Course guide
340373 - LOAL-I2O43 - Logic and Algebra

Unit in charge: Vilanova i la Geltrú School of Engineering
Teaching unit: 749 - MAT - Department of Mathematics.

Degree: BACHELOR'S DEGREE IN INFORMATICS ENGINEERING (Syllabus 2018). (Compulsory subject).

Academic year: 2023   ECTS Credits: 7.5   Languages: Catalan, Spanish

LECTURER

Coordinating lecturer: Julio Fernández González
Others: Immaculada Massana Hugas
        Carles Batlle Arnau
        Ester Simó Mezquita

DEGREE COMPETENCES TO WHICH THE SUBJECT CONTRIBUTES

Specific:
1. CEFB3. Ability to understand and to have a good command of discrete, logical, algorithmically mathematics and computing complexity and its application to automatical treatment of information by means of computational systems and its application to solve engineering problems.

Transversal:
4. EFFECTIVE USE OF INFORMATION RESOURCES - Level 1. Identifying information needs. Using collections, premises and services that are available for designing and executing simple searches that are suited to the topic.
3. SELF-DIRECTED LEARNING. Detecting gaps in one’s knowledge and overcoming them through critical self-appraisal. Choosing the best path for broadening one's knowledge.
2. SELF-DIRECTED LEARNING - Level 1. Completing set tasks within established deadlines. Working with recommended information sources according to the guidelines set by lecturers.

TEACHING METHODOLOGY

LEARNING OBJECTIVES OF THE SUBJECT

STUDY LOAD

<table>
<thead>
<tr>
<th>Type</th>
<th>Hours</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hours large group</td>
<td>60,0</td>
<td>32.00</td>
</tr>
<tr>
<td>Hours small group</td>
<td>15,0</td>
<td>8.00</td>
</tr>
<tr>
<td>Self study</td>
<td>112,5</td>
<td>60.00</td>
</tr>
</tbody>
</table>

Total learning time: 187.5 h
CONTENTS

Description:

Full-or-part-time: 79h 30m
Theory classes: 18h
Laboratory classes: 12h
Self study : 49h 30m

Description:

Full-or-part-time: 27h
Theory classes: 10h
Self study : 17h

Description:

Full-or-part-time: 47h
Theory classes: 18h
Self study : 29h

Description:

Full-or-part-time: 27h
Theory classes: 10h
Self study : 17h

GRADING SYSTEM

BIBLIOGRAPHY

Basic:

Complementary:
- Lipschutz, Seymour; Lipson, Marc. Matemáticas discretas [on line]. (México [etc.]: McGraw-Hill, 2009 [Consultation: 04/04/2022].