30716 - Architectural Graphic Expression 5

Información del Plan Docente

Academic Year	2016/17
Academic center	110 - Escuela de Ingeniería y Arquitectura
Degree	470 - Bachelor's Degree in Architecture Studies
ECTS	6.0
Course	2
Period	Second semester
Subject Type	Basic Education
Module	---

1.Basic info

1.1.Recommendations to take this course

1.2.Activities and key dates for the course

2.Initiation

2.1.Learning outcomes that define the subject

2.2.Introduction

3.Context and competences

3.1.Goals

3.2.Context and meaning of the subject in the degree

3.3.Competences

3.4.Importance of learning outcomes

4.Evaluation

5.Activities and resources

5.1.General methodological presentation

The subject relates to 2D and 3D virtual reality. The student, through a guided practice, is aimed to apply graphic tools in the explanation of the representation of architectural elements. The students needs to understand them, and to be able, within limits, to establish its own system of presentation, using universal codes for exchange architectural information.

5.2.Learning activities

The course is structured in theoretical sessions of 1 h duration, and practice sessions of workshop of 3 h of duration along all the weeks of the semester.

Theoretical sessions will explain the necessary content to enable students to develop their course work. Students should form small teams. They should choose or provide a modern or contemporary, relevant building by its design, program, author, etc., from which to obtain documentation sufficient for its representation. The choice of the building will be discussed with the teacher in the first sessions workshop, to decide its adaptation to exercise.

And from there, both theoretical teaching and practical sessions are structured in three blocks. The student will complete three deliverables described in the section "evaluation".

5.3.Program

1. Introduction BIM-interoperabilidad.

2.-Floors/layers/units of work. Display/selection control. Drawing 2D. Edition.

3.-Feathers/frames/text/import of dimensions, script/export of drawings. Browsing 3d

4-Building elements: curtain wall/slab/roof/pillar/beam/mesh/zones/wall / structure compleja

5-Objetosparametricos: puerta/ventana/lucernario/escalera/objetos

6.-Management of the virtual building. Printing, plotting and publicacion

7. Artlantis. Interface. Materials/lights. Rendering/retouching.

5.4.Planning and scheduling

Photorealistic rendering and BIM knowledge are taught during 10 weeks.

5.5.Bibliography and recomended resources
- Ching, Frank. Manual de dibujo arquitectónico / Francis D. K. Ching ; traducción de Marta Rojals . - 4ª ed. rev. y amp. Barcelona : Gustavo Gili, D.L. 2013
- Ching, Frank. Arquitectura : forma, espacio y orden / Francis D. K. Ching ; [versión castellana de Santiago Castán] . - 3ª ed. rev. y act. Barcelona : Gustavo Gili, D.L. 2010
- Ching, Frank. Dibujo y proyecto / Francis D. K. Ching con Steven P. Juroszek ; [versión castellana, Santiago Castán y Carlos Jiménez Romera] . - 2ª ed. amp. Barcelona : Gustavo Gili, D.L. 2012
- Montes Serrano, Carlos. Representación y análisis formal : lecciones de análisis de formas / Carlos Montes Serrano Valladolid : Universidad de Valladolid, Secretariado de Publicaciones, D.L. 1992
- Cecchi, Roberta. ArchiCAD 10: Guia de Uso / Roberta Cecchi. Edicions Renat, 2007
- Simmons, Thomas M.. Graphisoft ArchiCAD Tutorial Paso a Paso / Thomas M. Simmons. - 1st edition Graphisoft R&D Rt, 2002
- Dunn, Nick. Proyecto y construcción digital en arquitectura / Nick Dunn ; [traducción, Cristóbal Barber Casasnovas] Barcelona : Blume, 2012