



Course Title: Community Architect Training Program

Course Duration: 16 Classes, 2 Hours each, 32 Hours

Course Instructor: Ayesha Zulfiqar

Course Description: This program is designed for SSC and HSC students from the community who are interested in gaining fundamental knowledge in AutoCAD, sketching methods, and utilizing Google Maps. Beginning with traditional drafting skills, participants will subsequently shift to using AutoCAD for 2D drafting and conclude with practical exposure to integrating their designs with Google Maps for real-world applications.

Course Outline:

<ul style="list-style-type: none">➤ Class 1: Introduction to Manual Drafting and Sketching<ul style="list-style-type: none">○ Introduction to Plans, Elevations and Orthographic Projections○ Line weights○ Basic Sketching Exercises	<ul style="list-style-type: none">➤ Class 2: Looking Further into Sketching Concepts<ul style="list-style-type: none">○ Sections and Perspective Drawings○ Basic Architectural Symbols○ Sketching practice
<ul style="list-style-type: none">➤ Class 3: Introduction to AutoCAD<ul style="list-style-type: none">○ Brief introduction to AutoCAD and its Application○ Page Setup, User Interface, and Setting of Units,	<ul style="list-style-type: none">➤ Class 4: Drawing commands in AutoCAD<ul style="list-style-type: none">○ Drawing with Line, Polyline, Ray, Rectangle, and Polygon○ Use of Arc and Circle commands○ Offset, Extend, and Copy functions
<ul style="list-style-type: none">➤ Class 5: Object Modification Commands in AutoCAD<ul style="list-style-type: none">○ Erase, Delete and Undo functions○ Use of Trim and Fillet○ Rotate, Mirror, Move and Scale Commands	<ul style="list-style-type: none">➤ Class 6: Drawing Precision in AutoCAD<ul style="list-style-type: none">○ Object Snap○ Grid and Display○ Use of Ortho Command

<ul style="list-style-type: none"> ➤ Class 7: Drawing Management Tools Part 1: Layers <ul style="list-style-type: none"> ○ Basic Layer Understanding ○ Creating and Managing Layers ○ Assigning Colors, and Line Types 	<ul style="list-style-type: none"> ➤ Class 8: Drawing Management Tools; Part 2: Blocks <ul style="list-style-type: none"> ○ Basic Block Understanding ○ Inserting and Managing Block
<ul style="list-style-type: none"> ➤ Class 9: Working with Dimensions and Texts <ul style="list-style-type: none"> ○ Adding Basic Dimensions: Liners and Aligned ○ Adding and Altering Texts in Dimensions ○ Adding Texts in Drawings 	<ul style="list-style-type: none"> ➤ Class 10 : Layout and Printing <ul style="list-style-type: none"> ○ Creating Layouts ○ Creating PDFs ○ Printing CAD drawings
<ul style="list-style-type: none"> ➤ Class 11: Basic Planning Principles <ul style="list-style-type: none"> ○ Integrating Sun and Wind Directions ○ Understanding Building Standards ○ Exploring Textures and Details 	<ul style="list-style-type: none"> ➤ Class 12: Introduction to Google Maps <ul style="list-style-type: none"> ○ Google Maps and its application ○ Introduction to Geolocation and coordinate systems
<ul style="list-style-type: none"> ➤ Class 13: Integrating Google Maps into AutoCAD <ul style="list-style-type: none"> ○ Importing images from Google Maps into AutoCAD ○ Introduction to Raster images ○ Raster Exercise on AutoCAD 	<ul style="list-style-type: none"> ➤ Class 14: Georeferencing and Spatial Analysis <ul style="list-style-type: none"> ○ Georeferencing in AutoCAD (Align Command) ○ Basic Spatial Analysis using AUTOCAD
<ul style="list-style-type: none"> ➤ Class 15: Concluding Google Maps <ul style="list-style-type: none"> ○ Class Project: Create and Complete a 2D drawing on AutoCAD integrated with Google Maps 	<ul style="list-style-type: none"> ➤ Class 16: Review Class <ul style="list-style-type: none"> ○ Integrating Raster Images into one ○ Course Review ○ Question and Answers