

**COURSE DATA****DATA SUBJECT**

Code: 33864
Name: Information Technology II
Cycle: Undergraduate Studies
ECTS Credits: 6
Academic year: 2025-26

STUDY (S)

Degree	Center	Acad. year	Period
1007 - Degree in Information and Documentation	Facultat de Geografia i Història	1	Second quarter

SUBJECT-MATTER

Degree	Subject-matter	Character
1007 - Degree in Information and Documentation	Information technology	BASIC

COORDINATION

DURA MARTINEZ ESTHER

SUMMARY

This course follows the course in Information Technology already taken by students in the first semester. The main goal of this course is to focus on the foundations of computer systems from the perspective of file structure and supports, with special attention to electronic documents and digital editing, web publishing through markup languages, the logics of information retrieval, as well as the tools and advanced services on the Web. It is therefore intended that students will acquire knowledge and skills that can be used in personal and professional practice in their future as graduates in Information and Documentation.

PREVIOUS KNOWLEDGE**RELATIONSHIP TO OTHER SUBJECTS OF THE SAME DEGREE**

There are no specified enrollment restrictions with other subjects of the curriculum.

OTHER REQUIREMENTS

It is recommended to have attended Informatica I.



COMPETENCES / LEARNING OUTCOMES

1007 - Degree in Information and Documentation

Be able to adapt to changes in the environment.

Be able to apply critical reasoning to the analysis and assessment of alternatives.

Be able to learn independently.

Be able to undertake improvements and propose innovations.

Be able to work in a team and to integrate into multidisciplinary teams.

Capacity to write analytical reports and summaries with regard to management and organisation of information.

Demonstrate organisational and planning skills.

Have computer skills related to the field of study.

Have decision-making capacity.

Have oral and written communication skills in one's own language.

Have problem-solving skills.

Have skills for information management.

Show creativity.

DESCRIPTION OF CONTENTS

1. Electronic documents and digital publishing

-Digital Library.

-Generation of digital documents.

-File formats: documents and images.

2. Web publishing: markup languages

-Markup language introduction.

-Markup languages: HTML and XHTML.

-Style language: CSS.



3. Logic of Information retrieval

-Basics of search engines and Information Retrieval. Search strategies.

4. Advanced Web

-Services, applications of the web 1.0 and web 2.0: definitions and features.
-The Library 2.0.
-Semantic Web: definition and features.

5. Media and file structures

-Media types and access time.
-Files: definitios and concepts.
-Files organization.

WORKLOAD

PRESENCIAL ACTIVITIES

Activity	Hours
Theory	45,00
Laboratory	15,00
Total hours	60,00

NON PRESENCIAL ACTIVITIES

Activity	Hours
Attendance at other activities	0,00
Individual or group project	22,00
Independent study and work	14,00
Preparation of lessons	29,00
Preparation for assessment activities	25,00
Resolution of case studies	0,00
Total hours	90,00

TEACHING METHODOLOGY

PRESENTIAL CLASSES:

Classes will be based on active learning where an activity that requires the participation of students will be introduced every 20/25 minutes, so that: 1) they can immediately put into practice the contents they have just seen; 2) Regain the level of attention to the next exhibition block.



PREPARATION OF THEORETICAL CLASSES:

The students will have to prepare the content of the theoretical class, following the planning of the subject. For this they will make use of the bibliography suggested by the lecturer as well as of materials provided by this in an eventual way or other given orientations.

Students will be proposed activities that must be done at home individually or in groups and that will sometimes be necessary for the realization of the next theoretical session. These activities may be evaluated before the class begins or during the class as well as during tutorial hours.

Likewise, the previous preparation of these activities at home, will allow to apply certain techniques such as the puzzle or other more informal cooperative learning techniques.

PREPARATION OF PRACTICAL WORK:

In order to better assimilate the contents of the theoretical classes, practical sessions will take place. Attendance at practical sessions is mandatory and will be verified by the lecturer. Those students who, due to work reasons, can not attend should contact the lab assistant before the start of the activity. The results of these activities must be presented to the teacher in a staggered manner throughout the course and in the terms established by the teacher. Students will perform / prepare part of these activities at home. Attendance at practices is mandatory.

PERFORMANCE OF TEAMWORK:

Throughout the course a set of medium-sized problems will be considered that must be solved in teams of 3 to 6 people. In the process of evaluation of team work, both the joint note of the group and the individual note of each member will be scored.

TUTORIALS:

a) Scheduled tutorials:

There will be a few hours of scheduled tutoring where students will work in small groups on some of the concepts that present greater complexity and that have already been exposed in the theoretical class. They will be provided with a series of activities / problems that will be solved with the help of the teacher.

b) Non-scheduled tutorials:

Will establish a few hours of tutoring per week, which students can attend to clarify concepts or questions that have arisen during the completion of individual or group work

COMPLEMENTARY ACTIVITIES:



A seminar will be held that will deal in detail with some of the topics discussed throughout the course.

EVALUATION

The evaluation of the subject in first call will follow a continuous evaluation scheme in which the following aspects will be considered:

- **Written tests:** There will be a single final written test of a theoretical-practical nature. The minimum grade that the student must achieve to pass the subject both in the first and second calls will be 5 points out of 10. The grade obtained in this test will represent 50% of the final grade.
- **Preparation of theoretical classes:** The activities and problems that arise in the context of the theoretical classes will count 15% of the final grade. All the works are of obligatory realization for the evaluation of the subject in the first call. These works are not recoverable in second call.
- **Practical work:** The grade obtained in this section will represent 25% of the final grade. All practical assignments are compulsory. The minimum mark that the student must achieve in this section, both in the first and second calls, is 5 points out of 10 to be able to average with the rest of the sections. If they are suspended in the first call, they will be delivered and exhibited again in the second call according to the terms indicated by the professor of practices. The practices that are delivered in the second call will vary with respect to the first call.
- **Attendance at practices is mandatory.** In each practice session, the teacher will evaluate the work done by the student in it through an oral defense. This will be part of the evaluation of the practice in addition to the content of the practice that the teacher will also evaluate.
- **The practice will be delivered at the end of the last session of the same (example: if a practice is composed of two sessions, the practice will be delivered at the end of the last session, that is, session two)**
- **Teamwork:** In the evaluation process of teamwork, both the group's joint mark and the individual mark of each member will be graded. The grade obtained in this section will represent 10% of the final grade. All supervised team work is mandatory for the evaluation of the subject in the first call. These works are not recoverable in the second call.
- **The composition of the final grade will be applied, in summary, as:**

- EXAM 50%
- Preparation of theoretical lectures 15,00%
- Practical Work 25,00%
- Team Work 10,00%
- TOTAL 100 %

This evaluation is based on the premise that teaching at the Universitat de València is, by definition, in-class. In this sense, students should bear in mind that attendance, both theoretical and practical, is essential for proper monitoring of the contents of the subject. The student must also bear in mind the possibility of a part-time enrollment, except in the case of 1st graders, when it is not possible to attend all the subjects that make up a complete course (60 credits). However, the possibility will be established, in cases that are adequately justified and for those students who request it, the possibility of being evaluated without having to attend all or part of the classes. In these cases the student should proceed as follows:

- At the beginning of the course, the teacher / s responsible for the subject must be informed about the



incident for which it is impossible for them to attend the class, which must be adequately justified in a documentary way.

- The responsible teacher, in view of this information will decide the possibility of evaluation without total or partial assistance to the classes of the subject.

Students who are in this situation, must submit, to be evaluated, all work required by the teacher (not necessarily identical to those required during the course) as well as may be called to defend orally before the teacher, and they will perform a test of acquired knowledge. The weight of the works in the final grade will be 50% and that of the knowledge test the remaining 50%.

REFERENCES

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- XHTML y CSS Los nuevos estándares del código fuente. Luc Van Lancker, Segunda Edición, Eni Ediciones, 2009.
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