Student Name: _____ Student ID: _____ Grad term/year: _____

☐ **Interfaculty Program Cognitive Science (54 credits)**

☐ **Honours Cognitive Science (60 credits)**

Core Courses (24 credits)

Required Course (3 credits)

☐ NSCI 201 Introduction to Neuroscience 2

Logic Course (3 credits)

☐ COMP 230 Logic and Computability
☐ MATH 318 Mathematical Logic
☐ PHIL 210 Introduction to Deductive Logic 1

Computer Science Course (3 credits)

☐ COMP 202 Foundations of Programming
☐ COMP 204 Computer Programming for Life Sciences
☐ COMP 250 Introduction to Computer Science

Statistics Course (3 credits)

☐ PSYC 204 Intro to Psychological Statistics
☐ MATH 203 Principles of Statistics 1
☐ MATH 323 Probability

Linguistics Course (3 credits)

☐ LING 201 Introduction to Linguistics
☐ LING 210 Introduction to Speech Science
☐ LING 260 Meaning in Language

Philosophy Course (3 credits)

☐ PHIL 200 Introduction to Philosophy 1
☐ PHIL 201 Introduction to Philosophy 2
☐ PHIL 221 Intro to the History and Philosopy of Science 2

Neuroscience Course (3 credits)

☐ NSCI 200 Introduction to Neuroscience 1
☐ PSYC 211 Introductory Behavioural Neuroscience

Psychology Course (3 credits)

☐ PSYC 212 Perception
☐ PSYC 213 Cognition

Complementary Courses (30 credits): ☐ **15 credits must be 400+ level**

18 cr. from one of the five areas below. Area: _____

_____ _____ _____ _____ _____ _____

12 cr. chosen from <u>any</u> of the complementary courses below: _____ _____ _____ _____

Notes:

<u>Computer Science</u>

☐ COMP 206 Introduction to Software Systems
☐ COMP 250 Introduction to Computer Science
☐ COMP 251 Algorithms and Data Structures
☐ COMP 280 History and Philosophy of Computing
☐ COMP 302 Programming Languages and Paradigms
☐ COMP 330 Theory of Computation
☐ COMP 345 From Natural Language to Data Science
☐ COMP 360 Algorithm Design
☐ COMP 400 Project in Computer Science
☐ COMP 409 Concurrent Programming
☐ COMP 417 Introduction Robotics and Intelligent Systems
☐ COMP 421 Database Systems
☐ COMP 424 Artificial Intelligence
☐ COMP 445 Computational Linguistics
☐ COMP 451 Fundamentals of Machine Learning
☐ COMP 523 Language-based security
☐ COMP 527 Logic and Computation
☐ COMP 531 Advanced Theory of Computation
☐ COMP 546 Computational Perception
☐ COMP 549 Brain-inspired Artificial Intelligence
☐ COMP 550 Natural Language Processing
☐ COMP 551 Applied Machine Learning
☐ COMP 558 Fundamentals of Computer Vision
☐ COMP 562 Theory of Machine Learning
☐ COMP 579 Reinforcement Learning
☐ MATH 222 Calculus 3
☐ MATH 223 Linear Algebra
☐ MATH 240 Discrete Structures

<u>Linguistics</u>

Any course at the **300, 400 or 500 level** from the department of Linguistics, or from the following:

☐ LING 201 Introduction to Linguistics
☐ LING 210 Introduction to Speech Science
☐ LING 260 Meaning in Language
☐ LING ____ Any course 300, 400 or 500 level

<u>Philosophy</u>

☐ NSCI 300 Neuroethics **(Note: This counts as a <u>Science</u> class)**
☐ PHIL 306 Philosophy of Mind
☐ PHIL 310 Intermediate Logic
☐ PHIL 311 Philosophy of Mathematics
☐ PHIL 341 Philosophy of Science 1
☐ PHIL 354 Plato
☐ PHIL 355 Aristotle
☐ PHIL 360 17th Century Philosophy
☐ PHIL 361 18th Century Philosophy
☐ PHIL 367 19th Century Philosophy
☐ PHIL 411 Topics in Philosophy of Logic and Mathematics
☐ PHIL 415 Philosophy of Language
☐ PHIL 419 Epistemology
☐ PHIL 421 Metaphysics
☐ PHIL 441 Philosophy of Science 2
☐ PHIL 470 Topics in Contemporary Analytic Philosophy
☐ PHIL 474 Phenomenology

Psychology

- ☐ ANTH 440 Cognitive Anthropology
- ☐ MUMT 250 Music Perception and Cognition
- ☐ PSYC 204 Introduction to Psychological Statistics
- ☐ PSYC 211 Introductory Behavioural Neuroscience
- ☐ PSYC 212 Perception
- ☐ PSYC 213 Cognition
- ☐ PSYC 301 Animal Learning & Theory
- ☐ PSYC 302 The Psychology of Pain
- ☐ PSYC 304 Child Development
- ☐ PSYC 305 Statistics for Experimental Design
- ☐ PSYC 310 Intelligence
- ☐ PSYC 311 Human Cognition and the Brain
- ☐ PSYC 315 Computational Psychology
- ☐ PSYC 317 Genes and Behaviour
- ☐ PSYC 318 Behavioural Neuroscience 2
- ☐ PSYC 319 Computational Models - Cognition
- ☐ PSYC 340 Psychology of Language
- ☐ PSYC 341 The Psychology of Bilingualism
- ☐ PSYC 342 Hormones and Behaviour
- ☐ PSYC 352 Research Methods & Lab in Cognitive Psych
- ☐ PSYC 406 Psychological Tests
- ☐ PSYC 410 Special Topics in Neuropsychology
- ☐ PSYC 413 Cognitive Development
- ☐ PSYC 427 Sensorimotor Neuroscience
- ☐ PSYC 433 Cognitive Science
- ☐ PSYC 439 Correlational Techniques
- ☐ PSYC 443 Affective Neuroscience
- ☐ PSYC 470 Memory and Brain
- ☐ PSYC 506 Cognitive Neuroscience of Attention
- ☐ PSYC 513 Human Decision-Making
- ☐ PSYC 514 Neurobiology of Memory
- ☐ PSYC 522 Neurochemistry and Behaviour
- ☐ PSYC 526 Advances in Visual Perception
- ☐ PSYC 529 Music Cognition
- ☐ PSYC 531 Structural Equal Models
- ☐ PSYC 537 Advanced Seminar in Psychology of Language
- ☐ PSYC 538 Categorization, Comm., & Consciousness
- ☐ PSYC 541 Multilevel Modelling
- ☐ PSYC 545 Topics in Language Acquisition

Neuroscience

- ☐ ANAT 321 Circuitry of the Human Brain
- ☐ BIOL 200 Molecular Biology
- ☐ BIOL 201 Cell Biology and Metabolism
- ☐ BIOL 306 Neural Basis of Behaviour
- ☐ BIOL 307 Behavioural Ecology
- ☐ BIOL 320 Evolution of Brain and Behaviour
- ☐ BIOL 414 Invertebrate Brain Circuits and Behaviours
- ☐ BIOL 506 Neurobiology of Learning
- ☐ BIOL 507 Animal Communication
- ☐ BIOL 517 Cognitive Ecology
- ☐ BIOL 530 Advances in Neuroethology
- ☐ BIOL 532 Developmental Neurobiology Seminar
- ☐ BIOL 580 Genetic Approaches to Neural Systems
- ☐ BIOL 588 Advances in Molecular/Cellular Neurobiology
- ☐ CHEM 212 Introductory Organic Chemistry 1
- ☐ NEUR 310 Cellular Neurobiology
- ☐ NEUR 503 Computational Neuroscience
- ☐ NEUR 507 Topics in Radionuclide Imaging
- ☐ NSCI 200 ***OR*** PHGY 209
  Introduction to Neuroscience 1/Mammalian Physiology 1
- ☐ NSCI 300 Neuroethics
- ☐ PHGY 311 Channels, Synapses & Hormones
- ☐ PHGY 314 Integrative Neuroscience
- ☐ PHGY 556 Topics in Systems Neuroscience
- ☐ PSYC 211 Introductory Behavioural Neuroscience
- ☐ PSYC 302 The Psychology of Pain
- ☐ PSYC 311 Human Cognition and the Brain
- ☐ PSYC 317 Genes and Behaviour
- ☐ PSYC 318 Behavioural Neuroscience 2
- ☐ PSYC 342 Hormones and Behaviour
- ☐ PSYC 410 Special Topics in Neuropsychology
- ☐ PSYC 427 Sensorimotor Neuroscience
- ☐ PSYC 433 Cognitive Science
- ☐ PSYC 443 Affective Neuroscience
- ☐ PSYC 444 Sleep Mechanisms and Behaviour
- ☐ PSYC 502 Psychoneuroendocrinology
- ☐ PSYC 506 Cognitive Neuroscience of Attention
- ☐ PSYC 514 Neurobiology of Memory
- ☐ PSYC 522 Neurochemistry and Behaviour
- ☐ PSYC 526 Advances in Visual Perception
- ☐ PSYC 529 Music Cognition
- ☐ PSYT 301 Issues in Drug Dependence
- ☐ PSYT 500 Advances: Neurobiology of Mental Disorders
- ☐ PSYT 515 Advanced Studies in Addiction

Research Course

- ☐ COGS 401 Research Cognitive Science 1 (6 credits)

Honours Course (6 credits) - required course for Honours (6 credits in addition to the 54 credits needed for Interfaculty Program).

- ☐ COGS 444 Honours Research

Minor (18 credits)

B.A. & Sc. Degree Requirements

Minimum Arts and Science cr. in CogSci + Minor combined: ☐ **21 credits in Arts** ☐ **21 credits in Science**

Freshman Requirements

☐ **3 Freshman Science courses:**

_____

_____

_____

☐ **2 Freshman Math courses:**

_____

_____

☐ **3 Freshman Arts courses (in 2 categories):**

H / SS / L _____

H / SS / L _____

H / SS / L _____

(form edited 2023-07-27)