

# **COURSE SYLLABUS**

COURSE TITLE:	Advanced Excel	COURSE CODE:	COMP395
PREREQUISITES:	COMP120	SEMESTER:	FALL 2020
INSTRUCTOR:	Tomas SILVA	CREDITS:	3
EMAIL:	proftomassilva@gmail.com	SCHEDULE:	Thursday 12h30-15h30

# **COURSE DESCRIPTION:**

Students will master intermediate and advanced Excel tools to enable them to predict, forecast, and run a business from an Excel Worksheet.

# **COURSE OBJECTIVES:**

It is hoped that the students will:

- Be able to easily determine how to adapt Microsoft Excel tools to their needs, and build their capacities to learn new functionalities on their own
- Be able to use appropriate strategies in Excel to solve real business problems
- Build attractive and functional data presentations
- Master advance tools in Excel to analyze and predict current and future business trends

## **EXPECTED LEARNING OUTCOMES:**

Upon completion of this course students should be able to:

- Create and manipulate Excel spreadsheets and graphs to represent data in an easily understandable form
- Create and edit charts with Excel
- Transform raw data into desired results with the aid of Excel built-in functions, formulas, and functionalities
- Design an Excel tool for a given task
- Use Macros to automate tasks
- Work with other Microsoft Office applications within Excel
- Perform business intelligence analysis
- Create business forecasts and visualizations



## MANDATORY TEXTBOOKS:

<u>Microsoft Excel 2016- Step by Step</u> by Curtis D. Frye, Microsoft Press – ISBN: 978-0-7356-9880-2. Download practice files at: <u>https://www.microsoftpressstore.com/store/microsoft-</u> excel-2016-step-by-step-9780735698802



# **EVALUATIONS:**

The final grade will be determined as follows:

20% Class Participation, Homework, Attendance and Engagement
30% Midterm Exam
30% Final Exam
20% Big Data Project

Presence in class is mandatory. More than 2 absences will lead to a failing grade.

# **GRADING CRITERIA:**

Grades will be based on the following evaluation criteria:

	ACHIEVEMENT	ACHIEVEMENT	ACHIEVEMENT	ACHIEVEMENT
CATEGORY	LEVEL 1 :	LEVEL 2 :	LEVEL 3 :	LEVEL 4 :
	BEGINNING	DEVELOPING	ACCOMPLISHED	EXEMPLARY
Ability to Use	Comfortable with	Basic operations	Masters basic	Able to routinely
Microsoft Excel	basic concepts and	are achieved	operations,	use even more
	operations.	routinely; can find	routinely	complex
		answers to more	discovering/using	functionalities
		complex problems.	more complex	and shows a
			functionalities.	desire to explore
				further.

## **CLASSROOM RULES:**

More than 10 minutes late is disrespectful, and students will get half an absence.

More than 2 full absences and students will likely fail the course.

No phones allowed – No web surfing.

Your attendance and in class participation will count 10% towards your final grade.

Any homework must be sent by email 48h before the next class or it will not be graded.

## **COURSE SCHEDULE:**

Dates	Reading/Homework	Session Content
Session 1 17 Sept		Introductions to each other and the syllabus.
	Excel Chapters 1,2	Basic overview of what will be achieved throughout the term.
		Revision and evaluation of Chapter 1 Excel 2016
Session 2	Event Chapters 2 E	Revision and evaluation of Chapter 3 and 5 Excel 2016
24 Sept	Excel Chapters 3,5	Learning new formulas such as the "UNIQUE" formula
1 Oct	No Classes	IGS Integration Day



Session 3 3 Oct Saturday	Excel Chapters 6,7	<b>Revision and evaluation of Chapter 6 and 7 Excel 2016</b> Learning new formulas such as the "XLOOKUP" formula
Session 4 8 Oct	Excel Chapter 8	<b>Excel Chapter 8: Analyze alternative data sets</b> Define an alternative data set, Goal seek and Solver add-ins
15 Oct	No Classes	HEP
Session 5 22 Oct	Excel Chapter 9, 10	Revision and evaluation of Chapter 9 Excel 2016 Excel chapter 10: PivotTables Create dynamic worksheets using PivotTables
Session 6 29 Oct	Midterm Exam	Review of Excel chapters covered so far 1h30m Midterm Exam 1h30m
Session 7 5 Nov	Excel Chapter 11	<b>Excel Chapter 11: Print worksheets and charts</b> Prepare worksheets for printing, print charts
Session 8 12 Nov	Excel Chapter 12	<b>Excel Chapter 12: Automate repetitive tasks by using macros</b> Create and modify Macros, Macros and form controls
Session 9 19 Nov	Excel Chapters 13-14	Excel Chapter 13: Work with other Microsoft office apps Create hyperlinks, include Office documents in workbooks Excel Chapter 14: Collaborate with colleagues Share workbooks, Add protection to workbooks
26 Nov	No Classes	Business Games
Session 10 3 Dec	Excel Chapter 15	<b>Excel Chapter 15: Perform business intelligence analysis</b> Enable the Data Analysis add-ins, using Power Pivot
Session 11 10 Dec	Excel Chapter 16	<b>Excel Chapter 16: Create forecasts and visualizations</b> Define and display key performance indicators, create 3D maps
Session 12 17 Dec	Final Exam	Review of Excel chapters covered so far 1h30m Midterm Exam 1h30m

The Schedule of Final Exams will be confirmed and published by 31 October 2020. The last day of the semester is 18 December 2020. DO NOT PLAN ANY TRAVEL BEFORE THIS DATE AS THERE ARE NO MAKE-UP EXAMS.