

Subject	Credits
Ph.D. Communication Systems and Electromagnetic fields and Waves (Elective Courses)	
Advanced Electromagnetic	3
Advanced Engineering Mathematics	3
Microwave II	3
Antenna II	3
Numerical Techniques in Electromagnetics	3
Active Circuits in Microwave	3
Electromagnetic Compatibility	3
Scattering of Waves	3
Dyadic Green Function in Electromagnetic	3
Electromagnetic Warfare	3
Remote Sensing	3
Terahertz Technology	3
Microstrip Array Antenna	3
Asymptotic Methods in Electromagnetic	3
Meta-materials	3
Printed Circuits Antennas	3
Photonics	3
Optical Waveguides	3
Optical Communication Systems	3
Optoelectronics	3
Laser	3
Fourier Optics	3
Fiber Optics	3
Nonlinear Optics	3
Microwave Photonics	3
Quantum Optics	3
Quantum Mechanics	3
Nonlinear Fiber Optics	3
Optical Modulation	3
Optical Processors	3
Quantum Communication	3
Nano photonics	3
Statistical Optics	3
Integrated Photonics	3
Computational Photonics	3
Satellite Optical Communications	3
Stochastic Processes	3
Advanced Communication Theory	3
Advanced Digital Signal Processing	3
Wireless Communication Systems	3
Communication Networks	3
Channel Coding	3
Advanced Channel Coding	3
Information Theory	3
Advanced Information Theory	3

Speech Processing	3
Image Processing	3
Detection Theory	3
Adaptive Filters	3
Spread- Spectrum Communications	3
Estimation Theory	3
Cellular Communications	3
Radar Principles and Systems	3
Satellite Communications	3
Cryptography	3
Cryptography Mathematics	3
Network Security	3
Information Steganography	3
Advanced Cryptography	3
Computational Complexity	3
Secure Network Protocols	3
Intrusion Detection Systems	3
Advanced Computer Networks	3
Network Management	3
Network Switch and Router	3
Wireless Communication Networks	3
Traffic Control in Communication Networks	3
Traffic Engineering in Communication Networks	3
Multimedia Communications	3
Network Algorithms	3
Design of Communication Networks	3
Network Programming	3
Network Modeling and Performance Evaluation	3
Queuing Theory	3
Cloud Computing	3
Optical Communication Networks	3
Specialized Topics (Resource Allocation in Telecommunication Networks)	3
Specialized Topics(Structure and Design of Next Generation Wireless Networks)	3
Specialized Topics(Deep Learning in Signal Processing)	3
Specialized Topics(Statistical Pattern Recognition)	
Specialized Topics (Phases Array)	3

These courses are presented in this University