



Halton
District
School
Board

Course Outline

TDA4M - Technological Design: Architectural Design

Grade 12, University/College Preparation

OVERVIEW

All courses within HDSB are taught in learning environments that promote inclusive education, and identify and eliminate discriminatory biases, systemic barriers, and power dynamics that limit the ability of students to participate, learn, grow, and succeed. All students see themselves reflected in the curriculum, their physical surroundings, and the broader environment, so that they are engaged in and empowered by their learning experiences.

Course Description

This course introduces students to the fundamentals of design advocacy and marketing, while building on their design skills and their knowledge of professional design practices. Students will apply a systematic design process to research, design, build, and assess solutions that meet specific human needs, using illustrations, presentation drawings, and other communication methods to present their designs. Students will enhance their problem-solving and communication skills, and will explore career opportunities and the postsecondary education and training requirements for them.

STRANDS	OVERALL EXPECTATIONS
A. <u>TECHNOLOGICAL DESIGN FUNDAMENTALS</u>	A1. Demonstrate an understanding of criteria, relationships, and other factors that affect technological design and the design process; A2. Describe strategies, techniques, and tools for researching, organizing, planning, and managing design projects and related activities, with an emphasis on advocacy, diplomacy, and marketing; A3. Demonstrate an understanding of drafting standards, drawing types, conventions, and guidelines used when representing design ideas graphically; A4. Demonstrate an understanding of various types of models and prototypes, and describe the tools, materials, equipment, and processes for building, testing, and evaluating them; A5. Use appropriate technical language and communications methods to document, report, present, and market design ideas and results.
B. <u>TECHNOLOGICAL DESIGN SKILLS</u>	B1. Use appropriate resources, methods, and tools to research and manage design projects and related activities;

STRANDS (CONTINUED)	OVERALL EXPECTATIONS
B. <u>TECHNOLOGICAL DESIGN SKILLS</u> <u>(Continued)</u>	B2. Apply appropriate methods for generating and graphically representing complex design ideas and solutions; B3. Create, test, and analyse models and/or prototypes, using a variety of techniques, tools, and materials; B4. Use a variety of formats and tools to create and present reports summarizing and evaluating the design process, to analyse decisions made during the process, and to advocate the final design.
C. <u>TECHNOLOGY, The ENVIRONMENT, and SOCIETY</u>	C1. Demonstrate an understanding of environmentally responsible design practices, and apply them in the technological design process and related activities; C2. Analyse the relationship between society and technological development.
D. <u>PROFESSIONAL PRACTICE and CAREER OPPORTUNITIES</u>	D1. Describe and apply personal and environmental health and safety standards and practices related to technological design; D2. Compare a variety of careers related to technological design, as well as the training and educational requirements for them, and maintain a portfolio of their work as evidence of their qualifications for future education and employment.

To see the learning expectations for this course go to page 341 of the document found at <http://www.edu.gov.on.ca/eng/curriculum/secondary/2009teched1112curr.pdf>

LEARNING SKILLS AND WORK HABITS

- | | | |
|---|--|--|
| ☐ Responsibility | ☐ Organization | ☐ Self-Regulation |
| ☐ Independent Work | ☐ Collaboration | ☐ Initiative |

Learning skills and work habits are an important part of your growth. Learning Skills and Work Habits will be taught, assessed, evaluated, and shared on your report card. This gives you and your parents/guardians valuable information about your learning.

HOW YOUR GRADES WILL BE DETERMINED:

Your final grade will be calculated by combining your Term (70%) grade and your Final Evaluations (30%):

	DESCRIPTION	GRADING BREAKDOWN
Term Work	Your work throughout the semester accounts for 70% of your final grade: • Your teacher will collect and track evidence of your learning through observations of your work; conversations with you; and by evaluating the work you produce. • Your teacher will provide feedback to help you with further study and improvement • Your 70% work will be returned for your review and reflection.	18% Knowledge & Understanding: Emphasizes the ability to recall factual information, recognize fundamental concepts and the foundational skills of the subject/discipline. 25% Application: Emphasizes the application and integration of knowledge, skills, processes and techniques to produce evidence of the student's understanding. 17% Thinking: Emphasizes the thinking skills used in thinking processes to demonstrate the student's understanding of information they have processed. 10% Communication: Emphasizes the clear, precise and effective use of oral, written and visual language to communicate the student's understanding of information and ideas. (The Technological Education Subject Council has determined the weightings of the above categories for this course)

HOW YOUR GRADES WILL BE DETERMINED, CONTINUED:

	DESCRIPTION	GRADING BREAKDOWN
Final Evaluations	The Final Evaluations account for 30% of your final grade ³ : • Final Evaluations will challenge you to demonstrate your knowledge and skills related to the overall expectations for the course	30% Performance Task
		0% Written Exam

For more information about what you need to know regarding...

1) [Meeting Timelines and Academic Honesty](https://goo.gl/KTAh40) - goo.gl/KTAh40

2) [Final 30% Evaluations](https://goo.gl/W82PYL) - goo.gl/W82PYL

3) [Determining Report Card Grade](https://goo.gl/FuzbMW) - goo.gl/FuzbMW

Your teacher can provide you with a paper copy of this information, if required.