

## Autodesk Inventor Sheet Metal Design

In this class, users learn the fundamental principles of sheet metal design using Autodesk® Inventor®. With focuses on basic sheet metal concepts and techniques, and builds on them to include complex modeling practices for forming sheet metal parts, assemblies, and drawings. Hands-on exercises representing real-world, industry-specific design scenarios are included.

### Duration

2 days

### Typical Schedule

This class starts each day at 9:00 am and ends at 4:00 pm.

### Prerequisites

Completion of “Inventor Introduction to Solid Modeling” Class

A minimum of 120 hours of work experience with the software is recommended.

Knowledge of Drafting, design, or mechanical engineering principles.

Proficient with Microsoft® Windows®

### Topics covered

- Sheet Metal Concepts
- Sheet Metal Terminology
- Sheet Metal Environment
- Sheet Metal Base Features
  - Applying Existing Sheet Metal Defaults
  - Creating a Face as a Base Feature
  - Creating a Contour Flange as a Base Feature
  - Creating a Contour Roll as a Base Feature
- Sheet Metal Secondary Features
  - Sheet Metal Parameters
  - Bend Relief Shapes
  - Faces, Flanges and Contour Rolls as Secondary Features
- Flanges
  - Creating Flanges
  - Corner Relief Options
- Bending Sheet Metal
  - Hems
  - Folds
  - Bend Features
- Corner Rounds and Chamfers
- Sheet Metal Cuts
  - Creating Cut Features
  - Creating Straight Holes
  - Using Punch Tool Features
  - Creating a Punch Tool
  - Cuts Using Surfaces
- Corner Seams
- Flat Pattern Environment
  - Creating Flat Patterns
  - Flat Pattern Cleanup
  - Exporting to DXF/DWG
- Lofted Flange and Rips
- Unfold and Refold
- Documentation and Annotation
  - Creating Sheet Metal Drawings
  - Bend & Punch Notes
  - Bend Tables and Punch Tables
- Converting Parts to Sheet Metal