Form E-1-A for Boston College Core Curriculum

Department/Program  __Psychology & Neuroscience____

1) Have formal learning outcomes for the department’s Core courses been developed? What are they? (What specific sets of skills and knowledge does the department expect students completing its Core courses to have acquired?)

Learning Goal 1: Students will acquire a basic understanding of the topics studied and the methodologies used in the field of psychology.

- Learning Outcome 1a: Students will be able to demonstrate a general knowledge of theories, concepts, and findings in at least one subfield of psychology.
- Learning Outcome 1b: Students will understand better some of the different methodological approaches, paradigms, and technologies that have been used to study psychological processes.

Learning Goal 2: Students will gain critical thinking and writing skills and put them to use through the process of scientific inquiry.

- Learning Outcome 2a: Students will be able to consider competing hypotheses and to understand how data can adjudicate among those hypotheses.
- Learning Outcome 2b: Students will be able to evaluate critically contemporary data relating to psychology including media claims and graphical depictions of data.
- Learning outcome 2c: Students will be able to summarize psychological theory and research in concise accurate scientific writing.

Learning Goal 3: Students will acquire a better understanding of how psychological research methods are used to address perennial questions in psychology.

- Learning Outcome 3a: Students will be able to see how psychological study is complementary to other approaches to understanding and reflecting on the human condition.
- Learning Outcome 3b: Students will be able to express how the material learned is relevant to aspects of their daily lives, such as their behaviors and their interactions with others.

Learning Goal 4. Students will acquire skills to help them succeed in their personal and community lives after graduation.

- Learning Outcome 4a: Students will be able to demonstrate an appreciation of the ethical issues involved in human or animal research.
- Learning Outcome 4b: Students will be able to understand better themselves and others.

2) Where are these learning outcomes published? Be specific. (Where are the department’s expected learning outcomes for its Core courses accessible: on the web, in the catalog, or in your department handouts?)
The goals and outcomes are published on the department website and in appropriate handouts distributed by the department.

3) **Other than GPA, what data/evidence is used to determine whether students have achieved the stated outcomes for the Core requirement?** (What evidence and analytical approaches do you use to assess which of the student learning outcomes have been achieved more or less well?)

   1) An anonymous survey of students who take psychology core courses.
   2) Direct evidence based on evaluation of samples of two kinds of student work:
      a) Appropriate papers written by the students.
      b) Appropriate essay questions on exams.

4) **Who interprets the evidence? What is the process?** (Who in the department is responsible for interpreting the data and making recommendations for curriculum or assignment changes if appropriate? When does this occur?)

   Each year the faculty meet to review the results, both qualitative and quantitative, of the analyses and to discuss changes that might be implemented to improve student learning. The faculty also discuss the strengths and weakness of the assessment procedures and consider potential changes in the procedures including the goals and the methods to evaluate them. In addition to the analyses of the department’s core committee, suggestions for improvement in undergraduate teaching are solicited from course instructors and thesis advisers. Analyses also focus on the results of specific changes that had been implemented on the basis of earlier analyses.

5) **What were the assessment results and what changes have been made as a result of using this data/evidence?** (What were the major assessment findings? Have there been any recent changes to your curriculum or program? How did the assessment data contribute to those changes?)

   The results of the major survey were relatively positive. Modal responses on the 5-point scale was a 5 for ten survey items, and a 4 for the remaining 10 of our traditional likert-scale items. However, we view this data with caution primarily because, as in 2020, the number of respondents was substantially lower than in prior years. Also, it was difficult to determine how the varied course delivery formats employed as BC navigated the COVID-19 pandemic affected survey results. In order to glean as much as possible from the data, we ranked the average responses for each item as a within-subjects analysis of what these 65 students felt we were doing relatively well. Students indicated most strongly that our major curriculum helped students master the ability to read a research article critically. “General knowledge of psychology” and “research skills” were rated second and fifth highest, and other items related to evaluating scientific argument and data appeared in the top half of the ranked order. These data suggest that we are succeeding best at Learning Outcomes 1b, 2b, and 1a. The lowest ranked item was related to preparation for graduate programs outside of the field of psychology, which is not surprising. However, the second-lowest ranking was “statistical skills.” We have discussed measures that could improve the retention of statistical training provided in the two required quantitative courses in the majors. “Ability to communicate yourself in writing” was also ranked relatively lowly. We have discussed the challenges faced with providing quality training in writing, particularly in science writing, with the rapidly increasing size of our majors (and the corresponding increase in the size of our course rosters). Finally, we added two new likert-scale items and one free response item to our survey to address issues of diversity, equity, and inclusion. As noted in our 2020 E-1-A, our Department responded to the recent social unrest related to racial inequality by the creation of a Department-wide Diversity and Inclusivity Committee with four working groups. The two likert ‘agreement’ items added to the survey were: 1) The courses that I took in
the Department of Psychology and Neuroscience reflected and/or were relevant to a diverse range of viewpoints and experiences, and 2) The instructors I encountered in the Department of Psychology and Neuroscience respected students’ diverse perspectives, backgrounds, and cultures. Ratings for these items were 4.16 and 4.30, respectively (between Agree and Strongly Agree). These rankings are toward the lower end of rankings of our other 20 items, suggesting there is more work to be done. In 2021, our Department will continue to promote diversity in course content, and enact practical change such as entering more formally as a partner in the Biology Department’s Gateway program, providing one first-year advisor and two new discussion sections to the program.

6) Date of the most recent program review. (Your latest comprehensive departmental self-study and external review.)

Fall 2011