CISC 204 Fall 2019:
Syllabus (PRELIMINARY)

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1 Calendar description

Elements of mathematical logic with computing applications. Formal proof systems for propositional and predicate logic. Interpretations, validity, and satisfiability. Introduction to soundness, completeness and decidability.

2 Learning outcomes

Program code	Learning outcome
2.1	Construct syntactic and semantic proofs in propositional and predicate logic
3.1	Express English language and mathematical expressions in logic
	Determine semantic equivalences, satisfiability and validity
2.1	Verify the correctness of computer programs
	Apply model checking for verification

3 Textbook

The textbook for this course is *Logic in Computer Science: Modelling and Reasoning about Systems* by Huth and Ryan, 2004 (ISBN 978-0521543101, Cambridge University Press). We will cover, from the text: (nearly) all of Chapter 1; (nearly) all of Chapter 2; and possibly some of Chapters 3, 4, and 5.

We will provide additional instructional material as needed and as appropriate.

4 Grading method

There will be 5 in-class tests, graded numerically. All components of this course will receive numerical percentage marks. Your final grade will be derived by converting your numerical course average to a letter grade according to Queen's official grade conversion scale.

The grading scheme includes considerations for short-term health concerns, scheduling difficulties, variable performance, and misfortune. For the first 4 tests, the highest 3 test results will be worth 27% each or 81% of the final grade; the fifth test will be worth 19% of the final grade. Because of this policy, and the attendance requirements of Academic Regulation 6.1, ***no make-up or re-write tests*** will be offered.

If you find a discrepancy between the grade on your test paper and the grade entered in onQ, you must email the instructor or a graduate TA *no later than one week after the marked test is returned*. After one week, your onQ grade will not be altered for any reason.

If you have any question about your mark, please fill out the online form. Include the form and your marked test in an envelope and hand them in to the instructor *no later than one week after the marked test is returned*. Your entire test will then be re-marked and, as a result, your mark may go up or down, or remain unchanged. No request for a re-mark will be considered if your answers were written in *pencil* or *erasable ink*.

5 Test Schedule

The in-class tests are planned for the following dates:

Test #1:	2019–09–25	**Wednesday**
Test #2:	2019–10–10	Thursday
Test #3:	2019–10–31	Thursday
Test #4:	2019–11–14	Thursday
Test #5:	2019–11–28	Thursday

6 Accommodations

The following applies to students who receive accommodations from QSAS.

Send a copy of your accommodations letter to Erin Gunsinger, the School of Computing's Accommodations Coordinator. She can be reached at:

- accommodation@cs.queensu.ca
- School of Computing main office, 557 Goodwin Hall (613–533–6050), weekdays 8 a.m.–noon and 1–4 p.m.

Many students are accustomed to sending their letter to the course instructor. In most cases, I will send the letter on to the Accommodations Coordinator. You are, of course, still welcome to discuss your accommodations with me.

7 Additional syllabus information

7.1 Common Syllabus

The School of Computing's "Common Syllabus Information (2019–2020)" is part of the 204 syllabus. Access it at the following link:

`http://www.cs.queensu.ca/students/undergraduate/syllabus/year2019-20.php`

7.2 Academic integrity

For greater certainty, an excerpt from the common syllabus section on academic integrity is repeated here:

Queen's students, faculty, administrators and staff all have responsibilities for supporting and upholding the fundamental values of academic integrity. Academic integrity is constituted by the five core fundamental values of honesty, trust, fairness, respect and responsibility (see www.academicintegrity.org*) and by the quality of courage. These values and qualities are central to the building, nurturing and*

sustaining of an academic community in which all members of the community will thrive. Adherence to the values expressed through academic integrity forms a foundation for the "freedom of inquiry and exchange of ideas" essential to the intellectual life of the University.

Students are responsible for familiarizing themselves with and adhering to the regulations concerning academic integrity. General information on academic integrity is available at Integrity@Queen's University, along with Faculty or School specific information. Departures from academic integrity include, but are not limited to, plagiarism, use of unauthorized materials, facilitation, forgery and falsification. Actions which contravene the regulation on academic integrity carry sanctions that can range from a warning, to loss of grades on an assignment, to failure of a course, to requirement to withdraw from the university.

7.3 Automatic copyright of course materials

As recommended by the University, this is a reminder to students of copyright:

In accordance with Canadian statutory and common law, any written or visual material that the instructor produces is automatically copyrighted. The instructor may pursue any violator of that copyright whether or not a notice is placed on the course material. Copyright does not dampen any ordinary use that colleagues or students make of the material.