



ASSESSMENT REPORT

College	Science
Department	Psychology
Program	Psychology BA/BS
Reporting for Academic Year	2022-2023
Last 5-Year Review	2021-2022
Next 5-Year Review	2023-2024
Department Chair	Murray Horne
Date Submitted	July 31, 2023

I. SUMMARY OF ASSESSMENT *(suggested length of 1-2 pages)*

A. PROGRAM LEARNING OUTCOMES (PLO)

List all your PLO in this box. Indicate for each PLO its alignment with one or more institutional learning outcomes (ILO). For example: "PLO 1. Apply advanced computer science theory to computation problems (ILO 2 & 6)."

1. Identify key concepts, principles, and applications of psychology's content domains.
2. Apply scientific reasoning to interpret psychological phenomena and to design and conduct basic psychological research (ILO 1: Critical Thinking).
3. Evaluate the ethics of psychological science and practice.
4. Demonstrate effective communication skills (ILO 2: Written Communication).
5. Describe career options within psychology.

B. PROGRAM LEARNING OUTCOME(S) ASSESSED

List the PLO(s) assessed. Provide a brief background on your program's history of assessing the PLO(s) (e.g., annually, first time, part of other assessments, etc.)

During the 2016-2017 school year, we assessed PLO 4 using the CSUEB ILO Written Communication Rubric. During the 2017-2018 and 2018-2019 school years, we created and revised an online multiple-choice test to evaluate PLOs 1, 2, and 3. During the 2019-2020 school year, we used an empirical article analysis assignment to evaluate PLO 2. During the 2020-2021 school year, we used the online multiple-choice test to assess PLO 3 and also surveyed faculty on how they cover ethics in their classes. During the 2021-2022 year, we assessed PLO 4 using the CSUEB ILO Written Communication Rubric with our advanced research classes (PSYC 491/493). In the most recent year (2022-2023), we assessed PLO 5 using a new survey that we designed to assess career knowledge and students' beliefs about skills they acquired throughout the program.

C. SUMMARY OF ASSESSMENT PROCESS

Summarize your assessment process briefly using the following sub-headings.

Instrument(s):

We evaluated student knowledge of careers. We also evaluated students' beliefs about skills they gained throughout the program. Members of the assessment committee created a survey in collaboration with undergraduate students. The assessment included an open-ended question about careers of interest, followed by a list of 30+ psychology careers within the three broad areas of (a) counseling/community/education, (b) business/tech, and (c) science/research/health. We also asked about important skills students have learned as a result of their psychology major using an open-ended question followed by a list of (a) general and (b) technical skills for which they could select answers they agreed with. In addition to evaluating knowledge, we were interested in providing knowledge about careers, so we also asked participants whether they learned information about careers from the survey. Finally, the assessment also asked about students' demographics (e.g., gender, ethnicity/race, first generation status) and academic trajectory (e.g., year in college, expected graduation year, degree, experience meeting with advisors) as well as their interest in graduate school. The full survey is attached.

Additionally, the Department, in collaboration with the Society of the Mind undergraduate psychology club, hosted two career-focused talks. These were led by an undergraduate student with a background in career counseling (as part of her independent study course), and we had students in attendance fill out pre- and post-surveys. [Career and Education Planning Workshop.pptx](#)

Sampling Procedure:

Students on the Psychology Department listserv were emailed. We offered entry into a raffle to win one of several \$10 gift cards.

Students attending the Career and Education Planning workshops were provided with QR codes embedded in the slides, at the beginning and end of the talk, and given a few minutes to complete the surveys.

Sample Characteristics:

From the email sent out to the Department listserv, we collected survey responses from 183 students. This sample was 66% female, 15% male, and 1% non-binary (8% neglected to answer). Ethnicity/race identification was as follows: 39% Latinx American/Hispanic, 20% White/European American, 17% Asian American/Pacific Islander, 10% African American/Black, 3% Middle Eastern/Southwest Asian American, 2% Native American/Indigenous, and 5% identifying as "other" (18% did not respond). Fifty-six percent of the respondents identified as a first generation college student, 21% identified as a continuing generation college student, 4% were unsure, and 9% neglected to respond.

From the career talks, we collected 13 survey responses from the pre-survey and 15 responses from the post-survey. Students may not have arrived in time to get the QR code for the first survey, or been able to stay until the end for the post-survey, and some attendees may have elected not to participate, so the number of responses was low and these data should be considered with that in mind. The sample was evenly split between juniors and seniors (an average of 3.5 semesters spent at CSUEB). Most (77%) were Psychology B.A. students but some (23%) were also B.S. students with the Industrial/ Organizational concentration, with no Ergonomics students attending. 36% of students transferred to Psychology from another major. No demographic information on race/ gender/ first gen status was collected.

Data Collection: *(include when, who, and how collected)*

In October 2023, an email was sent to the Department listserv asking students to respond to a survey about careers. One follow-up email was sent out a few weeks later. We collected responses from 183 students between Oct. 26, 2023 and Nov. 30, 2023. Students completed these surveys from their own devices, and were offered entry into a raffle to win one of several \$10 gift cards.

Two career talks were also held on April 6th and April 11, during which we collected pre-survey (n = 13) and post-survey (n = 15) assessments. Students completed these surveys from their own devices. As fewer students responded to these, the majority of the data described below is from the department survey.

Data Analysis:

Use of Career Services

Students were asked whether they had ever used the career services resources on campus. About two-thirds of students, 66%, had never used the services. The rest had used career services once (19%) or multiple times (11%) while others were uncertain if they had used the services (4%).

Career Interests

Students could indicate an interest in some, all, or none of the broad career areas (i.e., counseling/community/education, business/tech, and science/research/health). Seventy-nine percent of students indicated an interest in counseling/community/education, 27% of students indicated an interest in business/tech, and 50% students indicated an interest in science/research/health. Students then saw lists providing examples of careers within each category, and were asked to select the ones in which they were interested. Fifteen percent of students indicated that they were unsure about the broad career areas, and these students were exposed to all three lists of careers. The most popular responses are as follows. Within the counseling/community/education area, 52% of the students indicated an interest in career/school/group counseling, 39% indicated an interest in social work, and 30% indicated an interest in becoming an MFT (Marriage and Family Therapist). Within the business/tech area, the most popular career was human resource specialist, with 23% of participants

indicating interest, followed by a career in public relations, with 19% indicating interest. Finally, within the science/research/health area, the most popular career/job was research assistant (26%), followed by board certified behavior analyst (20%). See Table 1 for a full list of careers/jobs and percentages of participants indicating interest.

Table 1.

Student Interest in Careers in Psychology

Area	Career/Job	% of Students Indicating Interest
Career/School/Group Counselor	Career/ School/ Group Counselor	52
	Social Worker	39
	MFT Therapist	34
	Other Counseling/ Community/ Education profession	30
	Rehabilitation Specialist	21
	Detective	21
	Public Administrator	20
	K-12 Teacher	18
	Professor	14
	Policy Analyst	9
	Probation Officer	9
	Lawyer	5

	Clergy	2
	Local Political Office	1
Business/Tech	Human Resource Specialist	23
	Public Relations	19
	Marketing/Advertisement	14
	Data Analytics	13
	Management Consultant	13
	Diversity Consultant	12
	Market Research Analyst	12
	UX (user interface or use experience) designer	7
	Journalism	5
	Tech Sales	4
	Other Business/ Tech profession:	3
Science/Research/Health	Research Assistant	26
	Board Certified Behavior Analyst	20

	Academic Researcher	19
	Speech/Language Pathologist	17
	Forensic Science Technician	15
	Physician's Assistant	15
	Pharmacy Technician	10
	Lab Manager	9
	Other Science/Research/ Health profession:	9
	Science Writer	6

For the open-ended question about careers, two undergraduate students scored (coded) the clarity/specificity of participants' open-ended responses for careers. The coding instructions asked them to rate how clear each respondent was in their career goals. Ratings ranged from 1 (*unclear*) e.g., if they wrote nothing or "I don't know/ not sure", up to 7 (*very clear*) e.g., if they wrote "I want to go into X field". People who entered a lot of unrelated career options might get a score of 3 or 4, and people who entered several related options would get a score of 5 or 6. The two coders' responses were highly correlated with each other ($r = .91$), and we averaged those two scores. To test whether more time spent as a student at CSUEB was associated with greater career clarity, we ran a correlation between the averaged career clarity measure and the number of semesters that students had spent at CSUEB, and found no significant relationship, $r = .06$, $n = 182$, $p > .05$. Careers that were commonly listed in this open-ended question included Marriage and Family Therapist, Teacher, Human Resources Management, Board Certified Behavioral Analyst, Counselor, and Clinical Psychologist.

In addition to assessing students' knowledge of careers, a goal of the survey was to provide knowledge about possible careers. At the end of the survey, we asked "Did taking this survey help you to learn about new careers available to you with a psychology degree? Forty-six percent of participants answered yes, 27% answered maybe, and 14% answered no.

Interestingly, clarity of career interest was not related to the extent to which students had met with a psychology department advisor ($r = .06$). One possible explanation is that most meetings with advisors focus on what courses students need to graduate, and only lightly touch on career

preparation. This suggests that advisors could incorporate more guiding questions to help students think ahead to their careers. Clarity of career interest was also not correlated to whether students had used CSUEB career services such as AACE (not at all, once, or multiple times), $r = .006$. Though 2/3rd of students had not used career services, it may be that those who did use it were either confused and seeking clarity or already had clarity and were seeking practical actions. Either way, working more closely with career services to see what support would be useful to students might be a helpful step for the department to pursue.

Additionally, students reported the reason they decided to major in psychology in an open-ended format, which was coded by one of the faculty members. About half of the students (50%) indicated general enjoyment or interest in psychology as the primary reason for choosing psychology as their major. About 3 in 10 students (31%) chose psychology as a means to advance in a desired career or as a prerequisite for graduate school applications. One in 10 (10%) were motivated by a broad interest in helping others, without mentioning a specific career. A minority of students chose psychology as a major for logistical reasons (7%) or because their skills matched with those required for success (2%). These results indicate that students are not necessarily thinking about their career options when they start out as a psychology major. Thus, faculty advisors and mentors should start discussing career goals and psychology-related jobs early and often.

Graduate School Interest

Students were asked if they were considering enrolling in a graduate program after graduation. The majority of our respondents (53%) replied in the affirmative, with another 35% saying they were undecided. Only 12% said they were not considering graduate school. (Although a follow-up question asked which specific types of graduate programs they were interested in, several options including clinical psychology were discovered to have been left off the list after the data were collected, so the responses to that question are not explored here.)

Skills

We also evaluated students' beliefs about skills acquired throughout the program. Table 2 shows the percentage of participants indicating learning of a given skill. The table is divided into general skills and technical skills.

Table 2.

Skills Endorsed by Students

GENERAL SKILLS	% of Participants Indicating Learning of Skill
Demonstrate social responsibility and ethical decision-making in a diverse world	70
Approach problems from multiple perspectives, notice recurrent patterns, and extract general principles	68
Understand and manage own emotions in positive ways to relieve stress, communicate effectively, empathize with others, overcome challenges and defuse conflict	64
Contribute to a team effort by effectively listening, communicating, and collaborating with others (teamwork)	63
Think critically about claims, comparing evidence for and against the claims	61
Use interpersonal communication skills to collaborate with a diverse group of people	58
Manage your own time effectively	56
Adhere to a code of professional ethics, including in research settings	54
Navigate research using library collections, journals, and databases	53
Critically evaluate news media regarding psychological research	50
Write clearly and concisely	48
Read difficult material with a high level of comprehension	41

Utilize effective conflict management strategies in the workplace	37
Present complex ideas to an audience in a clear and engaging manner	31
TECHNICAL SKILLS	
Notice and evaluate signs of mental illness, substance abuse, etc.	63
Design and validate surveys, tests, and questionnaires	57
Write the results of a research project in an APA-style manuscript	57
Systematically observe and record data about behavior	54
Notice and evaluate social behaviors such as nonverbal signaling and social appropriateness	53
Select, learn, and use appropriate statistical analysis computer applications for different tasks (such as Excel, SPSS and Minitab)	51
Notice and evaluate errors in cognition (e.g., perception, memory, judgment)	51
Design, conduct, and implement research projects	50
Articulate how psychological principles can be used to understand and aid in the solution of real-world challenges	50
Understand principles of child development and how to apply them to create nurturing environments for children	44
Notice and evaluate potential sources of human conflict, and implement conflict resolution approaches	44
Perform statistical analyses and interpret results	43
Notice and evaluate forms/ opportunities for negotiation and leadership	34

Notice and evaluate workplace factors such as job demands, work setting, and opportunities for habit formation	34
Reduce the uncertainty of decisions by utilizing rational decision-making model such as decision tree	28

The number of skills that participants endorsed correlated with their year in the program. That is, the closer students were to graduation, the more skills they reported, $r = .27, n = 182, p < .001$. Although how close students were to graduation was not correlated with the clarity of their open-ended career response (as reported in the earlier section), the number of skills they reported was correlated with the clarity of their open-ended career response, $r = .26, n = 183, p < .001$. One possible explanation for these findings is that although some students start the program with clear career plans (i.e., clarity of career plans does not correlate with year in the program), the more skills one reports developing in the program, the more clearly they can articulate their career goals.

Career Workshop Surveys

The surveys that took place before and after the career talks highlighted the value of making career information more accessible. The pre-survey asked students “Do you feel prepared for your next steps after graduation? (1 = not prepared at all, 10 = extremely prepared)”, to which the mean response was 2.83, $SD = 2.54$. After the workshop, the mean increased to 6.29, $SD = 2.08$. After the presentation, students reported appreciating the information about different career paths and the resources about applying to graduate school, and they rated CSUEB student resources as being available ($M = 7.93, SD = 2.02$) and relevant ($M = 8.33, SD = 1.66$).

D. SUMMARY OF ASSESSMENT RESULTS

Summarize your assessment results briefly using the following sub-headings.

Main Findings:

We found that students had some knowledge about careers, but that they could benefit from more knowledge and more opportunities to consider their careers earlier in college, and to become familiar with the resources on campus. About half of our students were considering graduate school. The majority of students were interested in a counseling profession, and the most endorsed technical skill was to “notice and evaluate signs of mental illness, substance abuse, etc.” At the same time, students appreciated learning about other career paths, beyond counseling, that are open to psychology majors.

Recommendations for Program Improvement: *(changes in course content, course sequence, student advising)*

We will continue to hold sessions in our department seminar series that provide information about different career options and the process of applying to graduate school. Our department also

developed a new one-unit course (PSYC 201) to provide more information about careers to psychology majors. We should also invite psychology advisors to ask questions to prompt students to think about their future careers instead of solely focusing on classes needed to complete the degree, and to become more familiar with the career services on campus.

Next Step(s) for Closing the Loop: *(recommendations to address findings, how & when)*

This career assessment was a good first step in assessing our students' knowledge of careers and of the skills they are gaining from our program. The next time we assess careers, we may consider having students express interest along a scale for various careers, instead of dichotomous yes/no responses for careers that interest them. Similarly, students could rate the extent to which the major has helped them to learn a given skill. We may then be able to assess growth in this area over time, perhaps by comparing scores provided by freshmen to those provided by seniors.

We will discuss results from the 2022-2023 assessment during a faculty meeting fall semester. After presenting the results, we will ask faculty for feedback about the assessment in order to improve it for the next time PLO 5 is assessed.

Other Reflections:

E. Assessment Plans for Next Year

Summarize your assessment plans for the next year, including the PLO(s) you plan to assess, any revisions to the program assessment plan presented in your last five-year plan self-study, and any other relevant information.

During 2023-2024, we plan to evaluate PLO 1 (Identify key concepts, principles, and applications of psychology's content domains) and PLO 3 (Evaluate the ethics of psychological science and practice). We will use a variation of the multiple-choice test used in 2018-2019 and will collect data from students in introductory psychology courses as well as our capstone research courses to evaluate learning using a cross-sectional design.