Faculty of Engineering

Application for Microprogram in Interdisciplinary AI

STUDENT IDENTIFICATION

SURNAME	GIVEN NAMES	STUDENT NUMBER
Haowen	Mo	1234567890

EMAIL	ACADEMIC UNIT/DISCIPLINE		
123@gmail.com	Uottawa	☐ COTUTELLE	☐ DIPLOMA ☑ MASTER'S ☐ PH.D.

PREVIOUS SURNAME IF APPLICABLE

SEX	DATE OF BIRTH	MARITAL STATUS	SOCIAL INSURANCE NUMBER
☐ MALE ☑ FEMALE	2023-02-16 (YEAR / MONTH / DAY)	☑ SINGLE, DIVORCED, WIDOWED ☐ MARRIED, SEPARATED ☐ OTHER	123456789

MOTHER TONGUE	LANGUAGE OF CORRESPONDENCE	PREFERRED LANGUAGE OF INSTRUCTION ?
☐ FRENCH ☐ ENGLISH ☐ OTHER ▷	☐ FRENCH ☐ ENGLISH	☐ FRENCH ☐ ENGLISH

COUNTRY OF BIRTH	COUNTRY OF CITIZENSHIP	IF NOT CANADIAN BY BIRTH, INDICATE DATE OF ARRIVAL IN CANADA
Canada	Canada	2023-02-16 (YEAR / MONTH / DAY)

IF NON-CANADIAN, SPECIFY YOUR **CURRENT STATUS** ☑ PERMANENT RESIDENT ☐ STUDY PERMIT ☐ OTHER (SPECIFY) ▷

PROGRAM OF STUDIES AND INSTITUTION OR OCCUPATION ON DECEMBER 1st LAST YEAR: Engineering

PERMANENT ADDRESS

N° AND STREET	CITY	PROVINCE
123 Ave	Ottawa	Ontario

COUNTRY	POSTAL CODE	TEL. N°	EFFECTIVE DATE OF PERMANENT ADDRESS
Canada	A1B2C3	8888888888	2023-02-16 (YEAR / MONTH / DAY)

☐ SAME AS PERMANENT ADDRESS

MAILING ADDRESS

N° AND STREET	CITY	PROVINCE
789 Ave	Toronto	Ontario

COUNTRY	POSTAL CODE	TEL. N°	EFFECTIVE DATE OF MAILING ADDRESS
Canada	A2B2C3	7777777777	2023-02-16 (YEAR / MONTH / DAY)

Prerequisites

Please indicate below the grades that you obtained in the following courses (N/A if you did not take that course) If your university differentiates between "theory course" and "laboratory", please indicate only the theory" part. Below please find descriptions of the prerequisite courses offered at the University of Ottawa.

Course name	Your Grade	Max. Grade Possible
Linear Algebra	1	2
Calculus II	3	4
Statistics and Probabilities	5	6
Introductory Programming	7	8

Linear Algebra: Review of complex numbers. The fundamental theorem of algebra. Review of vector and scalar products, projections. Introduction to vector spaces, linear independence, bases; function spaces. Solution of systems of linear equations, matrix algebra, determinants, eigenvalues and eigenvectors. Gram Schmidt, orthogonal projections. Linear transformations, kernel and image, their standard matrices. Applications (e.g. geometry, networks, differential equations.

Calculus II: Integrals: numerical integration; improper integrals. Introduction to differential equations: techniques to solve differential equations, numerical solution of differential equations and models in the life sciences using differential equations. Introduction to linear algebra matrices and matrix algebra, determinants, eigenvalues and eigenvectors (in two or three dimensions). Functions of several variables: graphical representations, partial derivatives. Systems of differential equations: equilibrium points, stability, phase portrait and global analysis.

Statistics and Probabilities: A survey of combinatorial analysis; probability and random variables; discrete and continuous densities and distribution functions; expectation and variance; normal (Gaussian), binomial and Poisson distributions; statistical estimation and hypothesis testing; method of least squares, correlation and regression.

Introductory Programming: Problem solving and algorithm design. Basic principles of software engineering: structure decomposition, documentation, testing and debugging. Variable types, expressions and assignment. Conditional and iterative control structures. Modules and parameter passing. Recursion. Fundamental data structures: arrays, strings, matrices, records. Introduction to objects. Examples of applications in various disciplines, including science and engineering.

- *I HEREBY AGREE TO PAY THE FEES ARISING FROM THIS REGISTRATION AND RECOGNIZE THAT I SHALL REMAIN INDEBTED OF ANY UNPAID FEES UNLESS I INFORM MY ACADEMIC UNIT **IN WRITING** (LETTER APPROPRIATE FORM) OF MY INTENT TO CANCEL MY REGISTRATION PRIOR TO THE DEADLINE FOR FULL REFUNDS.*
- *I CERTIFY THAT THE ABOVE INFORMATION IS TRUE AND COMPLETE, INCLUDING MY DECLARATION OF CITIZENSHIP AND STATUS IN CANADA. ANY FALSE DECLARATION ON MY PART WILL RESULT IN THE CANCELLATION OF MY REGISTRATION. I AGREE TO ABIDE BY ALL REGULATIONS OF THE FACULTY OF GRADUATE AND POSTDOCTORAL STUDIES AND OF THE UNIVERSITY OF OTTAWA.*

DATE _____ SIGNATURE (STUDENT) _____