

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

Code: 36624
Name: Communication technologies II
Cycle: Undergraduate Studies
ECTS Credits: 6
Academic year: 2025-26

STUDY (S)

Degree	Center	Acad. year	Period
1334 - Degree in Journalism	Facultat de Filologia, Traducció i Comunicació	1	Second quarter

SUBJECT-MATTER

Degree	Subject-matter	Character
1334 - Degree in Journalism	Información periodística y su tecnología	COMPULSORY

COORDINATION

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SUMMARY

This subject, belonging to the compulsory module, offers a broad introduction to the study of technological tools applied to the creation, editing, and broadcasting of audiovisual content: audio editing and processing, and audiovisual editing.

It specifically takes into account Sustainable Development Goal 4: Quality Education. In particular, it works towards Target 7, which aims for students to acquire the theoretical and practical knowledge needed to promote sustainable development, human rights, gender equality, a culture of peace and non-violence, global citizenship, the appreciation of cultural diversity, and the contribution of culture to sustainable development.

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

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



OTHER REQUIREMENTS

There are no enrollment requirements established. The coordination between communication technologies and journalistic genres is conceived as closely linked both in teaching and in structure.

COMPETENCES / LEARNING OUTCOMES

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Students must be able to communicate in their own language through traditional forms of media (the press, photography, radio, television), through new combined forms (multimedia), through new digital forms (the internet), or through hypertextuality.

Students must be able to design both formal and aesthetic aspects in written, graphic, audiovisual and digital media, as well as the use of computer techniques for the representation of facts and data through infographic systems.

Students must be able to reasonably propose ideas from the basics of rhetoric, as well as to communicate through the techniques of persuasion.

Students must be able to use the communicative and informative technologies and techniques in different medias and combined/interactive systems (multimedia).

Students must have an understanding of the data and mathematical operations performed, with some of them commonly used in the media. Students must know how to use data and statistics in a correct and understandable way for global dissemination.

Students should be able to adapt to technological and socio-occupational changes.

Students should be able to experiment and innovate through the understanding and use of the applied methods and technologies.

Students should be able to express themselves fluently and effectively in their own languages, as well as in a third language (preferably English), taking advantage of the linguistic and literary resources that are most appropriate for the different forms of media.

Students should be able to obtain and select relevant information and sources in order to solve problems and elaborate on strategies.

Students should be able to recover, organize, analyse and process information and communication with the purpose of private or collective uses through various media and supports or in the creation of productions of any kind.

Students should be able to search for, select, read, interpret and analyse both written and audiovisual texts and documents (analytically, synthetically and critically).

Students should be able to work as a team, communicate their own ideas and integrate themselves into group projects aimed at achieving results.



DESCRIPTION OF CONTENTS

Audio Editing and Processing

The Radio Studio: General architecture and functional areas, production control, and radio transmission
Sound: Nature of sound. Human hearing system. Sound characteristics. Principles of acoustics
Introduction to Radio Language: Elements of radio language. Introduction to radio scripting
Microphones and Speakers: Types of microphones and their use. Technical characteristics of microphones. Speakers and stereophony
Mixing Console: Elements and use
Audio Recording and Editing: Analog and digital recording. Digital audio formats and conversion. Audio media: analog, electronic, and optical. Sound recording practice. Knowledge and operation of audio editing software. Non-linear audio editing and assembly

Digital Image Processing

Introduction to Audiovisual Language: Framing. Image size and shape: formats. Types of shots. Camera point of view (angles). Camera movements. On-screen and off-screen space
The Optical Image: Nature and perception of light and color. Lenses and types of objectives. Depth of field
Video Camera
Optical unit: viewfinder and focusing system. Aperture and f-numbers. Shutter
Electronic unit: camera tubes. CCD and CMOS. Video signal. Electronic color processing. Camera adjustments
Supports for cameras (tripod, steady, webcam, camcar, dolly, hot head, easyring...)
New recording technologies: HD, Red One
Video Recording: Analog and digital recording. Analog and digital video formats. Recording media (tapes, DVDs, optical discs, solid-state memory). Progressive and interlaced. PAL and NTSC

Audiovisual Editing

Linear and Non-Linear Editing: Concept, methods, and functions
Some basic considerations about editing
Non-Linear Editing: Creating an EDL. Image capture. How to approach an edit. Structure, statements, etc.
Gathering material
Postproduction: Digital effects and electronic graphics. Color correction. Postproduction software
Lighting
Basic parameters: quantity, quality, direction, and color
Color temperature
Introduction to lighting techniques

Graphic Design

Digital representations applied to text and image design
Introduction to digital graphics. Bitmap graphics. Graphic formats. Graphic creation and processing software
Graphic production. Preparing graphics for printing and display. Optimising graphics for the web
Fundamentals of graphic design. Form and graphic composition. Typography. Colour and graphic design
Creativity techniques. Developing techniques and creative resources

This content plan will be reflected in the following learning outcomes:



- Organize the theoretical and practical knowledge of the tools and techniques involved in the production of audiovisual messages in radio and television.
- Demonstrate the ability and skill to properly capture images using professional video cameras.
- Demonstrate the ability and skill to edit and process audio using commonly used software.
- Discover the ability and skill to edit and process audiovisual content using commonly used software.
- Develop the ability and skill to digitally process still images using commonly used software.
- Define knowledge of the technical environment in audiovisual settings: TV studio, TV control room, radio booth, radio technical control, and cable nomenclature.

WORKLOAD

PRESENCIAL ACTIVITIES

Activity	Hours
Theory	20,00
Computer classroom practice	40,00
Total hours	60,00

NON PRESENCIAL ACTIVITIES

Activity	Hours
Attendance at other activities	5,00
Individual or group project	30,00
Independent study and work	30,00
Preparation of lessons	0,00
Preparation for assessment activities	0,00
Resolution of case studies	25,00
Total hours	90,00

TEACHING METHODOLOGY

- MD1 - Theoretical classes (lectures or lectures with student presentations)
- MD2 - Practical classes
- MD4 - Individual and/or group tutoring
- MD5 - Seminars and workshops
- MD7 - Problem-solving classes and case studies
- MD8 - Individual study and independent work
- MD9 - Group study and independent work

- **Theoretical classes:** Theoretical explanations will take place on the TV set in the television part, and in the radio studio in the radio part, which will allow to illustrate and intertwine theory with practice.

- **Practical classes:** The objective of these classes is that the students materialize the concepts learned in the theoretical part and develop enough skills to carry out audiovisual and radio products in all the phases



of their production.

For the practical sessions, it is necessary to divide the course into groups to ensure the smooth running of the class. The distribution of the practical sessions will be established at the beginning of the course in the Virtual Classroom.

EVALUATION

The general grading system will follow the Evaluation and Grading Regulations of the University of Valencia for undergraduate and master's degrees, approved by the Governing Council on May 30, 2017 (ACGUV 108/2017).

Score distribution

- Evaluation of individual and/or group assignments counts for 60%
- Practical exercises and problem-solving tasks account for 30%,
- Student participation in classroom dynamics represents 10%.

For the audio section, which is worth 3.5 points, evaluation of individual and/or group assignments contributes 20%, practical exercises and problem-solving tasks 10%, and student participation in classroom dynamics 5%.

For the image section, worth 6.5 points, evaluation of individual and/or group assignments makes up 40%, practical exercises and problem-solving tasks 20%, and student participation in classroom dynamics 5%.

First call

In the first call the final assessment will be practical and based on the accumulation of the practical assignments completed throughout the course.

The assessment criteria include completion of practical assignments. Failure to complete two or more assignments will result in not passing the course. The following aspects will be evaluated: organization in the submission of assignments, and technical and creative evaluation of the completed work.

The following will be required: punctuality and appropriate classroom attitude, teamwork in completing assignments, and proper care of the technical equipment used.

To pass the course, students must pass both parts; radio and television; into which the subject is divided, along with their corresponding practical work. In order to combine the grades for radio and television, a minimum score of 4 out of 10 must be obtained in each part.

**Second call**

In the second call, a practical test covering all aspects of the course will be administered in the form of a comprehensive evaluation.

Academic honesty

Intellectual honesty is vital in academic communities and for the fair assessment of student work. All work submitted for this course must be of original authorship. Papers that make use of fraudulent collaboration or composition with the help of artificial intelligence (such as ChatGPT or others) will not be accepted unless its use is part of the course content and authorised by the teaching staff.

In the case of plagiarism in a student's assessment work, the work may be graded with a score of zero and lead to the suspension of the course, regardless of any disciplinary proceedings that may be initiated and, if applicable, the sanction imposed in accordance with current legislation.

The following actions will also be considered serious misconduct and may result in immediate suspension from the exam session: copying or allowing the copying of work between students, irregular access to or appropriation of exam or test content in advance, facilitating or attempting to facilitate the appropriation, alteration, or destruction of the content or results of an evaluable activity, and impersonation during exams. When any of these serious violations are detected, the instructor must report it to the Grade Coordination.

The submission of work and/or exams with spelling or typographical mistakes, and/or errors in syntax, coherence, or writing, will be penalised and may result in the suspension of the corresponding test.

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- Zumeta, G. (2021). *La radio: el acompañante silenciado*. Kailas.

Supplementary references

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- Llorens, V. (1995). *Fundamentos tecnológicos de vídeo y televisión*. Paidós.
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