

# **PSYCHOLOGY**

## **UNDERGRADUATE PROGRAM**

### **STUDENT HANDBOOK**

**2010-2011**



**UNIVERSITY OF CALIFORNIA, BERKELEY**

**DEPARTMENT OF PSYCHOLOGY**

## TABLE OF CONTENTS

<b>INTRODUCTION</b> .....	3
<b>THE MAJOR PROGRAM</b> .....	4
Lower Division Requirements .....	4
Upper Division Requirements .....	4
<b>POLICIES GOVERNING THE MAJOR</b> .....	5
Applying to the Major .....	5
Note to pre-major students .....	5
Registration in Upper Division Psychology Courses .....	6
Granting Exceptions/Substitutions in the Major .....	6
Grading .....	6
Incomplete Grades.....	7
<b>RESEARCH OPPORTUNITIES IN PSYCHOLOGY</b> .....	8
Independent Study .....	8
Summer Research Opportunities.....	9
Katherine Craig Swan Undergraduate Research Award and Endowment in Psychology .....	9
Campus wide Research Opportunities .....	9
<b>HONORS PROGRAM</b> .....	10
Courses .....	10
Application.....	10
Committee for the Protection of Human Subjects Approval .....	11
Faculty Sponsor.....	11
Deadline.....	11
Sample Thesis Title Page.....	12
<b>STUDENT ORGANIZATIONS</b> .....	13
Association of Psychology Undergraduates (APU).....	13
Psi Chi.....	13
Psychology at Berkeley (Undergraduate Journal).....	13
American Psychological Association (APA) Student Affiliates Program.....	13
<b>ADVISING</b> .....	14
Student Responsibility .....	14
Peer Advising.....	14
Faculty Advising .....	14
College of Letters & Science Office of Undergraduate Advising (OUA).....	15
Tele-BEARS & Advisor Codes .....	15
Change in Course Schedule .....	15
Bulletin Boards .....	15
<b>OTHER CAMPUS STUDENT SERVICES</b> .....	16
<b>GRADUATION</b> .....	17
<b>APPENDIX A: THE FACULTY</b> .....	18
<b>APPENDIX B: PSYCHOLOGY COURSE DESCRIPTIONS</b> .....	21

## INTRODUCTION

Psychology represents an extremely broad discipline, ranging from the study of behavior of the simplest of organisms to the behavior of humans and groups of humans in complicated situations. Its “levels of analysis” span cells, brains, individuals, families, communities, and other large social groups. The Psychology major attempts to give basic and well-rounded coverage of most of the principal subfields of the broad field of psychology. The areas covered include social, developmental, behavioral neuroscience, comparative, industrial, clinical, and cognitive psychology, as well as learning (human and animal), perception, personality, and psycholinguistics.

The fact that psychology is so diverse means, however, that all areas of study cannot be represented within the expertise or primary interest of a single faculty or department. Our emphasis is on empirical research and theoretical analysis of fundamental aspects of animal and human behavior. Because, in our experience, students who are interested in the major often have been exposed to introductory courses with different emphases than are present at Berkeley—for example, those with strong orientations to counseling rather than basic science—prospective majors are strongly urged to examine closely our upper division course offerings to see if they are consonant with their interests in psychology.

*The major serves three purposes:*

- (1) For the liberal arts student, the study of psychology provides an avenue for increased self-understanding and insight into the behavior of others. The objective study of behavior is one of the major themes of intellectual history of the last hundred-plus years.
- (2) For students preparing for training in such professions as medicine, law, education, or business, psychology provides important basic knowledge and principles.
- (3) For students who plan on pursuing graduate work in psychology, the undergraduate major seeks to establish a sound foundation of research principles and knowledge of a variety of content areas.

## THE MAJOR PROGRAM

The primary goal of the major is to ensure that the student becomes aware of the diversity within the discipline and of the interrelationships among the different sub-areas of Psychology.

### Lower Division Requirements

<u>Prerequisites</u>	<u>Courses and Options</u>
GENERAL PSYCHOLOGY	<b>One</b> course, Psychology 1 (or AP Psychology with a score of 4 or 5).
EVOLUTION	<b>One</b> course from the following: Molecular & Cell Biology 41 or 41X; Anthropology 1; Integrative Biology 35AC.
BIOLOGICAL SCIENCE	<b>Two</b> courses from <i>any</i> departments as follow: Molecular & Cell Biology 31, 32, 50, 61, 63, 64; Biology 1A, 1B, 11; Integrative Biology 31 (AP Biology with a score of 4 or 5 will satisfy <b>one</b> Biological Science prerequisite).
SOCIAL SCIENCE	<b>Two</b> courses from two different departments: Anthropology 3 or 3AC; Sociology 3 or 3AC; Linguistics 5; Political Science 1, 2, or 4. (AP U.S. Government <b>or</b> AP Comparative Government with a score of 4 or 5 will satisfy <b>one</b> Social Science prerequisite. The second course may not be in Political Science).
QUANTITATIVE	<b>One</b> course from: Statistics 2, 20, or 21; Math 54 or 55 (AP Statistics with a score of 4 or 5 will satisfy this prerequisite).

### Upper Division Requirements

RESEARCH & DATA ANALYSIS	Psychology 101 (This course must be taken immediately after admission to the major.)
THREE "DECADE" COURSES	Three courses from Psychology 110, 120, 130, 140, 150, 160, or 180 (these are introductory courses in the areas of specialization covered by the Department).
FOUR ELECTIVE COURSES	Four upper-division psychology courses numbered 104-182 and with approval, Psychology 192. Psychology 192 is reserved for new courses and may be taken multiple times (assuming different courses). <b>Note:</b> Psychology 194, 195, 197, 198, and 199 may not be counted as electives.
BREADTH	The Decades and electives must include one course from each of the four sub-areas represented in the Department organization: Cognition, Brain and Behavior (110-129); Clinical (130-139); Developmental (140-149); and Social/Personality (150-169, 180)

## POLICIES GOVERNING THE MAJOR

### **Applying to the Major**

Psychology is a capped major, which means that there are more students who are interested in declaring the major than the Department has room to accommodate them. The Department accepts a limited number of students to the major each year as a result. We guarantee admission to all students who apply to the major and meet the following criteria: (1) complete all seven prerequisite courses; (2) have a 3.2 GPA in prerequisite courses; (3) declare the major by their 5<sup>th</sup> semester or *prior* to the accumulation of 80 semester units (or in the case of transfer students, declare the major no later than their first semester at Berkeley); and (4) submit the application to the department by the posted deadline. If any of the above criteria are not met, students may still be admitted to the major; however, admission to the major is not guaranteed.

Major applications will only be processed once all prerequisite courses are completed and final grades posted. This may mean that you will not technically be admitted to the major until the beginning of the following semester. Be sure to place your name on the waitlists for courses you wish to take the following semester (AND indicate on the major application form your TWO preferred Psychology courses; unfortunately, Fall courses are not guaranteed for Summer applicants), as you will be enrolled from the waitlist ONCE your application has been approved or you may register directly in the course during Phase II, whichever comes first. To check the status of your application, please log on to Bear Facts.

Applications to the Major are available on the Psychology Department website, (<http://psychology.berkeley.edu/undergrad/index.html>) and the Psychology Majors bSpace page (<http://bspace.berkeley.edu/>). Please read the instruction page that accompanies the major application. *Incomplete applications will not be considered for admission.* Transfer students are encouraged to submit applications during CalSO if all prerequisites are satisfied or will be satisfied by the end of Summer (or Fall for Spring admits). If prerequisites are not satisfied, please speak with an Undergraduate Advisor to discuss ways in which to complete all courses by the end of the first semester.

The Student Services Office does not accept applications from non-transfer students prior to their third semester at UCB. It is far more important to spread out your prerequisite courses and do well academically than to rush into applying for the major. Remember that as long as you declare prior to the completion of 80 semester units (not including AP credit or units earned in high school), you will be guaranteed admission with a 3.2 GPA in your prerequisite courses.

### **Note to Pre-major Students**

Students who intend to declare the Psychology major are encouraged to visit the Student Services Office periodically during each semester to consult with the Undergraduate Advisor and Peer Advisors, to obtain departmental literature, and to review the undergraduate bulletin boards for current information. Pre-majors are urged to participate in departmental student activities and events, such as:

- Join the Psychology Majors bSpace (<http://bspace.berkeley.edu/>) to receive email notifications about psychology related events and opportunities.
- Enroll in the Student Success at Cal Part I DE-Cal course periodically offered by the Association of Psychology Undergraduates (APU).
- Become a fan of the UC Berkeley Psychology Page on Facebook (<http://www.facebook.com/berkeleypsych>) to meet other UCB folks interested in Psychology.
- Take a freshman or sophomore seminar with a faculty member from the Psychology Department.

- Attend Psychology Major Orientations held once per semester.

### **Registration in Upper Division Psychology Courses**

Psychology majors are given priority to ALL upper-division psychology courses. During Phase I, only *declared* Psychology majors will have the ability to register for upper division Psychology courses (in addition to several seats that have been reserved for approved majors in select courses). Towards the end of Phase II, seats may open for non-majors and the waitlist will be processed automatically unless an instructor decides to manually monitor his/her waitlist. Be sure to attend the first day of class to learn how “Adds” will be determined for that class.

### **Granting Exceptions/Substitutions in the Major**

The Department will consider requests for exceptions in terms of either: (a) courses and criteria required for admission to the major; or (b) the work done to complete the major. If a student would like to request an exception, s/he must complete the *Exception to the Major Petition* (available on the Department website and bSpace). Exceptions related to admission to the major must be submitted with the *Application to the Major* by the application deadline and will be reviewed during the month after the deadline. Exceptions related to completion of the major will be reviewed shortly after submission.

Please note that if you are requesting consideration for courses taken at another institution or during a term abroad, you will be asked to provide a detailed course description and course syllabus. A *maximum* of TWO Psychology courses from another institution may apply toward the major. Courses completed abroad must be the equivalent of upper division courses in the Psychology Department or a closely related discipline at the host institution.

The following courses may be used towards upper division electives without the submission of a Petition:

- Anthropology 149: Psychological Anthropology
- Economics 119: Psychology and Economics
- Legal Studies 181: Psychology and Law
- MCB 165: Molecular Neurobiology (cannot also use Psych 119)
- Sociology 150 or 150A or 150B: Social Psychology (counts as Decade; cannot also use Psych 160)
- UGBA 105: Introduction to Organizational Behavior (counts as Decade; cannot also use Psych 180)

**Note:** All courses completed for the major will apply toward the major GPA, including EAP courses. A maximum of TWO courses of UCB non-Psych courses and EAP/off-campus courses may apply to the major.

### **Grading**

*Passed/Not Passed Option*

**All** prerequisite courses and upper-division courses that apply to the major must be taken on a letter grade basis.

*Minimum Grade Point Average in the Major*

The University requires that students maintain a 2.0 grade point average in all courses (lower and upper division) required in the major program, as well as a 2.0 grade point average in all upper division courses that apply toward the major. Any student who does not meet the minimum grade point average in the major will be placed on probation.

### ***Incomplete Grades***

An Incomplete grade is an agreement between the student and instructor indicating that the student's work in a course has been of passing quality but is not completed due to circumstances beyond the student's control. An Incomplete grade does not count in the GPA nor are units counted towards graduation until the course has been completed and the final grade posted on the official transcript. If an Incomplete grade is not completed by the deadline, it converts to an F which does count towards the GPA.

If you will be assigned an Incomplete in a Psychology course, your instructor must complete the *Incomplete Coursework Contract* form and leave it on file in the Student Services Office. This form is a vital document that tracks exactly what you need to do in order to receive a final grade in the course, which is especially helpful in case your instructor is not available in the future.

The removal of an Incomplete grade is the student's responsibility. Once work for the Incomplete is finished, the student must fill out the *Petition to Remove an Incomplete Grade*, have the form stamped by the Registrar after paying a \$5 fee, and submit the form to the instructor to assign the grade and submit to the Registrar.

## RESEARCH OPPORTUNITIES IN PSYCHOLOGY

By their junior year, students are generally prepared to undertake an independent research project of original design under the supervision of a professor. This may take the form of preparation for a senior Honors thesis, which should begin in the fall of the junior year if at all possible. Before reaching that point, however, many students prefer to have experience working on a research project designed by either a faculty member or a graduate student working in a particular faculty lab. Information on departmental research opportunities will be posted on the bulletin board outside the Psychology Student Services Office and distributed via email to the Psychology listserv at the beginning of the semester. Generally Psychology 199 course credit is available for research assistant positions. Over 200 students per semester are enrolled through the Department in research for credit.

### **Independent Study**

The Department of Psychology offers four types of independent study courses: Psychology 99, 197, 198, and 199. Descriptions of the courses are listed below. Students interested in enrolling in one of these courses should come by the Student Services Office at the beginning of the semester, obtain an application, and refer to the list of studies on the website. The faculty will be available during regularly scheduled office hours to discuss independent study enrollment. An application form should be filled out by the student, signed by both the student and the instructor, and returned to the Student Services Office by the University deadline to add a course (generally the Friday of Week 3). Upon receipt of the completed application, the Undergraduate Advisors or Peer Advisors will give the student the course control number to be entered on Tele-BEARS.

- 99. Supervised Independent Study and Research**, 1-3 units, P/NP. Intended for freshmen and sophomores who wish to undertake a program of individual inquiry on a topic in Psychology. A final may be required.
- 197. Field Studies in Psychology**, 1-3 units, P/NP. Groups or individual students may volunteer or intern in an agency whose program relates to the discipline of Psychology. A final paper may be required. Although the Department does not place students in agencies, the Undergraduate Bulletin Board may have posters from agencies seeking volunteers and announcements may be sent out via the listserv.
- 198. Directed Group Study**, 1-3 units, P/NP. Group study of a selected topic or topics in Psychology. Generally this is a student-initiated seminar course (i.e. DE-Cal) that requires prior planning. If you are interested in planning such a course, you should begin the semester prior to enrollment. A final paper may be required.
- 199. Supervised Independent Study and Research**, 1-3 units, P/NP. Designed for junior and senior students interested in carrying out their own research (which may be linked closely to the research program of the mentoring faculty member or grad student) or review of the literature on a topic in Psychology. Research assistants normally receive Psych 199 credit. A final paper may be required.

### *Unit Limits*

1. Students enrolled in 197, 198, and 199 courses must have completed at least 60 semester units of undergraduate study and must be in good academic standing (2.0 grade point average or better).
2. Credit for 97, 98, 99, 197, 198 and 199 courses in any department in a single term may aggregate no more than 4 units.
3. No more than a total of 16 units of courses numbered 97, 98, 99, 197, 198, and 199 in any department may be used to meet the requirements for a Bachelor's degree.

### *Unit Designation*

For each of the courses 97, 98, 99, 197, 198, 199 a student must be involved in three hours of work per week for one unit of credit (maximum of nine hours per week for three units, for any one of these courses).

### **Summer Research Opportunities**

Research and field work opportunities are available during the summer months at Berkeley and other institutions. Several universities have special research programs in Psychology for junior and senior Psychology majors. Recent examples have included research in language acquisition at Clark University, and cognition and communication in marine mammals at the University of Hawaii.

### **Katherine Craig Swan Undergraduate Research Award and Endowment in Psychology**

The Swan family has generously donated funds in memory of Katherine Craig Swan, a 1932 Berkeley Honors graduate in Psychology, which will support undergraduate research in the Psychology Department. The total budget of the proposal cannot exceed \$500. This money will be awarded to the most deserving applicants based on an annual competition. The faculty of the Undergraduate Awards Committee will review these proposals and award funding to the best proposals. Swan Research Awards will be acknowledged at the annual Commencement Ceremony of the Psychology Department.

### **Campus wide Research Opportunities**

The Office of Undergraduate Research's web site is designed to highlight the diverse research opportunities available to undergraduates at Berkeley. You can access it through: <http://research.berkeley.edu>

## HONORS PROGRAM

### **Overview of the Honors Program**

Students who expect to graduate with a 3.5 grade point average in the Psychology major and a 3.3 overall UC grade point average may apply for admission to the Honors program. Students must identify a faculty sponsor to supervise a thesis project. Although the Honors project is completed during the student's final year, most of the students in the program begin to prepare during their junior year, either by working as a research assistant under a potential sponsor or by contacting a potential sponsor to begin developing a project.

The award of departmental Honors is contingent upon submission of a thesis of high quality, based upon independent study with a member of the Psychology Department's faculty and marked by satisfactory completion of Psychology H195A-B. Evaluation of the thesis is the primary responsibility of the faculty sponsor, as well as a second reader as assigned by the Chair or Vice Chair. The sponsor and second reader will decide whether the thesis is of Honors quality and if so, which level of Honors is to be assigned: *Honors* or *Highest Honors* (these designations are subject to change). Departmental Honors designations will be included in the student's permanent UC Berkeley record. The Student Services Office maintains a file of completed Honors theses, which are available for review.

### **Courses**

Students are required to enroll in Psychology H195A-B during their thesis year. Many honors students also enroll in Psychology 199 during their junior year as part of the preparation for a thesis project.

#### *Psychology H195A-B*

Psychology H195A-B is offered for 1-3 units per semester and is **mandatory** in order to receive Honors in the major. The course is sequential with a grade of *In Progress* for the "A" portion and the final grade assigned for both semesters at the end of the "B" portion.

#### *Psychology H194A-B*

We strongly suggest that Honors students also concurrently enroll in Psychology H194A-B (2 units per semester), the Honors Seminar, in their senior year, as this course provides excellent supplemental background and guidance for preparing the thesis. However, enrollment in H194 is **not mandatory** in order to obtain Honors. Students may enroll in H194A only in the fall; H194B can be taken in the spring only if H194A has been taken in the fall. During the fall semester, the seminar will concentrate on issues of research design, ethics, and data analysis using statistical packages. The spring semester will focus on oral and written presentations of the thesis projects and feedback on thesis drafts.

### **Application**

Students must complete an application to enroll in Psych H195A-B units and Psych H194A-B. Applications may be obtained on the Department website: <http://psychology.berkeley.edu/undergrad/honors.html>

On the Psychology H195A-B application the student will outline the thesis proposal and submit it for approval to one of the full-time faculty of the Department who will serve as their faculty sponsor. The signed application is to be returned to the Student Services Office. Upon approval, a course control number will be given to the student to enroll in the course through Tele-BEARS. Applications should be submitted by the University deadline to add courses for both semesters of enrollment (generally the Friday of Week 3).

***Committee for the Protection of Human Subjects Approval***

Students who are planning to use human subjects for the Honors thesis must apply for approval from the Committee for Protection of Human Subjects at the end of the junior year. This process can take up to six months. Faculty must be consulted for help in making the request.

***Faculty Sponsor***

Students should maintain close contact with their faculty sponsor to ensure clear communication on direction of the thesis project and expectations of the professor. It would be wise for the student to submit a draft of the honors thesis to the instructor mid-semester of enrollment in H195B for criticism and comments before the final copy is produced.

***Content***

The honors thesis may be an original, empirical study of a topic in psychology, or a critical analysis of the work of other researchers on a topic in psychology chosen by the student.

***Style***

The thesis should be organized and written according to APA style, found in the APA Publication Manual. The thesis must include an abstract of approximately 200 words. The title page should follow the format as displayed on Page 11.

***Deadline***

The thesis should be submitted electronically via the Psychology Honors bSpace page no later than two weeks prior to the end of the semester in which the student files to graduate. It will then be distributed to the faculty sponsor and second reader. One bound copy of the thesis must be submitted simultaneously to the Student Services Office for archiving. If the student is not able to meet the above noted deadline date for submission of the thesis, s/he should confer with the Student Services Office.

**Sample Thesis Title Page**

**How I Learned to Be a Bear: A Critical Analysis**

by

Oski Bear

A thesis submitted in satisfaction  
of the Honors Program option in pursuit of the

Bachelor of Arts

in

Psychology

in the

COLLEGE OF LETTERS AND SCIENCE

of the

UNIVERSITY OF CALIFORNIA, BERKELEY

Faculty sponsor in charge:

Professor Edward Chace Tolman

May 2010

## STUDENT ORGANIZATIONS

The Psychology Department has a few very active student organizations. Students are strongly encouraged to participate in the activities of all groups.

### ***Association of Psychology Undergraduates (APU)***

Founded in 1969, the APU is a student organization whose goals are to facilitate student-to-student and student-to-faculty interaction and to provide a forum for student ideas. Its goals are to assist undergraduates with all aspects of the major, from an introduction for freshmen considering the major, to navigating the graduate school admission process for seniors. APU will assist you in understanding the various aspects of the Psychology Department and the major, keep you informed of current events, introduce you to professors and graduate students, and provide you with peer mentors and peer counselors. Additionally, APU keeps you informed of events within the Department, as well as possibilities for research careers in Psychology. Information about events and activities is available via the APU mailing list and Student Services Office listserv.

For more information please email: [calxapu@gmail.com](mailto:calxapu@gmail.com)

### ***Psi Chi***

The Berkeley Chapter of Psi Chi, the National Honors Society in Psychology, is located in the APU Office, 3330 Tolman Hall. Students who have achieved an honors level grade point average overall, as well as in the major (GPA of at least 3.5) are eligible for membership. There is a one time initiation fee, which covers life-time membership. Psi Chi is usually represented at the regional Western Psychological Association and the American Psychological Association meetings, through which student members can participate in convention activities.



For more information please visit the Psi Chi National Website: <http://www.psichi.org> or you may contact the Berkeley Chapter by emailing: [psichi@berkeley.edu](mailto:psichi@berkeley.edu).

### ***Psychology at Berkeley (Undergraduate Journal)***

Psychology at Berkeley is a journal that publishes undergraduate work in psychology. It is unlike most other publications at UC Berkeley, however, in that it mainly seeks to publish scientific studies that undergraduates have completed themselves. The purpose of Psychology at Berkeley is to disseminate the findings of students' studies, and to further expose the Berkeley campus to the research and work being done by undergraduates all year long. In doing this, Psychology at Berkeley hopes to highlight the importance and excitement of studying psychology!

For more information, please email: [berkpsychjournal@gmail.com](mailto:berkpsychjournal@gmail.com)

### ***American Psychological Association (APA) Student Affiliates Program***

The American Psychological Association (APA) is a scientific and professional organization that represents psychology in the United States. With 150,000 members, APA is the largest association of psychologists worldwide.

For more information, please visit the APA website: <http://www.apa.org/membership/forstudents.html>

## **ADVISING**

The Department of Psychology's advising program offers students a variety of services of which students are encouraged to make full use.

### ***Undergraduate Student Services Office***

Advisors in the Psychology Department's Undergraduate Student Services Office are available to handle problems relating to rules and regulations of the Department of Psychology and the College of Letters and Science. If you have questions regarding major program scheduling, requirements for the B.A. degree, information on career opportunities in Psychology, or graduate school information, please visit the Undergraduate Student Services Office (3305 Tolman Hall).

Hae-Ok Miller (Intake Advisor and Scheduler) and Emilie Dandan (Undergraduate Advisor) are available for drop-in advising during office hours: 9 a.m. -12 p.m. and 1-4 p.m. When possible, students are encouraged to pre-schedule advising appointments. To schedule an undergraduate advising appointment, please call (510) 643-8114 or send an email to [psychsso@berkeley.edu](mailto:psychsso@berkeley.edu).

The Undergraduate Student Services Office is located at 3305 Tolman Hall, with office hours from 9:00 a.m.-12:00 p.m. and 1:00-4:00 p.m. Please be sure to visit our website as we may post hours in which we are only available by appointment or for drop-in advising only. Although we may be reached by dialing (510) 643-8114, it is MUCH easier to contact us via email. Undergraduate advisors may be reached at [psychsso@berkeley.edu](mailto:psychsso@berkeley.edu). Our website is <http://psychology.berkeley.edu>.

To make the most of your advising sessions, please be sure to bring with you a program planning worksheet. This may be obtained by visiting [Letters & Science Office of Undergraduate Advising website](#). Remember that the beginning of the semester is always the busiest. To ensure a shorter waiting period, please schedule an appointment or stop by after the first few weeks of the semester.

### ***Student Responsibility***

Although departmental advisors may assist students in selecting their programs of study, the advisor does not assume responsibility for students' understanding and compliance with the requirements for the degree. Students are required to assume responsibility for their own academic program and progress towards completion of degree requirements.

### ***Peer Advising***

Upper division Psychology majors offer peer advising in the Undergraduate Student Services Office. They are a wonderful resource for students with questions about course selection, research, or general academic advice. The Peer Advisors are available to answer your questions during their office hours: 10 a.m.-4p.m. You may also contact them at [psychpeers@berkeley.edu](mailto:psychpeers@berkeley.edu).

### ***Faculty Advising***

Another level of advising is provided by the permanent faculty of the Department. We encourage you to speak with a faculty advisor to discuss questions about your academic pursuits in the fields of psychology. All faculty of the Department serve as advisors. A list of the faculty and their research interests may be found on the Psychology website. They are available to students during regularly scheduled office hours, which are posted each semester on the bulletin board outside of the SSO.

### **College of Letters & Science Office of Undergraduate Advising (OUA)**

Located in 206 Evans Hall, the College of Letters & Science OUA has advisors to assist you with planning your academic program, fulfilling college breadth requirements, and the general university degree requirements such as American Cultures, History and Institutions, etc. They are also familiar with the prerequisite courses for all departments under the College and will direct you to the appropriate advisor in the various departments for major information.

For information regarding College of Letters and Science requirements and general assistance, please call (510) 642-1483 or e-mail [kpasalns@berkeley.edu](mailto:kpasalns@berkeley.edu) or check their website at <http://ls.berkeley.edu>. You should also refer to the College of Letters and Science publication, **Earning Your Degree: A Guide for Students in the College of Letters and Science**, updated annually and available on the web.

### **Tele-BEARS & Advisor Codes**

After declaring the major, students must obtain an Advisor Code (AC) from the Student Services Office in each semester that follows. The Advisor Code will be required upon entering Tele-BEARS for the first time in Phase I. This procedure is to insure that students review their progress in the major and receive up-to-date information on graduation requirements.

Although Advisor Codes are not available until two weeks prior to the beginning of Phase I, we ask that students come in early to review their schedules. Advisor Codes will not be distributed via phone or email except for students who are studying abroad or on medical leave. All other students must come in person to the SSO to obtain their codes and will be asked to bring along a completed Tele-BEARS Advising Form. Please plan accordingly!

### **Change in Course Schedule**

Students may add and drop courses on Tele-BEARS until the fifth week of class unless the course is listed as an Early Drop Deadline (EDD) course. EDD courses must be dropped by the end of the second week. All students should print a copy of their schedule each time they use Tele-BEARS.

Exceptional changes in schedule (i.e., those requested after the posted deadlines) may be granted by the College of Letters & Science in only the most extraordinary circumstances. Very few, if any, students are permitted to add, drop or change grading options after the respective deadlines. Please be sure to stay vigilant of all deadlines.

### **Bulletin Boards**

There are four Undergraduate Bulletin Boards outside of the Student Services Office. Information on research assistant positions, jobs, volunteering, graduate school, and special courses will be posted throughout the semester. Students should plan to check the Bulletin Boards periodically.

## OTHER CAMPUS STUDENT SERVICES

**Office of Financial Aid** - 250 Sproul Hall, 642-6442

**Student Learning Center** - 198 Cesar E. Chavez Student Center, 642-1069. As the primary academic support service for students at the University of California at Berkeley, the SLC assists students in transitioning to Cal, navigating the academic terrain, creating networks of resources, and achieving academic, personal and professional goals. Through various services including tutoring, study groups, workshops and courses, we support students in Biological and Physical Sciences, Business Administration, Computer Science, Economics, Mathematics, Social Sciences, Statistics, Study Strategies, and Writing. <http://slc.berkeley.edu>

**Student Life Advising Services (EOP)** - 140 Cesar E. Chavez Student Center, 642-7224. Student Life Advising Services promotes the philosophy of providing students with guidance and resources to facilitate the attainment of their personal, academic and career goals. Our primary goal is to empower students from culturally diverse backgrounds to achieve academic excellence. Therefore, we make every effort to provide students with the information necessary to develop the skills required to succeed at Berkeley and beyond. <http://slas.berkeley.edu>

**Disabled Students Program (DSP)** - 230 Cesar E. Chavez Student Center, 642-0518, (TTY/TDD - 642-6376). The Disabled Students' Program (DSP) is committed to ensuring that all students with disabilities have equal access to educational opportunities at UC Berkeley. We offer a wide range of services for students with disabilities. These services are individually designed, and based on the specific needs of each student as identified by our Disability Specialists. <http://dsp.berkeley.edu>

**Transfer, Re-Entry, and Student Parent Center** - 105 Cesar E. Chavez Center, 643-8070. The Transfer, Re-entry, and Student Parent Center serves a diverse population of students and is dedicated to providing programs and services in support of the academic and personal success of transfer, re-entry, and student parents. As a supportive and inclusive community, the center is committed to increasing students' access to and awareness of campus resources and enrichment opportunities. The center also promotes campus and community engagement and leadership development that enrich and support students' academic and professional goals. The Transfer, Re-entry, and Student Parent Center carries out the University commitment to access and equity for students and plays a key role in campus outreach and recruitment of transfer, re-entry, and student parents through participation in programs and events at Bay Area community colleges. <http://reentry.berkeley.edu>

**University Health Services (UHS)** - 2222 Bancroft, Tang Center, 642-2000. University Health Services (UHS) at the Tang Center provides comprehensive medical care, counseling, health promotion, and public health services to Berkeley students and several other local institutions. <http://www.uhs.berkeley.edu>

**Counseling and Psychological Services (CPS)** - 3rd Floor Tang Center, 2222 Bancroft, 642-9494  
<http://uhs.berkeley.edu/Students/counseling/cps.shtml>

**Career Center** - 2111 Bancroft, 642-1716. We prepare undergraduates, graduate students, and alumni to make informed decisions about their futures by providing comprehensive resources, programs, and counseling on career development, internships, employment, and graduate school. <http://career.berkeley.edu> Faculty in the Department of Economics are also good sources of information regarding graduate programs in economics and business.

## GRADUATION

### ***Filing for Candidacy***

The semester prior to the semester a student wishes to graduate, a request should be made at the College of Letters & Science, 206 Evans Hall, for a Degree Check/Audit to insure that all requirements for the degree will be satisfied. Students should indicate their intention to graduate by responding to the Tele-BEARS inquiry when scheduling courses for the semester they plan to graduate. Please keep in mind that the College will only review overall degree requirements; please be sure to verify with the Psychology Undergraduate Advisors that all major requirements have been fulfilled.

### ***Commencement Ceremony***

The Department of Psychology's Commencement ceremony occurs once each year in May (a general campuswide ceremony also takes place in December and May). All students graduating in Fall, Spring, or Summer are eligible to participate. Summer and Fall graduates should inform the Undergraduate Student Services Office of their intention to graduate and participate in the ceremony ***no later than the end of March***. Graduating seniors may be asked to participate in the planning of the ceremony. Junior majors are encouraged to attend as guests or volunteers so that they will have an opportunity to develop ideas and plans for their own graduation the following year.

### ***Graduation with Honors***

There are two types of Honors at graduation: 1) Distinction in General Scholarship, which is based on your cumulative record (see the College of Letters & Science's announcement for information on this Honors level) and 2) Honors in the Major, which is based upon completion of the Honors Program in Psychology (see above).

## APPENDIX A: THE FACULTY

- OZLEM AYDUK** (Associate Professor) Ph.D., Columbia University  
 Social: cognitive, and affective processes in close relationships; self-regulation of violence, hostility and depression;  
 Developmental: processes in regulatory competencies.
- SONIA BISHOP** (Assistant Professor) Ph.D., University of London  
 Neural mechanisms supporting attention, emotion and their interactions; individual differences in cognitive control and emotional responsivity; neural substrate of anxiety; genetic factors modulating recruitment of cortical 'control' and limbic 'affective' mechanisms.
- SILVIA BUNGE** (Associate Professor) Ph.D., Stanford University  
 Cognitive neuroscience and developmental cognitive neuroscience; cognitive control and prefrontal function.
- JOSEPH J. CAMPOS** (Professor) Ph.D., Cornell University  
 Social-emotional development in infancy, especially emotional communication and perception of emotion; and the relation of motor development to cognitive, social and emotional development.
- SERENA CHEN** (Associate Professor) Ph.D., New York University  
 Social/Personality: Social bases of the self, multiple levels of self-definition, close relationships and cognition, social identity, intergroup relations, dual process models, knowledge representation and use
- MARK D'ESPOSITO** (Professor) M.D., SUNY Syracuse College of Medicine  
 Working memory and frontal lobe function, functional MRI, cognitive neuroscience.
- JACK GALLANT** (Professor), Ph.D., Yale University  
 Visual neuroscience, attention.
- ALISON GOPNIK** (Professor) D.Phil., University of Oxford  
 Cognitive development; theory of mind; psychology and philosophy.
- THOMAS GRIFFITHS** (Assistant Professor) Ph.D., Stanford University  
 Computational models of cognition, including causality, categorization, inductive inference, probabilistic reasoning, language learning, and language evolution; machine learning; Bayesian statistics
- ALLISON HARVEY** (Associate Professor) Ph.D., University of New South Wales  
 Adult psychopathology, especially sleep disorders. Cognitive processes of thought (worry/rumination), attention, memory and reasoning; comorbidity; transdiagnostic approaches; cognitive therapy; interactions between cognitive, emotional and biological processes and adult psychopathology.
- ERIK HESSE** (Associate Adjunct Professor) Ph.D., [Leiden University](#)  
 Attachment and evolution; narrative; disorganized and unclassifiable child and adult attachment status; alterations in normal consciousness as related to adverse attachment experiences; effects of frightened and frightening parental behavior.
- STEPHEN P. HINSHAW** (Professor; Chair – Fall 2009) Ph.D., University of California, Los Angeles  
 Childhood behavior disorders, developmental psychopathology. Peer relations, family interactions, and neuropsychological risk factors; psychosocial and pharmacological interventions; stigma associated with mental disorder.
- CARLA HUDSON KAM** (Associate Professor) Ph.D., University of Rochester  
 First and second language acquisition: In particular, I am interested in how these processes may constrain the form of languages, and how they might influence how languages change over time.
- RICHARD IVRY** (Professor; Vice Chair for Teaching – Fall 2009, Chair – Spring 2010) Ph.D., University of Oregon  
 Motor control and motor learning, cognitive constraints on skill, human performance, cognitive control, cognitive neuroscience and neuropsychology..
- LUCIA JACOBS** (Associate Professor) Ph.D., Princeton University  
 Evolution and ecology of cognition, in particular spatial memory, navigation and reasoning.
- OLIVER P. JOHN** (Professor) Ph.D., University of Oregon  
 Self-concept; self-perception accuracy and biases; personality development and assessment across the life span; emotion experience and expression; cultural differences.

**SHERI L. JOHNSON** (Professor) Ph.D., University of Pittsburgh

Basic and treatment research on bipolar disorder. Neurobiological, cognitive, emotional, and social triggers of mania, with a focus on the reward system. Psychosocial parallels in the triggers of bipolar and unipolar depression. Psychosocial interventions to prevent mania. Serotonin and processes involved in emotion regulation.

**DACHER KELTNER** (Professor) Ph.D., Stanford University

Social/Personality: emotion; social interaction; individual differences in emotion; conflict and negotiation; culture.

**JOHN KIHLSSTROM** (Professor) Ph.D., University of Pennsylvania

Cognition in personal and social contexts; unconscious mental processes; memory; hypnosis; social cognition; personality; experimental psychopathology; health cognition and behavior.

**ROBERT T. KNIGHT** (Professor) M.D., Northwestern University

Attention and memory; neuropsychology and physiology; cognitive neuroscience.

**LANCE KRIEGSFELD** (Assistant Professor) Ph.D., Johns Hopkins University

Behavioral neuroendocrinology, circadian biology, reproductive behavior and physiology, seasonality/photoperiodism, behavioral genetics, behavioral neuroscience

**ANN KRING** (Professor) Ph.D., SUNY Stony Brook

Clinical: Psychopathology. Emotional features of schizophrenia, the linkage between emotion and other cognitive and social deficits in schizophrenia, emotion, social interaction, and social anxiety, emotion, and depression. Emotion: individual differences in emotional expression, gender and emotion, the relationship between social context, personality, and emotion.

**ROBERT W. LEVENSON** (Professor) Ph.D., Vanderbilt University

Emotion. Autonomic nervous system and facial expressive components, cultural influences, empathy, emotional control, emotional changes with aging, dementing disorders, and brain pathology. Marital interaction across the life span: emotional and physiological signs and predictors of marital distress.

**TANIA LOMBROZO** (Assistant Professor) Ph.D., Harvard University

Cognitive psychology of explanation and understanding; concepts, theories, and causality; moral reasoning; philosophy and psychology

**MARY MAIN** (Professor) Ph.D., The Johns Hopkins University

Attachment; individual differences in relationship representation in discourse, drawing, and narrative; functional disorders of consciousness; ethology.

**CHRISTINA MASLACH** (Professor) Ph.D., Stanford University

Social: job burnout and health psychology; individuation and dissent, gender roles.

**RODOLFO MENDOZA-DENTON** (Associate Professor) Ph.D., Columbia University

Social: Prejudice; stereotyping; cultural influences on social cognition; personality; intergroup processes; coping.

**CHARLAN JEANNE NEMETH** (Professor) Ph.D., Cornell University

Social: influence processes; decision making and creativity in small groups; managing innovation in organizations; psychology of creative scientists, artists and entrepreneurs.

**KAIPING PENG** (Associate Professor), Ph.D., University of Michigan

Social: cultural psychology, culture and cognition, reasoning and judgment across cultures and domains, and cross-cultural understandings.

**WILLIAM PRINZMETAL** (Adjunct Professor) Ph.D., Claremont Graduate School

Visual perception, attention and cognition.

**LYNN ROBERTSON** (Adjunct Professor) Ph.D., University of California, Berkeley

Attention and perceptual organization in normal and neurological populations. Functional hemisphere asymmetries, neuropsychology, cognitive neuroscience.

**ELEANOR ROSCH** (Professor) Ph.D., Harvard University

Cognition, concepts, causality, cross-cultural, Eastern psychologies, psychologies of religion.

**ARTHUR SHIMAMURA** (Professor) Ph.D., University of Washington

Cognitive neuroscience, frontal lobe function, basic memory research.

**FREDERIC E. THEUNISSEN** (Associate Professor) Ph.D., University of California, Berkeley

Neural basis of vocal learning in songbirds; auditory physiology; speech perception.

**MATTHEW WALKER** (Assistant Professor) Ph.D., Medical Research Council, London

Impact of sleep on human brain function, especially the role of sleep in: learning and memory; brain plasticity; emotional regulation; affective & clinical mood disorders and aging. These topics are addressed using combined cognitive and multimodal neuroimaging techniques.

**JONATHAN WALLIS** (Assistant Professor) Ph.D., University of Cambridge

Impact of sleep on human brain function, especially the role of sleep in: learning and memory; brain plasticity; emotional regulation; affective & clinical mood disorders and aging. These topics are addressed using combined cognitive and multimodal neuroimaging techniques.

**DAVID WHITNEY** (Associate Professor) Ph.D., Harvard University

Visual perception including spatial cognition, motion perception, object recognition, visual attention, and visually guided movement.

**THOMAS WICKENS** (Professor) Ph.D., Brown University

Quantitative models in cognitive psychology; statistics and data analysis.

**FEI XU** (Professor) Ph.D., Massachusetts Institute of Technology

Cognitive and language development, including infant cognition, statistical inference across domains, physical and psychological reasoning, word learning, number representations, social cognition, language and thought, concept acquisition, psychology and philosophy.

**SHELDON ZEDECK** (Professor) Ph.D., Bowling Green University

Industrial/organizational/social psychology/personnel; cross-cultural work values; decision-making research; work and family issues; statistics and research methodology

**QING ZHOU** (Assistant Professor) Ph.D., Arizona State University

Developmental psychopathology, with an emphasis on the roles of temperament, emotion-related processing, and family socialization in the development of child and adolescent psychopathology and competence; cultural influences on socio-emotional development.

## APPENDIX B: PSYCHOLOGY COURSE DESCRIPTIONS

### Lower Division Courses

- 1. General Psychology. (3)** Students will not receive credit for 1 after taking 2. Two hours of lecture and one hour of discussion per week. Introduction to the principal areas, problems, and concepts of psychology. This course is required for the major; students not considering a psychology major are directed to 2. (F,SP)
- 2. Principles of Psychology. (3)** Students will not receive credit for 2 after taking 1. Three hours of lecture per week. An overview of psychology for students who will not major in the field. This course satisfies the prerequisite for upper division decade courses. (F,SP)
- 14. Psychology of Gender. (3)** Three hours of lecture per week. Examination of various factors in the development of feminine and masculine roles, including personality, social processes, biology, and culture.
- 24. Freshman Seminars. (1)** Course may be repeated for credit as topic varies. One hour of seminar per week. Sections 1-2 to be graded on a letter-grade basis. Sections 3-4 to be graded on a *passed/not passed* basis. The Berkeley Seminar Program has been designed to provide new students with the opportunity to explore an intellectual topic with a faculty member in a small-seminar setting. Berkeley Seminars are offered in all campus departments, and topics vary from department to department and semester to semester.
- 39. Freshman/Sophomore Seminar.** Course may be repeated for credit as topic varies. Seminar format. Sections 1-2 to be graded on a letter-grade basis. Sections 3-4 to be graded on a *passed/not passed* basis. *Prerequisites: Priority given to freshmen and sophomores.* Freshman and sophomore seminars offer lower division students the opportunity to explore an intellectual topic with a faculty member and a group of peers in a small-seminar setting. These seminars are offered in all campus departments; topics vary from department to department and from semester to semester.
- 45. Freshman Seminars. (1)** Two hours of seminar per week. Must be taken on a *passed/not passed* basis. *Prerequisites: Open to students in the Psychology Freshman Cluster Program.* Weekly discussion of the nature, methods and aims of contemporary psychology. Students are expected to read an article each week and actively participate in the discussion with the speaker.
- 84. Sophomore Seminar. (1,2)** Course may be repeated for credit as topic varies. One hour of seminar per week per unit for fifteen weeks. One and one half hours of seminar per week per unit for 10 weeks. Two hours of seminar per week per unit for eight weeks. Three hours of seminar per week per unit for five weeks. Sections 1-2 to be graded on a *passed/not passed* basis. Sections 3-4 to be graded on a letter-grade basis. *Prerequisites: At discretion of instructor.* Sophomore seminars are small interactive courses offered by faculty members in departments all across the campus. Sophomore seminars offer opportunity for close, regular intellectual contact between faculty members and students in the crucial second year. The topics vary from department to department and semester to semester. Enrollment limited to 15 sophomores.
- 98. Supervised Group Study. (1-3)** Course may be repeated for credit. One to three hours of directed group study per week. Must be taken on a *passed/not passed* basis. Group study of selected topics. Enrollment restricted. See Introduction to Courses and Curriculum section of this catalog.
- 99. Supervised Independent Study and Research. (1-3)** Course may be repeated for credit. Must be taken on a *passed/not passed* basis. *Prerequisites: 1 or consent of instructor and 3.4 GPA or higher.* Intended for freshmen and sophomores who wish to undertake a program of individual inquiry on a topic in psychology. (F,SP)  
*Psychology 1 is prerequisite for all upper division courses. Additional requirements are also stated for certain courses.*

### Upper Division Courses

- 101. Research and Data Analysis in Psychology. (4)** Three hours of lecture and two hours of laboratory per week. *Prerequisites: 1 and completion of the quantitative prerequisites for the major.* The course will concentrate on hypothesis formulation and testing, tests of significance, analysis of variance (one-way analysis), simple correlation, simple regression, and nonparametric statistics such as chi-square and Mann-Whitney U tests. Majors intending to be in the honors program must complete 101 by the end of their junior year. (F,SP)
- 101. Research and Data Analysis in Psychology. (4)** Three to five hours of lecture and zero to two hours of laboratory per week. *Prerequisites: 1 and completion of the quantitative prerequisites for the major.* The course will concentrate on hypothesis formulation and testing, tests of significance, analysis of variance (one-way analysis), simple correlation, simple regression, and nonparametric

statistics such as chi-square and Mann-Whitney U tests. Majors intending to be in the honors program must complete 101 by the end of their junior year. (F,SP)

**C104. Perspectives on the Young Child in Society. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites:* 110 (*Social Welfare majors*). This course provides a multidisciplinary approach to understanding the development needs of children from birth to age 5 in the context of the varied social institutions in which they are cared for and educated. Specific attention will be focused on how children's experiences within and beyond their families vary by social class, ethnicity and language, family needs and preferences, and special needs. Students will examine how expectations for young children change over time and will become familiar with current and past policy debates about the education and social well-being of young children. Also listed as Education C116A and Social Welfare C128. (F,SP) *Berrick*

**C105. Psychology of African American People: Current Issues. (3)** Three hours of lecture per week. *Prerequisites:* *Africam 5B or 101A, or upper division course in psychology.* Examines psychological research and theory pertaining to African American people. Emphasis on understanding the concerns, methods and conclusions regarding African Americans offered by American psychology from its origins to the present. Also listed as African American Studies C132.

**106. Psychology of Dreams. (3)** Two hours of lecture and one hour of discussion per week. Dreaming is a necessary, universal nightly activity of the human mind and brain. This class will cover some of the major psychological theories, interpretations, and uses that have been made of dreams. Students will be encouraged to keep dream diaries to provide an experiential component to the class and so that they may apply the class topics and do research using the material they generate themselves.

**107. Buddhist Psychology. (3)** Two hours of lecture and one hour of discussion per week. Based on tradition of direct observation of working of ordinary mind in everyday life situations. Provides contrasting perspective to present theories of cognition, perception, motivation, emotion, social interaction, and neurosis.

**109. History of Psychology. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites:* 101 or consent of instructor. Development of scientific study of human and animal behavior. Consideration of history of particular subject areas--such as biological, comparative, developmental, personality, and social psychology--as well as general trends.

#### BIOLOGICAL PSYCHOLOGY

**110. Introduction to Biological Psychology. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites:* 1 and biological prerequisites for the major or consent of instructor. Survey of relations between behavioral and biological processes. Topics include sensory and perceptual processes, neural maturation, natural bases of motivation, and learning. (F,SP)

**111. Sensory Processes: Vision. (3)** Three hours of lecture per week. *Prerequisites:* 110 or consent of instructor. Examination of various aspects of visual perception (adaptation, brightness and color vision, binocular vision, object detection) in relation to anatomy and physiology of the visual system.

**C112. The Biology of Stress. (3)** Three hours of lecture per week. *Prerequisites:* 110. This is an upper division undergraduate course designed to explore the impact of stress (as a product of genes, environment, hormones) on brain and behavior. It will adopt both a multidisciplinary and a transdisciplinary approach to the concept of stress. What is stress, how is it measured, what are differences between acute and chronic stressor exposure on physiological processes, on the brain, how does stress affect gene expression or neurogenesis, what are the relationships between stress and disease? All of these questions will be addressed in this course. Also listed as Integrative Biology C139. (F) *Kaufer, Francis*

**C113. Biological Clocks: Physiology and Behavior. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites:* Completion of biological prerequisites for the major and one of the following: 110 or a course in animal organismal physiology (*Integrative Biology 132, 140, 148, or Molecular and Cell Biology 160*). A consideration of the biological clocks that generate daily, lunar, seasonal and annual rhythms in various animals including people. Emphasis on neuroendocrine substrates, development and adaptive significance of estrous cycles, feeding rhythms, sleep-wakefulness cycles, reproductive and hibernation cycles, body weight and migratory cycles. Also listed as Integrative Biology C143A.

**114. Biology of Learning and Neural Plasticity. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites:* 110 or consent of the instructor. A study of theoretical and experimental investigations of the biological substrates of learning, memory and forms of neural plasticity related to the growth and maturation of the nervous system.

**115A. Introduction to Comparative Psychology. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites:* 110. Studies of animal behavior in evolutionary perspective, including analysis of behavior development, reproduction, aggression, territoriality.

**C115B. Animal Behavior. (4)** Students will receive no credit for C115B after taking Integrative Biology 146 or Integrative Biology 146L. Three hours of lecture and one hour of discussion per week. *Formerly 115B.* An introduction to the study of animal behavior in an evolutionary context. Topics covered include the genetic, physiological, ecological, and cognitive bases for animal behavior. This course, which emphasizes conceptual understanding of basic behavioral principles, serves as the foundation for advanced courses in behavior offered through Integrative Biology and Psychology. Three midterms and a cumulative final exam. Also listed as Integrative Biology C144. Caldwell, Lacey, Bentley

**C116. Hormones and Behavior. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites: Completion of biological prerequisites for the major and consent of instructor; a course in mammalian physiology recommended.* This course provides a comprehensive overview of behavioral endocrinology beginning with hormone production and actions on target issues and continuing with an exploration of a variety of behaviors and their hormonal regulation/consequences. The course uses a comparative approach to examine the reciprocal interactions between the neuroendocrine system and behavior, considering the effects of hormone on development and adult behavior in addition to how behavior regulates endocrine physiology. While much of the course focuses on non-human vertebrate species, the relevance to humans is explored where appropriate. Topics include sexual differentiation and sex differences in behavior, reproductive, parental, and aggressive behaviors, and hormonal and behavioral homeostatic regulation. Also listed as Integrative Biology C143B. (SP) Kriegsfeld

**117. Human Neuropsychology. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites: 110.* A survey of contemporary psychological approaches to problems of human disabilities including mental disorders, behavior changes following human brain injury and disease, and mental subnormality. Emphasis on nervous system models of these problems and areas of potential application of basic research development.

**118. Topical Seminar in Biological Psychology. (3)** Course may be repeated for credit with different topic and consent of instructor. Three hours of seminar per week. *Prerequisites: Consent of instructor.* For a precise schedule of courses, check with the Student Services Office each semester.

**119. Drugs and Behavior. (3)** Students will receive no credit for 119 after taking Letters and Science 19 or Molecular and Cell Biology 62. Two hours of lecture and one hour of discussion per week. *Prerequisites: 110 or consent of instructor.* A survey course exploring the basic principles of psychopharmacology. The major focus of the course is on the relationship between behavior and the physiological actions of drugs. Emphasis will be placed on effects of pharmacological agents on complex mental processes such as attention, motivation, learning, and memory.

#### COGNITIVE PSYCHOLOGY

**C120. Basic Issues in Cognition. (3)** Students will receive no credit for C120 after taking 120A. Two hours of lecture and one hour of discussion per week. Theoretical foundations and current controversies in cognitive science will be discussed. Basic issues in cognition—including perception, imagery, memory, categorization, thinking, judgment, and development—will be considered from the perspectives of philosophy, psychology, computer science, and physiology. Particular emphasis will be placed on the nature, implications, and limitations of the computational model of mind. Also listed as Cognitive Science C100. (F)

**121. Animal Cognition. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites: 115B or consent of instructor.* This course focuses on how animals process, organize, and retain information. Specific topics include learning and memory, sensory processes, navigation and migration, communication, and cross-species comparisons of behavior. Material will be drawn from the ethological, behavioral/experimental, and, to a lesser extent, the neurosciences literature.

**122. Introduction to Human Learning and Memory. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites: 101 is recommended.* Theoretical and experimental analysis of human learning and memory; short-term and long-term memory; coding and retrieval processes; transfer and interference; mechanisms of forgetting.

**C123. Computational Models of Cognition. (4)** Three hours of lecture and one hour of discussion per week. *Prerequisites: Calculus, discrete mathematics, Cognitive Science C1, Computer Science 61A, or equivalents.* This course will provide advanced students in cognitive science and computer science with the skills to develop computational models of human cognition, giving insight into how people solve challenging computational problems, as well as how to bring computers closer to human performance. The course will explore three ways in which researchers have attempted to formalize cognition – symbolic approaches, neural networks, and probability and statistics – considering the strengths and weaknesses of each. Also listed as Cognitive Science C131.

**C124. Psycholinguistics. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites: An introductory course in linguistics or consent of instructor.* Introduction to psycholinguistics, emphasizing effects of psychological variables on the learning

and use of language, influence of language behavior on psychological processes; special attention to psychological applicability of modern linguistic theory and to social psychological aspects of language behavior. Also listed as Cognitive Science C124.

**125. The Developing Brain. (3)** Students will receive no credit for 125 after taking 192 Fall 2007. Two hours of lecture and one hour of discussion per week. *Prerequisites: Cognitive neuroscience or human neuropsychology course recommended but not required.* What are the changes in brain structure and function that underlie improvements in cognitive abilities over childhood and adolescence? Or, coming from a different perspective, what insights can we gain regarding the neural basis of cognition by examining how the brain develops? And how are such findings relevant for medicine, education, and the law? The cutting-edge new field of developmental cognitive neuroscience is beginning to address these and other questions. This course will constitute an overview of current research and methods in this field, focusing on both typically and atypically developing children and adolescents.

**C126. Perception. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites: Consent of instructor. 101 recommended.* An introduction to principal theoretical constructs and experimental procedures in visual and auditory perception. Topics will include psychophysics; perception of color, space, shape, and motion; pattern recognition and perceptual attention. Also listed as Cognitive Science C126.

**C127. Cognitive Neuroscience. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites: 110 or C120, or Cognitive Science C100 recommended.* This course will examine research investigating the neurological basis of cognition. Material covered will include the study of brain-injured patients, neurophysiological research in animals, and the study of normal cognitive processes in humans with non-invasive behavioral and physiological techniques such as functional Magnetic Resonance Imaging (fMRI), electroencephalography (EEG), and transcranial magnetic stimulation (TMS). Topics to be covered include perception, attention, memory, language, motor control, executive control, and emotion. Also listed as Cognitive Science C127.

**128. Topical Seminars in Cognitive Psychology. (3)** Course may be repeated for credit with different topic and consent of instructor. Three hours of seminar per week. *Prerequisites: Consent of instructor.* For a precise schedule of offerings check with the Student Services Office each semester.

**C129. Scientific Approaches to Consciousness. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites: 1 or Cognitive Science C1; or C120 or Cognitive Science C100.* This course will examine the nature of human consciousness from the interdisciplinary perspective of cognitive science. It will cover topics from the philosophy of mind, cognitive linguistics, neuroscience, psychology, and computational models. Also listed as Cognitive Science C102.

#### CLINICAL PSYCHOLOGY

**130. Clinical Psychology. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites: 1.* Theoretical and empirical approaches to the explanation of psychological dysfunction. The relation between theories of psychopathology and theories of intervention. A critical evaluation of the effects of individual, family, and community approaches to therapeutic and preventive intervention. Thematic focus of the course may change from year to year. See department notices for details. (F,SP)

**131. Developmental Psychopathology. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites: 130 or consent of instructor.* This course will discuss linkages between developmental processes and child psychopathology. Included will be discussion of cognitive impairments in children, including learning disabilities and mental retardation; internalizing disorders, such as anxiety, withdrawal, and depression; externalizing disorders, such as attention-deficit hyperactivity disorder and conduct disorder; and child abuse and neglect. Psychobiological, familial, legal, and societal factors will be emphasized.

**132AC. Community Psychology: An American Cultures Perspective. (4)** Two hours of lecture and one and one-half hours of discussion per week. *Prerequisites: 130 or consent of instructor.* Introduction to community psychology with a comparative emphasis on ethnic cultural diversity. Critical examination of socio-cultural, environmental, and psychological factors that affect the development of mental health, and social/community intervention approaches that prevent dysfunction or promote competence for populations, organizations, and communities. Theories and methods of community psychology as they apply to five ethnic-cultural groups: African Americans, Asian Americans, Chicano/Latinos, indigenous peoples of the United States, and European Americans. Students participate in community-based action research projects. This course satisfies the American cultures requirement.

**133. Psychology of Sleep. (3)** Two hours of lecture and one hour of discussion per week. This course has two primary goals: (1) to provide a basic introduction to the study of sleep and an overview of sleep measurement, regulation, ontogeny, phylogeny, physiology, and psychology; and (2) to provide a basic introduction to sleep disorders including their classification, cause, and treatment. (F,SP) Staff

**138. Topical Seminars in Clinical Psychology. (3)** Course may be repeated for credit with different topic and consent of instructor. Three hours of seminar per week. *Prerequisites:* 130 or consent of instructor. For a precise schedule of offerings, check with the Student Services Office each semester.

#### DEVELOPMENTAL PSYCHOLOGY

**140. Developmental Psychology. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites:* 1. This course explores the development of children from birth to adolescence, in a wide range of areas including biological, cognitive, linguistic, social, and personality development. It also covers the effects of genes, experience, and social context on children's development. (F,SP)

**141. Development During Infancy. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites:* 140. Cognitive, perceptual, and social development during the first two years of life with emphasis upon methods of observation and experimentation.

**143. Language Acquisition. (3)** Two hours of lecture and one hour of discussion per week. The course will explore the question, "How do children manage to learn language?" by examining classic and contemporary theories of language acquisition. Topics include early speech perception, word learning, the acquisition of phonology, morphology, syntax, and pragmatic knowledge. In addition, we will cover topics such as language development disorders (e.g., autism), the critical period hypothesis, sign language, creolization, bilingualism, and language and thought.

**146. Developmental and Biological Processes in Attachment. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites:* 110 or consent of instructor. This course provides an integrating approach to the topic of human and subhuman primate attachment. Based on ethological and evolutionary perspectives, it moves through considerations of the effects of separation and loss in non-human primates to consideration of individual differences in the organization of human attachments. Recent advances in our understanding of representational (cognitive) aspects of individual differences in human attachment are stressed.

**148. Topical Seminars in Developmental Psychology. (3)** Course may be repeated for credit with different topic and consent of instructor. Three hours of seminar per week. *Prerequisites:* Consent of instructor. For a precise schedule of offerings, check with the Student Services Office each semester.

**149. Topical Laboratories in Developmental Psychology. (3)** Course may be repeated for credit with different topic and consent of instructor. Two hours of lecture and three hours of laboratory per week. *Prerequisites:* Consent of instructor. For a precise schedule of offerings, check with the Student Services Office each semester.

#### PERSONALITY PSYCHOLOGY

**150. Psychology of Personality. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites:* 1. A consideration of general and systematic issues in the study of personality and an evaluation of major theories and points of view. (F,SP)

**156. Human Emotion. (3)** Two hours of lecture and one hour of discussion per week. This course will examine two different theoretical perspectives on emotion: (1) the differential emotions approach with its strong evolutionary grounding, and (2) the social constructionist approach. Next, the course will investigate empirical research on many facets of emotion including facial expression, physiology, appraisal, and the lexicon of emotion. Finally, we will consider more specific topics including social interaction, culture, gender, personality, and psychopathology.

**158. Topical Seminars in Personality. (3)** Course may be repeated for credit with different topic and consent of instructor. Three hours of seminar per week. *Prerequisites:* 150 and consent of instructor. For a precise schedule of offerings, check with the Student Services Office each semester.

#### SOCIAL PSYCHOLOGY

**160. Social Psychology. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites:* 1. Survey of social psychology including interaction processes, small groups, attitudes and attitude change, and social problems. (F,SP)

**162. Human Happiness. (3)** Students will receive no credit for 162 after taking C162, Letters and Science C160V or 160C. Two hours of lecture and one hour of discussion per week. *Prerequisites:* 160 or consent of instructor. This course will take an interdisciplinary approach to an understanding of happiness. The first part of the course will be devoted to the different treatments of happiness in the world's philosophical traditions, focusing up close on conceptions or the good life in classical Greek and Judeo-Christian thought, the great traditions in East Asian thought (Taoism, Buddhism, Confucianism), and ideas about happiness that emerged more recently in the age of Enlightenment. With these different perspectives as a framework, the course will then turn to treatments of happiness in the behavioral sciences, evolutionary scholarship, and neuroscience. Special emphasis will be given to understanding

how happiness arises in experiences of the moral emotions, including gratitude, compassion, reverence and awe, as well as aesthetic emotions like humor and beauty. (F,SP) Keltner

**C162. Human Happiness. (3)** Students will receive no credit for C162 after taking 162 or Letters and Science 160C. Two hours of lecture and one hour of discussion per week. This course will take an interdisciplinary approach to an understanding of happiness. The first part of the course will be devoted to the different treatments of happiness in the world's philosophical traditions, focusing up close on conceptions of the good life in classical Greek and Judeo-Christian thought, the great traditions in East Asian thought (Taoism, Buddhism, Confucianism), and ideas about happiness that emerged more recently in the age of Enlightenment. With these different perspectives as a framework, the course will then turn to treatments of happiness in the behavioral sciences, evolutionary scholarship, and neuroscience. Special emphasis will be given to understanding how happiness arises in experiences of the moral emotions, including gratitude, compassion, reverence and awe, as well as aesthetic emotions like humor and beauty. Also listed as Letters and Science C160V. (F,SP) Keltner

**163. Small Group Structure and Processes. (3)** Two hours of lecture and one hour of discussion per week. This course will consider small groups, their structure, and the influence processes that shape attitudes, behavior, and performance. Topics will include socialization of the newcomer, conformity, power, leadership, dissent, minority influence, group decision making, individual and group creativity, and applied issues such as juries and organizations.

**164. Social Cognition. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites: C120 or 150 or 160, or Cog Sci C100.* Surveys empirical and theoretical approaches to our understanding of perception, memory, thought, and language concerning ourselves, other people, interpersonal behavior, and the situations in which social interaction takes place. Emphasis is placed on the integration of problems in social, personality, and clinical psychology with the concepts and principles employed in the study of nonsocial cognition.

**165. Psychology of Creativity. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites: 1, sophomore standing.* This is a course on creativity, both at the individual and the group level. We will consider traits of highly creative individuals (vs. less creative individuals) and the ways in which they think. We will also investigate the ways in which influence processes affect individual creativity and will then focus on group creativity, including techniques by which creativity is hindered or stimulated. Finally, we will consider applications from organizations as we consider cultures in which creativity thrives. Throughout the course, discussion will be encouraged and we will also do some experiential exercises. The course will be a combination of lecture, discussion, and experiential learning. Nemeth

**166AC. Cultural Psychology. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites: 1; 160 is recommended.* The course will review research on culture, race, and ethnicity and will consider the implications of these findings for our understanding of race, culture, and ethnicity in American society. Mounting evidence suggests that psychological processes are culture-specific, theory-driven, and context-dependent. This course will focus on the effects that theories of mind, person, self, and social institutions have on human cognition, motivation, emotion, and social interactions in American society. Students will gain a better appreciation of the ways that cultural traditions and social practices regulate and transform psychological functioning. Simply, the course is about how culture affects psyche and how psyche affects culture. This course satisfies the American cultures requirement. (F,SP)

**167AC. Stigma and Prejudice. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites: 1 or consent of instructor.* Traditionally, research on prejudice and stereotyping has focused on the psychological mechanisms that lead people to be biased against others. Recent research has begun to shed light on the psychological legacy of prejudice and stereotyping for their targets. This course will review the major contributions of each of these literatures, providing students with a broad understanding of both classic and current issues in the field. The course will be divided into three sections: bias (i.e., the perpetrator's perspective), stigma (i.e., the target's perspective), and intergroup relations. This course satisfies the American cultures requirement. (F,SP)

**168. Topical Seminars in Social Psychology. (3)** Course may be repeated for credit with different topic and consent of instructor. Three hours of seminar per week. *Prerequisites: Consent of instructor.* For a precise schedule of offerings check with Student Services Office each semester.

Industrial-Organizational Psychology

**180. Industrial-Organizational Psychology. (3)** Two hours of lecture and one hour of discussion per week. Primarily for majors. Introduction to the field of industrial psychology, covering fundamental theory and concepts in personnel and social aspects in the field. Concerned with the processes involved in developing and maintaining organizations.

**182. Personnel Psychology. (3)** Two hours of lecture and one hour of discussion per week. *Prerequisites: 180 or consent of instructor.* Emphasis on psychological contributions in the development of techniques and practices in personnel selection and development. Special Course Offerings

**190. Cluster Seminar. (1)** Two hours of seminar per week. Must be taken on a *passed/not passed* basis. *Prerequisites: Psychology major and admission to the Cluster Program.* Weekly discussion of the nature, methods, and aims of contemporary psychology. Students are expected to read an article each week and actively participate in the discussion with the speaker.

**192. Special Topics in Psychology. (3)** Course may be repeated for credit as topic varies. Three hours of lecture per week. *Prerequisites: Consent of instructor.* Course examines current problems and issues in psychology.

**H194A-H194B. Honors Seminar. (2;2)** Two hours of seminar per week. *Prerequisites: Required of and limited to psychology majors in the honors program. H195A-H195B should be taken concurrently.* In the fall semester the seminar will concentrate on issues of research design, ethics, and data analysis using statistical packages. The spring semester will focus on oral and written presentations of the thesis projects and feedback on thesis drafts.

**H195A-H195B. Special Study for Honors Candidates. (1-3;1-3)** Course may be repeated for a maximum of 6 units. Individual conferences. Credit and grade to be awarded on completion of sequence. *Prerequisites: Open only to senior psychology majors in the Honors Program.* Independent study and preparation of an honors thesis under the supervision of a faculty member. (F,SP)

**197. Field Study in Psychology. (1-3)** Course may be repeated for credit. Individual conferences. Must be taken on a *passed/not passed* basis. *Prerequisites: 1; appropriate upper division work in psychology (to be determined by instructor). Consent of instructor.* Supervised experience relevant to specific aspects of psychology in off-campus settings. Individual and/or group meetings with faculty. Enrollment is restricted by regulations of the Berkeley Division listed elsewhere in this catalog. (F,SP)

**198. Directed Group Study. (1-3)** Course may be repeated for credit. Individual conferences. Must be taken on a *passed/not passed* basis. *Prerequisites: Consent of instructor.* Group study of a selected topic or topics in psychology. Enrollment is restricted by regulations of the Berkeley Division listed elsewhere in this catalog. (F,SP)

**199. Supervised Independent Study and Research. (1-3)** Course may be repeated for credit. Individual conferences. Must be taken on a *passed/not passed* basis. *Prerequisites: Consent of instructor.* Enrollment is restricted by regulations of the Berkeley Division listed elsewhere in this catalog. (F,SP)