

ROBOTICS ENGINEERING (MS)

Program Overview

Master of Science degree in Robotics Engineering offers a comprehensive course of study in robotics. Research opportunities exist for students to actively participate in the program's research activities. The research areas include image processing, computer vision, artificial intelligence, industrial robot manipulators, unmanned aerial vehicles, autonomous ground robots, embedded systems, and microelectronics.

Career Opportunities

Robotics Engineering graduates typically work in the robotics industry, continue their studies in doctoral programs at premier institutions.

Program of Study

Code	Title	Credit Hours
Area 1 Required: 21 Credit Hours		
Take the following foundational courses		
ENGR 5151G	Computer Vision 1	3
ENGR 5161G	Elements of Machine Intelligence	3
ENGR 5176G	Kinematics and Dynamics	3
ENGR 5236G	Microelectronic Circuits	3
ENGR 5238G	Introduction to Embedded Systems	3
Take two additional courses from the following list to accumulate 21 credit hours in Area 1.		6
If any of the above foundational courses were taken as undergraduate courses (U version) in the undergraduate program of study, substitute graduate level ENGR, CPSC, or MATH courses.		
Any 5000+ ENGR/CPSC/MATH class with advisor approval		
Area 1 Total		21
Area 2 Required: 9 Credit Hours		
Must complete one of the options below.		
Thesis Option		
ENGR 6000	Thesis Defense	
ENGR 6999	Thesis Research (Repeat to complete a total of 9 hours)	
Nonthesis Option		
Take one of the following two courses twice for a total of 6 hours		
ENGR 6399	Graduate Research Project	
ENGR 6689	Supervised Graduate Internship	
Choose one of the following courses that is not applied in Area 1:		
Any 5000+ ENGR/CPSC/MATH class with advisor approval		
Area 2 Total		9
Total Credit Hours		30

Physics, or a suitably related field. A minimum CGPA of 3.0/4.0 is required for the Bachelor's degree completed.

Students may also submit (as optional materials) recommendation letters from persons familiar with the applicant's academic or professional experience and the verbal and quantitative parts of the Graduate Record Exam (GRE) taken in the last five years.

Admission Requirements

In addition to the Columbus State University Graduate School Admissions requirements, the applicants must submit copies of their transcripts, CV (outlining applicant's education, work experiences, special activities and awards), and a statement of purpose (~2 pages). The minimum entry requirement to the program is a Bachelor's degree in Engineering,