

#### **DESCRIPTION OF THE COURSE**

GENERAL INFORMATION				
Course Holder	Prof.dr.sc. Vladimir Šimović			
The name of the college	Fundamentals of Informatics			
Study program	Professional Undergraduate Study – Finance and Business Law			
Status of the College	Mandatory			
Year	1 <sup>st</sup> Year			
Point value and method of	ECTS coefficient of student workload	6		
teaching	Number of hours (P+V+S)	30+30+0		

### **DESCRIPTION OF THE COURSE**

### 1.1. Objectives of the course

The aim of this course is to develop the ability of students to master the basic knowledge of information and communication technology, which equips students with knowledge and basic skills in handling computers and basic software systems, in order to create the foundations on which they will develop specialized knowledge necessary for information management in business. Students will get to know the MS Windows operating system and the basic office software package MS Office, which will help them gradually master and create new materials on their own. Likewise, students are introduced to practical problems that can be solved with the use of the Windows operating system and the Office software package.

1.2. Requirements for enrolment in the course

#### No conditions

1.3. Expected learning outcomes for the course



#### Students should be able to:

- 1. Integrate the tools, functions, and formulas of spreadsheet programs for the purpose of formatting, calculating, and managing workbooks.
- 2. Format a document using the tools and capabilities of word processors.
- 3. Master spreadsheet and word processing programs for the purpose of quickly creating circular documents.
- 4. Master the tools and capabilities of a presentation maker for the purpose of creating and managing a presentation.
- 5. Identify the tools and capabilities of web browsers for the purpose of finding information and searching for content on the Internet.
- 6. Organize the data on the computer within disks and directories.

#### 1.4. Course content

#### Introduction to Excel Launch Excel Excel Window

- Desktop, columns, rows, and cells Sheets
- Formatting and editing data in cells (font, bold, italic, style, etc.) Writing a formula

## Entering data and formulas in an Excel worksheet

- Entering Data in Cells Editing Cells
- Automatically enter data into a range of cells Enter simple calculation operations Compose formulas
- Copy formulas to other cells Using built-in functions

# Using charts in Excel

- Create a chart
- Format titles, axes, and legends Change chart type

#### Introduction to Word

- Start Word
- Word window



- Entering and editing text
- Create a new document
- Edit text
- Align text
- Text formatting
- Font type and size
- Spacing between characters and paragraphs
- Working with text pragraphs and using rulers
- Use styles
- Paragraph numbering

# Page formatting in Word

- Margins and page orientation
- Page header and footer
- Pagination
- Division into sections

# Tables and figures in Word

- Creating a table
- Working with cells
- Add an image
- Image positioning

## **Excel and Word**



- Copy a chart to Word
- Mail merge circular letter (letters and stickers)

## Introduction to PowerPoint

- Launch PowerPoint and PowerPoint window
- Add and move slides
- Choosing a topic

## Work on a PowerPoint presentation

- Text
- Changing the Layout
- Import images
- Create your own theme

### Animations and transitions in PowerPoint

- Animate objects
- Add a transition
- Automatic transition to a new slide

#### Internet

- Basic concepts on the Internet
- How the Internet Works
- Internet Browser
- Email



<ul> <li>Basics of working on a computer and Windows operating system</li> <li>Hardware &amp; Software</li> <li>Computer components</li> <li>Operating system</li> <li>Organization of data on the computer - files and directories</li> <li>Manage data on your computer</li> <li>Computer Protection - Anitivirus and Data Backup</li> </ul>		
1.5. Types of teaching (put X)	☐ lectures ☐ seminars and workshops ☐ exercises ☐ Distance education ☐ Field Teaching	☐ Independent tasks ☐ Multimedia & Network ☐ laboratory ☐ Mentoring work ☐ Other
1.6. Student obligations		
The obligations of students are prescribed in detail by the Statute, Study Regulations, and Stud	dent Obligations Guidelines	s. The key obligations of students
are:		
ATTENDANCE AT CLASSES: students are obliged to attend classes, actively follow lectures and		
order to acquire the right to take the exam, it is necessary to attend classes in the percentage		egulations. For each student, their
presence in class is recorded through the Infoeduka digital office system. The minimum obliga		
Full-time students must attend at least 70% of the total number of classes to be eligib	_	
Part-time students need to attend at least 50% of the total number of classes to be eli	-	
PASSING EXAMS: in order to achieve a positive grade in the subject, it is necessary to achieve	at Ieast 54 points in the sul	bject, but also at least 50% of



points for each learning outcome. The method of taking the exam is described in more detail in the item Assessment and evaluation of students' work during classes and at the final exam.

\*FINAL EXAM – a student who has not met the conditions for passing the exam during the continuous examination of knowledge (has achieved a total of at least 54 points in the course and has met the lower point threshold of adoption of each learning outcome, i.e. a minimum of 50% of the points of each learning outcome), may take the learning outcomes of the course at the final exam.

\*CONTINUOUS EXAMINATION: In order to make students progress more efficiently in class, continuous examinations are carried out (2 intermediate exams). In this way, students acquire smaller teaching units and master the subject material more easily.

\*EXAMS and INTERMEDIATE EXAMS in the course are conducted by solving practical tasks on a computer. In this way, the student presents the acquired knowledge and skills according to the learning outcomes.

## 1.7. Student Work Tracking (Add X to the appropriate tracking format)

Attending classes	х	Teaching activity	Seminar paper	Experimental work	
Written exam	х	Oral exam	Essay	Research	
Project		Continuous Assessment*	Report	Practical work	
Portfolio					

## 1.8. Assessment and evaluation of students' work during classes and at the final exam

Evaluation and evaluation of students' work during classes and at the final exam is carried out on the basis of the Regulations on Studying of the EFFECTUS University of Applied Sciences.

Allocation of points according to the forms of student work monitoring:



	Attending classes	Written exam	Project	Seminar paper	Practical work	Altogether
/1		16				16
12		16				16
13		16				16
14		16				16
15		16				16
16		16				16
OUT OF OUTCOME	4					4
ALTOGETHE R	4	96				100



FORMS OF TRACKING	NAME OF LEARNING OUTCOMES	TEACHING METHOD	KNOWLEDGE ASSESSMENT METHOD	Maximum number of points
	OUTCOME 1	lecture		
Written exam	Use the tools, functions, and formulas of spreadsheet programs for the purpose of formatting, calculating, and managing workbooks.	Computer exercises – creating an Excel document, typing data into worksheets, writing your own formulas, using ready-made formulas and generating data graphs	Practical task – to show the use of spreadsheet programs; arrange data in worksheets; apply rules for creating your own functions over data; Display tabular data in the form of graphs	48
White Caum		lecture  Computer exercises –	Practical task — to show the use of	40
	OUTCOME 2 Format a document using the tools and capabilities of word processors.	creating a Word document, entering, editing and formatting text, formatting pages and using tables and images in a Word document	Practical task — to show the use of word processors; arrange data on the pages of the document; Use text and page formatting options. display data in tables in the document; Arrange images in a document	



	OUTCOME 3	lecture		
	Use the connection capabilities of spreadsheet and word processing programs to quickly create circular documents.  Computer exercises – combining data from Excel into a Word document. Creation of circular documents (contracts, letters, labels, etc.)		Practical task — to connect data from the program and the creation of spreadsheets and word processing programs; Use spreadsheet data to create multiple documents based on a default template in a word processor	
	OUTCOME 4 Use the tools and	lecture	Practical task – to show the use of the	
Written exam	OUTCOME 5 Use the tools and capabilities of web		program for creating presentations; Use the program's tools to format the document; Choose the appropriate animations, transitions, and theme on your presentation	48
			Practical task – demonstrate the use of an internet browser to find information	
			and search for content on the Internet; use an e-mail program to send a solution	



computer, data on the	the computer	
Attending classes All outcomes Lectures an	and exercises Attendance records	4



Type of student workload	Student Load Hours	ECTS credits
Attending contact classes	60	2
Field Trips/Visits Outside the College		
Independent study/research	45	1,5
Out-of-classroom preparation and preparation of seminars/presentations		
Work on an out-of-classroom project assignment		
Independent preparation for exams and exam time	60.0	2.0
Consultation activities	15	0.5
Other		
TOTAL ECTS credits	180	6

### ASSESSMENT:

In order to achieve a positive grade in the course, the student must cumulatively meet two conditions: achieve a total of at least 54 (fifty-four) points in the course and meet the lower point threshold for the adoption of each individual learning outcome, which is 50% of the total points of the learning outcomes. A student may receive an additional four points if (i) attends classes more than 80% for full-time students and (ii) attends classes more than 55% for part-time students.



Grades are calculated based on the following distribution of points:

SCORE	RATING
0,00 – 53,90	Insufficient (1)
54,00 – 64,90	Sufficient (2)
65,00 – 79,90	Good (3)
80,00 – 89,90	Very good (4)
90.00 and more	Excellent (5)

Grading is carried out in a transparent manner by collecting points. The course is evaluated with 100.00 points (with the possibility of achieving an additional 8 points on the Challenge learning outcome).

CHALLENGE LEARNING OUTCOME - the student has the opportunity to earn an additional maximum of 8 points through the Challenge learning outcome; The student independently chooses one of the activities proposed in the first lesson, and has the opportunity to independently propose an activity with which he wants to increase the number of points and, with the consent of the course holder, achieves them according to the criteria of the course. Points for the Challenge learning outcome are not distributed according to the learning outcomes, but the number achieved makes an additional number of points to the total number of points achieved according to the learning outcomes.

Before taking the final written exam, each student must meet the prescribed conditions, which primarily means that they have attended the % of classes determined by the Study Regulations and that they have received an electronically encrypted permission to take the exam.

1.9. Required reading and number of copies in relation to the number of students currently attending classes in the course



	Title	Number of copies	Number of students
1.	Šimović, Vladimir, Maletić, Franjo, Afrić, Winton. Basics of Computer Science - Introduction /		
	Omer Rak (ed.). Zagreb: Golden marketing; Technical Book, Faculty of Teacher Education,		
	University of Zagreb, 2010	100	100
2.	Steve Sagman,: MS Office for Windows, MIŠ d.o.o., Zagreb, 2004.		

## 1.10. Supplementary literature

- 1. Milan Korak: Microsoft Word, Writing and Text Processing, ALGEBRA d.o.o., Zagreb, 2012.
- 2. Silvije Davila, Milan Korak: Microsoft Excel 2010, spreadsheet calculations, ALGEBRA d.o.o., Zagreb, 2012.
- 3. Hrvoje Mirković, Zlatan Soldo: Microsoft PowerPoint 2010, Presentations, ALGEBRA d.o.o., Zagreb 2012.
- 4. Hrvoje Mirković, Armando Slaviček: Windows 7, Computer Use and File Management, ALGEBRA d.o.o., Zagreb, 2010.

## 1.11. Ways of quality monitoring that ensure the acquisition of output knowledge, skills and competencies

- statistical processing and analysis of exam results (checking the Gaussian curve normal distribution of success, comparing and monitoring the results of exams of different generations, analysis of understanding of individual modules/questions on the exam, etc.),
- conducting a survey among students,
- evaluation and self-evaluation of teachers,
- achieved results, level of understanding and knowledge during the preparation of the seminar paper,
- achieved results and level of knowledge presented during the preparation and defense of the final thesis (students who choose a graduate thesis in this course),
- analysis of the report of the Head of the Quality Centre, and
- Feedback from students who have already graduated on the usefulness of the content of this course in the performance of the work they do.