

BLDT-125 ROOF FRAMING AND SHINGLING 6 CREDITS

SYLLABUS

CATALOG DESCRIPTION

Gain detailed knowledge of how to construct a roof using pre-engineered trusses and/or stick framing techniques. The campus laboratory experience will include constructing a house

Prerequisites: BLDT 120, BLDT 111, BLDT 112

Semester Offered: Fall

COMMON STUDENT LEARNING OUTCOMES

Upon successful completion of San Juan College programs and degrees, the student will demonstrate competency in...

BROAD AND SPECIALIZED LEARNING

Students will actively and independently acquire, apply, and adapt skills and knowledge with an awareness of global contexts.

CRITICAL THINKING

Students will think analytically and creatively to explore ideas, make connections, draw conclusions and solve problems.

CULTURAL AND CIVIC ENGAGEMENT

Students will act purposefully, reflectively, and ethically in diverse and complex environments.

EFFECTIVE COMMUNICATION

Students will exchange ideas and information with clarity in multiple contexts.

INFORMATION LITERACY

Students will be able to recognize when information is needed and have the ability to locate, evaluate, and use it effectively.

INTEGRATING TECHNOLOGIES

Students will demonstrate fluency in the application and use of technologies in multiple contexts.

Student work from this class may be randomly selected and used anonymously for assessment of course, program, and/or institutional learning outcomes. For more information, please refer to the Dean of the appropriate School.

COURSE LEARNING OUTCOMES

Upon successful completion of the course, the student will be able to...

1. Estimate and use materials to successfully construct and finish a roof.
2. Identify and use tools to successfully construct and finish a roof.
3. Identify basic roof types and roof variations.

4. Explain in detail the difference between a rafter-framed and engineered-truss roof system.
5. Explain the common terms associated with roof construction.
6. Demonstrate an understanding of Right-Angle Framing by explaining the relationship of rise to run as it relates to roof pitch.
7. Properly prepare framed walls for the installation of a roof system.
8. Measure and layout a building for roof framing.
9. Safely raise, install, and brace roof trusses.
10. Calculate, measure, and cut “rafter-framed” roof components properly.
11. Finish roof eaves with either an open or closed cornice detail.
12. Install and cut roof sheathing properly.
13. Apply finish roof materials to include drip edge, roof felt, and asphalt shingles.
14. Demonstrate an understanding of proper roof ventilation and drainage.

GENERAL LEARNING OBJECTIVES

1. To provide the student with the knowledge and training necessary to properly construct a roof using a variety of building products, techniques and spacing standards.