

**Hagerstown Community College**  
**OFFICIAL MASTER SYLLABUS DOCUMENT**

**COURSE: INT 116 WELDING**

**CREDITS 3**

**INSTRUCTOR:**

**SEMESTER: SPRING 2016**

**COURSE DESCRIPTION:**

This course has been formatted into a four (4) part class / which is designed to introduce material science of metals within fabrications, welding print reading along with welding procedures (WPS/PQR), Fabrication basic tools and equipment, along with materials used in the layout and fabrication of a welding project with emphasis on designing a print based project that includes proposed cost estimation and projected time for assembly. Welding shop safety procedures are stressed. **Prerequisite: INT 106** Three credits

**REQUIRED TEXT:**

Welding Principles and Applications Seventh Edition; Larry Jeffus  
ISBN: 13:978-1-4180-5275-1

**STUDENT LEARNING OUTCOMES:**

On successful completion of this course, students should be able to:

- Identify Welding Symbols
- Identify and select proper tools and measuring supplies to fabricate many different projects
- Recognize correct layout and fabrication terminology
- Identify structural shapes used within industry
- Write a project proposal for a fabrication job and create a base line material selection
- Review plans and create a bill of materials
- Perform a real cost estimate for given projects relating to Welding Fabrications
- List and cost out materials
- Obtain materials from supplier
- Build a quality project

**TOTAL HOURS OF COURSEWORK:**

To earn one academic credit at HCC, students are required to complete a minimum of 37.5 clock hours (45 minute “academic” hours) of coursework per semester. Those hours of coursework may be completed through a combination of hours within the classroom and hours outside the classroom. Certain courses may require more than the 37.5 minimum hours of coursework per credit. For most classes, students should expect to do at least 2 hours of coursework outside of class for each hour of in-class coursework. Since this is a three academic credit class the student should expect to do at least 9 academic hours per week including class time.

<b>Assignment/Assessment</b>	<b>Clock Hours</b>
In-class Instruction	45
Textbook Chapter Readings	15 hours
Study of Manuals for Hands-on Activities	15 hours
Chapter Review Questions and Answers	15 hours
Research Assignments	15 hours

Exam Preparation	20 hours
	<b>Total hours=125 hours</b>