

Program Review and Assessment Committee (PRAC)

University Curriculum Forum

Undergraduate Program Review Report: Computer Science – School of Communication, Information and Library Services

April 13, 2010

The Computer Science Department in the School of Communication, Information and Library Services submitted a self-study report to UCF – PRAC on March 31, 2010. The self-study covered Standards 1-17 of the Academic Program Review document. PRAC reviewed all submitted materials and met with the Chairperson, Winnie Yu, and the Computer Science Department's assessment coordinator, Dr. Hrvoje Podnar, for discussion of the self-study report on April 8, 2010. No revisions were required. All standards were met and PRAC recommends **continuing approval** of the program. PRAC's summary report as well as the Computer Science Department's Executive Summary are submitted to UCF for the April 15, 2010 meeting.

PRAC commends the work done by the Computer Science Department and views this work as exemplary. The following are some specific evaluations of Standards 1-17:

Standard 1: The department/program's mission supports the University's mission

Met

The mission of Computer Science Department (both programs: General Computer Science and Computer Information Systems) is well articulated and aligned with the University's mission of academic excellence, access, social justice and service for the public good. The report identifies specific examples of the Department's support of the University's mission. This standard could serve as an example to other departments.

Standard 2: The department/program has clearly stated program goals and objectives

Met

The Computer Science Department identified four program goals and eight learning outcomes for the General Computer Science program, and six program goals and 11 learning outcomes for the Computer Information Systems program. There was a clear statement of what the programs intend to accomplish. Examples of mapping program and learning objectives onto specific learning outcomes at the course level were provided.

Standard 3: The department/program has clearly stated program -level expected student outcomes and methods for measurement

Met

The Computer Science Department has identified specific student learning outcomes for each of its learning objectives and identified **direct** methods for assessing these student learning outcomes. For example, one outcome is that students will learn how to analyze, design, implement and evaluate software and hardware. A direct measure of this is a blind review of student work. Indirect measures are student and employer surveys.

Standard 4: The department/program actively uses data about student learning to improve its programs

Met

The Computer Science Department has actively used student performance data to improve its programs, and has a mechanism in place for ongoing evaluation of the program and implementation of program changes as needed.

Standard 5a: Evidence of quality instruction

Met

Syllabi, summaries of student evaluation forms, and surveys are used as evidence of quality instruction. A particular strength is “for each course within the program, the faculty have developed a detailed course description that specifies the major topics covered, needed prerequisites and a mapping matrix that describes the relationship between the course learning outcomes and the evaluation methods used within the course.”

Standard 5b: Evidence of Teaching effectiveness

Met

Of note, the Computer Science Department describes a particular case example where courses following in a sequence are examined in detail to determine amount of carryover in knowledge from one course to the other. In the case described, the courses were CSC 153 and CSC 212, and content assumed to be learned in CSC 153 was tested in CSC 212. Active efforts are made to update and improve curriculum and curricular map provided for sequences.

Standard 6: The department provides evidence of a coherent and current program

Met

The Computer Science Department describes active efforts made to update and improve curriculum and curricular map provided for sequences. Emphasis was placed on the dynamic nature of their field and their important efforts for remaining current.

Standard 6a: The Department clearly describes the relationship between graduate and undergraduate programs

Met

Standard 7: The department has an appropriate number of qualified faculty, students, and staff

Met

Faculty represent diverse backgrounds and expertise. CVs were included in the report for this standard. Time committed to the program and courses taught were indicated. Documentation of student enrollment patterns was provided and interpreted. Profiles of students and staff were provided.

Standard 8: The Department provides high quality student advisement and maintains adequate tracking procedures of its students

Met

The Computer Science Department has demonstrated a appreciation for the importance of advising and tracking of students. Detail on how students are advised, including registration checklists, was provided. A department student handbook for majors is being created.

Standard 8a: Undergraduate Program Direction

Met

Standard 9: The department offers an appropriate number of courses and sections to meet the needs of students. Statistical data concerning admissions, graduations, courses offered and cancelled, and other relevant statistics are provided and analyzed

Met

Standard 10: The department/program demonstrates a climate of intellectual/professional curiosity and achievement among faculty and students

Met

The Computer Science Department has demonstrated a climate of intellectual and professional achievement. If any recommendations could be made it would be to elaborate more on the specific achievements mentioned.

Standard 11: There is evidence of faculty and student research, scholarship, and/or creative activity.

Met

Summary of faculty and student scholarship was provided.

Standard 12: The department/program has adequate library resources to meet its needs

Met

The library report was very thorough and provided a clear picture of the library resources allocated to this department.

Standard 13: The department/program has adequate facilities and non-print resources, such as audio-visual, computers, labs, practica to meet its needs.

Met

The Computer Science Department identified some facilities issues (e.g., labs, software, IT support, projectors in classrooms and own server), and how these issues may be a concern for continuing accreditation through ABET.

Standard 14: Periodic Review and Evaluation

Met

The General Computer Science program has been accredited by ABET. There is a Technical Advisory Committee (TAC) composed of employers in the local area that advise department regarding curriculum (i.e., remaining current). These meetings follow a 3-year cycle.

Standard 15: The department's activity in community service and outreach is appropriate to the mission of the program and the university

Met

Standard 16: The department provides an analysis of program strengths and weaknesses

Met

The Computer Science Department provides an informative list of strengths, and weaknesses that is consistent with the self-study.

Standard 17: The department describes a vision and action plan for the future

Met

The Computer Science Department provides a vision and action plan for 5 years.

Summary

PRAC appreciates the work the Computer Science Department, and Dr. Hrvoje Podnar, the department assessment coordinator, have done in the preparation and presentation of this self-study report, and has evaluated standards 1-17 as "met." PRAC recommends to the University Curriculum Forum that Continuing Approval be given, and in doing so, understands that Standard 1-17 have been met.