# MS in Textile Engineering

## **Program Overview**

MS in Textile Engineering program covers a wide range of research interests. MS in Textile Engineering aims to produce quality textile engineers with expertise in operation and design of textile processes and machinery, who can be devoted to solving the industry's technical and managerial issues targeting not only the current needs of the industry but also acting as a key source of ideas and expertise for the long term competitiveness of the entire textile industry of Pakistan. This will also be a source center for technical human resources, executives and consultants.

### Main Areas of Research:

- Nanotechnology
- High-Performance Textile Fibers
- Textile Composite Materials
- Advanced 3D Woven Structures
- Novel Finishing of Textile Surfaces
- Advanced Dyeing Techniques
- Organic Cotton and its Applications
- Electrically Conductive Textile Materials
- Textile Based Motion Sensors
- Physiological Properties of Textile Materials
- Antimicrobial Effects of Textile Materials

For more information, please refer to the list of faculty members for their research field on the Department website. (???)

### **Admission Requirement:**

16 years of education or equivalent e.g. B.E/BS - 4 years in Textile Engineering from HEC recognized University with at least 60 % marks (annual system) or CGPA 2.5 out of 4 (Semester System).

GAT general with at least 50% marks or GAT subject with at least 60% marks or HAT for the admission /scholarship in the specific program of study.

For more information on application deadlines, tests, and other admission requirements, please visit the admissions section of the Graduate Studies Office.

# **Program Requirement:**

The minimum and maximum duration of the MS program is 1.5 to 4 years. Students must meet the following requirements for graduation:

- A minimum of 24 credit hours course work with a minimum CGPA of 2.5
- Successful defense of synopsis/ research proposal and its approval from Advanced Studies and Research Board (AS&RB).
- A minimum of 6 credit hours research work/ thesis.
- Thesis defense and viva.

## **Program Structure:**

S#	<b>Course Codes</b>	Course Title	Credit Hours		
FIRST SEMESTER					
1		Core-I	3 + 0		
2		Core-II	3 + 0		
		Elective-I			
3		Elective-II	3 + 0		
SECOND SEMESTER					
1		Core-III	3 + 0		
2		Core-IV	3 + 0		
		Elective-III	3 + 0		
3		Elective-IV	3 + 0		
THIRD SEMESTER					
1		Thesis	6 + 0		
TOTAL			6		
Total Courses			24		
		<b>Total Credit Hours</b>	30		

### List of Courses for MS Textile Engineering

SR. NO	COURSE TITLE	CREDIT HOURS
	Core Courses	i
1	Research Methodology	3-0
2	Advanced Textiles	3-0
3	Fiber Reinforced Composites	3-0
4	Textile Product Development Process	3-0
5	Research Thesis	0-6
	Elective Courses	
6	Textile Supply Chain Management	3-0
7	Wearable Electronics	3-0
8	Nano Technology for textiles	3-0
9	Protective Textiles	3-0
10	Yarn Processing Dynamics	3-0
11	Advance Fabric Structures and Properties	3-0
12	Advance Finishing Techniques	3-0
13	Textile Environmental Management	3-0
14	Advanced Nonwoven Technology	3-0
15	Medical Textiles	3-0
16	Functional Textile Materials	3-0

# **Contact Information:**

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