WELDING AND MATERIALS TECHNOLOGY (WMT)

WMT F101  Introduction to Welding
4 Credits
Offered Fall, Spring and Summer
Introduction and orientation to the processes and procedures involved in the welding field including safe operational procedures for shielded metal arc welding (SMAW) (Stick), mixed inert gas (MIG), tungsten inert gas (TIG) and oxy-acetylene welding; in addition to the appropriate personal protective equipment (PPE) and terminology related to the welding industry.
Lecture + Lab + Other: 2 + 4 + 0

WMT F102  Intermediate Welding
3 Credits
Offered As Demand Warrants
Continuation of WMT F101.
Prerequisites: WMT F101.
Lecture + Lab + Other: 2 + 2 + 0

WMT F103  Welding I
3 Credits
Offered Fall
Entry-level course in basic oxyacetylene, arc welding and flame cutting. Attendance at first two classes is mandatory.
Lecture + Lab + Other: 1 + 4 + 0

WMT F105  Welding II
3 Credits
Offered Fall
Arc welding techniques and basic MIG and TIG welding. Attendance at first two classes is mandatory.
Prerequisites: WMT F103.
Lecture + Lab + Other: 1 + 4 + 0

WMT F106  Heat Treating/Metal Finishing/Knife Making I
3 Credits
Offered As Demand Warrants
Heat treating, metal finishing. Build two knives, heat treat and finish. Special Conditions: Must have excellent hand-eye coordination. Attendance at first class is mandatory.
Recommended: WMT F117; WMT F241.
Lecture + Lab + Other: 2 + 3 + 0

WMT F117  Oxy-Acetylene Welding and Cutting
3 Credits
Offered As Demand Warrants
Safe oxyacetylene welding techniques and procedures of common metals. Welding of these metals in flat, horizontal, vertical and overhead positions. Attendance at first two class meetings is mandatory.
Lecture + Lab + Other: 2 + 5 + 0

WMT F130  Shielded Metal Arc Welding
1-3 Credits
Offered Fall
All positions for multiple pass fillet welds. Study in shielded metal arc (SMAW) focused on vertical, horizontal, and overhead positions with multiple passes using different techniques.
Prerequisites: WMT F103; WMT F105.
Lecture + Lab + Other: 1-3 + 0 + 0