

# Manufacturing Technology

## Manufacturing Technology Degree

**Degree:** Associate in Applied Science  
**Total Required Credits for Degree:** minimum of 64  
*Program Requirements:* 28  
*Program Electives:* 16  
*General Education Credits:* 20  
**Code:** 3940

### About the Program

The Manufacturing Technology program provides training in a wide variety of skill areas of product manufacturing and services. The Manufacturing Technology degree provides students with a broad background in the areas of machining, drafting and fluid systems that prepares them for entry-level positions as machine operators, machine maintenance personnel and quality control personnel.

Program web site:  
[www.cod.edu/academic/acadprog/occ\\_voc/MfgOcc.htm](http://www.cod.edu/academic/acadprog/occ_voc/MfgOcc.htm)

### Program Notes

1. If you are considering transfer to a baccalaureate-granting school, consult with your program adviser for specific General Education courses for transfer. The Associate in Applied Science degree in Manufacturing Technology is transferable to selected baccalaureate-granting schools. Consult your program adviser for details.
2. Under certain circumstances, some technical courses may be waived or substituted. Credit also can be earned by Credit by Proficiency through an Instructor and Credit by Proficiency through Registration. For more information, call the Assessment and Testing office, (630) 942-2400.

### Program Requirements

Manuf 1101	Industrial Design/CAD.....	3
Manuf 1104	Technical Mechanics .....	2
Manuf 1110	Metrology .....	3
Manuf 1141	Hydraulics and Pneumatics.....	3
Manuf 1151	Machine Shop I.....	3
Manuf 1153	Advanced Machine Processes.....	3
Manuf 1180	Quality Control .....	3
Manuf 2251	Computer Numerical Control (CNC) .....	3
Elect 1100	Electricity and Electronics Fundamentals ....	2
Weld 1100	Welding I .....	3
<b>Total.....</b>		<b>28</b>

### Program Electives

Select 16 credits from the courses listed below:

Manuf 1121	Physical Metallurgy .....	3
Manuf 1171	Introduction to Robotic Technology.....	3
Manuf 2201	Geometric Dimensioning and Tolerancing (GD&T) .....	3
Manuf 2202	Solid Modeling and Design .....	3
Weld 1112	Oxy-Fuel, Welding, Plasma Cutting, and Brazing.....	3
Weld 1122	Shielded Metal Arc (SMAW) .....	3
Weld 1132	Gas Metal Arc (MIG).....	3
Weld 1142	Gas Tungsten Arc (TIG) .....	3

### General Education Requirements

Each candidate for an Associate in Applied Science degree shall satisfactorily complete a minimum of 20 credits in General Education.

Use the *Student Planning Worksheet* or consult a list of General Education categories and courses for the A.A.S. degree to decide what needs to be taken. Links can be found on the Manufacturing Technology program guide ([www.cod.edu](http://www.cod.edu), click on “Academics” and choose this program from the drop-down menu).

Under the specified General Education headings below, the following courses are recommended for the Manufacturing Technology degree:

**Communications:** 6 credits required  
*Recommended courses:* See the *Student Planning Worksheet*.

**Physical/Life Sciences:** 3 to 5 credits required  
 Select at least one course with a lab component.  
*Recommended course:* See the *Student Planning Worksheet*.

**Mathematics:** 3 to 5 credits required  
*Recommended course:* See the *Student Planning Worksheet*.

**Humanities and Fine Arts:** 3 credits required  
*Recommended course:* See the *Student Planning Worksheet*.

**Social and Behavioral Sciences:** 3 credits required  
*Recommended course:* See the *Student Planning Worksheet*.

### Additional A.A.S. Degree Requirements

A minimum of 2 credits must be completed from the list of courses in the Global/Multicultural Studies or Contemporary Life Skills category.

Manufacturing 1180 (already listed under Program Requirements) fulfills this requirement.

### Adviser

If you are considering this program as an area of study, consult with a faculty adviser in this field.

	Location	Phone
Branislav Rosul, coordinator E-mail: <a href="mailto:rosulb@cod.edu">rosulb@cod.edu</a>	TE 1052	(630) 942-3390

