

HASMUKH GOSWAMI COLLEGE OF ENGINEERING, VAHELAL

SYLLABUS FOR MID SEM EXAM-SEPT-2018

ELECTRONICS AND COMMUNICATION ENGINEERING

SEM	Sub Code	Subject	Unit No (GTU Syllabus)	Unit Name(GTU Syllabus)
7TH	2171003	Digital Signal Processing	1,2,6,8	Unit 1 : Introduction to DSP Unit 2 : Discrete-Time Signals and Systems Unit 6 : Discrete-Fourier Transform & Fast Fourier Transform Unit 8 : Architecture of DSP Processors & applications
	2171007	Satellite Communication	1,2,3,4,5,6,7	Unit 1: Introduction to Satellite Communication Unit 2: Orbits and Launching Methods Unit 3: The Geostationary Orbit Unit 4: Radio Wave Propagation Unit 5: Polarization Unit 6: The Space Segment Unit 7: The Earth Segment
	2171004	Wireless communication	1,2,4	Unit 1 : Introduction to Wireless Communication System: Unit 2 : The Cellular Concept- System Design Fundamentals Unit4 : Multiple Access Techniques
	2171001	Microwave engineering	1,2,3,4,5	Unit 1 :Introduction to Microwaves Unit 2 : Mathematical model of Microwave Transmission Unit 3 : Analysis of Microwave Transmission Lines and Waveguides Unit 4 : Microwave Network Analysis Unit 5: Passive and Active microwave Devices
	2171008	Data communication and networking	1,2,3,4,5	Unit 1 : Introduction to Data Communication and Networking: Unit 2 : Physical Layer Unit 3 : Data Link Layer Unit 4 : Medium Access Layer Unit 5: Local Area Network
SEM	Sub Code	Subject	Unit No (GTU Syllabus)	Unit Name(GTU Syllabus)
5TH	2151101	Audio Video Systems	1,2,3,4,5	Unit 1: Characteristics of Sound Unit 2: Audio devices and their applications Unit 3: Digital Audio Fundamentals Unit 4: Television Fundamentals Unit 5: Digital video, compression techniques and standards
	2151002	ENGINEERING ELECTROMAGNETICS	1,2,3,4,5,6,7,9	Unit 1: Vector Analysis Unit 2: Coulomb's Law and Electric Field Intensity Unit 3: Electric Flux Density, Gauss's Law and Divergence Unit 4: Energy and Potential Unit 5: Conductors and Dielectrics Unit 6: Capacitance Unit 7: The Steady Magnetic Field Unit 9: Time-Varying Fields and Maxwell's Equations
	2151001	Microcontroller and Interfacing	1,2,4	Unit 1: Introduction To 8-bit Microcontroller Unit 2: AVR Assembly Language Programming Unit 4: Peripheral Interfacing
	2151004	Electronic Communication	1,2,3,4,7,8	Unit 1: Introduction to communication system Unit 2: Analysis and transmission of signals Unit 3: Passive circuits Unit 4: Amplitude Modulation (AM) / Demodulation Unit 7: Noise Unit 8: Introduction of amateur technology
SEM	Sub Code	Subject	Unit No (GTU Syllabus)	Unit Name(GTU Syllabus)
3RD	2131004	DIGITAL ELECTRONICS	1,2,3,8,9	Unit 1: Binary Systems and Logic Circuits Unit 2: Boolean Algebra and Mapping Methods Unit 3: Logic Function Realization with MSI Circuits Unit 8: Logic Families Unit 9: Programmable Logic Devices
	2131005	DC MACHINE AND TRANSFORMER	1	UNIT: 1Transformers (single phase and three phase both)
	2130901	Circuits & Networks	1,2,7	Unit 1 : Circuit Variables and Circuit Elements and Sources Unit 2 : Nodal Analysis and Mesh Analysis of resistive Circuits Unit 7 : Laplace transform analysis and circuit applications
	2131006	Electronic devices and circuits	1,2,3,4	Unit 1: Semiconductors Unit 2: Diode Theory: Unit 3: Diode Circuits: Unit 4: Special Purpose Diode:
	2130002	ADVANCED ENGINEERING MATHEMATICS	2,3,5	Unit 2: FOURIER SERIES AND FOURIER INTEGRAL, Unit 3: ORDINARY DIFFERENTIAL EQUATION (UP TO LAST LECTURE), Unit 5: LAPLACE TRANSFORM
	2130004	ENGINEERING ECONOMICS AND MANAGEMENT	1,2,3,4,5	Unit: 1(A) Introduction to Economics Unit: 1(B) Theory of Demand and Supply Unit: 2(A) Theory of Production Unit: 2(B) Cost and Cost Concepts Unit: 3(A) Market