

SAULT COLLEGE OF APPLIED ARTS AND TECHNOLOGY

SAULT STE. MARIE, ON

COURSE OUTLINE

TRADE CALCULATIONS

COURSE TITLE:

CODE NO: IRN803 SEMESTER: \_\_\_\_\_ N/A

PROGRAM: IRONWORKER - ADVANCED

AUTHOR: D. SOCCHIA

DATE: Feb 95 PREVIOUS OUTLINE DATED: June 93

APPROVED:  (jU>. MI' 9S  
DEAN DATE

TRADE CALCULATIONS  
COURSE NAME

IRN 803  
CODE NO.

TOTAL CREDITS: N/A

PREREQUISITES): Ironworker Apprenticeship plus the successful completion of the 'Basic' and Intermediate' levels of in-school' training.

I. PHILOSOPHY /GOALS: To provide apprentices with the necessary background and academic training to solve job related problems that require (or are made easier to handle) thru the application of mathematical calculations.

H. STUDENT PERFORMANCE OBJECTIVES (OUTCOMES):

Upon successful completion of this course the student will:

- 1) Identify and select mathematical formula appropriate to the needs of the trade.
- 2) Perform typical (job related) calculations involving: weights, volume, bevels, elevation and point to point determinations.

m. TOPICS TO BE COVERED:

- 1) Course Introduction and Orientation
- 2) Volume / Weight of Squares, Cylinders and Cones.
- 3) Use of Percentages.  
\*\* Review Assignment # 1. \*\* (Homework)  
\*\* Test # 1 and Review \*\*
- 4) Ratio, Proportion and Trig Ratios  
\*\* Review Assignment # 2. \*\* (Homework)  
\*\* Test #2 and Review\*\*
- 5) Bevels, Elevation and Point to Point Determinations  
\*\* Review Assignment # 3 \*\*  
\*\* Test # 3 and Review \*\* (Homework)

IV. EVALUATION METHODS: (INCLUDES ASSIGNMENTS, ATTENDANCE REQUIREMENTS, ETC.)

<u>General Assessment</u>	<u>Final Mark</u>
A = 85 -100%	
B = 75- 84%	Homework Assignments 30%
C = 60- 74%	Tests 70%
D = 50- 59%	
F = 0- 49%	Attendance (see "Notes")

V. PRIOR LEARNING ASSESSMENT:

Students who wish to apply for advanced credit in the course should consult the instructor. Credit for prior learning will be given upon successful completion of the following:

1. Written proof of the successful completion of a mathematics course with student outcomes and course topics that are at least 80% compatible with IRN 803.  
<OR>
2. The successful completion of all three IRN 803 tests with a resulting average mark of at least 75%.

VI. REQUIRED STUDENT RESOURCES:

Scientific Calculator (Basic Math Functions plus Trig Ratios)  
Pens (blue and / or black ink)  
Binder c/w Paper  
Ironworker Texts  
Steel Tape Rule (cw Imperial and Metric Scales)

VH. SPECIAL NOTES:

Students with special needs (eg physical limitations, visual impairments, hearing impairments, learning disabilities) are encouraged to discuss required accommodations confidentially with the instructor.

Your instructor reserves the right to modify the course as he / she deems necessary to meet the needs of students.

Student attendance is mandatory and will be recorded on an hour by hour basis using the 'Sault College Record of Attendance Form'.