

**COURSE NUMBER:** SD1171

**COURSE TITLE:** Technology Awareness II

**COURSE DESCRIPTION:**

This course (with Technology Awareness I) is designed to raise career awareness levels for engineering technology learners by providing information regarding the engineering technology profession. This course will prepare learners for the workplace by illustrating how the skills and practices of successful students parallel the skills and practices of successful professionals.

**PREREQUISITES:** SD1170 – Technology Awareness I

**CO-REQUISITES:** None

**CREDIT VALUE:** Two (2) (One credit carried over from SD1170)

**COURSE HOURS PER WEEK:** One (1)

**LAB HOURS PER WEEK:** Zero (0)

**SUGGESTED TEXT:** None

**LEARNING RESOURCES:**

Landis, R.B. (2013). *Studying engineering: A road map to a rewarding career* (4<sup>th</sup>. ed.). Los Angeles, CA: Discovery Press. ISBN: 978-0-9793487-4-7  
<http://www.discovery-press.com/discovery-press/studyengr/chapter2.pdf>

Cheshier, S.R. (1998). *Studying engineering technology: A blueprint for success*. Los Angeles: Discovery Press. ISBN: 0964696932 and 9780964696938.

Conference Board of Canada. (2000). *Employability skills toolkit for the self-managing learner*. Ottawa, ON: Author. ISBN-10: 0070878471

Fraser, L. (2009). *Making your mark* (9<sup>th</sup> ed.). Port Perry, ON: LDF Publishing Inc. ISBN: 0-9735298-3-8

Canada. (2012). *Working in Canada*. Ottawa, ON: Author. <http://www.workingincanada.gc.ca/home-eng.do?lang=eng>

The Canadian Technology Human Resources Board. (2006). *Look ahead get ahead*. International Press Publication Inc. SKU 19443 (CD-ROM available free of charge from CTAB.)

Canada. (2012). *Service Canada-training and careers home page*. Ottawa, ON: Service Canada. <http://www.jobsetc.gc.ca/eng/>

## **MAJOR TOPICS:**

- 1.0 Academic Success
- 2.0 Career Awareness
- 3.0 Professional Practice
- 4.0 Career Development

## **LEARNING OBJECTIVES:**

The expected learning outcomes are that the learner will be able to:

### **1.0 Academic Success**

- 1.1 List the purpose of each of the student services (e.g., financial aid, guidance, computer support, library, disabilities support, student development officers) available at your campus
- 1.2 Describe the academic success traits and strategies of the successful student
- 1.3 Use available self-assessment inventories to gather personal information regarding your academic success potential (learning styles, multiple intelligences)
- 1.4 Describe how the following personal elements contribute to student success: personal wellness (e.g., nutrition, exercise), stress management, planning, problem-solving abilities, and goal setting
- 1.5 Examine your potential for academic success in at least two of the following areas: attitude, time management, study skills, note taking, and test-taking skills
- 1.6 Use strategies to increase your potential for academic success in at least one of the following areas: attitude, time management, study skills, note taking, and test-taking skills
- 1.7 Discuss how a student's grade point average (GPA) might affect opportunity for program transfer, graduation, and career advancement
- 1.8 Given course information and an example of marks, calculate the GPA
- 1.9 Describe the process for student transfer from one engineering technology program to another engineering technology program
- 1.10 Describe the process for student transfer from an engineering technology program to a non-engineering technology program at College of the North Atlantic

### **2.0 Career Awareness**

- 2.1 Define engineering technology
- 2.2 List eight of the engineering technology programs offered at College of the North Atlantic
- 2.3 Identify similarities and differences among the occupational areas of tradespersons, technicians, technologists, and engineers

- 2.4 Identify reliable sources for investigating career-exploration information
- 2.5 List eight of the engineering technology disciplines certified by the Association of Engineering Technicians and Technologists of Newfoundland and Labrador (AETTNL)
- 2.6 Discuss the benefits of becoming a professional engineering technologist to both society and the technologist
- 2.7 Record the following occupational information for a minimum of three engineering technology profiles: job duties, work environment, salary range, employment rate, employment outlook, training requirement, potential employers
- 2.8 Define accreditation
- 2.9 Describe the role of the Canadian Technology Accreditation Board (CTAB)
- 2.10 Discuss the benefits of program accreditation and professional certification for students, employees and employers
- 2.11 Match each of the following technology-related agencies with its role: Canadian Technology Human Resources Board (CTHRB), Canadian Council of Technicians and Technologists (CCTT), Canadian Technical Employment Network (CTEN), Association of Engineering Technicians and Technologists of Newfoundland and Labrador (AETTNL)

### **3.0 Professional Practice**

- 3.1 Give examples of several of the rights and responsibilities of all students of College of the North Atlantic
- 3.2 Demonstrate how the academic integrity responsibilities of students reflect the ethical responsibilities of employees
- 3.3 Discuss why it is important that the Association of Engineering Technicians and Technologists of Newfoundland and Labrador (AETTNL) insist that its certified members adhere to a stated code of ethics
- 3.4 Give examples of school and workplace situations where discrimination and harassment based on gender, ethnicity, etc. can create negative environments
- 3.5 Outline the purpose of each of the following documents:
  - 3.5.1 Occupational Health and Safety Act
  - 3.5.2 Labour Standards Act
  - 3.5.3 Workers Compensation Act
  - 3.5.4 Human Rights Act
- 3.6 Describe why each of the following is important to the practice of the professional engineering technologist: ethics, occupational health and safety, tort law, and the Workers Compensation Act
- 3.7 Discuss why it is so critical to continue your professional development as an engineering technologist
- 3.8 Explain why engineering technologists should maintain a high level of environmental responsibility
- 3.9 Given a case study involving an ethical concern, justify a decision or action you would recommend

## **4.0 Career Development**

- 4.1 Prepare a personal career assessment profile by completing inventories in a minimum of five of the following areas: personality, lifestyle choices, values, intelligences, interests, and skills
- 4.2 Examine how employability skills (as designated by The Conference Board of Canada) are transferable from home to school to work
- 4.3 Demonstrate personal management and teamwork throughout the course (e.g., demonstrate positive attitude, be accountable)
- 4.4 Organize a career development portfolio that contains evidence of your career planning skills and employment potential. The portfolio should contain, but not be limited to, the following items: career goal, career inventories, program profile, occupational profile, resume, letter of application, potential employers, and personal contact network
- 4.5 Describe post-diploma options for engineering technology graduates (at College of the North Atlantic and universities such as Memorial, Lakehead, and Cape Breton)
- 4.6 Identify ways engineering technologists can continue to develop professionally throughout their careers

### **EVALUATION:**

Participation and Assignments/Quizzes: 50%  
Career Portfolio: 50%

**DATE DEVELOPED:** February 2005

**DATE REVIEWED:**

**REVISION NUMBER:** 5

**DATE REVISED:** April 2013

*Note to instructor: Check PIRS to ensure this outline is the most current version.*