University of Colorado
Colorado Springs

College of Engineering & Applied Science – B.I. Computer Security

Contact Information:

Claire Ami
Academic Advisor (A-K)
719-255-3637
cami@uccs.edu

Katie Horner
Academic Advisor (L-Z)
719-255-3659
khorner@uccs.edu

Student Success Center Advising Hours:

Monday: 9am-5pm Walk-in Advising
Tuesday–Friday: 9am-4pm Appointments Only
To schedule an appointment, call 719-255-3260. The Student Success Center is located in Main Hall 208.

General Academic Information

Academic Policies
It is the responsibility of each student to know and follow all Academic policies established by the University and the College of Engineering & Applied Science (EAS) that are set forth in the Catalog (catalog.uccs.edu).

Course Prerequisites
Students are responsible for knowing and completing all course prerequisites. Course prerequisites are strictly enforced for all classes at UCCS.

Restrictions and Limitations
Students must be admitted into the degree major in the College of Engineering and Applied Science at least 30 credit hours prior to graduation. Only three hours of Independent Study may count toward the degree. Work Experience/Military Science/ROTC credit will not apply toward fulfillment of the requirements for a degree from the College of Engineering.

Probation/Suspension
Students whose full-time semester's or cumulative GPA falls below 2.0 will be placed on probation for the next semester in which they are enrolled in the College of Engineering & Applied Science and will be notified by email and mail. If, after that semester, the semester or cumulative GPA is still below 2.0, the student will be suspended from the college. PLEASE NOTE: *While on probation, registration for the subsequent semester will be blocked until final grades are posted for the current semester. This is to verify that the minimum semester GPA for each student has been fulfilled.*

Compass Curriculum
Compass Curriculum is the campus-wide general education program at UCCS. The Compass Curriculum has multiple components many of which will coincide with the degree requirements listed in this guide. Please visit the Compass Curriculum website at www.uccs.edu/compasscurriculum, review your degree audit, or check out the Compass Curriculum advising guide for specific course details. The required components are listed below and referenced in the guide.

REQUIRED COMPASS CURRICULUM COMPONENTS:

Component	Course
Gateway	GPS 1010
Explore – Arts, Humanities and Cultures	INOV 1010
Explore – Society, Behavior and Health	ENTP 1000
Explore – Physical and Natural World	See List
Navigate	INOV 3010
Summit	ENTP 4500
Writing Intensive Course (WIC)[1] *Two courses with at least one upper-division (3000+ level).*	INOV 2010 INOV 3010
Inclusiveness[1]	INOV 1010
Sustainability[1]	ENTP 1000

[1] *Can count towards other requirements within the Compass Curriculum or within a student's degree program.*

DEPARTMENT OF COMPUTER SCIENCE

Department website: www.uccs.edu/cs

Degree Requirements	Courses		
Computer Science Core Courses (51 hours)	CS 1150	Principles of Computer Science	3
	CS 1450	Data Structures & Algorithms *(pre-req CS 1150)*	3
	CS 2060	Programming in C *(pre-req CS 1150)*	3
	CS 2080	Programming with UNIX *(pre-req CS 1450)*	2
	CS 2160	Computer Org. & Assembly Language *(pre-req CS 1450, CS 2060)*	3
	CS 3050	Social & Ethical Implications of Computing *(pre-req CS 2080)*	1
	CS 3060 or CS 3020	Object Oriented Programming in C++ *(pre-req CS 2060 and CS 2080)* Adv Object Tech Using C#/.NET.C# *(pre-req CS 1450)*	3
	CS 3300	Software Engineering *(pre-req CS 2080, CS 3020 or CS 3060)*	3
	CS 3910	System Administration & Security *(CS 2080)*	3
	CS 4200	Computer Architecture I *(pre-req CS 2160)*	3
	CS 4220	Computer Networks *(pre-req CS 2060 and MATH 2150)*	3
	CS 4420	Database Systems I *(pre-req CS 3300)*	3
	CS 4500	Operating Systems I *(pre-req CS 2060, CS 2080 or CS 4200)*	3
	CS 4910	Fundamentals of Computer/Network Security *(CS 3160 and CS 3300)*	3
	CS 4920	Applied Cryptography *(MATH 2150, MATH 3810, CS 3160)*	3
	PAD 3400 or PAD 4400	Public Administration & Homeland Security Understanding Terrorism	3
	CS Electives	*Complete 6 hours of electives from the following:* CS 3000-4999, HSCI 3000-4999, INFS 3000-4999, MGMT 3300-4999, or PAD 3000-4999.	6
Innovation Core (24 hours)	BLAW 2010	Business and Intellectual Property Law *(pre-req Soph Standing)*	3
	ENTP 1000	Introduction to Entrepreneurship	3
	ENTP 4500	Entrepreneurship and Strategy *(pre-req BLAW 2010 and INOV 3010)*	3
	INOV 1010	The Innovation Process	3
	INOV 2010	Innovation Team: Analyze and Report *(pre-req INOV 1010 and ENTP 1000)*	3
	INOV 2100	Technical Writing, Proposals, and Presentations *(pre-req ENGL 1310 or ENGL 1410)*	3
	INOV 3010	Innovation Team: Research and Execute *(pre-req INOV 2010)*	3
	INOV 4010	Innovation Team: Design and Lead *(pre-req INOV 2100 and INOV 3010)*	3

Cross-Discipline Core (15 hours)	*Complete one of the Cross-Discipline Cores listed below. Each Cross-Discipline Core consists of 15 credit hours. See the BI website for specific courses (innovation.uccs.edu).* **Business** **Creative Communication** **Globalization**					15
Composition Courses (3 hours)	Complete ENGL 1310 and the Writing Portfolio.					
	ENGL 1310	Rhetoric & Writing I				3
	PORT 3000	Writing Portfolio Assessment				0
Mathematics (13 hours)	Complete all of the following courses.					
	CS 1300	Computational Linear Algebra *(pre-req MATH 90)*				3
	MATH 1350	Calculus I *(pre-req MATH 1050)*				4
	MATH 2150	Discrete Mathematics *(pre-req MATH 1350)*				3
	ECE 3610 or QUAN 2010	Engineering Probability & Statistics *(pre-req MATH 2350)* Business Statistics				3
Basic Science (10 hours)	Complete one full year of Basic Science with Lab in the same subject. (If Biology sequence is chosen, select two additional hours from BIOL, PES, or CHEM and inform Academic Advisor.)					
	BIOL 1300	BIOL 1310	BIOL 1350	BIOL 1360	CHEM 1301	CHEM 1311
	PES 1110	PES 1160	PES 1120	PES 2160		
Compass Curriculum (3 hours)	In addition to the courses outlined above a Gateway Seminar (**GPS 1010**) must be completed by all students to complete the Compass Curriculum.					
Open Electives (9 hours)	Complete 9 hours of open elective course work to include at least 3 hours at the upper-division (3000+) level. Courses con come from any discipline except Computer Science courses numbered below CS 1150, or Math courses numbered below MATH 1350.					

UCCS Bachelor of Innovation, Computer Security Major Degree Requirements

> A minimum of 128 hours must be completed with a cumulative CU grade point average of 2.0; at least 45 of these hours must be at the upper-division level (courses numbered 3000+).

> The last 30 hours of the degree must be completed while registered in the College of Engineering and Applied Science at UCCS.

> Courses numbered below 1000 do not count towards degree completion.

> This guide is provided for student use only. It does not represent an official documentation of a student's progress towards completion of their degree program. The B.I. Computer Security program requires a minimum 2.0 GPA in all CS course work taken in order to graduate.

Four-Year Degree Plan – B.I. Computer Security

The following four-year plan lists all the specific course requirements for the Bachelor of Innovation in Computer Security degree at UCCS. The order in which these courses are taken may vary with course availability. **Students are responsible for completing all course prerequisites.** Please note that this is a *suggested* degree program; your program may vary.

Suggested First Year

	FALL			SPRING	
√	*Course*	*Hours*	√	*Course*	*Hours*
	CS 1150	3		CS 1450	3
	ENGL 1310	3		CS 2060	3
	ENTP 1000	3		INOV 1010	3
	MATH 1350	4		MATH 2150	3
	GPS 1010	3		Cross Discipline Core Course	3
	TOTAL	16		**TOTAL**	15

Suggested Second Year

	FALL			SPRING	
√	*Course*	*Hours*	√	*Course*	*Hours*
	CS 2080	2		CS 3060 or CS 3020	3
	CS 2160	3		CS 3910	3
	CS 1300	3		INOV 2010	3
	BLAW 2010	3		INOV 2100	3
	Basic Science w/Lab	5		Basic Science w/Lab	5
	TOTAL	16		**TOTAL**	17

Suggested Third Year

	FALL			SPRING	
√	*Course*	*Hours*	√	*Course*	*Hours*
	PAD 3400 or PAD 4400	3		CS 3300	3
	INOV 3010	3		CS 4200	3
	Cross Discipline Core Course	3		CS 4220	3
	Upper Division Open Elective	3		ECE 3610 or QUAN 2010	3
	Open Elective	3		Cross Discipline Core Course	3
				Cross Discipline Core Course	3
	TOTAL	15		**TOTAL**	18

Suggested Fourth Year

	FALL			SPRING	
√	*Course*	*Hours*	√	*Course*	*Hours*
	CS 4500	3		CS 4920	3
	CS 4910	3		CS 3050	1
	CS 4420	3		ENTP 4500	3
	INOV 4010	3		Open Elective	3
	Cross Discipline Core Course	3		Computer Security Elective	3
				Computer Security Elective	3
	TOTAL	15		**TOTAL**	16