## Elizabethtown College



# Department of Psychology Student Handbook



## **Table of Contents**

Mission
Vision
Introduction
Faculty
Psychology Major Requirements
Field Study
Student Research
The Co-Curriculum
Letters of Recommendation
Fields of Psychology
Should you go to Graduate School

#### Mission

The psychology program at Elizabethtown offers a strong liberal arts education with practical applications to the world around us. Our primary mission is to cultivate a scientific attitude toward questions about mind, behavior, and experience. Through classes, internships, research, and close partnerships with faculty and their peers, students develop critical thinking and scientific reasoning skills as well as the interpersonal skills that enable them to act autonomously in a wide variety of professions.

#### Vision

The psychology program at Elizabethtown provides a superior psychology education. Students who graduate from our program are highly competitive for graduate schools and jobs. Our students are able to think logically and act responsibly; they can articulate, substantiate, and evaluate their ideas; they are tolerant and sensitive to differences in the world around them.

## Introduction

Welcome to the Department of Psychology! You are joining a community of scholars with a proud tradition. Many of our graduates have achieved distinguished careers in psychology. The study of psychology is good preparation for other professions, too. Many employers are interested in the skills that psychology majors bring to collecting, analyzing, and interpreting data, and their experience with statistics and experimental design<sup>1</sup>.

Psychology is a tremendously varied field. Psychologists conduct both basic and applied research, serve as consultants to communities and organizations, diagnose and treat people, and teach future psychologists and other types of students. They test intelligence and personality. Many psychologists work as health care providers. They assess behavioral and mental function and well-being, stepping in to help where appropriate. They study how human beings relate to each other and also to machines, and they work to improve these relationships. And with the United States undergoing large changes in its population makeup, psychologists bring important knowledge and skills to understanding diverse cultures. <sup>1</sup>

Members of the Department of Psychology at Elizabethtown College are committed to providing our majors with quality education and expertise regardless of which aspect of psychology they pursue. Employers report that our psychology graduates are well prepared for a variety of fields and positions.

All Psychology Faculty advise Psychology majors and we will work with you to help you to achieve your academic and professional goals.

Psychology faculty advise by year cohort so that an advisor will follow a class through until graduation. You may ask your academic advisor any questions about the requirements in the psychology major, the core curriculum or general requirements for graduation. This Handbook contains general information

<sup>&</sup>lt;sup>1</sup><u>http://www.apa.org/topics/psychologycareer.html</u>

about the psychology major at Elizabethtown College. Please consult with your Elizabethtown College Academic Program Catalog and Course Schedule for course descriptions and frequency of offerings.

I also invite you to check the department website as it contains some of the information in this Handbook and it also contains departmental news and other items of interest for majors.

## **Psychology Faculty**

Dr. T. Evan Smith, Associate Professor and Chair

PhD University of California, Santa Cruz smitht@etown.edu

Dr. Smith teaches First Year Seminar, General Psychology, Developmental Psychology and Research in Developmental. He also teaches in the Women and Gender Studies Program. Dr. Smith is our developmental psychologist with expertise in emerging adulthood. Dr. Smith's research examines gender development from a perspective informed by developmental and social psychology as well as feminist theories. Much of his work has centered on demonstrating the contextual and multidimensional nature of gender in adolescence and early adulthood. A recent study demonstrated the crucial role of peer acceptance in determining how adolescents' gender conformity influences their self-concept.

Paul Dennis, ProfessorPhD New School for Social Researchdennispm@etown.edu

Dr. Dennis teaches General Psychology, Abnormal Psychology, Counseling, and History and Systems. He also coordinates field studies. Dr. Dennis's research interests are in the popularization of psychology. His published articles include a paper on an intelligence test developed by Thomas A. Edison, the popularization of the subconscious and the power of suggestion before World War I, and Eleanor Roosevelt's contribution to the popularization of child psychology during the 1940's.

Catherine Craver Lemley, Professor PhD Northeastern University lemleyce@etown.edu

Dr. Lemley teaches General Psychology, Introduction to Neuroscience, Sensation and Perception, Human Cognition, and Research in Perception. She also teaches courses in the Honors Program (Honors General Psychology & Honors Neuroscience). Her primary area of expertise is in visual perception. Dr. Lemley's research focuses on the relation between visual mental imagery and visual perception with an emphasis on how what you imagine can interfere with what you actually perceive. She is also conducting a number of research studies examining the factors that underlie the mere exposure effect, which occurs when repeated exposures to stimuli increase the degree to which a person likes such stimuli. Additionally, she has been investigating the role of attention in synesthesia, an involuntary condition in which one perceptual modality triggers another (e.g. sound induces the perception of color, sight of colors induces specific tastes).

Dr. Jean Pretz, Associate Professor PhD Yale University pretzj@etown.edu

Dr. Pretz teaches Introduction to Neuroscience, General Psychology, Intelligence and Creativity, and Research in Cognition. Dr. Pretz is a cognitive psychologist with research interests in intuition in decision making, implicit cognition, and creativity. Her research is aimed at understanding when intuition is insightful and when it is irrational. She has approached this problem in some of her work by studying everyday problem solving in college students and decision making preferences among nurses.

Dr. Mike Roy, Associate Professor PhD University of California, San Diego roym@etown.edu

Dr. Roy teaches our Research Methods and Statistic sequence (PSY 213 & 218). He has research expertise in social psychology and cognition. His research interests involve people's perception of environmental statistics and how they affect judgments and decisions. One line of his research examines bias in memory for how long things have taken in the past and how that relates to predictions of when tasks will be finished. A second line of his research examines people's perceptions of their own abilities. Dr. Roy is interested in whether or not people are truly biased in their self-perceptions.

Dr. John Teske, Professor PhD Clark University teskeja@etown.edu

Dr. Teske teaches General Psychology, Social Psychology, Emotion, Psyche and Film, and Theories of Personality. Dr. Teske has conducted research in nonverbal behavior, environmental psychology, and social cognition. He also holds an interest in philosophical psychology. Most recently he has published in the science-religion dialogue. He has served as the President of the Institute on Religion in an Age of Science.

Dr. Joe Mahoney, Professor PhD University of North Carolina, Chapel Hill mahoneyj@etown.edu

Dr. Mahoney teaches General Psychology, Child and Adolescent Development, Community Psychology, and Child Development and Social Intervention. Dr. Mahoney's area of expertise is child and adolescent development. Much of his recent research has focused on the developmental consequences related to how young people spend their out-of-school time including participation in extracurricular activities, after-school programs, sports, and community-based organizations. Dr. Mahoney is the author of over 60 published research papers, books, and articles and this work has been supported by grants from the National Institute of Child Health and Human Development, the California Department of Education, and the William T. Grant Foundation. He serves as co-editor for the *Journal of Research on Extended Education* and is an editorial board member for *Advances in Child and family Policy and Practice*.

## **Adjunct Faculty**

Dr. Mike Valle. PhD University of South Carolina, Columbia

Dr. Mike Valle is a School Psychologist for the Milton Hershey School who teaches Psychological Assessment at Elizabethtown College.



## **Psychology Major Requirements**

The Psychology Department offers a Bachelor of Arts (B.A.) degree to students majoring in psychology. The degree requires 40 credits. It also requires that students take any philosophy course (4 credits) and any Biology course (4 credits). Most students select these eight credits through courses that will enable them to fulfill their Core Curriculum requirements. Please see the College Catalog for a complete list of psychology course offerings.

#### **Introductory Course**<sup>2</sup>:

PSY105 General Psychology (First year)

#### Methodology Courses:

PSY213 Psychological Statistics (Sophomore year) PSY218 Psychological Methods (Sophomore year)

#### 200 Level Content Courses:

One of the following: PSY221 Abnormal Psychology PSY226 Child and Adolescent Development PSY227 Adult Development and Aging PSY235 Social Psychology

<u>One</u> of the following: PSY241 Sensation and Perception PSY251 Emotion

#### 300 Level Courses:

Two of the following; junior status or POI needed: PSY372 Intelligence and Creativity PSY321 Theories of Personality PSY341 Human Cognition PSY370 Child Development and Social Intervention

#### **Research Courses**:

<u>One</u> of the following: PSY425 Research in Developmental (need PSY 213, 218, 225) PSY435 Research in Social (need PSY 213, 218, 235)

<u>One</u> of the following: PSY413 Research in Perception (need PSY 213, 218, & 241) PSY414 Research in Cognition (need PSY 213, 218, 341)

#### Capstone Course:

PSY402 History and Systems (senior status)

 $<sup>^{2}</sup>$  PSY 111, Introduction to Neuroscience is not required, but is *recommended*. It can fulfill a NPS Core requirement. It can also be substituted to fulfill the Department requirement of a Biology Course.

## **Field Study**

Many of our majors elect to take PSY375, Field Studies for a semester during their senior year and have gained practical experience at a number of internship sites near Elizabethtown. Dr. Dennis is the departmental advisor for this course. Dr. Dennis will provide you with supervised training in a professional setting related to your career interests and goals in the field of psychology.

Recently students had internships at the following facilities: Innovation Focus, Lancaster (a consultant to business); S. June Smith Center, Lancaster (a school for special needs pre-school children); Community Services, Lancaster (psychiatric day treatment center); Bell Socialization, York (psychiatric day treatment center); and Lancaster School District (working with a guidance counselor).

Students have also held internships in the following Psychiatric treatment centers: Options, Bell Socialization, Philhaven, Harrisburg State Hospital, Manos House, Crisis Intervention of Lancaster and Lebanon Veteran's Administration. Students who express an interest in school psychology, guidance counseling, or working with special needs children and adolescents have gotten internships at the Masonic Homes, Lancaster City Schools, Eizabethtown High School, YWCA, and Lancaster Probation and Parole. Dr. Dennis has also arranged internships for students interested in the community and industry at Innovation Focus, the American Red Cross, Hershey Foods, Pennsylvania Blue Shield/Blue Cross, Armstrong World Industries and the Center for Survey Research.

## **Student Research**

Our program is empirically based. All psychology students have the opportunity to engage in original research projects in close collaboration with faculty members. Some studies are conducted within required courses, whereas others are performed one-on-one with a faculty member through the special arrangement of a research practicum or honors project. Most of the psychology faculty have ongoing programs of personal research in which they can involve psychology majors. There have been many student/faculty collaborative research projects presented at regional, national and international meetings including the annual meeting of the Eastern Psychological Association, the Association for Psychological Science, the International Neuropsychological Society, the Psychonomic Society, the Society for Personality and Social Psychology and the Society for the Study of Emerging Adulthood. See Appendix for some recent presentations.

The department supports an annual field trip for majors and minors to the annual meeting of the Eastern Psychological Association. Such conferences provide excellent learning opportunities. We encourage your involvement in research.

## The Co-Curriculum

## Department-Affiliated Clubs

We have two student organizations directly connected to the department, the **Psychology Club** and **Psi Chi**. Psi Chi is the National Honor Society in Psychology. To become a member of Psi Chi, students must meet three criteria: Students must: 1) be a major or minor; 2) have completed 9 semester hours of psychology; 3): have completed at least 3 semesters at Etown College: 4) have an overall GPA and a psychology GPA of 3.0; and 5) rank in the upper 35% of the class. Dr. Teske is the Psi Chi advisor; please contact him with questions regarding this organization.

All psychology majors and minors are automatically members of the Psychology Club. The Psychology Club is a great way to get involved in psychology. Dr. Pretz is the club advisor. Feel free to contact her for more information.

The Psychology Club, along with Psi Chi, invites guest speakers to campus, sponsors field trips to professional meetings and provides a social group for informal exchange of ideas about psychology.

## Honors-in-the-Discipline

During the spring semester, the honors-in-the-discipline coordinator (Dr. Lemley), contacts juniors who hold a 3.5 or better GPA in the psychology major. At this time they are invited to pursue honors through a congratulatory letter. If students elect to pursue honors, then Dr. Lemley individually meets with them and advises them that they must conduct an original research project to be completed by March of their senior year. Students select a faculty member to be their project advisor. Most frequently, they select one of their 400-level course instructors. Upon completion of the project, students submit an APA style manuscript of their project to Dr. Lemley who then distributes it to at least ½ the department for review. In order to receive Honors-in-the-Discipline, the reviewers much reach consensus that the project is 'excellent.'

#### Seibert Scholarships

The Earl W. Seibert Psychology Scholarship was established in 1996. It provides scholarship assistance to deserving psychology students. In order to qualify for this scholarship you must:

- **Demonstrate financial need** (check with the financial aid office).
- Be a declared psychology major, at least sophomore status, with a major GPA of 2.0. Seniors may not apply as the scholarship is for the following academic year.
- Respond to the following questions:
  - What are your career goals in psychology for approximately the next five years?
  - Provide an outline of the specific tasks or steps needed to accomplish your goals (e.g., obtain internships, present research at a conference, take the GRE, submit applications, collaborate with other on or off campus research projects, conduct an honors project, etc.).

Students can pick up an application from the Psychology Department, download it from the department website or contact Dr. Smith. Applications are due to Dr. Smith by 1 March of each year. Scholarship amounts will be at least \$500. The total amount that an individual receives will depend on the number of recipients.

## Letters of Recommendation

At some point in your college career you are likely to need letters of recommendation from your professors. You might need a letter when you apply for a job before or after graduation; when applying for graduate school; when applying for a special program or internship; when applying to study abroad; when applying for a scholarship. It is helpful to us if you are organized and focused when you make your request.

Who should you ask? Often the agency that requires the recommendation specifies who should write the letter. When you have options, make certain to ask a professor who knows you well enough to write a positive recommendation. Allow the recommender the opportunity to decline if s/he believes s/he does not know you well enough in the required context to write you a favorable letter (this does not indicate that the professor doesn't like you—they can't help you by agreeing to write a letter and providing a weak one).

What can you provide to the recommender? Your professors may have individual preferences on what information they want you to provide, so check with each recommender. Generally, you should:

- 1) Waive your right to see the letter.
- 2) Provide a brief description of the job or program that you are applying for—what are they looking for?, what is the scholarship based on?, what is the basic job description?—such information will allow the recommender to tailor the recommendation to what the selection committee is seeking.
- 3) Provide a transcript. This will allow professors to comment on your academic performance in all areas and remind them what classes they had with you.
- 4) Provide a resume—this provides the professor with a broader view of who you are.
- 5) Include a statement of interests and goals if you can—something to help the recommender understand why you are applying to a particular program, or why you need a scholarship.
- 6) Provide the appropriate forms and addresses. (Professors usually send letters on department letterhead and can use department envelopes—this is preferred unless a specific form is required).
- 7) Let the recommender know the due date for the letters. You'll find most of us are pretty busy and won't get to tasks that aren't on a priority list, so the exact date is very important.
- 8) Related to item #7—provide your recommender with plenty of notice! At least 1 months' notice is recommended.

Anything else? This may seem like a lot of work; however it will greatly enhance the recommender's ability to write you a strong letter. Most of the written work that I have suggested (e.g. resume, statement of goals) are things that you should be doing anyway as most applications require these or similar items. Finally, let the recommender know how things turned out—even if it is not good news. We want to know the outcome and to continue to help you when necessary.

## **Fields of Psychology**

Psychologists usually specialize at the graduate level of training. Information regarding some of the specialties is provided below. This material and other related material can found at the home site of the American Psychological Association.

**Clinical Psychologists** assess and treat mental, emotional, and behavioral disorders. These range from short-term crises, such as difficulties resulting from adolescent rebellion, to more severe, chronic conditions such as schizophrenia.

Some clinical psychologists treat specific problems exclusively, such as phobias or clinical depression. Others focus on specific populations: youngsters, ethnic minority groups, gays and lesbians, and the elderly, for instance. They also consult with physicians on physical problems that have underlying psychological causes.

**Cognitive and perceptual psychologists** study human perception, thinking, and memory. Cognitive psychologists are interested in questions such as, how does the mind represent reality? How do people learn? How do people understand and produce language? Cognitive psychologists also study reasoning, judgment, and decision making. Cognitive and perceptual psychologists frequently collaborate with behavioral neuroscientists to understand the biological bases of perception or cognition or with researchers in other areas of psychology to better understand the cognitive biases in the thinking of people with depression, for example.

**Counseling psychologists** help people recognize their strengths and resources to cope with their problems. Counseling psychologists do counseling/psychotherapy, teaching, and scientific research with individuals of all ages, families, and organizations (e.g., schools, hospitals, businesses). Counseling psychologists help people understand and take action on career and work problems. They pay attention to how problems and people differ across life stages. Counseling psychologists have great respect for the influence of differences among people (such as race, gender, sexual orientation, religion, disability status) on psychological well-being. They believe that behavior is affected by many things, including qualities of the individual (e.g., psychological, physical, or spiritual factors) and factors in the person's environment (e.g., family, society, and cultural groups).

**Developmental psychologists** study the psychological development of the human being that takes place throughout life. Until recently, the primary focus was on childhood and adolescence, the most formative years. But as life expectancy in this country approaches 80 years, developmental psychologists are becoming increasingly interested in aging, especially in researching and developing ways to help elderly people stay as independent as possible.

**Educational psychologists** concentrate on how effective teaching and learning take place. They consider a variety of factors, such as human abilities, student motivation, and the effect on the classroom of the diversity of race, ethnicity, and culture that makes up America.

**Engineering psychologists** conduct research on how people work best with machines. For example, how can a computer be designed to prevent fatigue and eye strain? What arrangement of an assembly line makes production most efficient? What is a reasonable workload? Most engineering psychologists work in industry, but some are employed by the government, particularly the Department of Defense. They are often known as human factors specialists.

**Evolutionary psychologists** study how evolutionary principles such as mutation, adaptation, and selective fitness influence human thought, feeling, and behavior. Because of their focus on genetically shaped behaviors that influence an organism's chances of survival, evolutionary psychologists study mating, aggression, helping behavior, and communication. Evolutionary psychologists are particularly interested in paradoxes and problems of evolution. For example, some behaviors that were highly adaptive in our evolutionary past may no longer be adaptive in the modern world.

**Experimental psychologists** are interested in a wide range of psychological phenomena, including cognitive processes, comparative psychology (cross-species comparisons), learning and conditioning, and psychophysics (the relationship between the physical brightness of a light and how bright the light is perceived to be, for example). Experimental psychologists study both human and nonhuman animals with respect to their abilities to detect what is happening in a particular environment and to acquire and maintain responses to what is happening.

Experimental psychologists work with the empirical method (collecting data) and the manipulation of variables within the laboratory as a way of understanding certain phenomena and advancing scientific knowledge. In addition to working in academic settings, experimental psychologists work in places as diverse as manufacturing settings, zoos, and engineering firms.

**Forensic psychologists** apply psychological principles to legal issues. Their expertise is often essential in court. They can, for example, help a judge decide which parent should have custody of a child or evaluate a defendant's mental competence to stand trial. Forensic psychologists also conduct research on jury behavior or eyewitness testimony. Some forensic psychologists are trained in both psychology and the law.

**Health psychologists** specialize in how biological, psychological, and social factors affect health and illness. They study how patients handle illness; why some people don't follow medical advice; and the most effective ways to control pain or to change poor health habits. They also develop health care strategies that foster emotional and physical well-being.

Psychologists team up with medical personnel in private practice and in hospitals to provide patients with complete health care. They educate medical staff about psychological problems that arise from the pain and stress of illness and about symptoms that may seem to be physical in origin but actually have psychological causes.

Health psychologists also investigate issues that affect a large segment of society, and develop and implement programs to deal with these problems. Examples are teenage pregnancy, substance abuse, risky sexual behaviors, smoking, lack of exercise, and poor diet.

**Industrial/organizational psychologists** apply psychological principles and research methods to the work place in the interest of improving productivity and the quality of work life. Many serve as human resources specialists, helping organizations with staffing, training, and employee development. And others work as management consultants in such areas as strategic planning, quality management, and coping with organizational change.

**Neuropsychologists** (and behavioral neuropsychologists) explore the relationships between brain systems and behavior. For example, behavioral neuropsychologists may study the way the brain creates and stores memories, or how various diseases and injuries of the brain affect emotion, perception, and

behavior. They design tasks to study normal brain functions with new imaging techniques, such as positron emission tomography (PET), single photon emission computed tomography (SPECT), and functional magnetic resonance imaging (fMRI).

Clinical neuropsychologists also assess and treat people. And with the dramatic increase in the number of survivors of traumatic brain injury over the past 30 years, neuropsychologists are working with health teams to help brain-injured people resume productive lives.

**Quantitative and measurement psychologists** focus on methods and techniques for designing experiments and analyzing psychological data. Some develop new methods for performing analysis; others create research strategies to assess the effect of social and educational programs and psychological treatment. They develop and evaluate mathematical models for psychological tests. They also propose methods for evaluating the quality and fairness of the tests.

**Rehabilitation psychologists** work with stroke and accident victims, people with mental retardation, and those with developmental disabilities caused by such conditions as cerebral palsy, epilepsy, and autism. They help clients adapt to their situation, frequently working with other health care professionals. They deal with issues of personal adjustment, interpersonal relations, the work world, and pain management.

Rehabilitation psychologists are also involved in public health programs to prevent disabilities, including those caused by violence and substance abuse. And they testify in court as expert witnesses about the causes and effects of a disability and a person's rehabilitation needs.

**School psychologists** work directly with public and private schools. They assess and counsel students, consult with parents and school staff, and conduct behavioral interventions when appropriate. Most school districts employ psychologists full time.

**Social psychologists** study how a person's mental life and behavior are shaped by interactions with other people. They are interested in all aspects of interpersonal relationships, including both individual and group influences, and seek ways to improve such interactions. For example, their research helps us understand how people form attitudes toward others, and when these are harmful—as in the case of prejudice—suggests ways to change them.

Social psychologists are found in a variety of settings, from academic institutions (where they teach and conduct research), to advertising agencies (where they study consumer attitudes and preferences), to businesses and government agencies (where they help with a variety of problems in organization and management).

**Sports psychologists** help athletes refine their focus on competition goals, become more motivated, and learn to deal with the anxiety and fear of failure that often accompany competition. The field is growing as sports of all kinds become more and more competitive and attract younger children than ever.

Also, the following resource might be helpful to you: <u>http://www.apa.org/topics/psychologycareer.html#aparesources</u>

## Should you go to graduate school?

Students who are interested in graduate programs of study receive advice from their academic advisors and faculty members whose specialties are in line with the students chosen field of study. In addition, the department has a graduate school advisor, Dr. Smith, who holds a special information session in the fall and meets individually with interested students.

This site should also be helpful— Psychology Graduate Schools: <u>www.psychologycollegefinder.org/School</u>

The following information was taken from the APA website and should assist you in your consideration of this question:

#### **Bachelor's Graduates**

In 2002–2003 psychology was the most popular intended undergraduate major according to a survey of college freshman. As a single field and not a constellation of fields, such as is true of business, biology, or education, psychology outdrew all other fields. In 2000, 74,654 students graduated with a bachelor's degree in psychology.

Some students stop with a bachelor's degree in psychology and find work related to their college major. For example, they may be assistants in rehabilitation centers. If they meet state certification requirements, they may be able to teach psychology in high school.

But the study of psychology at the bachelor's level is also a fine preparation for many other professions. In 2000, about 75,000 college seniors graduated with a degree in psychology, but many were not necessarily interested in a career as a psychologist.

In 1999, fewer than 5% of 1997 and 1998 psychology BA recipients were employed in psychology or a field related to psychology. Of the 1997 and 1998 BA graduates in 1999, two thirds were in for-profit business settings, usually the sales/service sector. These students often possess good research and writing skills, are good problem solvers, and have well-developed, higher-level thinking ability when it comes to analyzing, synthesizing, and evaluating information. Most find jobs in administrative support, public affairs, education, business, sales, service industries, health, the biological sciences, and computer programming. They work as employment counselors, correction counselor trainees, interviewers, personnel analysts, probation officers, and writers. Two thirds believe their job is closely or somewhat related to their psychology background and that their jobs hold career potential.

#### **Master's Graduates**

While the doctoral degree is the standard for independent research or practice in psychology, the number of psychology students who pursue a terminal master's degree has increased sixfold since 1960. Competition for positions in psychology-related jobs is keen. Just over one fifth of master's graduates are full-time students, and about two thirds of master's graduates are employed outside psychology. Many handle research and data collection and analysis in universities, government, and private companies. Others find jobs in health, industry, and education, the primary work settings for psychology professionals with master's degrees. With growing recognition of the role of psychology in the

community, more jobs for persons with master's degrees in psychology may also become available in community mental health centers.

Persons with master's degrees often work under the direction of a doctoral psychologist, especially in clinical, counseling, school, and testing and measurement psychology.

Some jobs in industry, for example, in organizational development and survey research, are held by both doctoral- and master's-level graduates. But industry and government jobs in compensation, training, data analysis, and general personnel issues are often filled by those with master's degrees in psychology.

Graduates with a master's degree in psychology may qualify for positions in school and industrialorganizational psychology. School psychology should have the best job prospects, as schools are expected to increase student counseling and mental health services. Master's degree holders with several years of business and industry experience can obtain jobs in consulting and marketing research, while other master's degree holders may find jobs in universities, government or the private sector as psychological assistants, counselors, researchers, data collectors, and analysts.

#### **Doctoral Graduates**

As might be expected, the highest paid and greatest ranges of jobs in psychology are available to psychology doctorates. The number of doctoral graduates has remained stable over the past decade, and supply continues to meet demand. Unemployment and underemployment remain below what is noted for other scientists and engineers. Few drop out of the field.

The greatest expansion of career opportunities for doctoral psychologists in the last decade has been in the for-profit and self-employment sectors, including, but not limited to, health service provider subfields, industrial–organizational psychology, educational psychology, and other fields with applications in these settings. Although fewer new doctorates have headed into faculty positions compared to past decades, it is the case that about one third of doctoral-level psychologists today are employed in academe, and more than half of new doctorates in the research subfields head into academe following graduation.

The 2001 Doctorate Employment Survey from APA's Center for Psychology Workforce Analysis and Research (CPWAR) found that 73% of the 1,754 responding psychologists who earned their doctorates in 2000-2001 secured their first choice when looking for a job. In addition, 75% of respondents were employed within 3 months of receiving the doctorate.

The U.S. Bureau of Labor Statistics expects that opportunities in psychology will continue to grow over the next decade. "Employment in health care will grow fastest in outpatient mental health and substance abuse treatment clinics. Numerous job opportunities will also arise in schools, public and private social service agencies, and management consulting services. Companies will use psychologists' expertise in survey design, analysis, and research to provide marketing evaluation and statistical analysis. The increase in employee assistance programs, which offer employees help with personal problems, also should spur job growth. Opportunities for people holding doctorates from leading universities in areas with an applied emphasis, such as counseling, health, and educational psychology, should be good. Psychologists with extensive training in quantitative research methods and computer science may have a competitive edge over applicants without this background.

Also see the Report of the 2009 APA Salary Survey http://www.apa.org/workforce/publications/09-salaries/report.pdf