Term Information

Effective Term	Autumn 2015
Previous Value	*Summer 2013*

Course Change Information

What change is being proposed? (If more than one, what changes are being proposed?)

The course is being changed for 3 to 2 credit hours.

What is the rationale for the proposed change(s)?

The new graduate interdisciplinary specialization in Cognitive and Brain Sciences includes a 2-credit Proseminar in Cognitive Science as one of its requirements. Now that the specialization has been approved, the proseminar needs to be changed from 3 credits to 2 credits to match the approved specialization program and to be consistent with the cross listing departments.

What are the programmatic implications of the proposed change(s)?

(e.g. program requirements to be added or removed, changes to be made in available resources, effect on other programs that use the course)?

None

Is approval of the requrest contingent upon the approval of other course or curricular program request? No

Is this a request to withdraw the course? No

General Information

Course Bulletin Listing/Subject Area	Speech and Hearing Science
Fiscal Unit/Academic Org	Speech & Hearing - D0799
College/Academic Group	Arts and Sciences
Level/Career	Graduate, Undergraduate
Course Number/Catalog	5891
Course Title	Proseminar in Cognitive Science
Transcript Abbreviation	Prosem Cog Sci
Course Description	Provides an in-depth examination of the interdisciplinary perspective.
Semester Credit Hours/Units	Fixed: 2
Previous Value	*Fixed: 3*

Offering Information

Length Of Course	14 Week, 7 Week, 4 Week (May Session), 12 Week (May + Summer)
Flexibly Scheduled Course	Never
Does any section of this course have a distance education component?	No
Grading Basis	Letter Grade
Repeatable	Yes
Allow Multiple Enrollments in Term	No
Max Credit Hours/Units Allowed	4
Previous Max Credit Hours/Units Allowed	*6*
Max Completions Allowed	2
Course Components	Seminar
Grade Roster Component	Seminar
Credit Available by Exam	No

Admission Condition Course	No
Off Campus	Never
Campus of Offering	Columbus

Prerequisites and Exclusions

Prerequisites/Corequisites	Prereq: Permission of instructor.
Exclusions	

Cross-Listings

Cross-Listings	Cross-listed in CSE, Ling, Philos, and Psych.

Subject/CIP Code

Subject/CIP Code	16.0102
Subsidy Level	Doctoral Course
Intended Rank	Junior, Senior, Masters, Doctoral

Requirement/Elective Designation

The course is an elective (for this or other units) or is a service course for other units

Course Details

Course goals or learning objectives/outcomes

- Define the roles and functions of language in human cognition.
- Define the roles and functions of speech perception in human cognition.

Content Topic List

- Human cognition
- Human language
- Speech perception

Attachments

- SYLLABUS_5891_2cr.pdf: Syllabus

(Syllabus. Owner: Ellawadi,Allison Bean)

Comments

- Change needed *(by Fox,Robert Allen on 04/15/2015 11:06 AM)*

Workflow Information

Status	User(s)	Date/Time	Step
Submitted	Ellawadi,Allison Bean	04/15/2015 10:40 AM	Submitted for Approval
Revision Requested	Fox,Robert Allen	04/15/2015 11:06 AM	Unit Approval
Submitted	Ellawadi,Allison Bean	04/15/2015 11:43 AM	Submitted for Approval
Approved	Fox,Robert Allen	04/15/2015 11:48 AM	Unit Approval
Approved	Haddad,Deborah Moore	04/15/2015 12:10 PM	College Approval
Pending Approval	Nolen,Dawn Vankeerbergen,Bernadette Chantal Hanlin,Deborah Kay Jenkins,Mary Ellen Bigler Hogle,Danielle Nicole	04/15/2015 12:10 PM	ASCCAO Approval

Ohio State University

Center for Cognitive and Brain Sciences

CSE 5891, LING 5891, PHILOS 5891, PSYCH 5891, SPH/HRNG 5891

Proseminar in Cognitive Science

Brief Description: This course provides an in-depth examination of cognitive science from an interdisciplinary perspective. Various aspects of cognition will be considered, including visual perception, speech perception, language processing, conceptual development and the philosophy of mind. Each of these topics will be covered in a multi-week sequence. During the first week, students will be provided with a general introduction of the relevant topic area. This will be followed by one or more specialized presentations by experts from the OSU faculty.

Objectives:

1) Provide an introduction to the central issues of cognitive science.
2) Provide a representative sample of how these issues are addressed by researchers in different disciplines.

Supplemental Materials: Papers from the literature.

Course Evaluation: Students will be required to submit a project or term paper on one of the five topic areas (i.e., visual perception, linguistics, computer vision, speech/hearing or philosophy). For graduate students, the paper must be in an area that is outside of your own discipline. They will also be required to submit a 1-2 page summary of what they have learned from each of the outside speakers. The final grade will be based 75% on the term project and 25% on the module summaries and class participation.

Credit: 2

Call Numbers:

CPTR/INF	TBA
IND ENG	TBA
LING	TBA
PHILOS	TBA
PSYCH	TBA
SPH/HRNG	TBA

Day/Time: TBA

Room/Bldg: TBA

Contact Information:

TBA

Course web site

Powerpoint files and course readings can be downloaded from Carmen

Topic		Speaker, Department

Perceptual Development

Readings:
Brown, A. M., Dobson, V., Maier, J. 1987. Visual acuity of human infants at scotopic, mesopic and photopic luminances. Vision research. 27, 1845-58.

Brown, A. M. & Lindsey, D. T. (2009) Contrast Insensitivity: The Critical Immaturity inInfant Visual Performance. Optometry and Vision Science, 86, 572–576

Nittrouer, S. & Pennington, B.F. (2010). New approaches to the study of childhood language disorders. Current Directions in Psychological Science, 19, 308-313.

Nittrouer, S. (2002). From ear to cortex: A perspective on what clinicians need to understand about speech perception and language processing. Language, Speech, and Hearing Services in Schools, 33, 237-251.

Week 1	A General Introduction to Spatial Vision	James Todd, Psychology
Week 2	Why don't babies see very well?	Angela Brown, Optometry
Week 3	Speech development research	Susan Nittrouer, Otolaryngology

Cognitive Neuroscience

Readings:
Cunningham, W. A. & Brosch, T. (2012). Motivational salience: Amygdala tuning from traits, needs, values, and goals. Current Directions in Psychological Science, 21, 54–59.

Cunningham, W. A., Van Bavel, J. J., & Johnsen, I. R. (2008). Affective flexibility: Evaluative processing goals shape amygdala activity. *Psychological Science, 19*, 152-160.

Opfer, J. E., & Siegler, R. S. Development of Quantitative Thinking.

Walther, D. B., Chaib, B., Caddigan B., Beck D. M. and Fei-Feib, L. (2011) Simple line drawings suffice for functional MRI decoding of natural scene categories. Proceedings of the National Academy of Science, 108, 9661–9666.

Week 4	A General Introduction to fMRI	James Todd, Psychology
Week 5	The neuropsychology of emotion	William Cunningham, Psychology
Week 6	The neural representation of natural scene categories	Dirk Bernhardt-Walther, Psychology
Week 7	Development of numerical cognition	John Opfer, Psychology

Language

Readings:
Munson, B., Edwards, J., & Beckman, M. E. (2012). Phonological representations in language acquisition: Climbing the ladder of abstraction. In A. C. Cohn, C. Fougeron, M. K. Huffman, eds., *Handbook of laboratory phonology*, pp. 288-209. Oxford University Press.

Dahee, K., Stephens, J. D. W. & Pitt, M. A. (1012) How does context play a part in splitting words apart? Production and perception of word boundaries in casual speech. Journal of Memory and Language, 66, 509-529.

D.L. Wang and G.J. Brown: "Fundamentals of computational auditory scene analysis," In D.L. Wang and G.J. Brown (eds.): "Computational auditory scene analysis: Principles, algorithms, and applications," Chapter 1, pp. 1-44, Wiley-IEEE Press, 2006.

Week 8	A General Introduction to Speech and language	James Todd, Psychology
Week 9	Phonological representations in language acquisition	Mary Beckman, Linguistics
Week 10	Spoken word recognition	Mark Pitt, Psychology
Week 11	Cocktail party problem as binary classification	Deliang Wang, CSE

Memory

Readings:
Dennis, S. (2012) "Semantic memory: Computational perspectives". In H. Pashler (Ed.) Encyclopedia of the Mind. London: Sage publications. In press.

Sederberg P.B., Howard M.W., and Kahana M.J. (2008) A context-based theory of recency and contiguity in free recall. *Psychological Review*, *115*, 893-912.

Week 12	The psychology of memory	James Todd, Psychology
Week 13	Models of recognition memory	Simon Dennis, Psychology
Week 14	Computational memory	Per Sederberg, Psychology