

WPT 110 - OXY-FUEL PROCESS & THERMAL CUTTING

Course Description

This course is designed for Welding students pursuing job skills or transferring into a Welding Degree program. Topics include oxyacetylene welding in the flat, horizontal, and vertical positions; oxy-acetylene cutting, and oxy-acetylene brazing. This course also introduces students to basic Plasma Arc Cutting (PAC). Students learn safety and theory as well as develop their proficiency in these operations. This skill development course is the prerequisite for WPT 120. Group 2 course.

Credit Hours

3

Contact Hours

5

Lecture Hours

1

Lab Hours

4

General Education Outcomes supported by this course

Quantitative Reasoning

Course Learning Outcomes

Knowledge:

- Understand and use terminology common to the welding trade as defined by the American Welding Society (AWS).

Application:

- Demonstrate the ability to cut mild steel with the OC and PAC processes and braze joints on mild steel with the TB process.

Integration:

- Demonstrate the ability to complete welds on mild steel in the flat, horizontal, and vertical positions with the OAW process.

Human Dimension:

- Collaborate with other students to clarify concepts, explain requirements, and critique each other's work related to course standards and the ability to independently perform required welds.

Caring - Civic Learning:

- Demonstrate safe procedures in all welding and shop activities.

Learning How to Learn:

- Demonstrate proper handling, setup, and adjustment of oxy-fuel and PAC equipment.