

# Master's degree in Advanced Studies in Architecture-Barcelona (MBArch)

The aim of the **master's degree in Advanced Studies in Architecture-Barcelona** (**MBArch**) (**master's degree website**) is to train students in research, innovation and contemporary architectural design in a manner that is flexible and directed towards a specialisation. With an emphasis on expertise, erudition, tradition and professional practice, the Barcelona School of Architecture offers a comprehensive approach to a professional or teaching career in architecture.

#### **SPECIALISATIONS**

# **Contemporary Design** (taught entirely in English)

The aim of this specialisation is to expand upon, investigate and disseminate approaches to design in the city of Barcelona—a world-class example of architectural and urban design—with an emphasis on the role of the materiality and use of scale in architectural design.

# **Urban and Architectural Management and Valuation**

The aim of this specialisation is to promote research in urban and spatial planning and management that addresses spatial, urban and real estate problems from a transdisciplinary perspective that takes into account the technical, legal, economic and social aspects of urban management and valuation.

#### **Urbanism**

The aim of this specialisation is to produce highly qualified researchers in the field of urban design research, and to study and reflect upon key topics in the history of urbanism and contemporary urban design and approaches to analysis and intervention on regional and urban scales.

# **Process, Design and Programming**

The aim of this specialisation is to equip students with techniques for research into the theory and practice of design and the poetics, ethics and epistemology of architectural design, for them to become familiar with the work of representative architects and to restore the idea of function as the core of design.

#### Theory, History and Culture

The aim of this specialisation is to provide the specialised knowledge needed for professional practice in the fields of cultural and museum management, architectural and urban heritage management, mediation in participation processes and the provision of historical and heritage documentation for all kinds of public and private institutions.

## Architecture, Energy and Environment (taught entirely in Spanish)

This is a specialisation that allows students to acquire and develop research skills for the energy assessment of architecture and urban structures, environmental impact assessment of architectural and urban development projects and the application of natural and artificial environmental conditioning techniques.

# **Structures in Architecture** (taught entirely in Spanish)

To provide advanced training in the design and analysis of architectural structures, both for new buildings and rehabilitation. Through contemporary analysis methodologies and advanced calculation tools, the programme prepares students to tackle structural challenges with rigour and innovation. This track offers high-level training for professional practice and a solid foundation for doctoral research.

#### **Technological Innovation in Architecture**

The aim of this specialisation is to provide expertise in technological innovation and advanced knowledge and technical skills that can be applied to design and used in teams working on research and innovation.

#### **Architectural Restoration and Rehabilitation**

The aim of this specialisation is to provide students with the skills to carry out analysis, design and research in the fields of architectural restoration and rehabilitation.

# **Specialisations**

- Contemporary Project
- Urban and Architectural Management and Valuation
- Urbanism
- · Process, Design and Programming
- Theory, History and Culture
- Architecture, Energy and Environment
- Structures in Architecture
- Technological Innovation in Architecture
- Architectural Restoration and Rehabilitation

#### **GENERAL DETAILS**

#### **Duration and start date**

1 academic year, 60 ECTS credits. Starting September

## Timetable and delivery

Afternoons. Face-to-face

#### Fees and grants

Approximate fees for the master's degree, **excluding other costs** (does not include non-teaching academic fees and issuing of the degree certificate):

€1,660 (€6,331 for non-EU residents).

More information about fees and payment options

More information about grants and loans

# Language of instruction

Check the language of instruction for each subject in the course guide in the curriculum. The Contemporary Project specialisation is taught entirely in English. The Architecture, Energy and Environment specialisation is taught entirely in Spanish.

Information on language use in the classroom and students' language rights.

# Location

Barcelona School of Architecture

## Official degree

Recorded in the Ministry of Education's degree register

#### **ADMISSION**

#### **General requirements**

Academic requirements for admission to master's degrees

# **Places**

190

#### **Pre-enrolment**

Pre-enrolment period open. Expected deadline: 01/07/2025.

How to pre-enrol

## **Enrolment**

How to enrol

# Legalisation of foreign documents

All documents issued in non-EU countries must be legalised and bear the corresponding apostille.

#### **Professional opportunities**

Graduates of the master's degree are generally employed as managers or experts working on teams in the following areas:

- Any of the areas of specialisation of the master's degree in professional firms.
- University teaching in architectural design, criticism, technology and urbanism.
- Research. Doctoral studies.
- Creation, management and leadership of businesses involved in the construction process.
- Curating of architecture exhibitions and cultural management related to architecture.
- Management of urban design processes.
- Public administration, as specialists in strategic decision making on the various scales of architectural and urban design.

## Competencies

# **Generic competencies**

Generic competencies are the skills that graduates acquire regardless of the specific course or field of study. The generic competencies established by the UPC are capacity for innovation and entrepreneurship, sustainability and social commitment, knowledge of a foreign language (preferably English), teamwork and proper use of information resources.

# **Specific competencies**

- The ability to adopt a balanced approach to the environment and architectural technology, including views on current developments, knowledge and research in the various areas of specialisation, and the ability to show discernment and discuss a chosen topic.
- The ability to adopt a balanced approach to urbanism and architectural design, including views on current developments, knowledge and research in the various areas of specialisation, and the ability to show discernment and discuss a chosen topic.
- The ability to demonstrate a balanced overall perspective based on architectural theory and criticism, on the current state of knowledge and research and how they can be approached in the various specialisations, and the ability to show discernment and discuss a chosen topic.
- A capacity for spatial planning based on criteria of economic competitiveness, social cohesion and environmental sustainability.
- The ability to intervene in land management processes on urban and regional scales.
- The ability to carry out real estate appraisal on architectural and urban works and environmental practices.
- A capacity for urban, regional and environmental analysis, evaluation and management using new information and communication technologies such as geographic information systems.
- The ability to manage the city intelligently, equitably and sustainably (smart city governance).
- The ability to apply legal instruments related to urban management and public land policies.
- The ability to carry out high-end basic and applied research in relevant fields.
- The ability to reflect upon and discuss the main issues in the various fields of activity of urban design.
- The ability to analyse the urban and regional issues of planning.
- The ability to integrate the sociological, economic, technical and management dimensions of urbanism into a reflection on forms of physical intervention.
- The ability to communicate and interact with different agents, users, public representatives and decisionmakers.
- The ability to work in multidisciplinary and multicultural teams.
- The ability to reach a systematic understanding of urbanism and its research techniques and methods.
- The ability to conceive, design and carry out research on urbanism with academic rigour.
- The ability to contribute, through original research, to expanding the frontiers of scholarly knowledge through critical analysis, evaluation and synthesis.
- The ability to use the latest architectural representation techniques and demonstrate skill in their intentional use following the premises of contemporary architectural design.
- The ability to intervene in the decision-making process when a complex project is being carried out.
- The ability to conceive and carry out architectural projects using the advanced theoretical foundations of design.
- The ability to research the urban and regional environment and cultural context in order to use them as inputs in architectural design.
- The ability to understand the relation between architecture and other artistic disciplines and apply this

- understanding in architectural and urban design.
- The ability to apply interpretation and intervention strategies to territories and urban forms that are undergoing transformation.
- The ability to understand the theory and history of architecture within the tradition of theoretical and critical thought in our culture and the general context of the arts, technology and the construction of space.
- The ability to apply analytical methods and current historiographical trends related to theories of art, architecture and the city.
- The ability to develop critical reasoning skills about architecture and its historical and contemporary social and cultural context in order to communicate and summarise ideas and discussions related to artistic and architectural production, the production of space in general, and urban and cultural management.
- The ability to carry out research projects on the theory and history of architecture in the process of writing a doctoral thesis or contributing to the cultural management of a city and its museums.
- The ability to evaluate architecture and urban structures from an energy perspective.
- The ability to appraise architectural and urban projects in environmental terms.
- The ability to understand climate, lighting and acoustic phenomena in architectural spaces and their influence on human perception and comfort.
- The ability to analyse the formal influence of energy-related and environmental techniques in architecture and their aesthetic repercussions.
- The ability to understand state-of-the-art techniques and systems in the field of architectural structures.
- The ability to foster critical thinking in structural design, in the fields pertaining to new, highly complex designs and in heritage interventions.
- The ability to understand methodological resources for carrying out research and promoting technological innovation from a review of the state of the art.
- The ability to use resources to critically analyse the progress of architectural technology, including new materials, techniques, building systems and environmental conditioning systems.
- The ability to understand technological innovation, particularly in sustainable building, the industrialisation of construction, environmental conditioning systems of buildings and digital material design and production techniques.
- The ability to put new knowledge of advanced architectural technology into practice in research and professional practice.
- The ability to identify and critically analyse the historical and architectural value of buildings and urban spaces that can be restored, preserved or transformed.
- The ability to understand diagnosis and other techniques for designing and managing interventions for rehabilitating and restoring heritage buildings and buildings of public use.
- The ability to apply methodological resources in research in fields related to the theory of intervention practices in heritage buildings or sites and the building stock in general.
- The ability to work concurrently on several scales with the introduction of materiality from the beginning of the project and a creative interpretation of the functional brief.
- The ability to demonstrate broad knowledge of the current state of research; the ability to diagnose the problem to be studied and to draft development proposals and hypotheses for the research questions; and the ability to propose the subsequent original lines of research, innovation and specialisation.
- The ability to write, present and defend an original individual piece of work to an examination committee once all of the credits for the master's degree have been obtained.

#### **ORGANISATION: ACADEMIC CALENDAR AND REGULATIONS**

## **UPC** school

Barcelona School of Architecture (ETSAB)

#### Academic coordinator

Ernest Redondo Domínguez

#### **Academic calendar**

General academic calendar for bachelor's, master's and doctoral degrees courses

#### **Academic regulations**

Academic regulations for master's degree courses at the UPC

CURRICULUM		
Subjects	ECTS credits	Туре
FIRST SEMESTER		
Architecture, City and Project	5	Compulsory
Architecture, Environment and Technology	5	Compulsory
Architecture, Theory and Criticism	5	Compulsory

Subjects		ECTS credits	Туре
Specialisation in Generic Master	Acoustics in Architecture	5	Optional
	Architectural Criticism: Production, Reproduction and Debate	5	Optional
	Architectural Rehabilitation and Restoration Intervention Techniques: Occupant Safety and Health Regulations	5	Optional
	Architectural Rehabilitation and Restoration Intervention Techniques: Safety Measures	5	Optional
	City, Territory and GIS	5	Optional
	Contemporary Architectural Topics	5	Optional
	Cultural Landscapes, Heritage and Territorial Design	5	Optional
	Design and Thought	5	Optional
	Design Scales	5	Optional
	Designing the City: Emerging Cities and Territories	5	Optional
	Domestic	5	Optional
	Environmental Impact of Architecture	5	Optional
	Evolution of Building Materials and Products	5	Optional
	Historic and Heritage Construction	5	Optional
	Historiography of Art and Architecture	5	Optional
	History of Art and Architecture	5	Optional
	Industrialised Building Systems and Technologies	5	Optional
	Innovation in Mixed and Laminated Steel Structures	5	Optional
	Key Aspects of Urban Projects	5	Optional
	Project, Waste and Recycling	5	Optional
	Rehabilitation, Pathologies and Structural Reinforcement	5	Optional
	Sonic Landscape and Advanced Architectural Acoustics	5	Optional
	Space and Light	5	Optional
	Strategies for Zero-Energy Buildings	5	Optional
	Territory as Architecture	5	Optional
	Theory of Arts and Architecture	5	Optional
	Urban and Regional Analysis and Planning	5	Optional
	Urban Design: Ideas and Praxis	5	Optional
	Urban Landscapes	5	Optional
	Urban Planners in Their Cities	5	Optional
	Urban Policies and City Management	5	Optional
	Architecture, City and Project	5	Compulsory
	Architecture, Environment and Technology	5	Compulsory
	Architecture, Theory and Criticism	5	Compulsory

Subjects		ECTS credits	Туре
Specialisation in Specialisation in	Architectural Rehabilitation and Restoration Intervention Techniques: Occupant Safety and Health Regulations	5	Compulsory
Architectural Restoration and Rehabilitation Mbarch	Architectural Rehabilitation and Restoration Intervention Techniques: Safety Measures	5	Compulsory
	Historic and Heritage Construction	5	Compulsory
	Rehabilitation, Pathologies and Structural Reinforcement	5	Optional
	Architecture, City and Project	5	Compulsory
	Architecture, Environment and Technology	5	Compulsory
	Architecture, Theory and Criticism	5	Compulsory
Specialisation in	Innovation in Mixed and Laminated Steel Structures	5	Optional
Specialisation in Architectural Structures	Rehabilitation, Pathologies and Structural Reinforcement	5	Optional
Mbarch	Architecture, City and Project	5	Compulsory
	Architecture, Environment and Technology	5	Compulsory
	Architecture, Theory and Criticism	5	Compulsory
Specialisation in	Acoustics in Architecture	5	Optional
Specialisation in Architecture, Energy and	Environmental Impact of Architecture	5	Optional
<b>Environment Mbarch</b>	Space and Light	5	Compulsory
	Architecture, City and Project	5	Compulsory
	Architecture, Environment and Technology	5	Compulsory
	Architecture, Theory and Criticism	5	Compulsory
Specialisation in	Contemporary Architectural Topics	5	Optional
Specialisation in Contemporary Design	Design and Thought	5	Optional
Mbarch	Design Scales	5	Compulsory
	Urban Design: Ideas and Praxis	5	Optional
	Architecture, City and Project	5	Compulsory
	Architecture, Environment and Technology	5	Compulsory
	Architecture, Theory and Criticism	5	Compulsory
Specialisation in	Domestic	5	Optional
Specialisation in Design, Process and Programming Mbarch	Project, Waste and Recycling	5	Optional
	Urban Landscapes	5	Optional
	Architecture, City and Project	5	Compulsory
	Architecture, Environment and Technology	5	Compulsory
	Architecture, Theory and Criticism	5	Compulsory

Subjects		ECTS credits	Туре
Specialisation in Specialisation in Technological Innovation in Architecture Mbarch	Evolution of Building Materials and Products	5	Optional
	Industrialised Building Systems and Technologies	5	Optional
	Innovation in Mixed and Laminated Steel Structures	5	Optional
	Sonic Landscape and Advanced Architectural Acoustics	5	Optional
	Strategies for Zero-Energy Buildings	5	Optional
	Architecture, City and Project	5	Compulsory
	Architecture, Environment and Technology	5	Compulsory
	Architecture, Theory and Criticism	5	Compulsory
Specialisation in	Architectural Criticism: Production, Reproduction and Debate	5	Optional
Specialisation in Theory, History and Culture	Historiography of Art and Architecture	5	Optional
•	History of Art and Architecture	5	Optional
	Theory of Arts and Architecture	5	Optional
	Architecture, City and Project	5	Compulsory
	Architecture, Environment and Technology	5	Compulsory
	Architecture, Theory and Criticism	5	Compulsory
Specialisation in	City, Territory and GIS	5	Compulsory
Specialisation in Urban and Architectural	Urban and Regional Analysis and Planning	5	Compulsory
Management and Valuation Mbarch	Urban Policies and City Management	5	Compulsory
Valuation Plantin	Architecture, City and Project	5	Compulsory
	Architecture, Environment and Technology	5	Compulsory
	Architecture, Theory and Criticism	5	Compulsory
Specialisation in	Cultural Landscapes, Heritage and Territorial Design	5	Optional
Specialisation in Urbanism Mbarch	Designing the City: Emerging Cities and Territories	5	Optional
	Key Aspects of Urban Projects	5	Optional
	Territory as Architecture	5	Optional
	Urban Planners in Their Cities	5	Optional
	Architecture, City and Project	5	Compulsory
	Architecture, Environment and Technology	5	Compulsory
	Architecture, Theory and Criticism	5	Compulsory

# **SECOND SEMESTER**

Subjects		ECTS credits	Туре
Specialisation in Generic Master	Advanced and Innovative Structural Materials	5	Optional
	Advanced Architectural and Landscape Lighting	5	Optional
	Advanced Technology for the Construction of the Interior Space in Architecture	5	Optional
	Architectural Rehabilitation and Restoration Projects	5	Optional
	Architecture and Creativity	5	Optional
	Architecture and Culture	5	Optional
	Architecture, Science, Technology	5	Optional
	Comparative Architecture	5	Optional
	Contemporary Residential Urban Project	5	Optional
	Design and Materiality	5	Optional
	Design Perspectives	5	Optional
	Design Theory	5	Optional
	Energy and Comfort	5	Optional
	Environmental Assessment	5	Optional
	From the Private to the Public Space	5	Optional
	History, Architecture and City	5	Optional
	Integrated Exterior Cladding	5	Optional
	New Representations: New Conceptions	5	Optional
	Public Space, Experiences, Projects and Policies	5	Optional
	Regional and Urban Transformations Due to Sun-And-Beach Tourism	า 5	Optional
	Rehabilitation of Large Residential Complexes and Industrial Areas	5	Optional
	The City as Local Versus Global Interface	5	Optional
	The Public Space in Urban Reform	5	Optional
	The Rules of Urban Form	5	Optional
	The Territory as Project, Regional Mosaic City	5	Optional
	Urban and Architectural Management and Valuation Research Seminar	5	Optional
	Urban and Real Estate Valuation	5	Optional
	Urban and Regional Economics	5	Optional
	Urban Sustainability and Environmental Assessment Methods	5	Optional
	Urbanism of the Other 98%	5	Optional
	Master's Thesis	15	Project
Specialisation in	Architectural Rehabilitation and Restoration Projects	5	Compulsory
Specialisation in Architectural Restoration	Rehabilitation of Large Residential Complexes and Industrial Areas	5	Compulsory
and Rehabilitation Mbarch	Master's Thesis	15	Project
Specialisation in	Advanced and Innovative Structural Materials	5	Optional
Specialisation in Architectural Structures Mbarch	Master's Thesis	15	Project

Subjects		ECTS credits	Туре
Specialisation in Specialisation in Architecture, Energy and Environment Mbarch	Design Perspectives	5	Compulsory
	Energy and Comfort	5	Compulsory
	Environmental Assessment	5	Compulsory
	Master's Thesis	15	Project
Specialisation in	Design and Materiality	5	Optional
Specialisation in Contemporary Design	From the Private to the Public Space	5	Optional
Mbarch	New Representations: New Conceptions	5	Optional
	The Public Space in Urban Reform	5	Optional
	Master's Thesis	15	Project
Specialisation in	Architecture and Creativity	5	Optional
Specialisation in Design, Process and Programming	Comparative Architecture	5	Optional
Mbarch	Design Theory	5	Optional
	Master's Thesis	15	Project
Specialisation in	Advanced and Innovative Structural Materials	5	Optional
Specialisation in Technological Innovation	Advanced Architectural and Landscape Lighting	5	Optional
in Architecture Mbarch	Advanced Technology for the Construction of the Interior Space in Architecture	5	Optional
	Integrated Exterior Cladding	5	Optional
	Master's Thesis	15	Project
Specialisation in	Architecture and Culture	5	Optional
Specialisation in Theory, History and Culture	Architecture, Science, Technology	5	Optional
	History, Architecture and City	5	Optional
	Master's Thesis	15	Project
Specialisation in Specialisation in Urban	Urban and Architectural Management and Valuation Research Seminar	5	Compulsory
and Architectural Management and	Urban and Real Estate Valuation	5	Compulsory
Valuation Mbarch	Urban and Regional Economics	5	Optional
	Urban Sustainability and Environmental Assessment Methods	5	Optional
	Master's Thesis	15	Project
Specialisation in	Contemporary Residential Urban Project	5	Optional
Specialisation in Urbanism Mbarch	Public Space, Experiences, Projects and Policies	5	Optional
	Regional and Urban Transformations Due to Sun-And-Beach Tourism	n 5	Optional
	The City as Local Versus Global Interface	5	Optional
	The Rules of Urban Form	5	Optional
	The Territory as Project, Regional Mosaic City	5	Optional
	Urbanism of the Other 98%	5	Optional
	Master's Thesis	15	Project
Master's Thesis		15	Project

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