

BSc NEUROSCIENCE

HONORS PROGRAM

FACULTY OF SCIENCE

UPDATED FEBRUARY 2012

This Academic Planning Guide highlights major points only regarding admission and transfer. Students are advised to read the university and RDC calendars, and the Alberta Transfer Guide for other necessary information. Some courses listed may have prerequisites; refer to [Course Descriptions](#). Access this guide online: www.rdc.ab.ca/academic_advising.

THE DIFFERENCE BETWEEN BSC HONORS, SPECIALIZATION, AND GENERAL PROGRAMS AT UOFA

The 4-year **Honors programs** are the most desired route for students continuing to Master of Science (MSc) or Doctor of Philosophy (PhD) and a research or academic career. Honors students focus on their major field of study, and are expected to maintain a higher standard of academic achievement than those in a Specialization or General program.

The 4-year **Specialization programs** do not concentrate on one subject to the same extent as the Honors programs. Specialization students take most of their courses in the major field of study, and are expected to maintain a higher standard of academic achievement than those in a General program. The Specialization degree can provide the background to help you proceed to a higher degree, but its primary function is to provide a comprehensive education at the undergraduate level.

Transfer admission to Honors and Specialization programs requires a minimum course load and GPA in each year of post-secondary study preceding admission. Students wishing to move into these programs must meet the requirements regardless of their original/current program of study.

The 4-year **General program** provides a diverse education in more than one branch of study. Each student must complete a Science major and also a second Science major *or* complete a minor. The minor may be in Science or in Agricultural, Life & Environmental Science, Arts or Business. The General program allows for subsequent transfer to Specialization and Honors programs and may be used to prepare for admission to professional programs.

Neuroscience is a broadly based discipline covering all aspects of brain function. Some major areas are brain development, nerve cells and synapses, sensation and perception, learning and memory, control of movement, animal behavior, cognitive psychology, and disorders of the nervous system. This broad range of topics means that the teaching of neuroscience goes beyond the resources and expertise of a single department. BSc Honors at the UofA is an interdisciplinary program administered by the Division of Neuroscience but taught by professors from a number of different departments within the Faculty of Science and the Faculty of Medicine and Dentistry. The Honors program introduces the major areas of Neuroscience and allows students to explore topics of interest in their final year. A specialization program is not offered in this discipline.

With a BSc Honors degree in Neuroscience, there is a number of employment opportunities as a laboratory technician in industrial, government, and university laboratories. The degree also provides an excellent background for anyone considering a career in medicine or any other health-related discipline. If you aspire to a career as a university professor or research scientist, you would require graduate training to the doctoral level. Graduates of this UofA BSc program are well equipped to enter any neuroscience graduate program in North America.

RDC does not admit to BSc Neuroscience; apply to BSc General. Physics 30 is required for this program.

SUGGESTED COURSE SEQUENCE YEAR 1

FALL	WINTER
PSYC 260 (3)	BIOL 217 (3)
ENGL 219 (3)	ENGL 220 (3)
PHYS 205 (3)	PHYS 226 (3)
CHEM 211 (3)	CHEM 351 (3)
MATH 202 or MATH 203 (3) ¹	MATH 204 or STAT 251 (3)

NOTES:

1. Students with a grade of 70% or higher in Math 31: take MATH 203 instead of MATH 202.

TRANSFER CHECKLIST

1. **Students wishing to pursue an Honors program in Neuroscience** require a minimum GPA of 3.3 on *30 (30 credits) *in each preceding Fall/Winter*. A specialization program is not offered. Courses cannot be deferred to spring/summer terms.
2. **A minimum grade of C-** must be achieved in order for a course to be transferable. However, while courses with a grade of D or F will not transfer, they remain on your transcript and may be used in calculation of your GPA.
3. **Conditional Admission:** If you have higher than average standing in your post-secondary courses, you may be eligible for conditional admission. Transcript deadline: March 15th. See UofA website for more information.
4. **Course Attempts:** Students attending UofA are allowed to attempt a course no more than two times and cannot retake a course in which a passing grade was received. However, UofA honours the decisions of other institutions with respect to their students; if a student attempts a course twice at RDC (withdrawal, failing grade or non-transferable grade), UofA will accept the third attempt (if it is a C- or better) when determining transfer credit.

When calculating the AGPA, UofA will use all grades obtained in the most recent terms containing at least *24, including both a failing/non-transferable grade and a transferable grade in the same course. The first grade of C- or better received in a course is the only grade accepted for that course. Therefore, repeating a course for a higher grade is not advisable. If a student truly believes that he/she needs to repeat a course (in which a transferable grade was already earned) to master the material sufficiently to successfully continue in the program, it is recommended that the student audit the course.

5. **Academic Standing:** If you earn or have earned a GPA below 2.0 in any academic year of post-secondary education you are strongly advised to consult the UofA Calendar and contact the Faculty of Science **now** concerning your future admission to programs in the faculty. See [UofA Calendar](#) 15.15.7(3) and 15.15.7(4) and contact information in *How to Find more Information*.
6. **Application deadline:** May 1st **Transcript deadline for transfer students:** June 15th
7. **Regarding course transfer to the University of Alberta & Augustana Faculty:** When checking course transfer to UofA, take note that courses with **AU** as the first two letters of the course abbreviation in the Alberta Transfer Guide will transfer only to the UofA Augustana Faculty in Camrose. In order for a course to also transfer to other UofA faculties, there must be another entry indicating transfer as a course not beginning with **AU**. See example below.

CMPT 214 = UofA CMPUT 114 (3) OR AUCSC 1xx (3)

CMPT 261 = UofA AUCSC 1xx (3)

CMPT 214 is transferable to all UofA faculties, including Augustana Faculty. CMPT 261 is accepted by Augustana Faculty only and will not transfer to other faculties at UofA.

ALL BACHELOR OF SCIENCE STUDENTS ARE STRONGLY ADVISED TO:

1. Consult [Course Descriptions](#) for possible course prerequisites,
2. Check [Alberta Transfer Guide](#) concerning course credit transfer to UofA, and
3. Consult the [University of Alberta Calendar](#) for admission and program information.

HOW TO FIND MORE INFORMATION

[Science Department](#)

Warren Elgersma, Chairperson
Office: 1607-E Ph: 403-343-4052 warren.elgersma@rdc.ab.ca
http://www.rdc.ab.ca/about_rdc/academic_departments/sciences

[Academic Advising](#)

Academic Advising Centre: Room 1102
advisors@rdc.ab.ca 403-342-3400
http://www.rdc.ab.ca/academic_advising

[RDC Website](#)

<http://www.rdc.ab.ca>

[RDC Timetable](#)

<http://www.rdc.ab.ca/timetable>

[Alberta Transfer Guide](#)

<http://www.acat.gov.ab.ca>

Centre for Neuroscience

<http://www.neuroscience.ualberta.ca> 780-492-5749

[Faculty of Science](#)

<http://www.science.ualberta.ca> 1-800-358-8314

[University of Alberta](#)

<http://www.registrar.ualberta.ca>

PLEASE NOTE:

Be aware you are responsible for ensuring that your registration is complete and appropriate and that your course choices comply with the program to which you have been admitted at RDC and/or to the university to which you wish to transfer.

You are cautioned that any changes to your courses, your major or your transfer destination may adversely affect your transferable credit or admission requirements for future programs. Consult with an academic advisor if you have any questions.

The function of academic advisors is to provide students with information and resources that enable them to make informed decisions relevant to their education. These resources include the RDC Calendar, the Academic Planning Guide for your chosen program and destination university, the Alberta Transfer Guide and the calendar and contact information for your destination university. Academic advisors will assist you in interpreting information from these resources or refer you to your destination university if appropriate. Students in university transfer programs are strongly advised to refer to the calendar of the university to which they wish to transfer and should contact appropriate university departments as required.