Computer Engineering BS Curriculum Map

Core Courses	SO(a)	SO(b)	SO(c)	SO(d)	SO(e)	SO(f)	SO(g)	SO(h)	SO(i)	SO(j)	SO(k)
(Prerequisite)											
CPSC 120	Ι	Ι	Ι						Ι		Ι
CPSC 121 (CPSC 120)	R	R	R						R		R
CPSC 131 (CPSC 121)	R	R	R						R	Ι	R
CPSC 253U (CPSC 121)							Ι	Ι	А		
CPSC 351 (CPSC 131, 253U)	R		R								
EGCP 180 (CPSC 120)	R										R
EGCP 280 (EGCP 180)	E				Ι						E
EGCP 281 (CPSC 120 or 121 & EGCP 180)		R			R						
EGCP 371 (MATH 250B)		R									E
EGCP 381 (EGCP 281 & EGEE 303)	E									R	
EGCP 401 (MATH 150A)						Ι		R	E		
EGCP 441 (EGCP 281 & EGEE 303)		Е					R			Е	
EGCP 446 (EGCP 441)					R						E
EGCP 450 (EGCP 280, 381 &441; EGEE 323; CPSC 351)	Е		R		E						
EGCP 470 (EGCP 280, 381 &441; EGEE 323; CPSC 351)			Е	Е							
EGCP 471 (EGCP 450 & 470)			Е	Е			Е		Е		
EGEE 203 (MATH 250A & PHYS 226,L)	X				X				X		
EGEE 203L (MATH 250A & PHYS 226,L)	X	X		X	X		X		X		X
EGEE 303 (EGEE 203 & PHYS 227,L)	X		X		X				X		
EGEE 303L (EGEE 203 & PHYS 227,L)	X	X	X	X	X		X		X		X
EGEE 323 (MATH 250A)	X				X				X		X

Core courses (and its prerequisites) utilized to attain the 11 SOs.

CpE utilizes levels of rigor, I: "Introduce"; R: "Reinforce"; E: "Enhance" to indicate the attainment of SO; Computer Science Department utilizes levels of rigor, I: "Introduce"; R: "Reinforce"; A: "Advance" to indicate the attainment of SO.

Relationships between Computer Engineering SOs and Program Educational Objectives

	Student Outcomes	PEO A. Technical Growth	PEO B. Professional Skills	PEO C. Professional
(a)	An ability to apply knowledge of mathematics, science, and	X		
(b)	engineering An ability to design and conduct experiments, as well as to analyze and interpret data	X		
(c)	An ability to design a system, component, or process to meet desired needs within realistic constraints such as economic, environmental, social, political, ethical, health and safety, manufacturability, and sustainability	Х	X	
(d)	An ability to function on multi-disciplinary teams		Х	X
(e)	An ability to identify, formulate, and solve engineering problems	Х		
(f)	An understanding of professional and ethical responsibility		Х	Х
(g)	An ability to communicate effectively	Х	X	Х
(h)	The broad education necessary to understand the impact of engineering solutions in a global, economic, environmental, and societal context		X	Х
(i)	A recognition of the need for, and an ability to engage in life-long learning		X	Х
(j)	A knowledge of contemporary issues	Х	Х	X
(k)	An ability to use the techniques, skills, and modern engineering tools necessary for engineering practice	Х	X	Х

For the most up-to-date information, please contact the program.

Curriculum Alignment with Program Educational Objectives (PEOs)

Course Learning Outcomes (CLOs) have been written for all the courses included in the curriculum. To ensure that the curriculum is consistent with PEOs, each course in the curriculum is also linked to specific PEOs. Table 5-2 presents a summary of the coverage of the PEOs in the required core courses.

Core Courses	-	PEOs	
	Α	В	С
CPSC 120	Х	Х	
CPSC 121	Х	Х	
CPSC 131	Х	Х	
CPSC 253U		Х	Х
CPSC 351	Х	Х	
EGCP 180	X	X	X
EGCP 280	X	X	X
EGCP 281	X		
EGCP 371	Χ	X	Χ
EGCP 381		X	Х
EGCP 401		X	Χ
EGCP 441	X	X	X
EGCP 446	X		
EGCP 450	X	X	
EGCP 470	X	X	X
EGCP 471	X	X	X
EGEE 203	X	X	X
EGEE 203L	X	X	X
EGEE 303	X	X	X
EGEE 303L	X	X	X
EGEE 323	X	Х	X

Curriculum Alignment with PEOs.

For the most up-to-date information, please contact the program.