Virtual Skills Academy from Sandhills Community College offers a quick-start road map that allows individuals to build knowledge in preparation for a career in manufacturing. This online academy is intended to provide basic assembly concepts and processes understanding and bring awareness to opportunities within the manufacturing industry. Courses are stacked to follow a job progression plan. Unlike many other training programs, the Virtual Skills Academy requires minimal preparation. It is efficient, effective training that has been developed with input from manufacturing experts.

FLEXIBLE AND CONVENIENT
Online classes are self-paced, and easy to access through smart phones, tablets, and computers. Each course provides pre- and post- assessments and the ability to review and learn through a variety of engaging activities.

CAREER PATHWAYS FOR ASSEMBLY JOB ROLES
Combine job roles for learning pathways, or offer single job roles for targeted learning. Large comprehensive programs also available.

Virtual Skills Academy Provides:
- Preset curriculum
- Engaging online classes
- Supplemental videos
- Pre- and post-training knowledge assessments
- Guidance from Sandhills Community College Staff
- Readiness for On-the-Job Training
- Preparation for entry-level jobs in manufacturing
- Demonstrated proof of aptitude
- Opportunity to showcase personal initiative
Get ready for your career to TAKE OFF

### ASSEMBLER
- Types of Adhesives
- Coating Defects
- Intro to Coating Composition
- Processes for Applying Coatings
- Surface Preparation for Coatings
- Introduction to Assembly
- Introduction to Fastener Threads
- Overview of Non-Threaded Fasteners
- Overview of Threaded Fasteners
- Safety for Assembly
- Tools for Threaded Fasteners
- Basic Measurement
- Basics of Tolerance
- Blueprint Reading
- Calibration Fundamentals
- Hole Standards and Inspection
- Thread Standards and Inspection
- S5 Overview
- Lean Manufacturing Overview
- Ferrous Metals
- Introduction to Mechanical Properties
- ISO 9001 Review
- Intro to Machine Rigging
- Rigging Equipment
- Bloodborne Pathogens
- Fire Safety and Prevention
- Hand and Power Tool Safety
- Intro to OSHA
- Lockout/Tagout Procedures
- Noise Reduction and Hearing Conservation
- Personal Protective Equipment
- Powered Industrial Truck Safety
- Safety for Lifting Devices
- SDS and Hazard Communication
- Walking and Working Surfaces
- Math Fundamentals
- Math: Fractions and Decimals
- Units of Measurement

### ASSEMBLY MECHANIC
- Basics of the Bonding Process
- Steps for Adhesive Application
- DC Circuit Components
- Electrical Units
- Introduction to Circuits
- Safety for Electrical Work
- Properties for Fasteners
- Fittings for Fluid Systems
- Introduction to Fluid Conductors
- Introduction to Hydraulic Components
- Introduction to Pneumatic Components
- Safety for Hydraulics and Pneumatics
- Introduction to GD&T
- Major Rules of GD&T
- Metrics for Lean
- Troubleshooting
- Introduction to Mechanical Systems
- Lubricant Fundamentals
- Safety for Mechanical Work
- Lifting and Moving Equipment
- Rigging Inspection and Safety
- Geometry: Circles and Polygons
- Geometry: Lines and Angles
- Geometry: Triangles
- Trigonometry: Sine, Cosine, Tangent
- Overview of Soldering