

COURSE SYLLABUS

LAST REVIEW	Fall 2022
COURSE TITLE	Oxy-fuel Welding
COURSE NUMBER	WELD 0201
DIVISION	Career and Technical Education
DEPARTMENT	WELD
CIP CODE	48.0508
CREDIT HOURS	1
CONTACT HOURS/WEEK	Class: X Lab: 2
PREREQUISITES	WELD 0100

COURSE DESCRIPTION

Through a variety of classroom and/or shop/lab learning and assessment activities, the students in this course will: learn to set up, operate, and shut down OFW equipment, and learn to perform basic welds with the OFW and TB processes.

PROGRAM ALIGNMENT

This course is part of a program aligned through the Kansas Board of Regents and Technical Education Authority. For more information, please visit:

https://kansasregents.org/workforce_development/program-alignment

PROGRAM LEARNING OUTCOMES

1. Students will be able to explain job/site and precautions for job site hazards and will be able to determine the use of Personal Protective equipment (PPE) as well as be able to identify the safety equipment and procedures related to safe work practices and environment
2. Student will be able to demonstrate the use of good communication skills including listening, following directions, speaking, and using correct grammar in conducting a job search.
3. Student will be able to create fillet and groove welds in flat and horizontal positions and identify common visual discontinuities and defects on welds and determine causes of discontinuities and defects of welds.

TEXTBOOKS

<http://kckccbookstore.com/>

METHOD OF INSTRUCTION

A variety of instructional methods may be used depending on content area. These include but are not limited to lecture, multimedia, cooperative/collaborative learning, labs and demonstrations, projects and presentations, speeches, debates, panels, conferencing, performances, and learning experiences outside the classroom. Methodology will be selected to best meet student needs.

COURSE OUTLINE

- I. OAW basics
 - A. Safety
 - B. Equipment
 - C. Set up
- II. OAW beads
 - A. Without filler metal
 - B. With filler metal
 - C. Fillet weld
- III. TB
 - A. Square groove
 - B. Fillet

COURSE LEARNING OUTCOMES AND COMPETENCIES

Upon successful completion of this course, the student will:

- A. Demonstrate the safe and correct set up, operation and shut down of the Oxy-fuel (OFW) workstation
 - 1. Use the proper personal protective equipment (PPE).
 - 2. Identify safety hazards of the equipment
 - 3. Properly set up the equipment
 - 4. Properly light and adjust the torch
 - 5. Make a variety of quality cuts
 - 6. Properly shut down the equipment
- B. Perform selected OFW and TB assignments.
 - 7. Use the proper PPE
 - 8. Perform selected OFW assignments to a standard
 - 9. Perform selected TB assignments to a standard

ASSESSMENT OF COURSE LEARNING OUTCOMES AND COMPETENCIES

Student progress is evaluated through both formative and summative assessment methods. Specific details may be found in the instructor's course information document.

COLLEGE POLICIES AND PROCEDURES

Student Handbook

<https://www.kckcc.edu/files/docs/student-resources/student-handbook-and-code-of-conduct.pdf>

College Catalog

<https://www.kckcc.edu/academics/catalog/index.html>

College Policies and Statements

<https://www.kckcc.edu/about/policies-statements/index.html>

Accessibility and Accommodations

<https://www.kckcc.edu/academics/resources/student-accessibility-support-services/index.html>.