

CADVertex Solutions A-16 . Whispering Wind . Pashan-Baner Link Road . Pashan . Pune . 411021 www.CADVertex.com <u>info@cadvertex.com</u> Phone :+91 9890611694

Solid Edge Automation Language: VB.Net or CSharp

Training Structure

Module 1: VB.Net or CSharp Programming. **Module 2**: Solid Edge Automation.

Training Highlights





5 Industry Projs

Certificate

Support after Training CuttingEdge Tech

List of Projects (Automation)

- 1. Geometric Calculator
- 2. Create Drawing Views
- 3. Batch Processor
- 4. Title Blocks and Annotations
- **5**. Parametric Parts
- 6. Assembly Generation

Module 1: VB.Net or CSharp.Net Programming

1. Installing Visual Studio

- Installing Visual Studio Community version.
- Setting the default language.
- Customizing the layout.
- Solution Explorer, Toolbox and the Properties windows.

2. Introduction to Programming

- Selecting a project template.
- Setting up user interaction and collecting inputs.
- Variable types Double, Integer, and String.
- Acquiring user input from textboxes into variables.
- Calculations and display outputs.
- Using the .Net Math library functions.
- Various files and their meaning in the project structure.
- Separating source code from the executable.

3. Creating a Windows Forms Application

- Setting dialog box properties.
- Adding controls: Button, TextBox, Label, Checkbox, RadioButton.
- Adding images to PictureBox and other controls.
- Aligning text and images on controls.
- Composite controls: ListBox and ComboBox.
- Adjusting various properties for each type of control.

4. Arrays and Loops

- Filling arrays and reading array elements.
- Filling ListBoxes with array elements.
- ForEach loop.

5. Functions and Subroutines

- Arguments.
- Return Types.
- Return Values in Functions.
- Function Overloading.

6. Multi-Form Projects

- Adding Forms to a project.
- Form Constructor and object variables.
- Form objects and invoking Forms.
- Exchanging data between Forms.

7. Object Oriented Programming

- Creating a class.
- Adding member functions.
- Public and Private methods.
- Adding member variables.
- Encapsulation.
- Polymorphism.

Module 2: CAD Automation

8. Getting Started

- Connect to CAD
- ✤ Getting information from the UI
- Read-write various properties of the UI

9. Documents Automation

- Document types
- Create new files Part, Drawing and Assembly
- Open, Close, Save and SaveAs documents
- Close all documents in the Session
- Export documents to other formats
- ✤ Activate files in a session
- Loop through files in the session

10. File Handling

- Standard file dialogs to select files
- Setting file filters
- Industry Project Batch Processor

11. Managing Sheets in Drawings

- Creating drawing sheets
- Accessing sheets in a drawing
- Counting and extracting sheet info
- Switching between sheets

12. Drawing Views

- Create drawing views
- Industry Project Creating standard views of 3D models

13. Handling Text in Drawings

- ✤ Access text objects in a drawing document
- Industry Project Automatic Title Block Updater Program

14.2D objects in Drawings

Creating 2D objects in a drawing document

15. Parametric Parts

- ✤ Control parametric part
- Expression and formulas dimensions and variables
- Industry Project Modify features of a parametric shaft with a keyway

16. Assembly Generation

- Inserting parts into an assembly
- Positioning components in an assembly

Subscribe: CADVertex - Newsletter

- ✓ CAD API
- ✓ BIM API
- ✓ Python Programming Tips
- ✓ Dynamo Programming Tips
- ✓ Grasshopper Tips
- ✓ CSharp Programming Tips
- ✓ VB.Net Programming Tips
- ✓ ML and AI Programming Tips



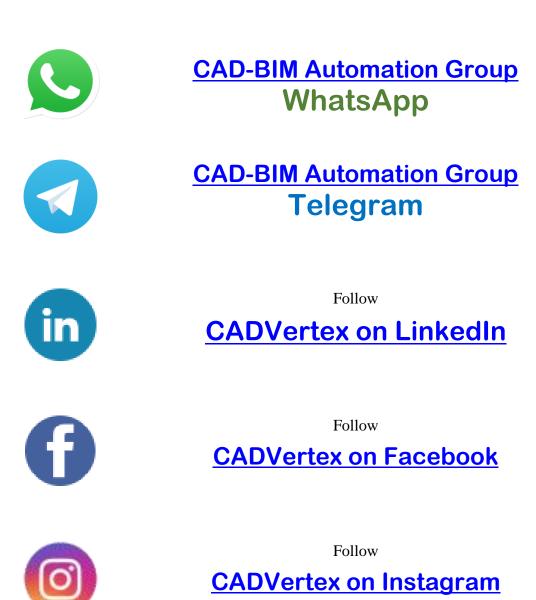
CADVertex Software A-16 . Whispering Wind . Pashan-Baner Link Road Pashan . Pune . 411021

www.CADVertex.com info@cadvertex.com

WhatsApp/Telegram/Call: +91 9890611694

Other eBooks and Training Programs from CADVertex:

- CATIA Automation: VB.Net or CSharp or Python
- SolidWorks Automation: VB.Net or CSharp or Python
- Solid Edge Automation: VB.Net or CSharp or Python
- Inventor Automation: VB.Net or CSharp or Python
- ✤ NX Open: VB.Net or CSharp with Win Forms
- NX Open: VB.Net or CSharp with Block UI Styler
- Knowledge Fusion
- Knowledge Fusion with Block UI Styler
- Revit API Plugin creation using CSharp and Python, Dynamo
- Tekla Open API programming
- cMayoCAD: Learn to build a new CAD program from scratch using a Geometric Modeling Kernel and CSharp
- Machine Learning for Engineers with Python
- CATIA Automation with Python and Machine Learning
- NX Automation and Machine Learning with Python
- Solid Edge Automation with Python + Machine Learning
- SolidWorks Automation with Python + Machine Learning
- Inventor Automation with Python + Machine Learning
- Search and the search
- Fast track course in Python with Machine Learning for CSharp experts



Phone & Chat

eMail

+ 91 9890611694

info@CADVertex.com

Website

www.CADVertex.com