COURSE SYLLABUS

BIM Certification Course Online

Develop expertise in Building Information Modeling (BIM) and prepare for the Autodesk Certified User Exam in Revit with this comprehensive series of Revit courses. From beginner to advanced, you'll master the skills to create 3D models and detailed construction documents using Revit.

> Group classes (Live Online) and onsite training are available for this course. For more information, email partnerships@vdci.edu or visit: https://vdci.edu/courses/bim-certification-course



admissions@vdci.edu • (619) 758-9300

Course Outline

This package includes these courses

- Intro to Revit Course Online (30 Hours)
- Intermediate Revit Course Online (30 Hours)
- BIM Construction Documents I Course Online (30 Hours)
- BIM Construction Documents II Course Online (30 Hours)
- BIM Construction Documents III Course Online (30 Hours)

Intro to Revit Course Online

In this beginner-friendly course, you'll dive into how Revit (BIM) links all your project information using the Revit Architecture tools. You'll learn how to design 3D models that automatically generate 2D architectural drawings, including floor plans, elevations, and 3D perspective views. Starting with a pre-made template, you'll build a Building Information Model, create floor plans and elevations, generate 3D views, place them on sheets, and print them to PDF.

- Describe Primary Revit Concepts and how they relate to Building Information Modeling (BIM).
- Explore the Revit User-Interface.
- Design a 3D building model to explain how information is interrelated
- Determine the appropriate workflow to complete tasks within Revit.
- Develop a project that includes floors, walls, ceilings, stairs, curtain walls, and roof design to strengthen 3D modeling and 2D documentation skills.
- Create presentation-level architectural graphics.
- Catalog building information using schedules.

Intermediate Revit Course Online

In this intermediate BIM class, you'll learn advanced Revit techniques for documenting projects, including scheduling

components, creating 2D/3D families, refining graphics, and making a streamlined construction document set. You'll also build on an existing model, explore design options, create custom schedules, and develop custom Revit families. By the end, you'll turn a conceptual model into a complete, integrated construction document set.

- Integrate DWG Files to create Revit details.
- Tag elements for cost estimation and material take-offs.
- Explore the capabilities of design options and how to present different options.
- Create 3D parametric families.
- Build customized door, material, and room schedules that can be used for construction take-offs.
- Explore BIM project management techniques to keep models efficient and user-friendly.

BIM Construction Documents I Course Online

This online Revit course is the first of three focused on creating construction documents. You'll model a single-story commercial building, import AutoCAD drawings, create a site model, and then add a two-story extension, simulating real-world AEC workflows. The course covers advanced Revit techniques for commercial projects, led by an Autodesk Certified Instructor with experience in commercial, medical, and biotech design.

- Using BIM tools to model existing buildings, partial demolition, and new constructions.
- Creating site plans with topography, hardscape, and landscaping.
- Differentiating construction phases through graphics.
- Producing presentation-quality renderings for documentation.

BIM Construction Documents II Course Online

In this intermediate course, you'll create construction documents for the commercial building and site created in BIM Construction Documents I. You'll also create the sheet drawings and will add keynotes, detail drawings, and schedules.

- Prepare a set of architectural construction documents incorporating the site and building models created in BIM Construction Documents I.
- Develop progress sets of construction documents, reflecting 30/60/90/100 percent deliverable submittals.
- Produce plan, section, and elevation views of the project for sheet layout.
- Keynote elements of the project model. Develop schedules and a limited number of architectural details extracted from the BIM model.

BIM Construction Documents III Course Online

This advanced BIM construction documents course covers both residential and commercial projects, helping you develop skills for creating floor plans, elevations, and 3D perspectives. You'll learn to create detailed 3D building models and generate professional 2D architectural drawings using Revit.

- Create and place graphic-symbol and material legends; standardize view titles and sheet presentation
- Dimension exterior/interior plans consistently, add partition schedules, and apply wall types per intent
- Add and manage keynotes across plans, elevations, sections, and the roof—using a shared keynote table
- Develop enlarged plans and interior elevations with coordinated tags, dimensions, and view templates
- Set up phasing for tenant-fit layouts; QC, revision-cloud/tag sheets, and export a scaled PDF set for midterm and final