5 out of 6)	10%
Bonus: Lab 7	2%
Bonus: Class Participation	3%
Midterm (during lecture time)	25%
Final exam	60%

# Quizzes (5%)

- Best 5 out of 6
- 2 attempts per quiz. Higher attempt counts
- No questions about quizzes will be answered over email
- **Deadlines**
  - Fridays at 9 pm
  - System open until Sunday at 9 pm
    - No late submission penalty
    - No further extensions. No exceptions!
    - If you miss the Sunday hard deadline, you are 2 days late, not just a few minutes

## Labs (10%)

- Best 5 out of 6
- TAs available during lab sessions for questions/help
  - No questions about labs will be answered over email
  - TAs will not answer emails. It's not part of their duties!  
(Except for appeals of grades when announced)
- **Deadlines**
  - Fridays at 9 pm (recommendation: submit by the end of your lab session)
  - System open until Sunday at 9 pm
    - No late submission penalty
    - No further extensions. No exceptions!
    - If you miss the Sunday deadline: 2 days late, not just a few minutes

## ➤ Labs 1, 2 and 3

- Complete the lab handout
- Complete the associated quiz for grades
  - 2 attempts – higher attempt counts
  - Lab handout is not submitted
- If you do not achieve full marks in the first attempt, we recommend solving the lab again before re-attempting the quiz

# Labs (10%)

## ➤ Labs 4, 5, and 6

- Python scripts (.py files)
- Graded based on a test harness
  - Some labs: manual grading for “documentation” and “coding conventions”
- Submit **.py** file to Brightspace (Gradescope)
  - Submit as many times as needed before the deadline.
  - **Latest** submission counts towards your grade.
  - Submit after each exercise for immediate feedback.
    - If you do not achieve full marks → fix the errors and submit again.
    - Exercise is correct → move to the next exercise.

# Lab 7 (2% bonus)

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- Lab 7 will be a bonus lab, worth 2%
- The instructions will be like those of Labs 4, 5, and 6 (see previous slide)
- Despite the lab being a bonus lab, the content will be on the final exam, so we strongly encourage you to do the lab!

## **Class Participation (3% Bonus)**

- **We will hold Wooclap polls during most lectures**
- **Students will receive marks for participating**
  - **Answers do not have to be correct to receive participation marks**
  - **You must be present at the lecture to receive participation marks (no exceptions!)**
  - **You must log in to your account to get credit (no exceptions!)**



## Class Participation (3% Bonus)

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- For each lecture in which we do a Wooclap poll (ideally all of them, technology permitting!) students will earn 0, 0.5, or 1
- To earn 1, students must answer at least 80% of the questions. To earn 0.5, students must answer at least 40% (and fewer than 80%) of the questions. Otherwise, students earn 0.
- At the end of the term the sum of your best 10 scores will be multiplied by 0.3 to give a bonus mark out of 3

# Midterm (25%)

- During lecture time – October 1
- Closed book and proctored
- Paper-based exam
- Up to lecture 7 is included in the midterm
- Requests to increase the weight of the final exam because of poor performance in the midterm, quizzes, or labs, with a corresponding reduction in the weight of the other component(s), will not be considered
- Deferred midterm
  - Self-declaration form to ISC (check course outline)
  - **Important:** It is an academic integrity offense to lie on the self-declaration form
  - Weight of the midterm moves to the final exam

# Final Exam (60%)

- Early Fall – Final exam period
  - Scheduled by examination services
  - Most likely October 26 or 27
- Closed book and proctored
- Paper-based exam
- All course material is on the final
- **At least 25/60 on the final exam is required to pass the course**

# Deferred Final Exams

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- Handled by the registrar's office (check course outline)
- **Important:** It is an academic integrity offense to lie on the self-declaration form
- **Additional Requirements:** the grades below are the minimum required to be eligible to pass the course:
  - Labs (including Lab 7): 8/12
  - Quizzes: 2/5
  - Midterm: 10/25. If a student defers the midterm, the grade in the midterm will be considered 0/25.
  - The final grade for students deferring both the midterm and the final exam will be an F, regardless of their grade on the deferred exam.

# ECOR1041: Important Reminder

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- A grade of C- or higher in ECOR1041 is a pre-requisite for ECOR1042.
  - **This pre-requisite will be enforced.**
- If you do not achieve a grade of C- in ECOR1041, you will be **removed automatically from ECOR1042 (late Fall) and automatically re-enrolled in a new ECOR1041 section.**
- **Do not drop ECOR1042** if you fail ECOR1041. Otherwise, you will not be re-enrolled in ECOR1041 (late Fall).

# ECOR1041: Important Reminder

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- If you do not want to be re-enrolled in ECOR1041 for late Fall, in the case that you do not achieve a grade of C- or higher, you must email [ECOR1041@carleton.ca](mailto:ECOR1041@carleton.ca) before 20<sup>th</sup> October 2024.
- Note that the pre-requisite will be enforced regardless of your decision to be re-enrolled in ECOR1041 or not, and you will have to re-take ECOR1041 at a later time (e.g. Summer) before being able to take ECOR1042.

# Instructional Support Coordinator (ISC)

- Dr. Cristina Ruiz Martin
- [ECOR1041@carleton.ca](mailto:ECOR1041@carleton.ca)
- Student's hours  
(check Brightspace)
- In charge of:
  - Labs
  - TAs
  - Admin aspects of the course



- Course objectives
- Topics
- Learning outcomes
- Grading schema (already covered)

Now, we will take a look at the course outline and do a Brightspace tour.....