MISSION STATEMENT AND STUDENT LEARNING OUTCOMES FOR:

Precision Machining Technology

Review Year: 2024

Division:	Discipline/Program/Department:	Contact Person:
Technical Education	Precision Machining Technology	**Bosworth, Mark**

Mission Statement

The Precision Machining Program embraces the collective mission statement as it offers lifelong learning opportunities to students who are seeking, or in the process of developing careers in the manufacturing and service industries, as journeyman machinists. Graduates will be able to meet standards established by the industries of District #522, which are developed by the program in collaboration with its advisory committee. Students will be provided access to "state of the art" labs for "hands on" experience that will support a world class-manufacturing base within the local community. The program will provide high quality graduates with the required knowledge and skills to support our district's world-class industries.

Program/Discipline Curriculum Map

I = **Introduce:** Student is first exposed to the concept/idea and is requested to apply the concept in a limited scope.
E = **Emphasize:** Student applies concept(s) in varying/multiple situations of greater complexity than when initially introduced.
R = **Reinforce:** Student may be expected to understand the concept upon taking the course and utilizes the concept in conjunction with other concepts/ideas to solve problems.

Program/Discipline Outcomes	***Course Prefix and Number***																								
Graduates of this program or discipline shall be able to:	PMT 100	PMT 101	PMT 102	PMT 110	PMT 111	PMT 112	PMT 114	PMT 201	PMT 202	PMT 221	PMT 222	PMT 226	PMT 231	PMT 124	PMT 240	PMT 250	PMT 262	IML 120	IML 119	IML 125						
Apply safe practices when using hand tools and machinery used in the machining trade.	I	I	I	E	E	R	R	R	R	R	R			R	R	R	R		R	R						
Interpret prints in both English and metric dimensions.		I	I	E	E	R	R	R	R	R	R	R	R	R	R	R	R	I								
Select the correct measuring devices and equipment to inspect finished parts.	I	I	E	E	R	R	I	R	R	R				R	R			I								
Demonstrate the set-up and operations of manually operated machinery, utilizing the correct speeds and feeds to part specifications.		I	E				R	R							R											
Demonstrate the procedures to write a program, set-up and operate a Computer Numerical Control machine.	I		I	R	E					R	R					R	R									
Build a Solid Model of a part using CAD software program.											I		E													
Produce a complex program using Computer Aid Manufacturing software.										I	E		R				R									

Map Comments:

Core Competency Map

Core Competencies	***Course Prefix and Number***																								
Communication Skills	PMT 100	PMT 101	PMT 102	PMT 110	PMT 111	PMT 112	PMT 114	PMT 201	PMT 202	PMT 221	PMT 222	PMT 226	PMT 231	PMT 124	PMT 240	PMT 250	PMT 262	IML 120	IML 119	IML 125						
1. Computer Literacy		X															X									
2. Oral Communications																										
3. Writing																										
Reasoning Skills																										
4. Critical Thinking															X											
5. Quantitative Literacy																										
Citizenship																										
6. Personal Accountability						X																				
7. Civic And Social Accountability																										