BASIC DETAILS:

Subject:	AULA ABIERTA: FORMACIÓN MULTIDISCIPLINAR EN ARQUITECTURA		
Id.:	30603		
Programme:	GRADUADO EN ARQUITECTURA. PLAN 2009 (BOE 21/03/2015)		
Module:	DISEÑO DE ARQUITECTURA		
Subject type:	OPTATIVA		
Year:	5	**Teaching period:**	Primer Cuatrimestre
Credits:	3	**Total hours:**	75
Classroom activities:	30	**Individual study:**	45
Main teaching language:	Castellano	**Secondary teaching language:**	Inglés
Lecturer:		**Email:**	

PRESENTATION:

This is a course designed to promote the exchange of professional experiences with other disciplines that improve the daily development of the professional activity, access to other profiles of complementary training or interest, know different professional action frameworks and develop collaborative links according to the promotion of the use of the professional skills of the architect, intervening in areas disconnected from the profession, fostering a professional enrichment of a universal nature oriented to the development of capacities for decision-making, conflict resolution and leadership and awakening in the students a spirit critical and non-conformist oriented towards the initiation in the world of research.

PROFESSIONAL COMPETENCES ACQUIRED IN THE SUBJECT:

General programme competences	G01	Effectively use language skills to express views and formulate arguments both orally and in writing Ability to express opinions and propose arguments effectively both orally and in writing in student's native language and English.
	G02	Ability to resolve problems and make decisions throughout their lifetime and choose professional and educational pathways independently.
	G03	Ability for autonomous learning and self-criticism.
	G04	Ability to transfer the knowledge acquired in practical work and skills to the field of work.
	G05	Demonstrate creativity, independence of thought, autonomy.
	G06	Demonstrate critical and analytical ability to conventional approaches of the discipline.
	G07	Demonstrate capacity for innovation, creativity and initiative.
	G08	Incorporate social and humanistic knowledge to an all-encompassing university education.
	G09	Capacity of developing values such as solidarity, multiculturalism, equality, social commitment, respect, diversity, integrity, universal accessibility, among other values that are unique to a culture of peace and democratic values.
	G10	Formulate proposals for social transformation from a critical and constructive point of view.
	G11	Ability to act, make decisions and take initiatives based on their own convictions and ethical behaviour.
	G12	Knowledge of culture and society as a pillar of human reality.
	G13	Knowledge of ethical commitment that leads to respect for the dignity of persons.
	G14	Knowledge of the methods and procedures of democratic societies in the defence of fundamental rights of the person.
Specific programme competences	E01	Ability to: Apply the graphic procedures to the representation of spaces and objects (T); Design and represent the visual attributes of objects and master proportion and drawing techniques, including computer-based techniques (T).
	E02	Knowledge adapted and applied to architecture and urbanism of: The spatial representation systems; Analysis and theory of form and laws of visual perception; The metric and projective geometry; Graphic survey techniques in all its phases, from drawing notes to scientific restitution. The principles of general mechanics, statics, the geometry of masses and vector and tensor fields; The principles of thermodynamics, acoustics and optics; The principles of fluid, hydraulics, electricity and electromagnetism mechanics; the basis of topography and mapping and terrain modification techniques.
	E03	Knowledge applied to: Numeracy, analytical and differential geometry and algebraic methods.

	E04	Ability to conceive, calculate, design, integrate into buildings and urban units and execute: Building structures (T); Interior division systems, carpentry, stairways and other finished work (T); Locking systems, roof and other structural work (T); Foundation Solutions (T); Supply facilities, water treatment and disposal, heating and air conditioning (T).
	E05	Ability to: Apply technical and construction standards; Maintain building structures, foundation and civil works; Conserve the finished work; Evaluate the project.
	E06	Capacity to Preserve the structural work; Plan building and urban transformation facilities and power supply, audiovisual communication, acoustic conditioning and artificial lighting; Conserve facilities.
	E07	Adequate knowledge of: Solid mechanics of continuous media and soil, as well as plastic, elastic and strength of materials of heavy works; Conventional building systems and their pathology; The physical and chemical characteristics, production procedures, pathology and use of building materials; Industrialised building systems.
	E08	Knowledge of: Ethics, collegiate organisations, professional structure and civil liability; Administrative and professional management procedures; The organisation of professional offices; Measurement, expert and assessment methods; Health and safety at work; The management and real estate management.
	E09	Suitability for design, practice and development of: Basic execution projects, sketches and drafts (T); Urban Projects (T); Construction management (T).
	E10	Ability to: Develop functional programmes of buildings and urban spaces; Intervene in and conserve, restore and rehabilitate the built heritage (T); Remove architectural barriers (T); Undertake architectural criticism; Solve the passive environmental conditioning, including thermal and acoustic insulation, climate control, energy efficiency and natural lighting (T); Catalogue built and urban heritage and plan its protection.
	E11	Capacity to Perform safety projects, evacuation and protection properties (T); Compose civil engineering projects (T); Design and execute urban layouts and development projects, gardening and landscape (T); Apply standards and building regulations; Develop environmental, landscape and correction of environmental impacts studies(T).
	E12	Adequate knowledge of: General theories of form, composition and architectural types; The general history of architecture; The methods of studying the processes of symbolisation, practical functions and ergonomics; The methods to study social needs, quality of life, habitability and basic housing programmes; Ecology, sustainability and the principles of conservation of energy and environmental resources; Architectural, urban and landscape traditions of Western culture, as well as their technical, climatic, economic, social and ideological foundations; Aesthetics and theory and history of fine arts and applied arts; The relationship between cultural patterns and social responsibilities of the architect; The bases of vernacular architecture; Sociology, theory, economics and urban history; The methodological foundations of urban planning and territorial and metropolitan management; Drafting mechanisms and management of urban plans at any scale.
	E13	Knowledge of: Civil, administrative, urban laws of the building industry and the professional performance; Feasibility analysis and supervision and coordination of integrated projects; The real estate appraisal.
	E14	Once all the credits of the curriculum are obtained, the presentation and defence of an original project individually, before a university tribunal which will include at least one member suggested by the professional organisations. The assignment will consist of a comprehensive architectural project of a professional nature in which all the skills acquired in the degree are put into practice to the point of demonstrating proficiency to determine the complete execution of the construction project, in compliance with the applicable technical and administrative regulations.
Regulated profession competences	P01	Ability to create architectural designs that satisfy both aesthetic and technical requirements.
	P02	Adequate knowledge of the history and theories of architecture as well as the arts, technology and human sciences.
	P03	Knowledge of the fine arts as an influence on the quality of architectural design.
	P04	Adequate knowledge of urban design, planning and the skills involved in the planning process.
	P05	Ability to understand the relationships between people and buildings and between them and their environment, and the need to relate buildings and the spaces between them depending on the needs and the human scale.
	P06	Ability to understand the architectural profession and its role in society, in particular by developing projects that take social factors into account.
	P07	Knowledge of methods of investigation and preparation of construction projects.
	P08	Understand the problems of the structural design, construction and engineering associated with building projects.
	P09	Adequate knowledge of physical problems and the different technologies and of the function of buildings so as to provide them with internal conditions of comfort and protection against the climate conditions.
	P10	Design capacity to meet the requirements of building users within the limits imposed by budget factors and building regulations.
	P11	Adequate knowledge of the industries, organisations, regulations and procedures involved in translating

		design concepts into buildings and integrating plans into planning.

PRE-REQUISITES:

NOTE: Students must attend to the course with the sole exception of repeating students who are also enrolled in other courses that take place simultaneously. Students in this situation must attend to the newly enrolled one yet they are compelled to keep their tasks updated and comply with any planned deadline. Additionally, they should inform the teacher about their situation, should they need to make any adjustments on their schedule.

SUBJECT PROGRAMME:

Subject contents:

1 - Canvas
2 - Analysis of people
3 - Analysis of the idea
4 - Market analysis
5 - Product analysis
6 - Client analysis
7 - Economic analysis

Subject planning could be modified due unforeseen circumstances (group performance, availability of resources, changes to academic calendar etc.) and should not, therefore, be considered to be definitive.

TEACHING AND LEARNING METHODOLOGIES AND ACTIVITIES:

Teaching and learning methodologies and activities applied:

This is an eminently practical subject in which the lectures and the theory of innovation will be combined throughout the semester, but the dynamics of most of the course will be a combination of studies / case studies and workshops with frequent individualized corrections and a final crit.

Another pillar of the subject will be the corrections between students oriented to the students to analyze and value the work among them. In order to encourage cooperative work and make an activity closer to reality, it will be encouraged that the work can be developed in groups depending on the total number of students.

Each type of sessions, work and activities are designed for the development of the competences that the student must acquire in the course. The most important recommendations made to students can be summarized in the following scheme:

_ Attendance to the theoretical sessions in a participatory and critical way.

_Complement the topics covered in these sessions with the information offered in the bibliography or commented in class.

_Use, at any time, tutorial sessions to resolve any doubt or problem.

_ Begin performing practical tasks without postponing them too early.

_Resolve the difficulties encountered with colleagues.

_Search, research, propose.

_Use the PDU for this collaboration and teacher participation is considered important.

Student work load:

Teaching mode	Teaching methods	Estimated

		hours
Classroom activities	Master classes	7
	Practical work, exercises, problem-solving etc.	8
	Coursework presentations	7
	Participation in seminars, conferences etc.	4
	Assessment activities	2
	Extra-curricular activities (visits, conferences, etc.)	2
	Asistencia a tutorías	0
Individual study	Individual coursework preparation	8
	Group cousework preparation	20
	Research work	12
	Recommended reading	5
	Total hours:	75

ASSESSMENT SCHEME:

Calculation of final mark:

Final Work:	25	%
Work Units:	50	%
Business Angels:	25	%
TOTAL	100	%

*Las observaciones específicas sobre el sistema de evaluación serán comunicadas por escrito a los alumnos al inicio de la materia.

BIBLIOGRAPHY AND DOCUMENTATION:

Basic bibliography:

STASIOWSKI, Frank.Técnicas de negociación para arquitectos, ingenieros e interioristas. Ed. Gustavo Gili, Colección “Proyecto y Gestión”. 1997
SEPÚLVEDA, P. ¿Qué debo saber de finanzas para crear mi empresa?. Ed. Marcombo, Boixareu Editores. 1992
QUINTANA, Jose Javier. Rethinking Architecture. BSA Rethinking Architecture S.L.
MORALES NIETO, Enrique. Innovar o morir: como obtener resultados excepcionales con poca inversio?n?: innovacio?n, internacionalizacio?n, redes comerciales. Madrid: Starbook. 2010.
OSTERWALDER, Alexander. Generación de modelos de negocio.Deusto sello editorial de Centro Libros PAPF, S.L.U. Grupo Planeta. Barcelona.
BARRICART, Ecequiel. Tú eres Dios. Y tu marca personal tu religión. Barcelona: Alienta Editorial, 2014

Recommended bibliography:

OLLÉ, Montserrat; LUDEVID, M.: Como crear su propia empresa. Criterios claves de gestión. Ed. Marcombo, Boixareu Editores. 1990.
AMAT, Oriol: Emprender con éxito. Ed. Gestión 2000
RUBIO, Ignacio: Emprender con éxito II. Ed. Gestión 2000. 1999.
FUNDACION COTEC para la Innovacio?n Tecnolo?gica. Comunicar la innovacio?n: de la empresa a los medios. Madrid: Cotec. 2004
MUÑIZ, Luis. Guía práctica para mejorar un plan de negocio: como diseñarlo, implantarlo y evaluarlo. Barcelona: Profit. 2010.

Recommended websites:

Inknowation	http://inknowation.com/blog/
Thinkwasabi (productividad para humanos)	http://thinkwasabi.com/

Magazine HipoTesis	http://www.hipo-tesis.eu/
RedFundamentos	http://www.redfundamentos.com/rita/es/normas/
Year of open source	http://yearofopensource.net/
Experiencias Arquitectónicas. Los otros arquitectos.	http://carloscamara.es/experiencias-arquitectonicas
Stepien y Barno	http://www.stepienybarno.es/blog/
Klaustoon (cómic)	http://klaustoon.wordpress.com/
Teamlabs	http://teamlabs.es/
Openarch	http://www.openarch.cc/es
Fablab	http://fablab.es/
Fablab BCN	http://fablabbcn.org/
Fablab León	http://www.fablableon.org/

* Guía Docente sujeta a modificaciones