# Brain Development-Psychology 450 Mondays 8:30-9:50, Thursdays 10-11:20, Jeffrey Hall, Room 115

Professor: Dr. Beth Kelley Office: Room 351 Humphrey

Office Hours: Wednesdays 5-6 and Thursdays 12-1

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Book: "Developmental Cognitive Neuroscience, Fourth Edition" by Johnson & de Haan

## **Course Description**

This course is designed to be a relatively broad discussion of brain development, with a particular focus on issues such as the developmental course of brain development, how to most effectively measure brain development and the changes in brain functioning, how and when the brain may develop atypically, the role of plasticity and pruning in brain development, and how brain development is related to various aspects of cognitive development. c>Á2¤ä¢ädeä! \*!Ý ã 2 ¤" B \*NJ.KóÞ0:BäÐ3ä) <.À"" NNJ =, .BæÄdæiðaingða

## **Learning Outcomes**

- 1. Construct the developmental course of brain development.
- 2. Evaluate the strengths and weaknesses of the various methods used to assess brain development over time.
- 3. Interpret the roles of plasticity and pruning as they are involved in brain development.
- 4. Compare and contrast the effects of different developmental disorders on the developing brain.
- 5. Appraise current research in the field.
- 6. Be able to argue a position using supporting evidence to back up your assertions.

## **Course Requirements**

1. Questions on the readings-worth 15% (best three of four). Four times during the semester, you will be asked to submit discussion questions on the readings. These questions should be as substantive as possible and make a real attempt to tie the readings/lecture into other things you have learned in psychology and especially developmental psychology. Think big picture, critical thinking, theoretical type of questions. You might also try to think of other ways that the issues under discussion might be addressed, that is, what sort of experimental design might be more appropriate, but please be sure to offer up constructive criticism, i.e., don't just talk about how the methodology in the paper sucks! I am happy to answer questions of clarification, but these will not count toward your mark. Each day's question will be worth 5 marks toward your overall grade and the best three of the four submitted will count toward your grade. These questions are due by noon the day before class so that I can organize

them and get them together for the whole class. The questions will be submitted through OnQ dropboxes and will be run through Turnitin. For the first few classes I will provide the discussion questions to give you an idea of what I am looking for.

2. Attendance and participation-worth 10%. You will be expected to attend every class and be engaged in

review. You will only write two of these article reviews, though there will be a choice of 4 articles. Each of these article reviews will have its own due date listed in the class schedule and will not be accepted late. If you can't get it in on time, you will have to do another one. We will spend the better part of the first class talking about how to read primary source articles with a critical eye and how to situate them within the larger literature. We will also spend some time talking about plagiarism, as many people in last year's class lost a significant proportion of their grades because of (mostly inadvertent) plagiarism.

Each assignment will be worth 30 points and will be multiplied by .5 to be worth 15% of your final grade. It is not mandatory that you do two, but highly suggested. These assignments will be handed into a dropbox in OnQ but will pass through Turnitin.

5. Final Exam-worth 30%. The final exam will be a take-home exam which will be given to you when you come back after fall break. It will consist of short answers and essays that will cover the important themes running throughout the course. This exam will be due by 11:59 pm on Thursday, December 13<sup>th</sup> without exception-if you do not have a doctor's note, 1% of your overall grade (i.e., one mark out of 30) will be taken off each 24 hours that it is late. The paper will be submitted through OnQ dropboxes and will be run through Turnitin.

#### **Grading Summary**

Questions and Comments-15% (best three of four)
Attendance and Participation 10%
Oral Presentation 30%
Article Assignment 15% (best one of two)
Final Exam 30% (due December 13<sup>th</sup> at 11:59 p.m.)

#### **Grading Policy**

The Psychology Grading Policy, "mixed-marking method," is outlined on the following webpage: http://www.queensu.ca/psychology/Undergraduate/psycdepartmentalpolicies/psycgradingpolicy.html

A full list of Departmental Policies, including exam absences, can be found at: http://www.queensu.ca/psychology/Undergraduate/psycdepartmentalpolicies.html

#### **Accommodations for Students with Disabilities**

Queen's University is committed to achieving full accessibility for persons with disabilities. Part of this commitment includes arranging academic accommodations for students with disabilities to ensure they have an equitable opportunity to participate in all of their academic activities. If you are a student with a disability and think you may need accommodations, you are strongly encouraged to contact the Student Wellness Services and register as early as possible. For more information, including important deadlines, please visit the Student Wellness Services website at: http://www.queensu.ca/studentwellness/home

Please contact me by e-mail <u>kelleyb@queensu.ca</u> if you need accommodation for the discussion questions, missing classes, or the final exam.

The Senate Policy on Academic Consideration for Students in Extenuating Circumstances 10. Academic Consideration for Students with Extenuating Circumstances Queen's University is committed to providing

academic consideration to students experiencing extenuating circumstances that are beyond their control and are interfering with their ability to complete academic requirements related to a course for a short period of time, not to exceed three months. Students receiving academic consideration must meet all essential requirements of a course. The Senate Policy on Academic Consideration for Students in Extenuating Circumstances was approved at Senate in April, 2017 (see

http://www.queensu.ca/secretariat/sites/webpublish.queensu.ca.uslcwww/files/files/policies/senateandtrustees/A cademicConsiderationsforExtenuatingCircumstancesPolicyFinal.pdf ) Each Faculty has developed a protocol to provide a consistent and equitable approach in dealing with requests for academic consideration for students facing extenuating circumstances. Arts and Science undergraduate students can find the Faculty of Arts and Science protocol and the portal where a request can be submitted at:

http://www.queensu.ca/artsci/accommodations Students in other Faculties and Schools who are enrolled in this course should refer to the protocol for their home Faculty. If you need to request academic consideration for this course, you will be required to provide the name and email address of the instructor/coordinator. Please use the following: Beth Kelley kelleyb@queensu.ca

### **Academic Integrity**

Academic integrity is constituted by the five core fundamental values of honesty, trust, fairness, respect and responsibility (see <a href="http://www.academicintegrity.org">http://www.academicintegrity.org</a>). These values 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 fou

# October 10-noon-last names H-Morris-discussion question #2 Chapter 5 due October 10-noon-last names Morrison-T- discussion question #2 Richards et al. due

# October 11

Textbook Ch. 5 "Vision, Orienting and Attention"

Richards, J. E., Reynolds, G. D., & Courage, M. L. (2010). The neural bases of infant attention. Current

Bauer, P. J. (2008). Toward a neuro-developmental account of the development of declarative memory. *Developmental Psychobiology, 50,* 19-31.

October 30-11:59 pm. Article Assignment #2 Due