



## Teaching Guide

Identifying Data					2024/25
Subject (*)	Information Systems for Business Financial Management		Code	650G01034	
Study programme	Grao en Ciencias Empresariais				
Descriptors					
Cycle	Period	Year	Type	Credits	
Graduate	2nd four-month period	Fourth	Optional	6	
Language	SpanishGalician				
Teaching method	Face-to-face				
Prerequisites					
Department	Empresa				
Coordinador	Fernández Rodríguez, María Teresa	E-mail	m.fernandezr@udc.es		
Lecturers	Fernández Rodríguez, María Teresa Martínez Fernández, Paulino	E-mail	m.fernandezr@udc.es paulino.martinez@udc.es		
Web	<a href="http://campusvirtual.udc.gal/">http://campusvirtual.udc.gal/</a>				
General description	Learn about the functions and components of the Business Information Systems from the point of view of a Graduate in Business Administration				

## Study programme competences / results

Code	Study programme competences / results
A3	CE3 - Comprender detalles do funcionamento empresarial, tamaño de empresas, rexións xeográficas, sectores empresariais, vinculación con coñecemento e teorías básicas.
A5	CE5 - Comprender a tecnoloxía nova e existente e o seu impacto para os novos/futuros mercados.
A7	CE7 - Comprender os principios da lei e vincularlos co coñecemento de negocios e xestión.
A9	CE9 - Comprender os principio éticos, identificar as implicacións para as organizacións empresariais, deseño de escenarios.
A10	CE10 - Comprender e utilizar sistemas contables e financeiros.
A14	CE14 - Xestionar as operacións da empresa.
A18	CE18 - Identificar as características dunha organización.
A20	CE20 - Identificar e operar o software adecuado. Diseñar e implementar sistemas de información.
A24	CE24 - Derivar dos datos información relevante imposible de recoñecer por non profesionais.
B1	CB1 - Que os estudantes demostrasen posuír e comprender coñecementos nunha área de estudo que parte da base da educación secundaria xeneral, e se adoita encontrar a un nivel que, se ben se apoia en libros de texto avanzados, inclúe tamén algúns aspectos que implican coñecementos procedentes da vangarda do seu campo de estudo.
B2	CB2 - Que os estudantes saiban aplicar os seus coñecementos ao seu traballo ou vocación dunha forma profesional e posúan as competencias que adoitan demostrarse por medio da elaboración e defensa de argumentos e a resolución de problemas dentro da súa área de estudo.
B3	CB3 - Que os estudantes teñan a capacidade de reunir e interpretar datos relevantes (normalmente dentro da súa área de estudo) para emitir xuízos que inclúan unha reflexión sobre temas relevantes de índole social, científica ou ética.
B4	CB4 - Que os estudantes poidan transmitir información, ideas, problemas e solucións a un público tanto especializado como non especializado.
B5	CB5 - Que os estudantes desenvolvesen aquelas habilidades de aprendizaxe necesarias para emprender estudos posteriores cun alto grao de autonomía.
B6	CG1 - Que os estudantes formados sexan profesionais versátiles, capacitados tanto de iniciar o seu propio negocio como de desempeñar labores de deseño, planificación, organización, xestión, asesoramento e avaliación nas áreas e departamentos contables, financeiros e fiscais de organizacións empresariais, con especial referencia ás pequenas e medianas empresas.
B7	CG2 - Que os estudantes posúan unha elevada capacitación metodolóxica de xestión e tratamento da información que lles proporcione vantaxes competitivas, non só no seu labor profesional, senón nunha sociedade global en permanente transformación. Para iso, o Grao debe estar dotado dun axeitado nivel de interdisciplinidade, transversalidade e integración nas súas materias.



B8	CG3 - Que os estudantes presten especial atención aos cambios que, tanto en conceptos, coma en metodoloxía ou en aplicacións, implican no mundo empresarial as novas tecnoloxías da información e as comunicacións. Así mesmo deben poder obter e actualizar os coñecementos específicos que teñan como base a aparición de novas leis e regulamentos que afecten ao mundo fiscal, financeiro ou contable.
B9	CG4 - Que os estudantes integren a aprendizaxe na súa vida e no seu labor profesional, a través da metodoloxía de ensino que lles achega o Grao, o cal lles proporciona unha formación básica xeral que servirá como puntal para a formación continua ao longo da vida.
B10	CG5 - Que os estudantes teñan unha perspectiva integral e destreza no manexo dos conceptos, técnicas e ferramentas empregados en cada unha das diferentes áreas funcionais, con especial referencia ás contables, financeiras e fiscais da empresa; así como entender as relacións que existen entre elas e cos obxectivos xerais da organización. Todo iso tendo en conta os principios de sustentabilidade e responsabilidade social das mesmas.
B11	CG6 - Que os estudantes saiban identificar e anticipar oportunidades, asignar recursos, organizar a información, realizar asesoramento fiscal e contable, control orzamentario, xestión de tesouraría, auditorías de contas e temas concursais (suspensións de pagamentos e quebras), tomar decisións en condicións de incerteza e avaliar resultados.
B12	CG7 - Que os estudantes sexan capaces de liderar proxectos nas áreas de valoración da empresa, de dirección estratéxica e financeira; deben poder entender a información contable das empresas co fin de obter conclusións e realizar predicións tanto sobre rendementos coma sobre riscos futuros.
B13	CG8 - Que os estudantes identifiquen os requisitos legais da información financeira aos que a empresa debe enfrontarse.
B14	CG9 - Que os estudantes manifesten respecto aos dereitos fundamentais e de igualdade entre homes e mulleres, o respecto e a promoción dos Dereitos Humanos e os principios de igualdade de oportunidades, non discriminación e accesibilidade universal das persoas con discapacidade.
C1	CT1 - Expresarse correctamente, tanto de forma oral coma escrita, nas linguas oficiais da comunidade autónoma.
C2	CT2 - Dominar a expresión e a comprensión de forma oral e escrita dun idioma estranxeiro.
C3	CT3 - Utilizar as ferramentas básicas das tecnoloxías da información e as comunicacións (TIC) necesarias para o exercicio da súa profesión e para a aprendizaxe ao longo da súa vida.
C4	CT4 - Desenvolverse para o exercicio dunha cidadanía aberta, culta, crítica, comprometida, democrática e solidaria, capaz de analizar a realidade, diagnosticar problemas, formular e implantar solucións baseadas no coñecemento e orientadas ao ben común.
C5	CT5 - Entender a importancia da cultura emprendedora e coñecer os medios ao alcance das persoas emprendedoras.
C6	CT6 - Valorar criticamente o coñecemento, a tecnoloxía e a información dispoñible para resolver os problemas cos que deben enfrontarse.
C7	CT7 - Asumir como profesional e cidadán a importancia da aprendizaxe ao longo da vida.
C8	CT8 - Valorar a importancia que ten a investigación, a innovación e o desenvolvemento tecnolóxico no avance socioeconómico e cultural da sociedade.

Learning outcomes			
Learning outcomes	Study programme competences / results		
Know the role played by the Information Systems in the business organizations. Know also about the components of a Business System Information.	A3 A9 A10	B1 B2 B3	C1 C4 C5
Know the lifecycle of a Business Information System and, more precisely, the role played by its users in the different steps of that lifecycle.	A18 A24	B4	C7
Practical issues related with the IT applied to the Business Management.	A5 A10 A14 A20	B3 B4 B6	C1 C3 C4 C7 C8



Know and learn the use of common BIE IT Tools, specifically studying those known as "office automation systems".	A5	B7	C1
	A9	B8	C3
	A10	B9	C6
	A20	B10	C7
			C8
Know, from a user point of view, the basic tools to design the data model and the procedures subsystem of a Business Information System.	A5	B4	C2
	A10	B5	C3
	A20	B11	C4
	A24	B12	
Show a general view of the Business Information Systems legal framework.	A7	B2	C1
	A18	B4	C4
		B6	C6
		B13	
		B14	

Contents	
Topic	Sub-topic
1. Introduction to the Business Information System.	1.1 The information as a resource in the business activity. 1.2. The Business Information System. Concept, activities and components. 1.3. The Business Information System and the Business Decision Making Levels. 1.4. The Business Information System and the Business Environment. 1.5. The Lifecycle of a Business Information System.
2. Analysis and design of an Information System	2.1. Introduction to the data model. 2.2. The Entity-Relationship model.
3. Business Information Systems and IT.	3.1. Basic tools. 3.2. OAS tools. 3.3. Other tools.
4. General view of other relevant issues in a Business Information System.	4.1. General view of the security. 4.2. General view of the legal framework.

Planning				
Methodologies / tests	Competencies / Results	Teaching hours (in-person & virtual)	Student?s personal work hours	Total hours
Guest lecture / keynote speech	A1 A3 A5 A7 A10 A16 A18 A20 A23 B5 B6 C3 C4 C5 C7 C8	17	51	68
Problem solving	A4 A9 A14 A24 B2 B3 B4 B7 B8 B9 B10 B11 B12 B13 B14 C3	23	50	73
Mixed objective/subjective test	A1 A4 B1 C1 C2 C6	1	2.5	3.5
Mixed objective/subjective test	A1 A4 B1 C1 C2 C6	1	2.5	3.5
Personalized attention		2	0	2

(\*The information in the planning table is for guidance only and does not take into account the heterogeneity of the students.

Methodologies	
Methodologies	Description



<p>Guest lecture / keynote speech</p>	<p>1. Classroom lectures about the theoretical and practical contents of the subject to guide the student in its preparation.</p> <p>2. The time spent in each one of the subject chapters will be proportional to the difficulty level and to the length of those chapters. Thus, some chapters will take more time than others. The teacher is responsible of deciding how many time spend in each one of the subject chapters.</p> <p>3. For preparing those chapters with thw lowest level of difficulty, the student should study the bibliography, although in the lectures the student will be orientated about:</p> <p>a) which are the bibliographic sources to study</p> <p>b) which are the most relevant and interesting issues to reach the learning goals set for the subject.</p> <p>4. Discussion, together with all the workgroups, of the homework of each one of the workgroups. The student can participate:</p> <p>a) by his or her own, after being given the floor; b) after being required by the teacher to participate.</p>
<p>Problem solving</p>	<p>1. Development, exposition and resolution of practical exercises to be made by the student, being part of a workgroup, throughtout the course.</p> <p>2. Exercises and readings to be made by the student by his or herself. In subsequent classes:</p> <p>a) a review of the exercises will be made. In this review, the student can participate as stated in the point 3.</p> <p>b) a question time about the readings will be opened.</p> <p>3. The student can participate: a) on his or her own, after being given the floor; b) after being required by the teacher to participate.</p>
<p>Mixed objective/subjective test</p>	<p>During the class period, one or more mixed tests will be held, which will not be of a non-compulsory nature.</p>
<p>Mixed objective/subjective test</p>	<p>Theoretical and practical examination of all the contents of the subject, which will be carried out in the first and second call.</p>

**Personalized attention**

Methodologies	Description
<p>Problem solving</p> <p>Guest lecture / keynote speech</p> <p>Mixed objective/subjective test</p> <p>Mixed objective/subjective test</p>	<p>1. In the guest lectures and keynote spechs the student can participate, after being given the floor, to ask, clarify or explain his or her point of view about the issues being dealed with in the moment of his participation.</p> <p>2. In the problem solving classes the student can participate as described in the Methodologies section.</p> <p>3. In the tutorials, the student can ask about the doubts arisen in the preparation of the subject. Although it is not compulsory, the student can ask about the doubts and the data and time -inside the tutorials schedule- in which he or she wants to be received, thus improving the tutorials effectiveness and management.</p> <p>4. If the questions dealed with in the tutorials are of a general interest, from the point of view of the teacher, they could be published in Moodle, together with their answers, to allow other students a better preparation of the subject. The name of the person who made the question will never be published.</p>

**Assessment**

Methodologies	Competencies / Results	Description	Qualification
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Problem solving	A4 A9 A14 A24 B2 B3 B4 B7 B8 B9 B10 B11 B12 B13 B14 C3	<p>1. Preparation of one or more case studies proposed by the lecturers of the subject, as part of the continuous assessment, in which aspects related to the content of the subject will be developed, with the discussion of their development with the lecturers being an essential part of the assessment. The resolution of these cases may require the use of information and communication technologies (ICT), and if deliverables are required, they will be in electronic format.</p> <p>2. The cases will be developed in groups of 4 to 6 students. Exceptionally, and with the prior approval of the teaching staff of the subject, a different number of students per group may be allowed.</p> <p>3. Any doubt about this evaluation section must be solved by basing the solution on the idea of "continuous evaluation".</p>	40
Mixed objective/subjective test	A1 A4 B1 C1 C2 C6	During the class period, one or more mixed tests of continuous assessment will be carried out, which will not have a releasing character. The test not taken will be marked as zero.	20
Mixed objective/subjective test	A1 A4 B1 C1 C2 C6	Theoretical-practical examination of all the contents of the course, to be held at the first and second call.	40

Assessment comments



A) EVALUATION REGULATIONS: All aspects related to "academic dispensation", "dedication to study", "permanence" and "academic fraud" will be governed in accordance with the current academic regulations of the UDC.

B) TYPES OF RATING:

Qualification of not presented: Corresponds to the student, when he only participates in evaluation activities that have a weighting of less than 20% on the final qualification, regardless of the qualification achieved.

Students with recognition of part-time dedication and academic waiver of attendance exemption: Except for the dates approved in the Faculty Board for the final objective test, for the remaining tests a specific calendar of dates compatible with their dedication. For this reason, the student must contact the teacher of the subject in the first ten days of the semester in which the subject is taught, in order to set the aforementioned calendar. The tests will have the same format as for full-time students.

C) ASSESSMENT OPPORTUNITIES:

1. First opportunity: The evaluation criteria previously indicated in this section will be applied.
2. Second opportunity: The evaluation criteria are the same as in the first opportunity.
3. Early opportunity: It will be evaluated through a mixed test that will account for 100% of the final grade.

D) OTHER EVALUATION OBSERVATIONS:

1. In general, without prejudice to what is indicated for students with recognition of part-time dedication and academic exemption from attendance exemption, class attendance is required to qualify for the part of the grade corresponding to continuous evaluation, both first chance and second chance. At the end of the evaluation period corresponding to the first opportunity, students who have yet to pass the subject may be proposed activities that allow them to recover the part of the grade corresponding to the continuous evaluation for the second opportunity, which they must request. to the teaching staff of the subject at least ten days before the date of the second chance exam.
2. The scoring criteria for each of the tests will be announced at the time of the test and will be supplied with the statement of the test



<b>Basic</b>	<ul style="list-style-type: none"><li>- Arjonilla Domínguez, S. J. y Medina Garrido, J. A (2009). La gestión de los sistemas de información en la empresa. Pirámide. Madrid</li><li>- Burrueco, Daniel (2016). Tablas dinámicas con Excel 2016. . Paracuellos del Jarama Madrid: Ra-Ma</li><li>- Casas Roma, Jordi; Conesa Caralt, Jordi (2013). Diseño conceptual de bases de datos en UML. . Barcelona: UOC</li><li>- Schmuller, J. (2000). Aprendiendo UML en 24 horas. Prentice Hall. México</li><li>- Ramón Cardona, José; Bueno Ávila, Salvador; Bañuls Silvera, Víctor Amadeo; Fuentes Blasco, María (2011). Sistemas de Información Empresarial. Casos y supuestos prácticos. Granada: GEU</li><li>- Kimmel, Paul (2007). Manual de UML. Guía de aprendizaje. McGraw Hill. México</li><li>- Gómez Vieites, Álvaro; Suárez Rey, Carlos (2004). Sistemas de información: herramientas prácticas para la gestión empresarial.. Madrid: RA-MA.</li><li>- Piattini, M. G.; Calvo-Manzano, J. A.; Cervera, J. y Fernández, L. (2007). Análisis y diseño detallado de Aplicaciones Informáticas de Gestión. Ra_ma. Madrid</li><li>- Moreno Bonilla, Fernando (2010). Excel 2010 : modelos económicos y financieros. Madrid : Anaya Multimedia</li><li>- Travería, Santiago (2011). Excel 2010 a fondo. Barcelona : Inforbook's</li><li>- Menchén Peñuela, Antonio (2011). Tablas dinámicas en Excel 2010. Madrid: RA-MA</li><li>- Teaching Soft Group (2011). Excel 2010 : curso práctico. Madrid: RA-MA</li><li>- Silberschatz, Abraham; Korth, Henry F.; Sudarshan, S. (2014). Fundamentos de Bases de Datos. Aravaca : McGraw-Hill</li><li>- Edwards, Chris; Nytheway, Andy; Ward, John (1998). Fundamentos de sistemas de información. Madrid: Prentice Hall</li><li>- Grau Fernández, L. y López Rodríguez, I. (2001). Problemas de Bases de Datos. Sanz y Torres. Mdrid</li><li>- Elmasri, Ramez; Navathe, Shamkant B. (2000). Sistemas de Bases de Datos. Conceptos fundamentales. Addison-Wesley. México</li><li>- Pablos Heredero, C. de et al (2006). Dirección y gestión de los sistemas de información en la empresa (una visión integradora). Madrid: ESIC</li><li>- Giner de la Fuente, Fernando; Gil Estallo, María de los Angeles (2004). Los sistemas de información en la sociedad del conocimiento. Madrid: ESIC</li><li>- O'Brien, J.A.; J.M. Marakas (2006). Sistemas de Información gerencial. Mexico: McGraw-Hill</li><li>- Marqués Asensio, Felicidad (2010). Modelos financieros a través de Excel. . San Fernando de Henares: RC Libros.</li><li>- Tormo, Marisa (2018). Excel práctico: descubre su magia trabajando con fórmulas y funciones. . San Fernando de Henares, Madrid: RC Libros</li><li>- Valdés-Miranda Cros, Claudia. (2016). Manual imprescindible de Excel 2016.. _Anaya multimedia</li></ul>
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<b>Complementary</b>	<ul style="list-style-type: none"> <li>- Debrauwer, L. y Karam, N. (2010). UML 2. Practique la modelización. ENI. Barcelona</li> <li>- Debrauwer, L. y Van der Heyde, F. (2009). UML 2. Iniciación, ejemplos y ejercicios corregidos. ENI. Barcelona</li> <li>- Piattini Velthuis, M.; Peso Navarro, E. del; y Peso Ruíz, M del (2008). Auditoría de Tecnologías y Sistemas de Información. RA-MA. Madrid</li> <li>- Areito, J. (2008). Seguridad de la Información. Redes, informática y sistemas de información. Paraninfo. Madrid</li> <li>- Piattini Velthuis, M. G.; García Rubio, F. O.; García Rodríguez de Guzmán, I. y Pino, F. (2011). Calidad de los Sistemas de Información. RA-MA. Madrid</li> <li>- Fernández Alarcón, V. (2010). Desarrollo de Sistemas de Información. Una metodología basada en el modelado. UPC. Barcelona</li> <li>- Alarcón, R. (2000). UML. Diseño orientado a objetos con UML. Eidos. Madrid</li> <li>- Rumbaugh, J.; Jacobson, I. y Booch, G. (). El Lenguaje Unificado de Modelado. Manual de referencia. Addison Wesley</li> <li>- Fowler, M. y Scott, K. (1997). UML gota a gota. Pearson. México</li> <li>- de Pablos Heredero, Carmen; López Hermoso Agius, José Joaquín; Martín-Romo Romero, Santiago &amp; Me (2021). Organización y transformación de los sistemas de información en la empresa. Madrid: ESIC</li> <li>- Gallegos Ruiz, Amalia; Martínez López, Francisco Javier (2017). Programación de bases de datos relacionales. Madrid : RA-MA Editorial</li> </ul>
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### Recommendations

#### Subjects that it is recommended to have taken before

Financial Accounting I/611G02013

#### Subjects that are recommended to be taken simultaneously

#### Subjects that continue the syllabus

Information Systems Design/611G02041

#### Other comments

1. The delivery of the documentary works carried out in this subject: It will be requested in virtual format and / or computer support. It will be done through Moodle, in digital format without the need to print it.

2. The importance of ethical principles related to sustainability values in personal and professional behavior must be taken into account.

3. Work will be done to identify and modify prejudices and sexist attitudes and the environment will be influenced to modify them and promote values of respect and equality. Actions to fix gender discrimination, when detected, will be proposed. As stated in the different applicable regulations for university teaching, the gender perspective must be incorporated in this matter. Work will be done to identify and modify prejudices and sexist attitudes and the environment will be influenced to modify them and promote values of respect and equality. Situations of discrimination based on gender must be detected and actions and measures to correct them will be proposed.

4. The full integration of students who, for physical, sensory, psychological or sociocultural reasons, experience difficulties to an adequate, equal and profitable access to university life will be facilitated.

(\*)The teaching guide is the document in which the URV publishes the information about all its courses. It is a public document and cannot be modified. Only in exceptional cases can it be revised by the competent agent or duly revised so that it is in line with current legislation.