To be adopted:

Proposed Changes to the B.A. and B.S. Degrees in Neuroscience

PRESENT:

Major Requirements

1. Neuroscience Core (65-70 units; satisfies the Life Sciences Core required for some majors in the College of Natural and Agricultural Sciences). Up to 12 units of upper-division life sciences courses (for this major, courses from the departments of Biochemistry, Biology, Cell Biology and Neuroscience, and Entomology) not being used to satisfy the core may be taken prior to completion of the core; permission from the program chair or the program chair’s designate is required to take upper-division units in excess of these 12 units.
   a) BIOL 005A, BIOL 05LA, BIOL 005B, BIOL 005C (BIOL 002 and BIOL 003 may be substituted for BIOL 005A, BIOL 05LA, and BIOL 005B with advisor’s approval.)
   b) PSYC 011 or STAT 040 or STAT 100A or STAT 105
   c) MATH 009A (or MATH 09HA) and MATH 009B (or MATH 09HB)
   d) CHEM 001A (or CHEM 01HA), CHEM 001B (or CHEM 01HB), CHEM 001C (or CHEM 01HC); CHEM 112A, CHEM 112B, CHEM 112C
   e) PHYS 002A, PHYS 002B, PHYS 002C, PHYS 02LA, PHYS 02LB, PHYS 02LC; or PHYS 040A, PHYS 040B, PHYS 040C
   f) BCH 100 or BCH 110A

2. Upper-division requirements
   a) First Tier (14 units)
      (1) CBNS 106
      (2) CBNS 120/PSYC 120
      (3) CBNS 120L/PSYC 120L
      (4) CBNS 124/PSYC 124

PROPOSED:

Major Requirements

1. [no change]
   a) [no change]
   b) [no change]
   c) MATH 008B or MATH 009A or MATH 09HA; MATH 009B or MATH 09HB
   d) CHEM 001A or CHEM 01HA, CHEM 001B or CHEM 01HB, CHEM 001C or CHEM 01HC; CHEM 112A, CHEM 112B, CHEM 112C
   e) [no change]
   f) [no change]

2. [no change]
   a) [no change]
b) Second Tier (at least 12 units for the B.A. or at least 20 units for the B.S.) BIOL 178; CBNS 101, CBNS 116, CBNS 121, CBNS 125/PSYC 125, CBNS 126/PSYC 126, CBNS 127/PSYC 127; PSYC 129

b) Second Tier (at least 12 units for the B.A. or at least 20 units for the B.S.) BIOL 178; CBNS 101, CBNS 116, CBNS 121, CBNS 123, CBNS 125/PSYC 125, CBNS 126/PSYC 126, CBNS 127/PSYC 127; PSYC 129

Third Tier (additional units to reach a total of 36 units for the B.A. or 52 units for the B.S.)
Select from upper-division courses listed under Neuroscience Core, First Tier, or Second Tier above not used to satisfy those requirements, and the additional courses listed below. The combined number of units taken under First Tier, Second Tier, and Third Tier must total either 36 if the B.A. is sought or 52 if the B.S. is sought.
BCH 102, BCH 110B, BCH 110C; BIOL 100/ENTM 100, BIOL 102, BIOL 105, BIOL 107A, BIOL 108, BIOL 109, BIOL 110, BIOL 151, BIOL 160, BIOL 161A, BIOL 161B; BIOL 162/ENTM 162; BIOL 171, BIOL 173/ENTM 173, BIOL 175, BIOL 185P; up to 9 units from CBNS 191, CBNS 194, CBNS 197 and/or CBNS 199; CS 170; PHYS 139L; PSYC 132, PSYC 134, PSYC 135, ANTH 146/PSYC 146

[no change]

Note: No courses other than those listed may be used in the major unless specifically approved by the program chair or the program chair's designate.

JUSTIFICATION:

1. c): With the deletion of MATH 003, the Mathematics Department's newly created MATH 008B will offer students who successfully complete MATH 008A the opportunity to learn the trigonometry while covering the material of MATH 009A. Students who complete MATH 008B may continue to MATH 009B.

1. d): Removed unnecessary punctuation.

2. b): New courses CBNS 123 (Brain Control of Bodily Functions) and PSYC 136 (Topics in Cognitive Neuroscience) contain substantial overlap with the area of neuroscience, and are appropriate for this category.
2. c): Deleted First Tier because its inclusion no longer applies.
BCH 120 (General Biochemistry Related to Biomedical Sciences) and CBNS 169 (Human Embryology) are existing courses that have been revisited and are deemed to contain material related to the area of neuroscience. These courses are appropriate for this category.

APPROVALS:

Approved by the Neuroscience Committee in Charge: October 31, 2005
Approved by the faculty of the Department of Psychology: November 1, 2005
Approved by the faculty of the Department of Cell Biology and Neuroscience: November 2, 2005
Approved by the Executive Committee of the College of Humanities and Social Sciences: 12/1/05
Approved by the Executive Committee of the College of Natural and Agricultural Sciences: November 29, 2005
Approved by the Committee on Educational Policy: January 17, 2006