

SAULT COLLEGE OF APPLIED ARTS & TECHNOLOGY

SAULT STE. MARIE, ONTARIO

COURSE OUTLINE

Course Title: CAREER EXPERIENCE: CIVIL ENGINEERING

Code No.: CPC 300-

Program: CIVIL ENGINEERING TECHNOLOGY

Semester: SIX

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APPROVED:

Dean of Engineering Technology

Date

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CPC 300-

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COURSE DURATION: A minimum of 80 to a maximum of 120 hours (one day per week during sixth semester). This semester is 16 weeks, excluding the Winter Break. Students are not expected to attend their Placement during the Break.

PRE-REQUISITE: Only students who have successfully completed all course requirements for the Civil Engineering Technology Program (Semesters 1 through 5 inclusive) and who are eligible candidates for graduation may participate in the Career Experience Course.

I. PHILOSOPHY/GOALS:

Career Experience work placements are provided by local and area employers in the civil/construction/consulting engineering fields in either the public or private sectors. Graduating 6th-semester students participate as an "employee" for a one-day-a-week placement for a minimum of 10 weeks to a maximum of 15 weeks (generally 12 weeks). There is no remuneration for Career Experience.

The work placements give students the opportunity to put classroom theory into practice and learn first-hand about the scope and variety of occupations available.

Students are assigned their Career Experience placements by the program faculty. The assignments are based upon a review of student resumes, placement preferences, employer constraints, and the available placement opportunities.

The College's Co-operative Education (Co-op) Office maintains student placement files and acts as a liaison among employers, faculty and students.

II. STUDENT PERFORMANCE OBJECTIVES/LEARNING OUTCOMES:

Upon successful completion of this course, the student will be able to:

- 1) apply in a work setting, the skills and knowledge acquired and/or refined during the course of study of Civil Engineering at Sault College;
- 2) apply accepted business/industry practices and procedures;
- 3) demonstrate appropriate business conduct (i.e. regular attendance, punctuality, ability to maintain confidentiality, good grooming, and proper attire);
- 4) work effectively as part of an engineering team and independently with a minimum of supervision;
- 5) use effective written and oral communication, as well as interpersonal relation skills;

- 6) use effective critical thinking, problem-solving, and decision-making techniques (exercise good judgment; taking initiative if appropriate or if presented with new situations);
- 7) apply, in a work setting, the skills and knowledge acquired during the course of study of Civil Engineering at Sault College;
- 8) demonstrate effective selection and use of engineering technology and equipment;
- 9) practise professional ethics and follow accepted industry standards;
- 10) demonstrate an awareness of the impact of technology on society;
- 11) identify and comply with industry occupational health and safety standards;
- 12) apply principles of physics and mathematics to the analysis of technical problems;
- 13) demonstrate computer literacy and surveying skills when given the opportunity

III. COURSE REQUIREMENTS:

1. Career Experience Course Orientation:

Prior to the start of the work placements, students must attend the orientation session scheduled by faculty. The orientation is designed to review the Career Experience Course Outline, the expectations of the College and participating employers thus enabling the students to maximize their learning experience.

2. Attendance:

- a) Attendance while participating in the Career Experience course is mandatory. Any absence must be reported to the employer and the Co-op Office prior to the start of the work day. Absences of 2 or more consecutive weeks due to illness must be supported by a medical certificate. Too many unexcused absences will result in failure.
- b) Civil Engineering Faculty will schedule meetings for participating students to discuss and share with classmates and faculty their observations regarding their placements. At the mid-way point, each student will give an oral introductory presentation of his/her placement and progress to date. At the conclusion of the placements, each student will give an oral report of the overall placement experience. Attendance at these sessions is mandatory.

3. Placement Confirmation:

Each student will acknowledge his/her placement assignment with a resume and letter of introduction to the employer. A copy of the letter of introduction is to be filed with the Co-op Office. At least one week prior to the start of the placement, students will confirm placements by a telephone call or personal visit to their employer.

4. Work Experience Reports:

Each student must complete two written (word processed) reports of his/her placement activities; one to be presented at the mid-point and the second at the conclusion of the placement. The "Career Experience Reports" provide useful records of the work experience. The reports must be submitted to the Co-op Office.

5. Letter of Thanks:

Students are to forward a card of appreciation or letter of thanks to their employer at the end of the Career Experience placement. A copy must also be filed with the Co-op Office.

IV. EVALUATION METHODS

Evaluations will be conducted by employers who are required to complete one Final Evaluation of each student "employee." The Co-op Office provides a standard evaluation form and the employer is required to discuss the evaluation with the student prior to authorizing the evaluation. The employer's evaluation allows both the student and the College to measure the success of the work placement.

Students are responsible for ensuring that the evaluation is completed and submitted on time to the Co-op Office.

All academic credits are awarded by the Civil Engineering Faculty. Career Experience credits are earned and awarded based upon the satisfactory completion of the above course requirements. Failure to complete any of these requirements will result in an "R" grade. Successful completion of all components of the Career Experience course will result in a passing grade (either an A+, A, B or C based on the quality of the student's work and attendance record, employer evaluation, oral and written presentations).

The following is the breakdown of the evaluation:

Letter of Introduction	5%
Attendance	10%
Oral Presentation (midpoint)	5%
Written Presentation (midpoint)	5%
Oral Presentation (conclusion)	15%
Written Presentation (conclusion)	25%
Employer's Final Evaluation	30%
Card/Letter of Thanks (conclusion)	5%

Total 100%

SPECIAL NOTES:

1. Student Progress:

Civil Engineering Faculty are concerned and interested in student progress during the work placement. Students should contact the appropriate faculty member or the Co-op Office if they have any concerns, or if any serious matter affecting their work or welfare should arise.

2. Rights & Responsibilities:

As representatives of Sault College, students are reminded the policies and procedures outlined in Sault College's "Rights & Responsibilities" Handbook are in effect during their placement as well.

3. Confidential and Proprietary Information:

All work is to be treated as highly confidential. In business and industrial settings, details of clients or industrial processes may be of interest to competitors in the field. Students must, therefore, be aware of the company's policies regarding confidentiality and, as "employees", are expected to comply with their "employer's" policies.

In accepting a Career Experience placement, the student agrees that information, data and research materials collected and prepared while an "employee" are the property of the "company". Authorization by the employer is required for the release of any information (especially regarding material presented in the student's oral and written reports).

4. Dress:

Students must dress in appropriate business/industry attire. They must always adhere to Canadian Safety Standards, Industrial and Accident Prevention, as well as Occupational Health and Safety regulations.

5. Special Needs:

If a student requires accommodations under Special Needs, he/she should notify the appropriate Civil Engineering Faculty prior to the start of the placement. This will help to ensure the student will be matched with an employer who can accommodate the student's needs.