

Heating, Ventilation, and Air Conditioning 1 & 2 Scope & Sequence: Year 1

Semester 1		Semester 2	
Quarter 1	Quarter 2	Quarter 3	Quarter 4
Professional Standards: 4.0,8.0 Unit 1 Basic Safety Incidents and Hazard Recognition Safe Work Requirements Avoiding Struck-By Hazards Energy Related Hazards PPE Specific Job-Site Safety Hazards *SP/2 Completion Professional Standards: 1.0, 3.0 Unit 2 Introduction to Construction Math Whole Numbers and Operations Fractions The Decimal System Tools to Measure Length Conversions: Imperial and Metric Systems Geometry: Angles, Area & Volume	Professional Standards: 1.0, 4.0,5.0 Unit 3 Introduction to Hand Tools Identify and Properly Use Hand Tools Identify and Properly Use Measurement and Layout Tools Identify and Properly Use Cutting and Shaping Tools Identify and Properly Use Chain Falls, Come-Alongs, Clamps, etc Professional Standards: 1.0, 4.0,5.0 Unit 4 Introduction to Power Tools Identify and Properly Use Power Drills and Impact Wrenches Identify and Properly Use Various Power Saws Identify and Properly Use Grinders and Attachments Identify and Properly Use Miscellaneous Power Tools	Professional Standards: 1.0, 4.0,5.0 Unit 5 Introduction to Construction Drawings Identify and Describe Types of Construction Drawings Purpose of 5 Basic Construction Drawing Components. Significance of Drawing Elements Use of Dimensions and Drawing Scales Use of Engineer's and Architect's Scales Professional Standards: 1.0, 4.0,5.0 Unit 6 Introduction to Basic Rigging Identify Rigging Slings, Hardware, and Equipment. Inspecting Slings Rigging Hardware Types of Hoists Rigging Hitches	Professional Standards: 1.0, 2.0, 3.0, Unit 7 Basic Communication Skills Communication, Listening, and Speaking Process Relationship between Communication and Job Performance Proficient Reading and Writing Skills Relationship between Reading and Writing Skills and Job Performance Professional Standards: 1.0, 2.0, 3.0, Unit 8 Basic Employability Skills Construction Business and Trades Critical Thinking and Problem Solving Professional Standards: 4.0, 8.0 Unit 9 Introduction to Materials Handling Safety-Materials Handling Material Handling Equipment



51% of the entire program will be conducted in a lab setting. The lab consists of hand-on learning projects and experiences where student will practice the necessary skills to complete the current unit study.