



Western Technical College

31409325 Commercial Cabinetmaking

Course Outcome Summary

Course Information

Description	In this course, students will study the materials and equipment used in the commercial cabinetmaking field to include: high pressure laminates, substrates, adhesives, and hardware. Students will construct various types of commercial casework and countertops in the lab.
Career Cluster	Architecture and Construction
Instructional Level	Technical Diploma Courses
Total Credits	3
Total Hours	108

Pre/Corequisites

Prerequisite 31409323 Residential Cabinetmaking

Textbooks

No textbook required.

Learner Supplies

Safety glasses with side eye protection that meet Z87 OSHA guidelines. **Vendor:** Campus Shop. Required.

25' - 1" tape measure. **Vendor:** To be discussed in class. Required.

Scientific Calculator - \$20. **Vendor:** Campus Shop. Required.

Proper work boots - \$35.00-75.00. **Vendor:** To be discussed in class. Required.

Success Abilities

1. Cultivate Passion: Expand a Growth-Mindset
2. Cultivate Passion: Increase Self-Awareness
3. Live Responsibly: Embrace Sustainability
4. Refine Professionalism: Improve Critical Thinking
5. Refine Professionalism: Participate Collaboratively
6. Refine Professionalism: Practice Effective Communication

High Impact Practices

1. Community Based Learning Project: a key learning outcome of this course is to connect academic learning and civic development while simultaneously addressing a community partner's needs, interests, or problems.
2. Work-Based Learning: this course applies your learning to your desired profession by working in industry placements such as internships, practicums, clinicals, or co-ops.

Program Outcomes

1. Use hand and power tools and equipment
2. Apply industry recognized safety practices and procedures
3. Analyze sustainable building practices
4. Calculate the cost of a project
5. Recommend a plan of procedure to eliminate wasted time and materials
6. Demonstrate industry cabinetmaking practices and material application

Course Competencies

1. Apply plastic laminate.

Assessment Strategies

- 1.1. Skill Demonstration

Criteria

You will know you are successful when:

- 1.1. you use safe methods of cutting laminate to oversized dimensions.
- 1.2. you use correct methods of applying contact cement to substrates and laminate items.
- 1.3. you bond laminate to substrate using correct pressure with a j-roller.
- 1.4. you trim excess laminate with a trim router and a flush cutting router bit.
- 1.5. you use a laminate file to clean up all overlapping laminate edges to a clean, blemish free look and feel.

Learning Objectives

- 1.a. Identify safe methods of cutting or sizing of plastic laminate
- 1.b. Prepare the surface of a substrate to receive the application of plastic laminate
- 1.c. Apply adhesive to substrate and plastic laminate
- 1.d. Press laminate on to substrate
- 1.e. Trim excess laminate from substrate
- 1.f. File edges of substrate to a smooth surface

1.g. Clean excess adhesive from product

2. Construct a base cabinet.

Assessment Strategies

2.1. Skill Demonstration

Criteria

You will know you are successful when:

- 2.1. you use safe practices to cut or shape all cabinet parts to the appropriate dimensions.
- 2.2. you assemble case components using wood joinery methods that are supplied by instructor.
- 2.3. you bond plastic laminate to substrate using proper methods.
- 2.4. you trim and file excess laminate to clean and smooth edges.
- 2.5. you install all required hardware to manufactures specifications.
- 2.6. you present a commercial cabinet to instructor that is dimensionally accurate, functional, and shows minimum flaws or blemishes.

Learning Objectives

- 2.a. Identify different manufactured panel products used in commercial cabinetmaking
- 2.b. Determine the correct dimensions for case items to be cut.
- 2.c. Determine proper joinery used to construct cabinet.
- 2.d. Identify the hardware needs that will be used in base cabinet.
- 2.e. Assemble panel products to produce a finished cabinet.

3. Construct an upper cabinet.

Assessment Strategies

3.1. Skill Demonstration

Criteria

You will know you are successful when:

- 3.1. you use safe practices to cut or shape all cabinet parts to the appropriate dimensions.
- 3.2. you assemble case components using wood joinery methods that are supplied by instructor.
- 3.3. you bond plastic laminate to substrate using proper methods
- 3.4. you trim and file excess laminate to clean and smooth edges.
- 3.5. you install all required hardware to manufactures specifications.
- 3.6. you present a commercial cabinet to instructor that is dimensionally accurate, functional, and shows minimum flaws or blemishes.

Learning Objectives

- 3.a. Identify different manufactured panel products used in commercial cabinetmaking
- 3.b. Determine the correct dimensions for case items to be cut.
- 3.c. Determine proper joinery used to construct cabinet.
- 3.d. Identify the hardware needs that will be used in upper cabinet.
- 3.e. Assemble panel products to produce a finished cabinet.

4. Construct a countertop.

Assessment Strategies

4.1. Skill Demonstration

Criteria

You will know you are successful when:

- 4.1. you use safe practices to cut or shape all countertop parts to the appropriate dimensions.
- 4.2. you assemble countertop components using proper joinery methods that are supplied by instructor.
- 4.3. you bond plastic laminate to substrate using proper methods.
- 4.4. you trim and file excess laminate to clean and smooth edges.
- 4.5. you present countertop to instructor that is dimensionally accurate and shows minimum flaws or blemishes.

Learning Objectives

- 4.a. Identify different manufactured panel products used in commercial cabinetmaking
- 4.b. Determine proper materials needed to construct a countertop.

- 4.c. Cut all materials to correct dimensions.
- 4.d. Prepare materials for applying laminates.
- 4.e. Apply all laminate to substrate and trim, and file to an acceptable edge.

5. Estimate cost of materials for a commercial cabinet.

Assessment Strategies

- 5.1. Skill Demonstration
- 5.2. Written Objective Test (score 70% or higher)

Criteria

You will know you are successful when:

- 5.1. you research unit costs of materials used in the commercial cabinet making industry.
- 5.2. you fill out a bill of materials worksheet.

Learning Objectives

- 5.a. Calculate the amount of materials needed for a commercial cabinet
- 5.b. Research the unit cost of materials needed for a commercial cabinet.
- 5.c. Calculate a complete cost breakdown for a commercial cabinet.
- 5.d. Complete a bill of materials form for a commercial cabinet.