

Autodesk Inventor Training Course

Course Overview

Course Length: 16-Hours

- 16-Hours – 8 x 2-hour training sessions
- Remote training over MS Teams
- Sessions are recorded and download links for each session are provide for future use
- Training for up to 1-3 People
- Sessions can start within 7 days upon ordering
- Flexible sessions (i.e. consecutive or Monday, Wednesday, Friday, etc.)
- Courses are private and topics can be customised to suit
- Includes Certificate of Completion

The Autodesk Inventor Introduction for Experienced 3D CAD Users training course is intended to provide accelerated introductory training in the Autodesk® Inventor® software.

This hands-on, practice-intensive training course is developed so that new users in the Autodesk Inventor software can benefit from a shorter, introductory-level, training course.

You are taught how to find and use the modelling tools associated with familiar modelling strategies that are used in other 3D CAD software. You will acquire the knowledge required to complete the process of creating models from conceptual sketching, through to solid modelling, assembly design, and drawing production.

Topics Covered

- The Autodesk Inventor software interface
- Obtaining model information
- Creating sketch and pick and place features
- Work Features
- Creating equations and working with parameters
- Model geometry and model display manipulation
- Feature duplication techniques
- Placing and constraining parts in assemblies
- Assembly component display
- Presentation files (Exploded views and Animations)
- Assembly tools
- Creating parts and features in assemblies
- Creating and editing assembly Bill of Materials
- Working with projects
- Creating and annotating drawings and views

Prerequisites

Prior knowledge of 3D modelling and 3D CAD software is recommended but not essential.

Training Guide Contents

Chapter 1: Introduction to Autodesk Inventor

- 1.1 Getting Started
- 1.2 Autodesk Inventor Interface
- 1.3 Model Manipulation
- 1.4 Model Information

Chapter 2: Sketching Geometry

- 2.1 Creating a New Part File
- 2.2 Creating a Sketch
- 2.3 Sketch Geometry
- 2.4 Constraints
- 2.5 Dimensions
- 2.6 Additional Sketching Tools

Chapter 3: Creating Sketched Features

- 3.1 Extrude & Revolve Features
- 3.2 Sweep Features
- 3.3 Loft Features
- 3.4 Editing Sketched Features

Chapter 4: Creating Pick and Place Features

- 4.1 Edge Chamfer
- 4.2 Constant Fillets
- 4.3 Variable Fillets
- 4.4 Face Fillets
- 4.5 Full Round Fillets
- 4.6 Holes
- 4.7 Threads
- 4.8 Editing Pick and Place Features

Chapter 5: Work Features

- 5.1 Work Planes
- 5.2 Work Axes
- 5.3 Work Points

Chapter 6: Additional Features

- 6.1 Face Draft
- 6.2 Splitting a Face or Part
- 6.3 Shells
- 6.4 Ribs
- 6.5 Reordering Features
- 6.6 Inserting Features

Chapter 7: Equations

- 7.1 Equations
- 7.2 Parameters

Chapter 8: Duplication Tools

- 8.1 Rectangular Sketch Patterns
- 8.2 Circular Sketch Patterns
- 8.3 Rectangular Feature Patterns
- 8.4 Circular Feature Patterns
- 8.5 Sketched Driven Patterns
- 8.6 Mirror Parts or Features
- 8.7 Manipulate Patterns and Mirror Features

Chapter 9: Assembly Environment

- 9.1 Assembling Components Using Constraints
- 9.2 Assemble Mini-Toolbar
- 9.3 Content Centre
- 9.4 Assembly Browser
- 9.5 Saving Files

Chapter 10: Joint Connections

- 10.1 Assembling Components Using Joints

Chapter 11: Manipulating Assembly Display

- 11.1 Moving and Rotating Assembly Components
- 11.2 Suppressing Constraints
- 11.3 Component Display
- 11.4 Selection Options in Assemblies

Chapter 12: Presentation Files

- 12.1 Creating Presentations
- 12.2 Storyboards
- 12.3 Snapshot Views
- 12.4 Publishing a Presentation File

Chapter 13: Assembly Tools

- 13.1 Replacing Components
- 13.2 Duplicating Components
- 13.3 Restructuring Components
- 13.4 Driving Constraints
- 13.5 Contact Solver
- 13.6 Interference
- 13.7 Error Recovery

Chapter 14: Assembly Parts and Features

- 14.1 Assembly Parts
- 14.2 Assembly Features

Chapter 15: Assembly Bill of Materials

- 15.1 Create Virtual Components

15.2 Create Bill of Materials

Chapter 16: Working With Projects

16.1 Project Files

16.2 Resolving Links

Chapter 17: Drawing Basics

17.1 Creating a New Drawing

17.2 Base and Projected Views

17.3 Additional Drawing Views

17.4 Manipulating Views

Chapter 18: Detailing Drawings

18.1 Dimensions

18.2 Drawing Sheets

18.3 Parts List

18.4 Balloons

18.5 Styles and Standards

18.6 Hatching

Chapter 19: Drawing Annotations

19.1 Text

19.2 Symbols

19.3 Hole and Thread Notes

19.4 Chamfer Notes

19.5 Centre Marks and Centre Lines

19.6 Hole Tables

19.7 Revision Tables and Tags