



# Course guide

## 240EQ323 - 240EQ323 - Pharmaceutical Biotechnology

Last modified: 27/05/2024

**Unit in charge:** Barcelona East School of Engineering  
**Teaching unit:** 713 - EQ - Department of Chemical Engineering.

**Degree:** **Academic year:** 2024 **ECTS Credits:** 4.5  
**Languages:** Spanish

### LECTURER

**Coordinating lecturer:** Juan Jesus Perez Gonzalez

**Others:** Primer quadrimestre:  
JUAN JESUS PEREZ GONZALEZ - T10

### DEGREE COMPETENCES TO WHICH THE SUBJECT CONTRIBUTES

#### Generical:

1. Possess independent learning skills to maintain and enhance the competencies of chemical engineering to enable the continued development of their profession.

#### Transversal:

2. SUSTAINABILITY AND SOCIAL COMMITMENT: Being aware of and understanding the complexity of the economic and social phenomena typical of a welfare society, and being able to relate social welfare to globalisation and sustainability and to use technique, technology, economics and sustainability in a balanced and compatible manner.

3. EFFECTIVE USE OF INFORMATION RESOURCES: Managing the acquisition, structuring, analysis and display of data and information in the chosen area of specialisation and critically assessing the results obtained.

### TEACHING METHODOLOGY

### LEARNING OBJECTIVES OF THE SUBJECT

### STUDY LOAD

Type	Hours	Percentage
Hours small group	40,5	36.00
Self study	72,0	64.00

**Total learning time:** 112.5 h

### CONTENTS

#### (ENG) 1. LA CIÈNCIA TERAPÈUTICA I LA INDÚSTRIA FARMACÈUTICA

**Full-or-part-time:** 10h

Theory classes: 4h

Self study : 6h



### (ENG) 2. FARMACOCINETICA I FARMACODINAMICA

**Full-or-part-time:** 15h  
Theory classes: 6h  
Self study : 9h

### (ENG) 3. FARMACS I BIOFARMACS

**Full-or-part-time:** 50h  
Theory classes: 20h  
Self study : 30h

### (ENG) 4. DISSENY DE FARMACS

**Full-or-part-time:** 10h  
Theory classes: 4h  
Self study : 6h

### (ENG) 5. BIOPROCÉS FARMACÈUTIC

**Full-or-part-time:** 27h  
Theory classes: 11h  
Self study : 16h

## ACTIVITIES

### (ENG) 1. PRODUCCIÓ D'UN BIOFÀRMAC

**Full-or-part-time:** 20h  
Self study: 20h

## GRADING SYSTEM

## BIBLIOGRAPHY

### Basic:

- Brunton, Laurence L; Chabner, Bruce; Knollmann, Bjorn C; Goodman, Louis S; Gilman, Alfred Goodman. Goodman & Gilman's the pharmacological basis of therapeutics. 12th ed. New York: McGraw-Hill Medical, 2011. ISBN 9780071624428.
- Walsh, Gary. Pharmaceutical biotechnology : concepts and applications. Chichester [etc.]: John Wiley & Sons, cop. 2007. ISBN 9780470012451.
- Shuler, Michael L; Kargi, Fikret. Bioprocess engineering : basic concepts. 2nd ed. Harlow, Essex: Pearson, cop. 2014. ISBN 9781292025995.