

Academic Year/course: 2024/25

# 28637 - Monument Restoration

### **Syllabus Information**

Academic year: 2024/25

Subject: 28637 - Monument Restoration

Faculty / School: 175 - Escuela Universitaria Politécnica de La Almunia

Degree: 422 - Bachelor's Degree in Building Engineering

**ECTS:** 5.0 **Year:** 3

Semester: Second semester Subject type: Optional

Module:

#### 1. General information

The main goal is to stimulate students' interest in the conservation of architectural heritage through the theory and history of restoration, as well as intervention techniques. The student will be encouraged to correctly use the specific terminology and will be introduced to legislation, charters and international conventions, as well as theories and techniques of intervention in heritage to develop their ability to decide on conservation operations of historic buildings. They will learn to detect, analyze and decide intervention techniques on the pathologies of the historical construction.

### 2. Learning results

In order to pass this subject, the students shall demonstrate they has acquired the following results:

Learn to look at the buildings to be restored from the architect's point of view, and identify existing problems.

They will have the ability to give an opinion on the causes and manifestations of injuries in buildings, to propose solutions to avoid or correct pathologies, and to analyze the useful life cycle of building elements and systems.

They will have knowledge of the legislative framework, technical regulations and specific doctrine, of application in the built heritage and will acquire fluency and practice in their handling and interpretation.

They will have the aptitude to intervene in the rehabilitation of buildings, restoration and conservation of the historical built heritage .

Have the ability to apply the assessment procedures specific to monument restoration.

They will know the intervention techniques and procedures compatible with the different historical construction systems. Likewise, will have knowledge of the construction materials suitable for each construction typology and aptitude for its implementation in the process of intervention on pre-existences.

It will enhance and reinforce the technical language of the subject matter.

Develop a critical sense and the proposal of alternatives based on observation and reasoning for the resolution of construction problems associated with the restoration and conservation of buildings.

Acquire awareness of the responsibility of decision making.

It will increase sensitivity towards Cultural Heritage.

They will achieve a favorable disposition and search capacity to acquire new knowledge from different sources, including autonomously, and its continuous updating.

#### 3. Syllabus

Unit 1. INTRODUCTION

1A Vocabulary and basic concepts

1B Legislation

Unit 2. HISTORY OF RESTORATION: THE FOUNDATIONS OF CONTEMPORARY THEORY

Unit 3. RESTORATION IN SPAIN AT THE PRESENT TIME

Unit 4. THE ARCHITECTURAL RESTORATION PROJECT

4A Previous studies

- Historical research
- Architectural-constructive surveying: traditional techniques and new technologies
- Material degradation study
- Structural damage study

- Analysis of wall stratigraphy
- 4B Project criteria and decisions. Intervention techniques

#### 4. Academic activities

- Participative master classes. The theoretical contents of the subject are explained, structuring them in related units, according to the objectives pursued by the subject. Presentations shown in class will be made available at through Moodle.
- Practical work in class. Individuals and groups
- Semi-autonomous tutored practical work. Heritage intervention project.
- Practical field classes/ visits
- Tutoring. Face-to-face (at the department) or virtual (via Moodle or e-mail).
- Personal work without attendance
- Reinforcement activities: directed from Moodle.

### 5. Assessment system

- 1. On-site assessment system
- -Individual activities in class: Active participation in class will be assessed, as well as their oral expression when presenting in audience and their ability to express themselves in the written work and in the drawings to be developed in the activities. Minimum grade of 5. 10% of the final grade.
- -Practical work in class. Throughout the term, various tasks will be carried out, individually or in groups, in class, in which the concepts worked on in the Lectures and in the field visits will be analysed by means of practical questions. They should hand in your work on the dates set by the teacher. It is necessary to obtain a minimum grade of 4 in each practice to to compensate with the rest. Minimum average grade of 5. 50% of the final grade.
- Semi-autonomous tutored practical work: The group will develop a preliminary study and proposal for intervention on a historic building . Minimum grade of 5. 40% of the final grade.
- 2. Non-attendance assessment system:

Based on a single final written test, which will include theoretical or practical questions similar to those posed in the face-to-face assessment. Minimum grade of 5.

## 6. Sustainable Development Goals

- 5 Gender Equality
- 11 Sustainable Cities and Communities
- 12 Responsible Production and Consumption