

Business Analytics

Academic Year: (2023 / 2024)

Review date: 28-04-2023

Department assigned to the subject: Business Administration Department

Coordinating teacher: MUÑOZ GARCIA, ALBERTO

Type: Electives ECTS Credits : 2.0

Year : 1 Semester : 2

REQUIREMENTS (SUBJECTS THAT ARE ASSUMED TO BE KNOWN)

Data Analysis and Visualization (18934)

OBJECTIVES

To solve business problems using data analysis, statistical models and other quantitative methods.

DESCRIPTION OF CONTENTS: PROGRAMME

1. Introduction and Predictive Analytics.
 - a. A process model for Data Mining ¿ CRISP-DM.
 - b. Predictive Modeling Tools.
2. Advanced Data Visualization and Data Wrangling.
3. Classification methods in Business Analytics.
4. Text Mining for Business Analytics.
5. Real Case Studies: market basket analysis, Response Modeling in Direct Marketing, Predicting Bank Loan Default, etc.

LEARNING ACTIVITIES AND METHODOLOGY

Theory (10 hours)
 Practices (5 hours)
 Office Hours (5 hours)
 Group Work and Individual Work

TEACHING METHODOLOGIES

In-class lectures by the teacher with the support of computer and audiovisual media, in which the main concepts of the subject are developed and the bibliography is provided to complement the students' learning.

- Resolution of practical cases, problems, etc., posed by the teacher individually or in groups.
- Preparation of individual work and reports.

% end-of-term-examination: 100

% of continuous assessment (assignments, laboratory, practicals...): 0

BASIC BIBLIOGRAPHY

- B.S. Baumer, D.T. Kaplan, N.J. Horton Modern Data Science with R, CRC Press, 2017
- Galit Shmueli, Peter Bruce et al. Data Mining for Business Analytics, Wiley, 2018
- Hadley Wickham R for Data Science (2e), O'Reilly, 2023
- Julia Silge Tidy Modeling with R: A Framework for Modeling in the Tidyverse, O'Reilly, 2022

ADDITIONAL BIBLIOGRAPHY

- Johannes Ledolter Data Mining and Business Analytics with R, Wiley, 2013

