

## ***„AutoCAD – Basic operations”***

### ***Course description:***

The training is addressed to people who start working with AutoCAD. The aim of the training is to familiarize participants with the mechanism and the way of creating and editing basic technical drawings in AutoCAD. No knowledge of computer-aided design is required from participants.

### ***Skills acquired during the training:***

- o gaining knowledge of vector design in AutoCAD
- o creating technical drawings in 2D
- o dimensioning objects
- o opening and editing existing drawings
- o preparing documentation for printing

### ***Training program:***

#### **1. Introduction to the use a computer program:**

- Overview of the environment and modes of operation in AutoCAD
- Configuration of the most important program options
- Ways of entering commands

#### **2. Description of basic drawing tools:**

- Lines
- Polylines

- Polygon
- Rectangle
- Arc
- Circumference

### **3. Description of basic work tools:**

- Creating lines
- Methods of selecting objects
- Presentation of handles in selected objects
- Deleting objects
- ZOOM operations

### **4. Use of basic editing commands:**

- Erasing
- Copying
- Moving
- Rotating
- Scaling
- Cutting
- Lengthening
- Dotted and dashed line
- Attaching

- Filleting
- Chamfering

#### **5. Basic techniques of introducing precise data in two-dimensional space program:**

- Drawing by polar coordinates
- Drawing by Cartesian coordinates
- Drawing by absolute coordinates

#### **6. Drawing facilities**

- Grid and snap
- ORTHO mode
- Polar mode
- Lock position mode – position tracking
- Object snap tracking using the temporary tracking point procedure

#### **7. Object properties. Editing objects using handles**

#### **8. Creating a drawing template:**

- Units and boundaries of the drawing
- Layers and editing their properties

#### **9. Blocks**

- The purpose of using blocks

- Types of blocks
- Creating blocks
- Editing blocks
- Adding blocks to tool palette

## **10. Edit command**

- Rectangular arrays
- Polar arrays
- Mirror

## **11. Using learned commands and methods for effective drawing**

## **12. Creating and editing text**

## **13. Dimensioning objects**

## **14. Printing a drawing**

- System description
- System configuration
- VIEWPOINT insertion and configuration
- PAPER and MODEL space
- PRINT SCALES settings

***Methodology:***

- PowerPoint mini lectures
- working on computers (each participant works on a separate computer)

***Organizational information:***

Number of training hours: 14

Time of training 9:15-16:15

Place of training: Łódź, Piotrkowska 125 – KM Studio - trainings