

Computer Integrated Manufacturing (2165)

Associate in Science or Associate in Applied Science

The Computer Integrated Manufacturing Technology program specializes in the computer-controlled systems for manufacturing applications. Your training will include electronics, industrial components, various computer control software and hardware applications, industrial control circuits, programmable logic controllers (PLCs), hydraulics and pneumatics. You will also receive specialized courses in automated manufacturing systems such as automated process control, which prepares you to work in the manufacturing, food, chemical, paper pulp, and pharmaceutical industries.

Career Opportunities, Rapid Placement

Florida has more than 16,000 manufacturers employing more than 400,000 workers, and the demand for more is high. The program you choose today will prepare you for the career you want tomorrow at companies that include: Adcom Wire Company, Advantus Corp., A-Jax Company, American Rubber Technologies, Ameritape, Anchor Glass Container, Anheuser-Busch, Bacardi Bottling, Colomer, Georgia-Pacific Corporation, International Flavor & Fragrance, Mac Paper Converters, Maxwell House Coffee, Medtronic-Xomed, Owens Corning, Rex Corporation, Swisher International, United States Gypsum Company, Vistakon and Walter Lorenz Surgical. We'll also refer you for internships and job interviews.

Annual Salaries

Entry level wage in industrial machinery and manufacturing in Florida averages \$17.10 per hour. Overtime, bonuses, rapid advancement and opportunities for self-employment can rapidly increase your income.

Cost

Estimated cost of tuition is \$4,250 (tuition rated for Florida residents, as of 7/07). Contact the program manager for additional costs (textbooks, materials, fees).

Need More Information? Contact:

Lance Wallace, Advanced Technology Center, 904.598.5676
Or call 904.598.5673

Curriculum

Course Number and Title	Credits
General Education	
*Mathematics	3
*Humanities	3
*Social and Behavioral Sciences	3
*Communications – Category B	3
ENC 1101 English Composition I	3
Credit Hours	15
Required Professional Courses	
EET 1084 Survey of Electronics	3
EET 1140 Industrial Electronics	3
EST 1603 Robotics — Mechanics and Control	4

EST 1542	Introduction to Programmable Logic Controllers	4
EST 1511	Motors and Control Circuits	3
EST 1535	Automated Process Control	3
EST 1700	Hydraulics and Pneumatics	3
EST 1520	Basics of Instrumentation	3
EST 1531	Human Machine Interface and Systems Graphics	3
EST 1352	Introduction to Manufacturing Processes	4
EST 1540	Industrial Applications Using Programmable Logic Controllers and Robots	4
EST 1632	Computer Integrated Manufacturing	4
EST 1942	Internship	2
	Credit Hours	43

Professional Electives (minimum 6 credit hours)

CET 1630	Fiber, Voice and Data Cabling	3
ETD 1100	Engineering Drawing	3
ETM 2315	Mechanical Devices and Systems	3
EST 2527	Electromechanical Components and Mechanism	3
ETM 2317	Drive and Pump Systems	3
ETI 2622	Introduction to Lean Manufacturing	3
EST 1936	Technical Career Exploration	2
	Credit Hours	6

Total Credit Hours **64**

*Refer to A.S./A.A.S. degree **General Education Requirements**.

Note

You have two options in this program: the associate in science (A.S.) degree, which can prepare you for employment or transfer to a state university, and the associate in applied science (A.A.S.) degree, which is intended primarily for students who want immediate employment after graduation. If you choose the A.S. degree you must take **MAC 1105**, **MGF 1106** or a higher level mathematics. The A.A.S. degree requires **MAT 1033** or higher. Please see an advisor to determine the option that is best for you.

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