

PILOT PROJECT 2

Utilizing Professional Development to Improve Student Career Outcomes in Computer Science and Software Engineering (Appendix J; Example Proposal Feedback)

Project Overview + Summary ///

The Department of Computer Science and Software Engineering (CSSE) seeks to understand observed gaps in career outcome success for graduates of this department in relation to other departments within the Samuel Ginn College of Engineering. A review of career outcomes data revealed lower success rates for CSSE graduates, and a review of student engagement data revealed lower involvement rates in High-Impact Practices (HIPS). Success and involvement gaps were also identified for students from underrepresented communities. Additionally, the department seeks to improve the first destination and campus engagement survey response rates for CSSE graduates. The planned intervention involves a series of professional development seminar courses embedded into the curriculum through which students will receive targeted resources and support. Further data collection related to the intervention will also occur through these courses.

Project Initiation ///

Academic Insight received an initial project abstract from CSSE on April 29, 2022. After a preliminary review and feedback from Academic Insight staff and the QEP Advisory Council member, CSSE submitted a full project proposal on September 1, 2022. Another round of review and feedback from the Community of Practice was completed on September 29, 2022, and, after further discussion, a final budget was approved on November 8, 2022.

Specification of the Problem, Opportunity, and Target ///

The Department seeks to create solutions for two specific problems identified in the career outcome data: 1) the FDS response rate for CSSE graduates during the spring 2021 collection year (Summer 2020, Fall 2020, Spring 2021) was 83%, which is considerably lower than the typical response rate of over 98%; and 2) during the 2020–2021 collection year, relatively large percentages of women and African American graduates from CSSE indicated unsuccessful first destination career outcomes. Specifically, 23% of women and 44% of African American graduates responded as still seeking employment or applying for continuing education. The department hopes to increase career outcomes for these underrepresented groups.

Connections to AUBURNACHIEVE ///

The project has three main objectives: 1) collect 100% detailed first destination data from all students graduating from the CSSE department; and 2) enhance first career outcomes for women and African-American graduates, and 3) discover any other data gaps. The first objective aligns with the University's QEP Quantity Objective to increase first destination outcome success for graduating students. Between summer 2020 and spring 2021, only 83% of CSSE students completed the FDS. Furthermore, within that percentage, 23% of women and 44% of African American students responded with "still seeking employment/continuing education." By achieving 100% completion percentage, CSSE will have data from all CSSE students, including specifically targeted student populations within the department. These data will provide more opportunity for strategic intervention for any students that do not feel academically prepared to pursue continuing and professional education or prepared to pursue career opportunities. Through achieving 100% completion of the FDS, CSSE aims to discover insights into the satisfaction of students' first destination post-graduation. This aligns with the QEP's Quality Objective 1 (students being satisfied with their first destination outcome) and

Objective 2 (students being placed into high quality careers). Furthermore, discovering why students select “still seeking employment/continuing education” will facilitate more impactful interventions for each individual student. For example, students may report still seeking employment/continuing education due to the lack of obtaining job interviews, not obtaining the desired job offer or school acceptance, lack of resources and opportunities for careers, inadequate career planning, or other reasons.

Current Status ///

As noted above, the project’s final budget was approved on November 8, 2022. Currently, CSSE is preparing for the project’s scheduled implementation date of January 2023.

Future Steps ///

The planned intervention includes a professional development seminar sequence required for all students during the sophomore and senior years. CSSE will use these seminars as a vehicle for providing students access to professional development opportunities and resources, such as mentoring and career preparation. The seminars will also serve as a method for further data collection from students and graduates; these data will aid the department in further honing the intervention, particularly as it pertains to students from underrepresented groups. The professional development seminars will begin during the spring 2023 semester, and the lifespan of the project is set for two years, ending after the fall 2024 semester. At the end of each semester, the Office of Academic Insight will assist CSSE by providing analysis of career outcomes data. CSSE plans to continue the intervention after the project is complete.

Assessment Plan ///

Semester impact will be assessed by analyzing the at-graduation and six months post-graduation career outcome data for CSSE graduates and then comparing the results to career outcomes data from semesters before the intervention was implemented. Overall impact will be assessed after six months post-graduation career outcomes data have been collected for the fall 2024 semester. CSSE hopes to share findings at the planned Academic Insight poster presentation as well as various conference outlets.

