

SUBJECT: Residential Construction		GRADE: 10-12	
Unit Title: Introduction to Residential Construction		Time Frame: Days 1-9	
UNIT OVERVIEW			
Students will learn about various building and roof styles Identify the importance and need for residential construction in everyday living Learn how to read plans/ technical drawings Students will be able to identify various structural members of a framing system			
LRG SKILLS AND DISPOSITIONS		PA STANDARDS	
Communication & Empathy: Introductory course information (S2C) Continual Learning & A Growth Mindset: Introductory course information (D2C)		3.5.9-12.F, 3.5.9-12.H, 3.5.9-12.BB, 3.5.9-12.GG 3.5.9-12.KK	
COMPETENCIES		LEARNING TARGETS	
Core Concepts of Technology and Engineering		<ul style="list-style-type: none"><li>I can demonstrate the use of conceptual, graphical, virtual, mathematical, and physical modeling to identify conflicting considerations before the entire system is developed and to aid in design decision making (K1TEB2M1)</li></ul>	
		<ul style="list-style-type: none"><li>I can cite examples of the criteria and constraints of a product or system and how they affect final design (K1TEB2M5)</li></ul>	
Design in Technology and Engineering Education		<ul style="list-style-type: none"><li>I can determine the best approach by evaluating the purpose of the design (K1TEB7M1)</li></ul>	

	<ul style="list-style-type: none"> <li>• I can apply principles of human-centered design (K1TEB7M4)</li> <li>• I can apply a broad range of design skills to their design process (K1TEB7M7)</li> </ul>
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SUBJECT: Residential Construction		GRADE: 10-12	
Unit Title: Safety in the Lab Setting/ On site		Time Frame: Days 9-15	
UNIT OVERVIEW			
Students will be able to: Safely use different types of machinery Identify different machines Safely use different hand and power tools			
LRG SKILLS AND DISPOSITIONS		PA STANDARDS	
Honesty, Integrity, & Responsibility: Safety Demonstrations (D3C)		3.5.9-12.B 3.5.9-12.C 3.5.9-12.D 3.5.9-12.E	
COMPETENCIES		LEARNING TARGETS	
Core Concepts of Technology and Engineering		<ul style="list-style-type: none"><li>I can implement quality control as a planned process to ensure that a product, service, or system meets established criteria (K1TEB2M6)</li></ul>	

SUBJECT: Residential Construction		GRADE: 10-12	
Unit Title: Residential Construction Systems		Time Frame: Days 15-30	
UNIT OVERVIEW			
Students will apply building techniques to a small scale class project that will include framing, roofing, siding, and finish carpentry.			
LRG SKILLS AND DISPOSITIONS		PA STANDARDS	
Communication & Empathy: Working in the lab environment (S2C) Continual Learning & A Growth Mindset: Working in the lab environment (D2C) Resilience & Grit: Working in the lab environment (D4C) Critical Thinking & Problem Solving: Working in the lab environment (S4C)		3.1.10ABCDE 3.2.10D 3.6.10BC 3.7.10AB 3.8.10BC	
COMPETENCIES		LEARNING TARGETS	
Core Concepts of Technology and Engineering		<ul style="list-style-type: none"><li>I can demonstrate the use of conceptual, graphical, virtual, mathematical, and physical modeling to identify conflicting considerations before the entire system is developed and to aid in design decision making (K1TEB2M1)</li><li>I can cite examples of the criteria and constraints of a product or system and how they affect final design (K1TEB2M5)</li><li>I can implement quality control as a planned process to ensure that a product, service, or system meets established criteria (K1TEB2M6)</li></ul>	

Design in Technology and Engineering Education	<ul style="list-style-type: none"> <li>• I can determine the best approach by evaluating the purpose of the design (K1TEB7M1)</li> <li>• I can apply principles of human-centered design (K1TEB7M4)</li> <li>• I can apply a broad range of design skills to their design process (K1TEB7M7)</li> </ul>
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<b>SUBJECT: Residential Construction</b> <b>GRADE: 10-12</b>	
<b>Unit Title: Practical Building Application</b>	<b>Time Frame: Days 30-90</b>
UNIT OVERVIEW	
Students will apply building techniques to a full scale class project that will include framing, roofing, siding, and finish carpentry.	
LRG SKILLS AND DISPOSITIONS	PA STANDARDS
Continual Learning & A Growth Mindset: Working on a jobsite environment (D2C) Resilience & Grit: Working on a jobsite environment (D4C) Critical Thinking & Problem Solving: Working on a jobsite environment (S4C) Communication & Empathy: Working on a jobsite environment (S2C)	3.5.9-12.B 3.5.9-12.C 3.5.9-12.D 3.5.9-12.E
COMPETENCIES	LEARNING TARGETS
Core Concepts of Technology and Engineering	<ul style="list-style-type: none"> <li>• I can demonstrate the use of conceptual, graphical, virtual, mathematical, and physical modeling to identify conflicting</li> </ul>

	<p>considerations before the entire system is developed and to aid in design decision making (K1TEB2M1)</p> <ul style="list-style-type: none"> <li>• I can cite examples of the criteria and constraints of a product or system and how they affect final design (K1TEB2M5)</li> <li>• I can implement quality control as a planned process to ensure that a product, service, or system meets established criteria (K1TEB2M6)</li> </ul>
Design in Technology and Engineering Education	<ul style="list-style-type: none"> <li>• I can determine the best approach by evaluating the purpose of the design (K1TEB7M1)</li> <li>• I can apply principles of human-centered design (K1TEB7M4)</li> <li>• I can apply a broad range of design skills to their design process (K1TEB7M7)</li> </ul>