

Unit: Project Book 3 Commercial Unit 2

Title: Laying out walls

Skill(s) and Knowledge: Identify and describe what is found in each project plan, schedule or view and use plans to determine construction method needed to create partition walls.

Tasks: Students will be able to: Layout walls, door and window openings according to a set of prints using measuring and marking tools.

Performance objective:

Students will determine the type of dimension, how to adjust dimensions, how to establish a perpendicular line.

Tools, supplies and reference materials:

Tape measure, pencil, chalk-line, open area to mark out walls. If a concrete floor is available consider using spray lacquer over chalk lines to keep them visible. Career Connections Project Book 3 Commercial pages: 68-97.

Methods of instruction: Demonstration on how to measure and mark using tape measure and a chalk line. Have students work in pairs or small groups to practice marking a perpendicular and then start laying out walls.

Estimated time: 30 hrs. **Number of students:** 10-15

Task analysis or activities:

Lead up exercise page 77, Establishing a perpendicular (3-4-5 triangle)

Lead up exercise page 86-92 Laying out partitions

Layout Project page 93

Evaluation: Students will be graded on their use of time, safety methods, quality of work, cleaning and organization of their work area, interaction with other students, and vocational employability skills grading rubric. Manipulative skills assessments and written evaluations.

Performance Notes:

Vocational Frameworks References

- 2.A.01.05 Identify and apply OSHA safety regulations.
- 2.B.01 Describe the basic layout of a set of construction documents.
- 2.E.01.01 Demonstrate use and maintenance of layout, marking and measuring tools.

English/Strand 3 Frameworks References:

- 2.B.01-06 Determine the meaning of symbols, key terms, and other domain-specific words and phrases in a technical context.

Frameworks References: Math

- 2.B.01 Use Trigonometric ratios and Pythagorean Theorem to solve right triangles in applied problems.

Common Core References:

- Read and listen critically for information understanding and enjoyment
- Set goals and achieve them by organizing time, workspace, and resources effectively
- Work both independently and in groups

SCANS references:

Foundation Skills:

1. Basic skills— reading, writing, mathematics, speaking, and listening.
2. Thinking Skills-- thinking creatively, making decisions, solving problems, visualizing, knowing how to learn, and reasoning
3. Personal qualities--individual responsibility, self-esteem, sociability, self management, and integrity

Workplace Competencies

1. Resources--allocating time, money, material, space, and staff.
2. Interpersonal skills--working in teams, teaching others, serving customers, leading negotiating, and working well with culturally diverse populations.
3. Information--acquiring and evaluating data, organizing and maintaining files, interpreting & communicating, and using computer to process information
4. Systems--understanding social, organizational, and technological systems, monitoring and correcting performance, and designing or improving systems.
5. Technology--selecting equipment and tools, applying technology to specific tasks, maintaining and troubleshooting technologies.