STUDIES IN COMPUTER PROGRAMMING, BPS

Contact

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Faculty List (https://coursecatalog.syracuse.edu/undergraduate/professional-studies/)

Description

The professional studies degree prepares graduates for career placement or advancement in computer programming. Courses will be applied and transdisciplinary – designed to develop and improve work-ready skills through a wide range of computer programming competencies and cognitive skills. It will address the following computer programming knowledge areas: programming fundamentals; programming in various programming languages; critical thinking; problem synthesis and solving; program design; mathematics; and testing, and evaluation.

Student Learning Outcomes

1. Design a system, component, or process to meet desired outcomes within realistic constraints.
2. Analyze and evaluate programming applications to ensure they are accurate, efficient, and meet required outcomes.
3. Exhibit the ability to identify, formulate and solve problems.
4. Master advanced programming and interfacing techniques.

Program Requirements

Code	Title	Credits
Liberal Studies Core		
The Liberal Studies Core gives a foundation in writing, language or quantitative skills, humanities, social science, natural science, and critical reflections. It draws upon lower-division courses in the College of Arts and Sciences.		
Writing		
WRT 105	Studio 1: Practices of Academic Writing	3
WRT 205	Studio 2: Critical Research and Writing	3
Quantitative Skills		
Complete 6-8 credits of Quantitative Skills Sequence Requirement outlined in the Liberal Arts Core Guidebook.		6-8
Humanities		
Select six credits from any course listed in the Humanities Division of the Liberal Arts Core Guidebook.		6
Social Science		
Select six credits from any course listed in the Social Sciences Division of the Liberal Arts Core Guidebook.		6
Natural Science		
Select 3-4 credits from any course listed in the Natural Sciences Division of the Liberal Arts Core Guidebook.		3-4
Critical Reflections on Ethical & Social Issues		
Select 3 credits from any course listed in the Critical Reflections on Ethical & Social Issues Division of the Liberal Arts Core Guidebook.		3
Students are required to select one Liberal Arts Core Course that meets the IDEA requirement.		
Professional Competencies Core		
The Professional Competencies Core covers fundamental knowledge and abilities required in the modern workplace, such as ethics and critical thinking, problem solving, human relations, diversity and change management, budgeting and resource management, and teamwork. The Professional Competencies Core includes an introductory course, and a capstone experience required of all B.P.S. students. Designed to draw together issues from across the entire B.P.S. program, these courses summarize concepts covered in the curriculum and develop students' skills in strategic decision-making that looks to the future.		
Required Courses		
BPS 144	Orange Immersion	2
BPS 211	Introduction to Professional Studies	3
BPS 411	Senior Seminar	3
FYS 101	First Year Seminar	1
Select seven of the following:		21
ODL 303	Introduction to Change Management	
BPS 315	Practical Financial Management for the Working Professional	
BPS 317	Assertiveness in the Workplace for Professional Studies	
BPS 321	Rhetorical Awareness and the Diverse Workplace	
ODL 425	Design Thinking for Organizations	
ODL 335	Conflict Management	
BPS 382	Leading Cooperative Negotiations	
ODL 319	Global Leadership	
CYB 323	Introduction to Information Security for Professional Studies	
PPM 301	Foundations of Project Management	
PPM 325	Project Communications and Stakeholder Management	
SCP 103	Introduction to Computing Systems	
SCP 225	Concepts in Digital Graphics	
SCP 295	Esports Fundamentals	
SCP 435	Multiplayer Game Design Competition	
Major Requirements		
SCP 220	Basic Principles of Computer Programming	3
SCP 285	Object-Oriented Programming	3
SCP 305	Database Management	3
SCP 360	Introduction to Mobile Applications	3
SCP 350	Introduction to HTML/CSS	3
SCP 355	Introduction to Javascript/jQuery	3
SCP 405	Programming in C++	3
SCP 420	Web Application and Design	3
SCP 418	Programming in Java	3
SCP 445	Cross Platform Mobile Application Deployment	3

SCP 482	System Software Design for Professionals	3
Electives		
Select 27 credits (or as many needed to reach 120 credits)		27
Total Credits		**120-123**

Note

The degree is administered by the College of Professional Studies. Each student should consult with their Academic Advisor to structure a plan for degree completion.

Undergraduate University Requirements

The following requirements and experiences apply to all Syracuse University Undergraduate matriculated degree programs.

- IDEA Course Requirement (https://coursecatalog.syracuse.edu/undergraduate/idea-course-requirement/)
- First Year Seminar (https://coursecatalog.syracuse.edu/undergraduate/courses/fys/)