

# Ancaster High School Course Outline 2013/2014 Construction Technologies Grade 12 TCJ4E Technological Education



TEACHER: Mr. G. Coomber PREREQUISITE: None HOURS: 110 CREDIT VALUE: 1

**DEPARTMENT HEAD:** Mr. K. Lemieux **TEXTBOOK:** 

GUIDELINE: The Ontario Curriculum Grades 11 and 12, Technological Education, 2009 Revised

The text will be provided free of charge. However, the student is responsible for returning the book in reasonable condition. The student will be charged for loss or damage.

# **OVERALL EXPECTATIONS:**

### **CONSTRUCTION TECHNOLOGY FUNDAMENTALS**

- A1. assess the properties and applications of a variety of construction materials, tools, equipment, and processes;
- A2. demonstrate an understanding of building codes, regulations, and standards for construction projects;
- A3. use construction terminology correctly;
- A4. apply mathematical skills and scientific concepts in the planning and building of a variety of construction projects.

# **DESIGN, LAYOUT, AND PLANNING SKILLS**

- B1. apply a design process and/or other problem-solving methods as appropriate when planning a variety of residential and/or light construction projects, and demonstrate an understanding of the design considerations for these projects;
- B2. create and interpret working drawings for residential and/or light commercial construction projects;
- B3. apply accurate technical data and relevant building codes, regulations, and standards when planning and developing construction projects;
- B4. plan and lay out systems for residential and/or light commercial buildings.

### **FABRICATION, ASSEMBLY, AND FINISHING SKILLS**

- C1. apply appropriate technical skills, including the safe use of the tools, equipment, and materials required to build construction projects;
- C2. apply safe and accurate techniques for building construction projects;
- C3. complete construction projects by correctly applying finishing materials and installing fixtures and devices.

# **TECHNOLOGY, THE ENVIRONMENT, AND SOCIETY**

- D1. demonstrate an understanding of the environmental effects of construction projects, and ways of reducing harmful effects;
- D2. demonstrate an understanding of how the construction industry affects society.

# PROFESSIONAL PRACTICE AND CAREER OPPORTUNITIES

E1. demonstrate an understanding of and comply with health and safety regulations and practices specific to the construction industry;

- E2. describe the organization and management of construction companies and the entrepreneurial skills needed to establish a successful construction business;
- E3. describe the skills and training required for careers in the construction industry.

# **TEACHING STRATEGIES (include, but not limited to):**

- Providing appropriate accommodation for students on IEP's and for English Language Learners and for those who are First Nations, Metis or Inui;
- Utilizing Student Support and Student Alternative Support Programs;
- Contacting parents for support and assistance;
- Using diagnostic assessment and check-in points to monitor student progress;
- Providing differentiation of instruction and assessment to meet the needs of diverse learners;
- Providing ongoing descriptive feedback that is clear, specific, meaningful, and timely to support improved student learning;
- Creating lessons, and assessment and evaluations, that are carefully planned to relate to the curriculum
  expectations and learning goals, and as much as possible to the interests, learning styles and preferences of all
  students;
- Developing students' self-assessment skills to enable them to assess their own learning, set specific goals, and plan next steps for their learning.

# **ASSESSMENT AND EVALUATION OF WORK:**

Assessment and evaluation will be based on the provincial curriculum expectations and the achievement levels outlined in the curriculum policy document. Students will be given numerous and varied opportunities to demonstrate their achievement of the expectations across the four categories of knowledge and skills.

Midterm and final marks will be calculated using the prescribed learning strands with the following weighting:

Strand	Weighting
CONSTRUCTION TECHNOLOGY FUNDAMENTALS	20%
DESIGN, LAYOUT, AND PLANNING SKILLS	10%
FABRICATION, ASSEMBLY, AND FINISHING SKILLS	30%
TECHNOLOGY, THE ENVIRONMENT, AND SOCIETY	5%
PROFESSIONAL PRACTICE AND CAREER OPPORTUNITIES	5%

Evidence of achievement can be determined from a variety of sources, including but not limited to: in-class assignments, class presentation, open-ended questions, observations, quizzes, unit tests, investigations, projects, conversations, portfolios, anecdotal records, self-assessments, etc. Not every assessment will count towards a student's final grade. The primary purpose of assessment and evaluation is to improve student learning.

# **CULMINATING ACTIVITY**

Culminating activities occur at or near the end of a course. They form part of the final 30% of a student's mark. If a student is absent from a culminating activity, they must provide a doctor's note. The culminating activity will not normally be re-scheduled.

For this course, the culminating activity will occur: In the last month of class And will consist of the following: Although at the discretion of the class teacher, the culminating activity is typically a practical demonstration of acquired skills. This is completed in allotted class time.

# **LEARNING SKILLS:**

The report card provides a record of the learning skills demonstrated by the student in every course, in the following six categories. However, learning skills are not directly considered in the determination of percentage grades.

**Independent Work** These skills will be assessed using the following key:

**Collaboration** E = Excellent

**Organization** G = Good

**Initiative** S= Satisfactory

**Responsibility** N = Needs Improvement

**Self-Regulation** 

### **MARK CALCULATION:**

Interim: A report will be given to reflect how well the student is progressing with suggestions for improvement.

Term Work: 70% of the overall grade (from all term evaluations)

Final Evaluation(s): 30% of the overall grade will be made up of a combination of the culminating activity and a

final exam written during the exam schedule.

Teachers will take various considerations into account before making a decision about the grade to enter on the report card. Determining a report card grade will involve teacher's professional judgement and interpretation of the evidence and should reflect the student's most consistent level of achievement with special considerations given to the more recent evidence. Marks are not merely a calculation of averages, but an evaluation of the consistent achievement of the student.

# **CONTACT INFORMATION:**

Teacher's Name: Mr. G. Coomber Phone Number: 905 648-4468 ext. 501 Email: gary.coomber@hwdsb.on.ca Extra Help Sessions: As required