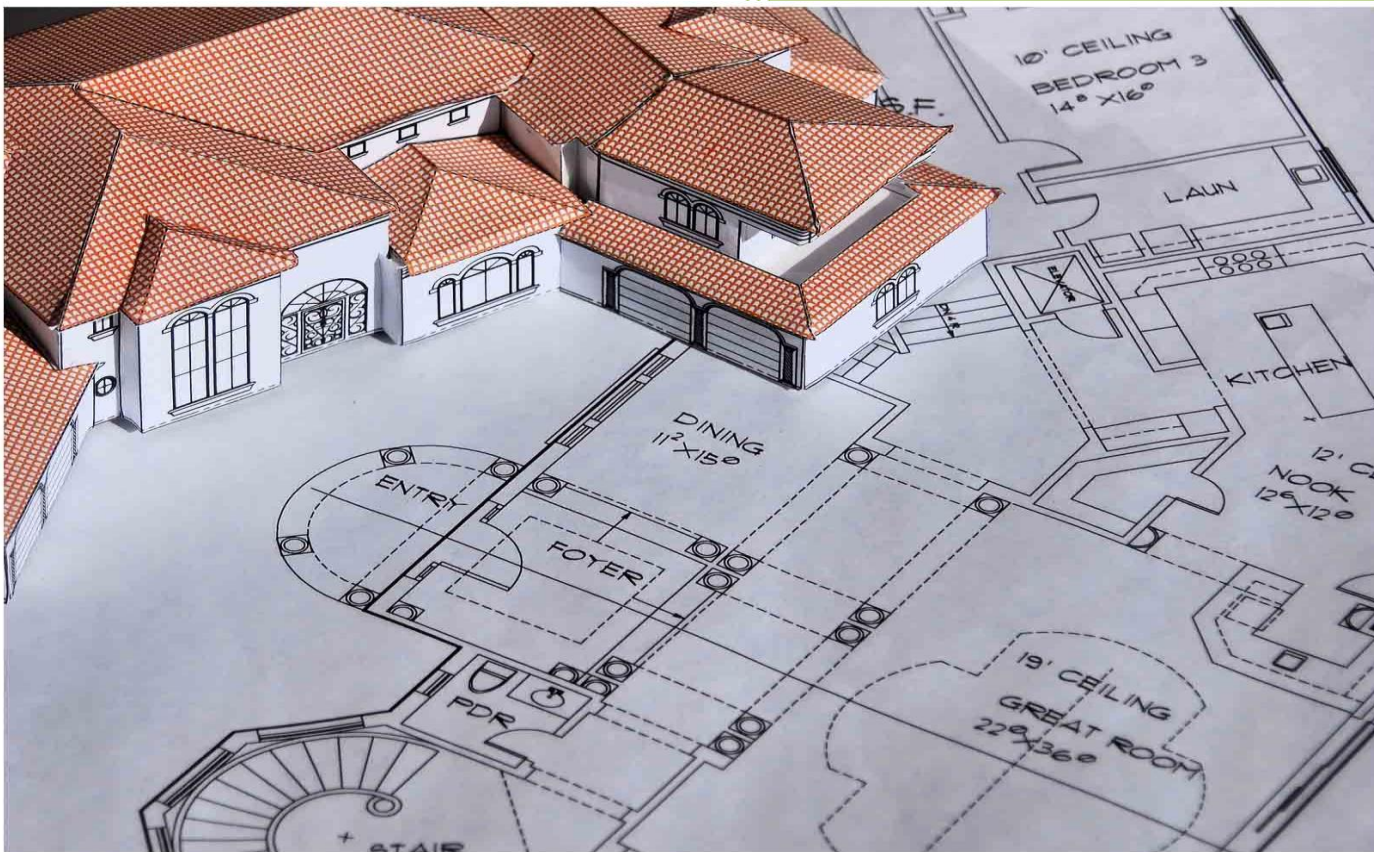


MA in Architectural Engineering



DANESHPAJOOHAN PISHRO HIGHER EDUCATION INSTITUTE

- **COURSE CHART**
- **SYLLABUS**

MA. Architectural Engineering Course Chart

Architectural Engineering Courses

Course Code	Course Title	Credits	Theoretical	Practical	Pre-requisite	Co-requisite
	Research Methods and Thesis Compilation	2	2	0	-----	-----
	Architectural Programming and Design Methods	2	2	0	-----	-----
	Graduate Architectural Design-I	4	0	4	-----	-----
	Architectural Wisdom in Iran	2	2	0	Graduate Architectural Design-I	-----
	Man and Environment	2	2	0	Graduate Architectural Design-I	-----
	Graduate Architectural Design-II	4	0	4	Graduate Architectural Design-I	-----
	Architectural Rights and Regulations	2	2	0	Graduate Architectural Design-I	-----
	Construction Procedures	2	0	2	Graduate Architectural Design-I	-----
	Graduate Architectural Design-III	4	0	4	Graduate Architectural Design-I	-----
Total Credits		24				

Elective Courses (not complete)

Course Code	Course Title	Credits	Theoretical	Practical	Pre-requisite	Co-requisite
	Contemporary Structures	2	2	0	-----	-----
Total Credits		-				

Note: students have to pass 2 credits from elective courses.

Research Methods and Thesis Compilation

Course Code	Course Title	Credits	Theoretical	Practical	Pre-requisite	Co-requisite
	Research Methods and Thesis Compilation	2	2	0	-----	-----

- Acquiring the necessary knowledge to apply the proper research methods for architecture engineering
- Enhancing students' scientific capabilities for presenting papers and theses in master's degree level

Architectural Programming and Design Methods

Course Code	Course Title	Credits	Theoretical	Practical	Pre-requisite	Co-requisite
	Architectural Programming and Design Methods	2	2	0	-----	-----

- Studying the design processes and its evolution
- Introduction to the subject of Programming and its comparison with planning
- Studying the benefits and steps of programming
- Introduction to the methodology of designing

Graduate Architectural Design-I

Course Code	Course Title	Credits	Theoretical	Practical	Pre-requisite	Co-requisite
	Graduate Architectural Design-I	4	0	4	-----	-----

- Emphasizing the practical and programming aspects of designing
- Paying attention to the parameters affecting the formation of design
- Reviewing design methods by attending to the subject of designing

Architectural Wisdom in Iran

Course Code	Course Title	Credits	Theoretical	Practical	Pre-requisite	Co-requisite
	Architectural Wisdom in Iran	2	2	0	Graduate Architectural Design-I	-----

- The relationship between idea and architecture
- The emergence quality of architectural ideas
- The evolution of architectural ideas of Iranians throughout the history
- Studying the significant and famous examples from each period of Iranian architectural history

Man and Environment

Course Code	Course Title	Credits	Theoretical	Practical	Pre-requisite	Co-requisite
	Man and Environment	2	2	0	Graduate Architectural Design-I	-----

- Acquiring the essential knowledge to comprehend the influencing factors of mutual relationships between man and environment, and interactions between people
- Enhancing designers' psychological analysis capability in order to raise their awareness of environment design

Graduate Architectural Design-II

Course Code	Course Title	Credits	Theoretical	Practical	Pre-requisite	Co-requisite
	Graduate Architectural Design-II	4	0	4	Graduate Architectural Design-I	-----

- Emphasizing the philosophical and theoretical aspects of designing
- Paying attention to the aesthetic and creative aspects of designing

Architectural Rights and Regulations

Course Code	Course Title	Credits	Theoretical	Practical	Pre-requisite	Co-requisite
	Architectural Rights and Regulations	2	2	0	Graduate Architectural Design-I	-----

This course provides students with the rules and regulations directly interacting with the profession of architecture.

Contemporary Structures

Course Code	Course Title	Credits	Theoretical	Practical	Pre-requisite	Co-requisite
	Contemporary Structures	2	2	0	-----	-----

- Introduction to modern building systems and new structural forms
- Studying structure behaviors and the interactions of form and structure specially in modern day architecture
- Introduction to modern technologies and required materials to operate modern building systems

Construction Procedures

Course Code	Course Title	Credits	Theoretical	Practical	Pre-requisite	Co-requisite
	Construction Procedures	2	0	2	Graduate Architectural Design-I	-----

- Construction staff characterizations
- Operative organizations and institutions of construction
- Initial studies, first stage plan, executional blueprints
- Technical analysis, procedures, excavation, ...
- Walls
- Facades
- Stairs
- Doors and windows
- Mechanical installations
- Electrical Installations

Graduate Architectural Design-III

Course Code	Course Title	Credits	Theoretical	Practical	Pre-requisite	Co-requisite
	Graduate Architectural Design-III	4	0	4	Graduate Architectural Design-I	-----

- Emphasizing the practical, legal and operational aspects of construction
- Paying attention to the essence of coordination between design theories and construction systems and components

Thesis

Course Code	Course Title	Credits	Theoretical	Practical	Pre-requisite	Co-requisite
	Thesis	6	0	6	Graduate Architectural Design-I	-----

In this project students will choose and study a specific subject or problem and find its answer or solution, through practical analyzing, experiencing, and experimenting. Eventually, students will compile their theses and present them as their final project.