



Oxman College

Upgrade Skills Training for Working Professionals

Autodesk Revit Structure

Introduction to Revit Structure

- Building Information Modeling
- Overview of the Interface
- Standard Terminology
- Starting Projects
- Viewing Commands

Basic Drawing and Editing Tools

- General Drawing Tools
- Editing Elements
- Basic Modifying Tools
- Helpful Editing Tools

Setting up Levels and Grids

- Setting Up Levels
- Creating Structural Grids

Starting Structural Projects

- Importing and Linking CAD Drawings
- Linking in Architectural Projects
- Copying and Monitoring Elements

Working with Views

- Duplicating Views
- Adding Callout Views
- Setting the View Display
- Creating Elevations
- Creating Sections

Adding Columns and Walls

- Placing Vertical Structural Columns
- Placing Slanted Structural Columns
- Placing and Modifying Walls

Adding Foundations

- Creating Wall Footings
- Step and Isolated Footings
- Piers and Pilasters
- Slab Foundations

Structural Reinforcement

- Structural Reinforcement
- Adding Rebar, Modifying Rebar Placement
- Reinforcing Walls, Floors, and Slabs

Beams and Framing Systems

- Adding Beams and Beam Systems
- Modifying Beams
- Framing Annotation
- Adding Bracing

Floors and Shafts

- Creating Floor Systems
- Creating Shaft Opening

Construction Documents

- Setting Up Sheets
- Placing and Modifying Views on Sheets
- Adding Revisions
- Creating Sheets
- Printing Sheets

Annotating Construction Documents

- Working with Dimensions
- Working with Text
- Detail Lines and Symbols
- Creating Legends

Scheduling

- Structural Schedules
- Graphical Column Schedules
- Material Takeoff Schedules
- Additional Schedules

Detailing

- Setting Up Detail View
- Creating Details
- Patterning

Family Concepts & Techniques

- Introduction to Creating Families
- Creating the Parametric Framework
- Creating Family Elements
- Additional Tools for Families
- Creating Family Types
- Visibility Display Settings
- Overview of Family Creation

Creating Custom Families

- Slabs on Composite Metal Deck
- Tapered Concrete Columns
- Precast Hollow Core Slabs
- Tapered Moment Frame

Creating Trusses

- Truss Concepts and Techniques
- Creating Truss Families
- Using Trusses in Projects

Structural Analysis

- Preparing Projects for Structural Analysis
- Structural Settings
- Viewing Analytical Models
- Adjusting Analytical Models
- Placing Loads

Sample Project

- Steel Structure
- Concrete Structure
- Workshop