## MARTIN COMMUNITY COLLEGE COURSE SYLLABUS Semester/Year: Spring 2011

<b>COURSE NUMBER:</b>	WLD 212 (1)	<b>INSTRUCTOR:</b> Ryal Watkins
COURSE TITLE:	Inert Gas Welding	<b>OFFICE NO:</b> Building 1, Room 28
<b>CREDIT HOURS:</b>	2	<b>OFFICE/VIRTUAL HOURS:</b> NA
CONTACT HRS/WK:	4 (1 class, 3 lab)	PHONE NO: 252-789-0246 Dr. Broughton
PREREQUISITES:	None	<b>FAX:</b> 252-792-0826
COREQUISITES:	None	E-MAIL: rwatkins@mcc.martincc.edu

**COURSE DESCRIPTION:** This course introduces inert gas-shielded welding methods (MIG/TIG). Topics include correct selection of consumable and non-consumable horizontal, and overhead positions.

#### **PROGRAM LEARNING OUTCOMES:**

- 1. Utilize tools and equipment to service and maintain mechanical systems, plumbing systems, hydraulic and pneumatic systems, and electrical and electronic systems.
- 2. Create, interpret, and modify industrial blueprints and schematics.
- 3. Perform preventive maintenance and troubleshoot a variety of industrial systems.
- 4. Perform various welding and cutting processes used in current industry.

#### **COURSE LEARNING OUTCOMES:**

- 1. Explain the inert gas-shielded welding methods (MIG/TIG).
- 2. Correctly select consumable and non-consumable horizontal, and overhead positions.
- 3. Perform inert gas-shielded welding methods.

**SUPPLEMENTAL TEXTBOOKS:** Andrew D. Althouse, Carl H.Trunqueist, Willia A. Bowditch, and Kevin E. Bowditch. (2000). Modern welding (9<sup>th</sup> ed.). Tinley Park, Illinois: The Goodheart-Willcox Company, Inc.

**SUPPLEMENTAL RESOURCES:** Student will receive handouts as supplemental information. One threering binder is recommended. Safety shoes, work gloves, safety glasses, and coveralls are required.

LEARNING/TEACHING METHODS: Hands-on welding, lecture, projects, & outside reading assignment

#### ASSESMENTS/METHODS OF EVALUATION:

1.	Test 1	25%
2.	Test 2	25%
3.	Final Exam	40%
4.	Outside Reading Assignment	10%

#### **GRADING POLICY:**

93-100 = A 85-92 = B 77-84 = C 70-76 = DBelow 70 = F = Failing (course must be repeated) AU = AuditXA, XB, XC = Credit by exam

### **COURSE OUTLINE:**

Weeks 1/2	Arc Welding Joint Flaws
Weeks 3/4	<b>Review of Safety in SMAW</b>
Weeks 5/6	GTAW Station
Weeks 7/8	GTAW Torches
Weeks 9/10	GMAW Station
Weeks 11/12	GMAW Shield Gases
Weeks 13/14/15	GMAW Welding Gun
Week 16	Final Exam

**STUDENT ATTENDANCE POLICY:** Class attendance is considered a necessary part of the education experience and is required in curriculum courses. For this reason, each student will be expected to be present and on time for every class and lab meeting. The maximum number of hours students are permitted to miss has been established at 20 percent of the total contact hours of a curriculum course. Three tardies equal one hour of absence. For this course, six hours is the maximum number of hours a student can miss and still receive a passing grade.

# **REQUEST FOR EXCUSED ABSENCES FOR RELIGIOUS OBSERVANCES\***

\*In compliance with G.S. 115D-5, MCC policy permits a student to be excused, with the opportunity to make-up any test or other missed work, a minimum of two excused absences per academic year for religious observances required by the student's faith. The policy limits the excused absences to a maximum of two days per academic year.

Students who wish to be excused for a Religious Observance required by their faith must complete and submit a request form to the instructor(s) <u>prior to the census date of each class</u>. The *Request for Excused Absences for Religious Observances* form can be picked up from Student Services. This does not supersede the college-wide attendance policy as outlined in the college catalog or syllabus, with the exception of a reasonable accommodation for the make-up of missed course work.

**COURSE POLICIES:** Course Withdrawal: If for any reason you cannot complete this course, you must officially withdraw from the course by completing and submitting a withdrawal form to Student Services before the due date. Failure to do so will result in a failing grade (F). If you decide to withdraw from the course and have any kind of financial aid, you should consult with the financial aid office prior to the withdrawal to determine what, if any, effect it will have on your financial aid status. Withdrawal forms are available in the Student Services office.

Martin Community College

If you cannot reach your instructor, you may contact Dr. Phyllis Broughton, Dean of Academic Affairs and Student Services at (252)789-0246 or (252)789-0247 by phone, pbroughton@martincc.edu by e-mail, or in person at her office in Building 2, Room 33.

To access the Martin Community College Career Catalog for policies and curriculum requirements, please go online to www.martincc.edu.

If you have a need for a disability-related accommodation, please notify the Student Services counselor at (252) 789-0293.