SUBJECT TEACHING GUIDE

894 - Information System Management II and Information System Security

Master's Degree in Business and Information Technologies

Academic year 2023-2024

1. IDENTIFYING DATA

Degree	Master's Degree in Business and Information Technologies		Type and Year	Compulsory. Year 1
Faculty	Faculty of Economics and Business Studies			
Discipline	Obligatory Subjects			
Course unit title and code	894 - Information System Management II and Information System Security			
Number of ECTS credits allocated	2,5	Term	Semester based (2)	
Web	http://moodle.unican.es/moodle27/course/view.php?id=806			
Language of instruction	Spanish	English Friendly	No	Mode of delivery	Face-to-face

Department	DPTO. ADMINISTRACION DE EMPRESAS
Name of lecturer	ELIANA ROCIO ROCHA BLANCO
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Office	Edificio de las Facultades de Derecho y Ciencias Económicas y Empresariales. Planta: + 2. DESPACHO (E240)
Other lecturers	PABLO MARIA DE CASTRO GARCIA

3.1 LEARNING OUTCOMES

- Ability to model information systems from the perspective of data and processes.
- Know the principles and threats to the security of information systems and skills to design the strategy and effective policies of information security in organizations.
- Technical knowledge about information security in organizations and security models applicable to information systems.
- Know the applicable standards regarding information security in organizations.

4. OBJECTIVES

Acquire the knowledge and skills needed to model information systems, both from the perspective of data and processes.
Know the principles and threats to the security of information systems and acquire the skills to design strategies and policies of information security.
Know from a technical point of view the key design aspects of security organizations and security models applicable to information systems.
Know the applicable standards regarding information security in organizations.

6. COURSE ORGANIZATION

	CONTENTS
1	Unit 1. Design of information systems: 1.1 Data Modeling with Entity / Relationship Methodology (E/R). 1.2 Object-oriented modeling with UML.
2	Unit 2. Security of information systems: 2.1 Fundamentals of information security. 2.2 Strategy and policies of information security. 2.3 Models of information security in information systems. 2.4 Internet security.
3	Unit 3. Standards and studies in information security: 3.1 National and international safety standards. 3.2 Standard UNE ISO/IEC 27001:2005. 3.3 Case studies on information security.
4	Group work: data modeling with E/R methodology and design of information systems with UML.
5	Tutoring.
6	Exam.

7. ASSESSMENT METHODS AND CRITERIA

Description	Type	Final Eval.	Reassessn	%
Exam 60%	Others	Yes	Yes	60,00
Group work 40%	Work	No	Yes	40,00
TOTAL				100,00
Observations				
Participation in classroom activities and virtual classes will be valued.				
Observations for part-time students				
Part-time students will make an exam and a work that may be individual under the circumstances.				

8. BIBLIOGRAPHY AND TEACHING MATERIALS

BASIC

MATERIALES DOCENTES A DISPOSICIÓN DE LOS ESTUDIANTES EN EL AULA VIRTUAL DE LA ASIGNATURA.

GOMEZ, A. (2011): Enciclopedia de la Seguridad Informática. 2ª Ed. RA-MA.

DEBRAUWER, L. y HEYDE, F. (2010): UML 2: Modelización de Objetos. ENI.

PRESSMAN, R. S. (2010). Ingeniería del software. 7ª Ed. McGraw-Hill.

VILLALÓN, A., (2005): Seguridad de los Sistemas de Información. http://andercheran.upv.es/~toni/personal/seguridad.pdf

FOWLER, M. (2004): UML Distilled: A Brief Guide to the Standard Object Modeling Language. 3ª Ed.. Pearson Education.