UMSL is a NSA/DHS National Center of Academic Excellence in Cyber Defense Education

Undergraduate Certificate in Internet and Web

The undergraduate certificate in Internet and Web is a five-course (15 credit hour) program. It is designed to provide broad training in web technologies at both the client and server sides, including various stack architectures and frameworks, recent technologies such as REST and trends such as microservices. A minimum GPA of 2.5 is required for admission.

A minimum of three courses must be taken from UMSL. Courses may be substituted with the permission of the certificate coordinator.

Required core courses		Availability
CMP SCI 3010	Web Programming	FPS
CMP SCI 4010	Advanced Web Development with Java	FP
CMP SCI 4011	Web Development with Advanced JavaScript	P
CMP SCI 4012	Introduction to Enterprise Web Development	P
Choose one of the electives		
CMP SCI 4020	Introduction to Android Apps: Android Fund.	P
CMP SCI 4030	Introduction to Intelligent Web	TBA
CMP SCI 4610	Database Management Systems	FP
CMP SCI 4730	Computer Networks and Communications	FP
CMP SCI 4750	Introduction to Cloud Computing	F
CMP SCI 4794	Introduction to Security of IoT Systems	F
Total courses (credit hours)		**5(15)**

For more info about Computer Science visit umsl.edu/cs, for careers visit umsl.edu/cs/careers.
For electronic version visit http://umsl.edu/cs/certificates.
Availability: Summer (**S**), Fall (**F**), Spring (**P**)
Mode: Online ⊘ Evening 𝙀
For course rotation visit https://www.umsl.edu/cmpsci/undergraduate-studies/3yearcourse.html

V1/23/2023