

Microsoft Office Access– basic of VBA programming

Description: The course is aimed at familiarising the participants with Visual Basic editor and basic constructions used in building VB code. Additionally, the training is to demonstrate the same elements of VB environment for all applications of the Office package.

Duration: 16 hours

Initial requirements: The participants of the training should be able to use Microsoft Office Access program

For whom: The training is dedicated for all those to wish to create databases in the Microsoft Office Access environment.

Module: Fundamental constructions of Basic language (VBA01)

- 1) **Structure of the Visual Basic editor**
- 2) **Basic language elements**
 - a. Variables, constants, data types
 - b. Assigning instructions
 - c. Use of embedded dialogue fields
 - d. Functions embedded in examples (calculations, text transformations)
- 3) **Steering the course of the program, taking decisions**
 - a. If instruction
 - b. Select Case instruction
- 4) **Repeating actions, loops**
 - a. Calculated
 - b. Logical
 - c. Early loop exit
 - d. Loop embedding
- 5) **Using tables**
 - a. Declaration, static and dynamic tables
 - b. Tables and loops
 - c. Errors in tables
 - d. Use cases
 - i) Value searching
 - ii) Sorting
- 6) **Disc operations**
 - a. Creating sequence file
 - b. Operations: save, read

Module: Errors in programs (VBA02)

- 1) Types of errors**
- 2) Interruption mode, code analysis**
- 3) Handling execution errors**
- 4) Table of error codes**

Module: Basic applications of Visual Basic in Microsoft Access (VBAAC01)

- 1) Building macros**
 - a. Use in forms and reports
 - b. Conversion to VB code form
 - c. „Dynamic” macros, code adaptation for own needs

Module: Events (VBAAC02)

- 1) Definition and specificity of event programming**
 - a. Programming events of form controls
 - b. Report events
 - c. Use cases

Module: User functions (VBAAC03)

- 1) Using own functions at the level of queries, forms and reports**
 - a. Examples of specific data processing
 - b. Functions to control non-standard data types