Engineering Technologist

Industrial/Manufacturing Track or Quality Assurance Track

Associate of Applied Science Degree: 10-623-8
Campus: Fond du Lac
(some courses also available at the West Bend campus)

Description

The Engineering Technologist program combines the foundational skills related to industrial engineering with the skills of computerized manufacturing. Students learn the planning, setup, monitoring, analyzing and controlling of integrated systems in order to improve efficiencies in a manufacturing environment, standardize and streamline processes, and initiate cost savings for businesses. Applications in problem solving and automated technologies are emphasized.

Although a broad range of manufacturing skills are covered, students in the final stages of coursework select a specialized training track in either Industrial/Manufacturing or Quality Assurance.

Representatives from business and industry have identified skills that are essential to success in manufacturing. Students will be expected to demonstrate the critical core manufacturing skills throughout all the manufacturing classes. The critical core manufacturing skills include: work cooperatively, work productively, listen effectively, demonstrate a positive attitude, maintain a safe work environment, demonstrate integrity, communicate clearly, follow directions, apply problem solving strategies, apply mathematical reasoning, think critically and adapt to change.

Graduates are trained to work as members of teams consisting of engineers and production workers in a variety of industrial and manufacturing settings.

Program Outcomes

- Solve manufacturing- and safety-related problems.
- Use various manufacturing processes.
- Program automated machines.
- Operate automated work cells.
- Recommend lean manufacturing techniques within an organization.
- Use computer-aided drafting and manufacturing software.
- Operate gauging and measuring equipment.

Program Outcomes (Cont.)

- Plan a quality assurance system.
- Perform basic robotic programming and setup.
- Complete a project within a cross-functional team.

Career Opportunities

- Industrial Engineering Technician
- Manufacturing Engineering Technician
- Quality Assurance Technician
- CNC Programmer
- Robotics and Material-Handling Technician
- Continuous Improvement Technician

MPTC Yearly Salary Range for Recent Graduates

$27,038 - $42,117

Admission Process

- Submit the college admission application.
- Submit the $30 one-time fee.
- Submit high school/other official college transcripts.
- Take the college placement assessment (ACCUPLACER, ACT or other).
- Meet with an admissions specialist to determine the best course sequencing and prerequisites (strongly encouraged).
- Check with Admissions if any additional steps are required.

For additional information, visit
www.morainepark.edu

Beaver Dam
700 Gould Street
Beaver Dam, WI 53916-1994

Fond du Lac
235 North National Avenue
Fond du Lac, WI 54935-2884

920-924-3207

West Bend
2151 North Main Street
West Bend, WI 53090-1598

TTY 920-929-2109

1-800-472-4554

Moraine Park Technical College Is an Equal Opportunity/Access Employer and Educator.

Course Number	Course Title	Year Cr.	2009-2010 S	F	W	P	2010-2011 S	F	W	P
Technical Studies Courses (both tracks)										
606-170	CAD 3-D, NX (Unigraphics) (or)	3								
617-112	CAD 3-D, Pro-Engineer (or)									
617-114	CAD 3-D, SolidWorks									
606-176	CAD 2-D, AutoCAD	3								
617-134	Principles of Design	3								
623-118	Gage Calibration, Repeatability and Reproducibility (or)	3								
628-122	Basic CNC Programming and Operation									
623-151	Lean Manufacturing	3								
623-162	Manufacturing Processes	3								
623-170	Process Planning	2								
623-190	Basic Metrology	3								
623-196	GD&T With CMM Verification	3								
628-110	Integrated Manufacturing Planning - Engineering Tech.	2								
628-111	Integrated Manufacturing Production - Engineering Tech.	2								
628-136	Statistical Process Control	3								
Industrial/Manufacturing Track Technical Studies Courses										
628-132	Advanced CNC Programming and Operation	3								
628-133	Robotics and Automated Material Handling	3								
628-142	Computer-Aided Manufacturing	3								
Quality Assurance Track Technical Studies Courses										
623-106	Quality Tools	3								
623-157	Applied Statistics/6 Sigma Concepts	3								
623-167	ISO 9000/2000 and Auditing	3								
Students are required to take any 3 of the 6 track courses listed above.										
General Studies Courses (both tracks)										
801-195	Written Communication	3								
801-196	Oral and Interpersonal Communication (or)	3								
801-197	Technical Reporting									
804-113	College Technical Math 1A	3								
804-114	College Technical Math 1B	2								
806-137	Comprehensive Technical Physics	4								
809-166	Introduction to Ethics: Theory and Application	3								
809-195	Economics	3								
809-198	Introduction to Psychology (or)	3								
809-199	Psychology of Human Relations									
	Students must choose an additional three credits of electives.	3								
	Schedule a Course **Total**	69								
	An Engineering Technologist Exit Assessment is a graduation requirement for this program.									
Institutional Requirements	Academic Planner									
890-125	Student Success - take **1st** semester									
103-159	Computer Literacy/Advanced Standing - take **1st** semester									
890-130	Career Development - take **3rd** semester									

Semester Codes: S - Summer F - Fall W - Winter P - Spring

For information on how program credits transfer to a four-year college, please visit us at www.morainepark.edu/academics/transfer.

For course descriptions, please visit our Web site at www.morainepark.edu.