TKR COLLEGE OF ENGINEERING AND TECHNOLOGY
(AUTONOMOUS)
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Accredited by NBA & NAAC with 'A' Grade]

B.TECH – CIVIL ENGINEERING
Course Structure R-20

SEMESTER I

S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM8	Linear Algebra, Calculus & Partial Differential Equation	3	0	0	3
2	HS	CHSE1	English	2	0	0	2
3	BS	CBSP3	Engineering Physics	3	1	0	4
4	ES	CESBE2	Basic Electrical Engineering	3	0	0	3
5	ES	CESEG1	Engineering Graphics	1	0	4	3
6	HS	CHSE2	English Language & Communication Skills Lab	0	0	2	1
7	BS	CBSP4	Engineering Physics Lab	0	0	3	1.5
8	ES	CESBE3	Basic Electrical Engineering Lab	0	0	2	1
9	MC	MC001	Sports	0	0	0	Satisfactory
			Total Credits				18.5

Mandatory Course: SPORTS

The students need to participate in any physical activity such as sports, marathon, conducted by any college or any organization, students should produce participation certificate for clearing this course.

SEMESTER II

S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM1	Ordinary Differential Equation & Vector Calculus	3	0	0	3
2	BS	CBSC1	Material Chemistry	3	1	0	4
3	ES	CESCP1	C Programming for problem solving	3	0	0	3
4	ES	CESEM1	Engineering Mechanics	3	1	0	4
5	BS	CBSC2	Material Chemistry Lab	0	0	3	1.5
6	ES	CESCP2	C Programming for problem solving Lab	0	0	3	1.5
7	ES	CESBW1	Basic Workshop	0	0	3	1.5
8	ES	CESIC1	Introduction to CAD Lab	0	0	2	1
9	MC	MC002	Yoga	0	0	0	Satisfactory
			Total Credits				19.5

Mandatory Course: YOGA

The student should undergo yoga meditation course offered by any organization or conducted by any college. Student should produce the completion certificate for clearing this course.

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T K R COLLEGE OF ENGINEERING &TECHNOLOGY

(Autonomous)

B.TECH. CIVIL ENGINEERING -R18

COURSE STRUCTURE& SYLLABUS

B. Tech. III Semester

Sl. No	Course Code	Course title	L	T	P	Credits
1	B13PC1	Building Materials, Construction & Planning	2	1	0	2
2	B13PC2	Surveying & Geomatics	3	1	0	3
3	B13PC3	Strength of Materials -I	3	1	0	3
4	B13PC4	Fluid Mechanics	3	1	0	3
5	BBSM3	Probability & Statistics	3	0	0	3
6	B13PC6	Surveying Lab-I	0	0	3	1.5
7	B13PC7	Strength of Materials Lab	0	0	3	1.5
8	B13PC8	Computer Aided Design Lab-II	0	0	3	1.5
					Total credits	18.5

B. Tech. IV Semester

Sl. No	Course Code	Course title	L	T	P	Credits
1	B14PC1	Engineering Geology	2	1	0	2
2	B14PC2	Strength of Materials –II	3	1	0	3
3	B14PC3	Hydraulics & Hydraulic Machinery	3	1	0	3
4	B14PC4	Structural Analysis -I	3	1	0	3
5	B14PC5	Soil Mechanics	3	1	0	3
6	BBSM6	Numerical Methods	2	1	0	2
7	B14PC7	Surveying Lab-II	0	0	3	1.5
8	B14PC8	Fluid Mechanics Lab	0	0	3	1.5
9	B14PC9	Engineering Geology Lab	0	0	3	1.5
					Total Credits	20.5

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T K R COLLEGE OF ENGINEERING &TECHNOLOGY
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B.TECH. CIVIL ENGINEERING -R18

COURSE STRUCTURE

B. Tech - V Semester

Sl. No	Course Code	Course title	L	T	P	Credits
1	B15PC1	Structural Analysis-II	3	1	0	3
2	B15PC2	Design of Reinforced Cement Concrete Structures	3	1	0	3
3	B15PC3	Transportation Engineering	3	1	0	3
4	B15PE4	**Professional Elective-I** 1)Concrete Technology 2)Construction Equipment & Materials 3)Ground Improvement Techniques	3	1	0	3
5	B15HS5	Fundamentals of management	3	1	0	3
6	B15PC6	Highway Engineering & Concrete Technology Lab	0	0	3	1.5
7	B15PC7	Soil Mechanics Lab	0	0	3	1.5
9	BE23	Advanced Communication Skills LAb	0	0	3	1.5
		Total Credits	15	5	9	19.5

B. Tech - VI Semester

Sl. No	Course Code	Course title	L	T	P	Credits
1	B16PC1	Environmental Engineering	3	1	0	3
2	B16PC2	Foundation Engineering	3	1	0	3
3	B16PC3	Design of Steel Structures	3	1	0	3
4	B16PC4	Hydrology & Water Resource Engineering	3	1	0	3
5	B16PE5	**Professional Elective –II** 1)Prestressed Concrete 2)Advanced Structural Design 3)Structural Analysis by Matrix Methods	3	1	0	3
6		Open Elective-1	3	1	0	3
7	B16PC7	Environmental Engineering Lab	0	0	3	1.5
8	B16PC8	Hydraulic Machinary Lab	0	0	3	1.5
9	B16ES9	Computer Aided Civil Engineering Drawing	0	0	3	1.5
		Total Credits	18	6	9	22.5

TKR COLLEGE OF ENGINEERING & TECHNOLOGY
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B.TECH. CIVIL ENGINEERING –R17
COURSE STRUCTURE & SYLLABUS

IV YEAR I SEMESTER

S.No	Course Code	Course Title	L	T	P	Credits
1	A17PC1	Foundation Engineering	4	1	0	4
2	A17PC2	Estimation & Costing	4	1	0	4
3		**Open Elective-III**	3	0	0	3
4	A17PE4	**Professional Elective-IV** 1. Prestressed Concrete 2. Finite Elements Methods 3. Rehabilitation And Retrofitting	3	1	0	3
5	A17PE5	**Professional Elective-V** 1. Water Resources Engineering-II 2. Pipe Line Engineering 3. Air and Noise pollution	3	1	0	3
6	A17PE6	**Professional Elective-VI** 1. Pavement Design, Construction & Maintenance 2. Construction Project Planning and Management 3. Railway Engineering	3	1	0	3
7	A17PC7	Highway Engineering Lab	0	0	3	2
8	A17PC8	Environment Engineering Lab	0	0	3	2
9	A17PW9	Industry Oriented Mini project	0	0	0	3
		Total Credits				27

IV YEAR II SEMESTER

S.No	Course Code	Course Title	L	T	P	Credits
1	A18PE1	**Professional Elective-VII** 1. Industrial Waste waterTreatment 2. Solid and Hazardous Waste Management 3. Environmental Impact Assessment	3	0	0	3
2	A18PE2	**Professional Elective-VIII** 1. Earth and Rock fill Dams and Slope Stability 2. Design and Drawings of Irrigation Structures 3. Advanced Structural Design	3	0	0	3
3		**Open Elective-IV**	3	0	0	3
4	A18PW4	Seminar	0	0	6	2
5	A18PW5	Project Work	0	0	15	10
6	A18PW6	Comprehensive Viva Voce	0	0	0	3
		Total Credits				24

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B.TECH – ELECTRICAL & ELECTRONICS ENGINEERING
Course Structure R-20

SEMESTER I

S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM7	Linear Algebra & Applied Calculus	3	1	0	4
2	HS	CHSE1	English	2	0	0	2
3	BS	CBSC3	Engineering Chemistry	3	1	0	4
4	ES	CESBE2	Basic Electrical Engineering	3	0	0	3
5	HS	CHSE2	English Language & Communication Skills Lab	0	0	2	1
6	BS	CBSC4	Engineering Chemistry Lab	0	0	3	1.5
7	ES	CESBE3	Basic Electrical Engineering Lab	0	0	2	1
8	ES	CESBW1	Basic Workshop	0	0	3	1.5
9	MC	MC001	Sports	0	0	0	Satisfactory
			Total Credits				18

Mandatory Course: SPORTS

The students need to participate in any physical activity such as sports, marathon, conducted by any college or any organization, students should produce participation certificate for clearing this course.

SEMESTER II

S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM11	Ordinary Differential Equations, Transforms & Vector Calculus	3	1	0	4
2	BS	CBSP1	Applied Physics	3	1	0	4
3	ES	CESEG1	Engineering Graphics	1	0	4	3
4	ES	CESSD1	Semi-Conductor Devices & Circuits	3	0	0	3
5	ES	CESCP1	C Programming for Problem Solving	3	0	0	3
6	BS	CBSP2	Applied Physics Lab	0	0	3	1.5
7	ES	CESCP2	C Programming for Problem Solving Lab	0	0	3	1.5
8	MC	MC002	Yoga	0	0	0	Satisfactory
			Total Credits				20

Mandatory Course: YOGA

The student should undergo yoga meditation course offered by any organization or conducted by any college. Student should produce the completion certificate for clearing this course.

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B.TECH. ELECTRICAL AND ELECTRONICS ENGINEERING-R18

COURSE STRUCTURE & SYLLABUS

EEE- B. Tech - III Semester

S. No	Course Code	Course Title	Hour per week			Total	Credits
			Lecture	Tutorial	Practical		
1	BBSM4	Numerical Methods and Transforms	3	0	0	3	3
2	B23PC2	Electrical Circuit Analysis	3	0	0	3	3
3	B43PC3	Electronic Circuits	3	0	0	3	3
4	B23PC4	Electrical Machines-I	3	0	0	3	3
5	B23PC5	Electromagnetic Fields	3	0	0	3	3
6	B43PC6	Electronic Circuits Lab	0	0	3	3	1.5
7	B23PC7	Electrical Machines-I Lab	0	0	3	3	1.5
8	B23PC8	Electrical Circuit Analysis Lab	0	0	3	3	1.5
9	B23MC9	Environmental Science	0	0	0	0	0
						Total	**19.5**

EEE- B. Tech - IV Semester

S. No	Course Code	Course Title	Hour per week			Total	Credits
			Lecture	Tutorial	Practical		
1	BBSM7	Special functions & complex variables	3	0	0	3	3
2	B44PC2	Digital Logic Design	3	0	0	3	3
3	B24PC3	Electrical Machines-II	3	0	0	3	3
4	B24PC4	Control Systems	3	0	0	3	3
5	BHSFM	Fundamentals of Management	3	0	0	3	3
6	B44PC6	Digital Logic Design Lab	0	0	3	3	1.5
7	B24PC7	Electrical Machines-II Lab	0	0	3	3	1.5
8	B24PC8	Control Systems Lab	0	0	3	3	1.5
9	B24MC9	Essence of Indian Traditional Knowledge	0	0	0	0	0
						Total	**19.5**

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B.TECH. ELECTRICAL AND ELECTRONICS ENGINEERING -R18

EEE- B. Tech - V Semester

S. No	Course Code	Course Title	Hour per week			Total	Credits
			Lecture	Tutorial	Practical		
1	B25PC1	Power Systems-I	3	0	0	3	3
2	B25PC2	Power Electronics	3	0	0	3	3
3	B45PC3	Microprocessors and Micro Controllers	3	0	0	3	3
4	B25PE4	Professional Elective-I 1. Electrical Machine Design 2. Power System Dynamics and Control 3. Digital Signal Processing	3	0	0	3	3
5		Open Elective – I	3	0	0	3	3
6	B25PC6	Power Electronics Lab	0	0	3	3	1.5
7	B45PC7	Microprocessor and Micro Controllers Lab	0	0	3	3	1.5
8	BE23	Advanced Communication skills Lab	0	0	3	3	1.5
					Total		19.5

EEE- B. Tech - VI Semester

S. No	Course Code	Course Title	Hour per week			Total	Credits
			Lecture	Tutorial	Practical		
1	B26PC1	Power Systems-II	3	0	0	3	3
2	B26PC2	Electrical Measurements and Instrumentation	3	0	0	3	3
3	B26PC3	Power System Analysis	3	0	0	3	3
4	B26PC4	Signals and Systems	3	0	0	3	3
5	B26PE5	Professional Elective-II 1. Electrical Energy Conservation and Auditing 2. Computer Architecture 3. Line-Commutated and Active Rectifiers	3	0	0	3	3
6		Open Elective – II	3	0	0	3	3
7	B26PC7	Electrical systems simulation Lab	0	0	3	3	1.5
8	B26PC8	Electrical Measurements and Instrumentation Lab	0	0	3	3	1.5
9	B26PC9	Electrical Workshop	0	0	3	3	1.5
					Total		22.5

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B.TECH. ELECTRICAL AND ELECTRONICS ENGINEERING-R17

COURSE STRUCTURE & SYLLABUS

IV YEAR I SEMESTER

S. No.	Course Code	Course Title	L	T	P	Credits
1	A27PC1	Power Semiconductor Drives	4	1	0	4
2	A27PC2	Power System Operation and control	4	1	0	4
3		Open elective-III	3	0	0	3
4	A27PE4	Professional elective-IV 1.Switch Mode Power Supply 2. Electrical Distribution System 3. Embeded Systems	3	0	0	3
5	A27PE5	Professional elective-V 1. Special Machines 2. Advanced Power Electronics 3. Digital Control Systems	3	0	0	3
6	A27PE6	Professional elective-VI 1. VLSI Design 2. Utilization of Electric Power 3. Programmable Logic Controllers	3	0	0	3
7	A27PC7	Electrical Systems Simulation Lab	0	0	3	2
8	A27PC8	Electrical Workshop	0	0	3	2
9	A27PW9	Industry Oriented Mini project	0	0	0	3
		Total Credits				**27**

IV YEAR II SEMESTER

S. No.	Course Code	Course Title	L	T	P	Credits
1		Open elective-IV	3	0	0	3
2	A28PE2	Professional elective-VII 1. Smart Electric Grid 2. Artificial Neural Networks and Fuzzy Systems 3 Flexible AC Transmission Systems	3	0	0	3
3	A28PE3	Professional elective-VIII 1. Power Quality 2. Solar Photovoltaic Systems 3. EHV AC Transmission Systems	3	0	0	3
4	A28SC4	Seminar	0	6	0	2
5	A28PW5	Project Work	0	15	0	10
6	A28CV6	Comprehensive Viva Voce	0	0	0	3
		Total Credits				**24**

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NAAC

B.TECH – MECHANICAL ENGINEERING
Course Structure R-20

SEMESTER I

S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM7	Linear Algebra & Applied Calculus	3	1	0	4
2	BS	CBSP3	Engineering Physics	3	1	0	4
3	ES	CESCP1	C Programming for Problem Solving	3	0	0	3
4	ES	CESEG1	Engineering Graphics	1	0	4	3
5	BS	CBSP4	Engineering Physics Lab	0	0	3	1.5
6	ES	CESCP2	C Programming for Problem Solving Lab	0	0	3	1.5
7	ES	CESFL	Fuels & Lubricants Lab	0	0	4	2
8	MC	MC001	Sports	0	0	0	Satisfactory
			Total Credits				19

Mandatory Course: SPORTS

The Students need to participate in any physical activity such as sports, marathon, conducted by any college or any organization, students should produce participation certificate for clearing this course.

SEMESTER II

S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM16	Differential Equations & Vector Calculus	3	1	0	4
2	BS	CBSC3	Engineering Chemistry	3	1	0	4
3	ES	CESEM1	Engineering Mechanics	3	1	0	4
4	HS	CHSE1	English	2	0	0	2
5	ES	CESEW2	Engineering Workshop	1	0	3	2.5
6	BS	CBSC4	Engineering Chemistry Lab	0	0	3	1.5
7	HS	CHSE2	English Language & Communication Skills Lab	0	0	2	1
8	MC	MC002	Yoga	0	0	0	Satisfactory
			Total Credit				19

Mandatory Course: YOGA

The student should undergo yoga meditation course offered by any organization or conducted by any college. Student should produce the completion certificate for clearing this course.

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T K R COLLEGE OF ENGINEERING &TECHNOLOGY

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B.TECH. MECHANICAL ENGINEERING -R18

COURSE STRUCTURE& SYLLABUS

B. Tech. III Semester

Sl. No	Course Code	Course title	L	T	P	Credits
1	BBSM3	Probability and Statistics	3	1	0	3
2	B33ES1	Thermodynamics	3	1	0	3
3	B33PC2	Kinematics of Machinery	3	1	0	3
4	B33PC3	Metallurgy and Material Science	3	1	0	3
5	B33PC4	Mechanics of Solids	3	1	0	3
6	B33PC5	Metallurgy and Material Science Lab	0	0	3	1.5
7	B33PC6	Mechanics of Solids Lab	0	0	3	1.5
8	B33PC7	Kinematics and Dynamics Lab	0	0	3	1.5
		Total credits				19.5

B. Tech. IV Semester

Sl. No	Course Code	Course title	L	T	P	Credits
1	B34PC1	Dynamics of Machinery	3	1	0	3
2	B34PC2	Fluid Mechanics and Hydraulic Machines	3	1	0	3
3	B34ES3	Machine Drawing	0	0	3	1.5
4	B34PE4	Professional Elective-I A) Manufacturing Process B)Machine Tool Design C)Computer Graphics	3	1	0	3
5	B34OE5	Open Elective -I A) Disaster Management B) Introduction to Mechatronics C) Non Destructive Testing methods	3	1	0	3
6	BBSM6	Numerical Methods	3	1	0	3
7	B34PC7	Fluid Mechanics and Hydraulic Machines Lab	0	0	3	1.5
8	B34PC8	Manufacturing Process Lab	0	0	3	1.5
		Total Credits				19.5

T K R COLLEGE OF ENGINEERING &TECHNOLOGY
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B.TECH. MECHANICAL ENGINEERING -R18

TKRCET
HYDERABAD

COURSE STRUCTURE& SYLLABUS

B.Tech. VSemester

S. No.	Code	Course Title	L	T	P	Credits
1	B35PC1	Design of Machine members-I	3	1	0	3
2	B35PC2	Thermal Engineering-I	3	1	0	3
3	B35PC3	Machine tools	3	1	0	3
4	B35PC4	Automobile Engineering	3	1	0	3
5	B35HS5	Fundamentals of Management	3	1	0	3
6	B35PE6	Professional Elective-II **B35PE5A:** Finite Element Methods **B35PE5B:** Engineering Metrology **B35PE5C:** I.C. Engines and Gas Turbines Methods	3	1	0	3
7	B35PC7	Thermal engineering Lab	0	0	3	1.5
8	B35PC8	Machine tools lab	0	0	3	1.5
9	B35PC9	Engineering Metrology Lab.	0	0	3	1.5
10	B35MC10	*Professional Ethics and Group discussion	3	0	0	0
		Total Credits				**22.5**

* MC--Mandatory course, Satisfactory/Unsatisfactory

B.Tech. VI Semester

S. No.	Code	Course Title	L	T	P	Credits
1	B36PE1	Professional Elective-III **B36PE1A:** Fundamentals of Engineering Materials **B36PE1B:** Thermal Engineering-2 **B36PE1C:** Power Plant Engineering	3	1	0	3
2	B36PC2	Design of machine members –II	4	1	0	4
3	B36PC3	Heat Transfer	3	1	0	3
4	B36OE4	Open Elective -II **B36OE4A:** World Class Manufacturing **B36OE4B:** Science and Technology of Nano Materials **B36OE4C:** Nuclear Power generation and supply	2	1	0	2
5	B36OE5	Open Elective-III **B36OE5A:**SOLAR ENERGY APPLIANCES **B36OE5B:** Rural Technology and Community development **B36OE5C:** Theory of Combustion and Emission	3	1	0	3
6	B36PC6	Heat transfer Lab	0	0	3	1.5
7	B36PC7	Production drawing Practices and Instrumentation Lab	0	0	3	1.5
8	BE23	Advanced Communications skill lab	0	0	3	1.5
		Total Credits				19.5

T K R COLLEGE OF ENGINEERING &TECHNOLOGY
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B.TECH. MECHANICAL ENGINEERING –R17

COURSESTRUCTURE & SYLLABUS

IV YEAR I SEMESTER

No S.	Code	Course Title	L	T	P	Credits
1.	A37PC1	Operations Research	3	1	0	3
2.	A37PC2	Power Plant Engineering	4	1	0	4
3.	A37PC3	CAD/CAM	4	1	0	4
4.	A37PC4	**Professional Elective -1** A) Computational Fluid Dynamics B)Welding Technology C)Nano-Technology	3	1	0	3
5.	A37PE5	**Professional Elective- 2** A) Production Planning and Control B) Mechtronics C)Robotics	3	1	0	3
6.	A37PE6	**Professional Elective- 3** A)Un-Conventional Machinig Process B)|Automation in Manufacturing C)Turbo Machines	3	1	0	3
7.	A37PE7	Open Elective-3	3	0	0	3
8.	A37PC8	CAD and CAM lab	0	0	3	2
9.	A37PC9	Production Drawing Practice and Instrumentation lab	0	0	3	2
		Total Credits				27

IV YEAR II SEMESTER

No.	Code	Course Title	L	T	P	Credits
1.	A38OE1	Open Elective-4	3	1	0	3
2.	A38PE2	**Professional Elective-3** A)Maintenance And Safety Engineering B)Plant Layout and Material Handling C) Total Quality Management	3	1	0	3
3.	A38PE3	**Professional Elective-4** A) Renewable energy sources B) Jet propulsion and Rocket Engineering. C) I.C. Engines	3	1	0	3
4.	A38MP4	Industry Oriented Mini Project	-	-	-	2
5.	A38SR5	Seminar	-	-	6	2
6.	A38PW6	Project Work			15	9
7.	A38CV7	Comprehensive Viva	-	-	-	2
		Total Credits				24

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NAAC

B.TECH – ELECTRONICS & COMMUNICATION ENGINEERING
Course Structure R-20

SEMESTER I

S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM13	Linear Algebra Calculus & Ordinary Differential Equations	3	1	0	4
2	BS	CBSP1	Applied Physics	3	1	0	4
3	ES	CESED1	Electronic Devices	2	0	0	2
4	ES	CESCP1	C Programming for Problem Solving	3	0	0	3
5	BS	CBSP2	Applied Physics Lab	0	0	3	1.5
6	ES	CESED2	Electronic Devices Lab	0	0	2	1.0
7	ES	CESCP2	C Programming for Problem Solving Lab	0	0	3	1.5
8	ES	CESIT1	IT Workshop	0	0	3	1.5
9	MC	MC001	Sports	0	0	0	Satisfactory
			Total Credits				18.5

Mandatory Course: SPORTS
The Students need to participate in any physical activity such as sports, marathon, conducted by any college or any organization, students should produce participation certificate for clearing this course.

SEMESTER II

S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM14	Transforms Theory	3	1	0	4
2	BS	CBSC5	Applied Chemistry	3	1	0	4
3	HS	CHSE1	English	2	0	0	2
4	ES	CESBE2	Basic Electrical Engineering	3	0	0	3
5	ES	CESEG1	Engineering Graphics	1	0	4	3
6	BS	CBSC6	Applied Chemistry Lab	0	0	3	1.5
7	HS	CHSE2	English Language & Communication Skills Lab	0	0	2	1
8	ES	CESBE3	Basic Electrical Engineering Lab	0	0	2	1
9	MC	MC002	Yoga	0	0	0	Satisfactory
			Total Credits				19.5

Mandatory Course: YOGA
The student should undergo yoga meditation course offered by any organization or conducted by any college. Student should produce the completion certificate for clearing this course.

DEAN ACADEMICS
TKR College of Engineering & Technology
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B.Tech III Semester

S. No.	Course Code	Course Title	L	T	P	Credits
1	BBSMS4	Numerical Methods and Transforms	3	1	0	3
2	B43ES2	Digital Logic Design	3	0	0	3
3	B43EC3	Analog Electronic Circuit Analysis	3	0	0	3
4	B43EC4	Signals and Systems	3	1	0	3
5	B43EC5	Pulse and Digital Circuits	3	0	0	3
6	B43ES6	Network Analysis	2	0	0	2
7	B43EC7	Analog Electronic Circuit Analysis Lab	0	0	3	1.5
8	B43EC8	Basic Simulation Lab	0	0	2	1
9	B43MC9	Constitution of India	0	2	0	0
		TOTAL CREDITS				19.5

B.Tech IV SEMESTER

Sl. No.	Course Code	Course Title	L	T	P	Credits
1	BBSM7	Special functions and complex variables	3	1	0	3
2	B44PC2	Control Systems	3	0	0	3
3	B44PC3	Analog Communications	3	0	0	3
4	B44PC4	Linear and Digital IC Applications	3	0	0	3
5	B44PC5	Probability Theory and Stochastic Process	3	1	0	3
6	B44PC6	Analog Communications Lab	0	0	3	1.5
7	B44PC7	Linear and Digital IC Applications Lab	0	0	3	1.5
8	B44PC8	Pulse and Digital Circuits Lab	0	0	3	1.5
9	B44HS5	Disaster Management	0	2	0	0
		TOTAL CREDITS				19.5

DEAN ACADEMICS
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TKR COLLEGE OF ENGINEERING AND TECHNOLOGY
(Autonomous)
ELECTRONICS AND COMMUNICATION
ENGINEERING COURSE STRUCTURE & SYLLABUS (R18)

B.Tech. V Semester

S. No.	Course Code	Course Title	L	T	P	Credits
1	B45PC1	Electromagnetic Theory And Transmission Lines	3	1	0	3
2	B45PC2	VLSI Design	4	1	0	4
3	B45PC3	Digital Signal Processing	4	1	0	4
4	B45PC4	Digital Communications	3	1	0	3
		Open Elective – I	3	1	0	3
5	B45PC6	VLSI & ECAD Lab – I	0	0	3	1.5
6	B45PC7	Digital Communications Lab	0	0	3	1.5
7	B45PC8	Digital Signal Processing Lab	0	0	2	1.0
		TOTAL CREDITS				21

Semester VI

S. No.	Course Code	Course Title	L	T	P	Credits
1	B46PC1	Antennas and Wave Propagation	3	1	0	3
2	B46PC2	Microprocessors and Microcontrollers	4	1	0	4
3	B46PE3	**Program Elective – I** **B46PE3-I:** Cellular and Mobile Communications **B46PE3-II:** MEMS **B46PE3-III:** Information Theory and Coding	4	1	0	4
4	B46PE4	**Program Elective – II** **B46PE4-I :** Wireless Communications and Networks **B46PE4-II:** Image Processing and Pattern Recognition **B46PE4-III:** Power Electronics	3	1	0	3
		Open Elective – II	3	1	0	3
5	B46PC6	VLSI & ECAD Lab – II	0	0	2	1
6	B46PC7	Microprocessors and Microcontrollers Lab	0	0	3	1.5
7	B46HS8	Advanced English Communication Skills Lab	0	0	3	1.5
		TOTAL CREDITS				21

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IV YEAR I SEMESTER

S. No	Course Code	Course Title	L	T	P	Credits
1	**A47PC1**	Microwave Engineering	4	0	0	4
2	**A47PE2**	**Professional Elective - IV** **A47PE2-I:** Telecommunication Switching Systems and Networks **A47PE2-II:** RF Circuit Design **A47PE2-III:** Artificial Neural Networks	4	0	0	4
3	**A47PE3**	**Professional Elective - V** **A47PE3-I:** Cellular and Mobile Communications **A47PE3-II:** Electronic Measurements and Instrumentation **A47PE3-III:** Information Theory And Coding	4	0	0	4
4	**A47OE4**	**Open Elective III**	4	0	0	3
5	**A47PE5**	**Professional Elective - VI** **A47PE5- I:** CMOS Analog Integrated Design **A47PE5- II:** CMOS Digital Integrated Design **A47PE5- III:** Mixed Signal Design	4	0	0	4
6	**A47HS6**	Management Science	4	0	0	4
7	**A47PC7**	VLSI and E-CAD Lab	0	0	3	2
8	**A47PC8**	Microwave Engineering Lab	0	0	3	2
		Total Credits				27

IV YEAR II SEMESTER

S. No.	Course Code	Course Title	L	T	P	Credits
1	**A48PE1**	**Professional Elective - VII** **A48PE1-I:** Optimization Techniques **A48PE1-II:** Embedded Systems Design **A48PE1-III:** Satellite Communications	3	0	0	3
2	**A48PE2**	**Professional Elective - VIII** **A48PE2-I:** Optical Communications **A48PE2-II:** Wireless Communications and Networks **A48PE2-III:** Principles of Electronic Communications	3	0	0	3
3	**A48OE3**	**Open Elective – IV**	3	0	0	3
4	**A48PW4**	Industry Oriented Mini Project	0	0	0	2
5	**A48PC5**	Seminar	0	0	6	2
6	**A48PW6**	Major Project	0	0	15	9
7	**A48PC7**	Comprehensive Viva	0	0	0	2
		Total Credits				24

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TKR COLLEGE OF ENGINEERING AND TECHNOLOGY
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B.TECH – COMPUTER SCIENCE & ENGINEERING
Course Structure R-20

SEMESTER I

S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM2	Linear Algebra & Graph Theory	3	0	0	3
2	HS	CHSE1	English	2	0	0	2
3	BS	CBSC7	Chemistry	3	1	0	4
4	ES	CESEG1	Engineering Graphics	1	0	4	3
5	ES	CESCP1	C Programming for Problem Solving	2	1	0	3
6	HS	CHSE2	English Language & Communication Skills Lab	0	0	2	1
7	BS	CBSC8	Chemistry Lab	0	0	3	1.5
8	ES	CESCP2	C Programming for Problem Solving Lab	0	0	3	1.5
9	MC	MC001	Sports	0	0	0	Satisfactory
			Total Credits				19

Mandatory Course: SPORTS
The Students need to participate in any physical activity such as sports, marathon, conducted by any college or any organization, students should produce participation certificate for clearing this course.

SEMESTER II

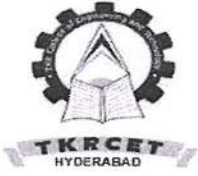| S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM1	Ordinary Differential Equations & Vector Calculus	3	0	0	3
2	BS	CBSP1	Applied Physics	3	1	0	4
3	ES	CESSD1	Semi-Conductor Devices & Circuits	3	0	0	3
4	ES	CESBE2	Basic Electrical Engineering	3	0	0	3
5	BS	CBSP2	Applied Physics Lab	0	0	3	1.5
6	ES	CESSD2	Semi-Conductor Devices & Circuits Lab	0	0	3	1.5
7	ES	CESBE4	Basic Electrical & Simulation Lab	0	0	3	1.5
8	ES	CESIT1	IT Workshop	0	0	3	1.5
9	MC	MC002	Yoga	0	0	0	Satisfactory
			Total Credits				19

Mandatory Course: YOGA
The student should undergo yoga meditation course offered by any organization or conducted by any college. Student should produce the completion certificate for clearing this course.

DEAN ACADEMICS
TKR College of Engineering & Technology
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B.TECH. COMPUTER SCIENCE & ENGINEERING - R18

COURSE STRUCTURE & SYLLABUS

B.Tech. III Semester

S.No.	Course Code	Course Title	L	T	P	Credits
1.	BBSM3	Probability & Statistics	3	0	0	3
2.	B53PC2	Data Structures	3	0	0	3
3.	B53PC3	Digital Logic Design	3	0	0	3
4.	B53PC4	Object Oriented Programming	3	0	0	3
5.	B53PC5	Digital Logic Design lab	0	0	3	1.5
6.	B53PC6	Data Structures Lab	0	0	3	1.5
7.	BE23	Advanced Communication Skills Lab	0	0	3	1.5
8.	B53PC7	Object Oriented Programming Lab	0	0	3	1.5
9.	BITW1	IT Workshop	0	0	3	1.5
Total Credits						**19.5**

B.Tech. IV Semester

S.No.	Course Code	Course Title	L	T	P	Credits
1.	BBSM5	Discrete Mathematics	3	0	0	3
2.	B54PC2	Computer Organization	3	0	0	3
3.	B54PC3	Python Programming	3	0	0	3
4.	B54PC4	Database Management System	3	0	0	3
5.	B54PC5	Software Engineering	3	0	0	3
6.	B54PC6	Python Programming Lab	0	0	3	1.5
7.	B54PC7	Database Management System Lab	0	0	3	1.5
8.	B54PC8	Software Engineering lab	0	0	3	1.5
Total Credits						**19.5**

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T K R COLLEGE OF ENGINEERING &TECHNOLOGY
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B.TECH. COMPUTER SCIENCE & ENGINEERING

COURSE STRUCTURE -R18

B.Tech.V Semester

S.No.	Course Code	Course Title	L	T	P	Credits
1.	BHSFM	Fundamentals of Management	3	0	0	3
2.	B55PC2	Operating Systems	3	0	0	3
3.	B55PC3	Computer Networks	3	0	0	3
4.	B55PC4	Theory of Computation	3	0	0	3
5.	B55PC5	Design and Analysis of Algorithms	3	0	0	3
6.	B55PC6	Web Technologies	3	0	0	1.5
7.	B55PC7	Operating Systems Lab	0	0	3	1.5
8.	B55PC8	Computer Networks Lab	0	0	3	1.5
9.	B55PC9	Web Technologies Lab	0	0	3	1.5
10.	B55MC1	Mandatory Course	0	3	0	0
		Total Credits				**21**

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IV YEAR I SEMESTER

S.No	Course code	Course Title	L	T	P	Credits
1	A57PC1	Network Security & Cryptography	4	0	0	4
2	A57PC2	Linux Programming	4	1	0	4
3	A57PC3	Machine Learning	3	1	0	3
4	A57PE4	1. Introduction to Big Data Analytics 2. Information Security Assessment and Audits 3. Mobile Computing	3	0	0	3
5	A57PE5	1.Internet Of Things 2.Design Patterns 3.Advance Computer Architecture	3	0	0	3
6	A57PE6	1 Software Process and Project Management 2. Computer Forensics 3. Information Retrieval Systems	3	0	0	3
7		Open Elective-3	3	1	0	3
8	A57PC8	Linux Programming Lab	0	0	4	2
9	A57PE8	Cutting Edge Technologies Lab	0	0	4	2
Total Credits						27

IV YEAR II SEMESTER

S.No	Course code	Course Title	L	T	P	Credits
1		Open Elective-4	3	0	0	3
2	A58PE2	1.Introduction to Predictive Analytics 2.Storage Area Networks 3.Information Security Incident Response and Management.	3	0	0	3
3	A58PE3	1.Adhoc Sensor Networks 2.E-Commerce 3. Human Computer Interaction	3	0	0	3
4	A58PW4	Industry Oriented Mini Project	0	0	0	2
5	A58SC5	Seminar	0	0	6	2
6	A58CV6	Comprehensive Viva	0	0	0	2
7	A58PW7	Major Project	0	0	18	9
Total Credits						24

TKR COLLEGE OF ENGINEERING AND TECHNOLOGY
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NAAC

B.TECH – COMPUTER SCIENCE & ENGINEERING
(ARTIFICIAL INTELLIGENCE AND MACHINE LEARNING)
Course Structure R-20

SEMESTER I

S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM2	Linear Algebra & Graph Theory	3	0	0	3
2	HS	CHSE1	English	2	0	0	2
3	BS	CBSC7	Chemistry	3	1	0	4
4	ES	CESEG1	Engineering Graphics	1	0	4	3
5	ES	CESCP1	C Programming for Problem Solving	2	1	0	3
6	HS	CHSE2	English Language & Communication Skills Lab	0	0	2	1
7	BS	CBSC8	Chemistry Lab	0	0	3	1.5
8	ES	CESCP2	C Programming for Problem Solving Lab	0	0	3	1.5
9	MC	MC001	Sports	0	0	0	Satisfactory
			Total Credits				19

Mandatory Course: SPORTS
The students need to participate in any physical activity such as sports, marathon, conducted by any college or any organization, students should produce participation certificate for clearing this course.

SEMESTER II

S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM1	Ordinary Differential Equations & Vector Calculus	3	0	0	3
2	BS	CBSP1	Applied Physics	3	1	0	4
3	ES	CESBE2	Basic Electrical Engineering	3	0	0	3
4	ES	CESSD1	Semi-Conductor Devices & Circuits	3	0	0	3
5	BS	CBSP2	Applied Physics Lab	0	0	3	1.5
6	ES	CESSD2	Semi-Conductor Devices & Circuits Lab	0	0	3	1.5
7	ES	CESBE4	Basic Electrical & Simulation Lab	0	0	3	1.5
8	ES	CESIT1	IT Workshop	0	0	3	1.5
9	MC	MC002	Yoga	0	0	0	Satisfactory
			Total Credits				19

Mandatory Course: YOGA
The student should undergo yoga meditation course offered by any organization or conducted by any college. Student should produce the completion certificate for clearing this course.

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TKR COLLEGE OF ENGINEERING AND TECHNOLOGY
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NAAC

B.TECH – COMPUTER SCIENCE & ENGINEERING (DATA SCIENCE)
Course Structure R-20

SEMESTER I

S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM2	Linear Algebra & Graph Theory	3	0	0	3
2	HS	CHSE1	English	2	0	0	2
3	BS	CBSC7	Chemistry	3	1	0	4
4	ES	CESEG1	Engineering Graphics	1	0	4	3
5	ES	CESCP1	C Programming for Problem Solving	2	1	0	3
6	ES	CESCP2	C Programming for Problem Solving Lab	0	0	3	1.5
7	HS	CHSE2	English Language & Communication Skills Lab	0	0	2	1
8	BS	CBSC8	Chemistry Lab	0	0	3	1.5
9	MC	MC001	Sports	0	0	0	Satisfactory
			Total credits				19

Mandatory Course: SPORTS
The students need to participate in any physical activity such as sports, marathon, conducted by any college or any organization, students should produce participation certificate for clearing this course.

SEMESTER II

S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM1	Ordinary Differential Equations & Vector Calculus	3	0	0	3
2	BS	CBSP1	Applied Physics	3	1	0	4
3	ES	CESSD1	Semi-Conductor Devices & Circuits	3	0	0	3
4	ES	CESBE2	Basic Electrical Engineering	3	0	0	3
5	BS	CBSP2	Applied Physics Lab	0	0	3	1.5
6	ES	CESSD2	Semi-Conductor Devices & Circuits Lab	0	0	3	1.5
7	ES	CESBE4	Basic Electrical & Simulation Lab	0	0	3	1.5
8	ES	CESIT1	IT Workshop	0	0	3	1.5
9	MC	MC002	Yoga	0	0	0	Satisfactory
			Total credits				19

Mandatory Course: YOGA
The student should undergo yoga meditation course offered by any organization or conducted by any college. Student should produce the completion certificate for clearing this course.

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TKR COLLEGE OF ENGINEERING AND TECHNOLOGY
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B.TECH – INFORMATION TECHNOLOGY
Course Structure R-20

SEMESTER I

S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM2	Linear Algebra & Graph Theory	3	0	0	3
2	HS	CHSE1	English	2	0	0	2
3	BS	CBSC7	Chemistry	3	1	0	4
4	ES	CESEG1	Engineering Graphics	1	0	4	3
5	ES	CESCP1	C Programming for Problem Solving	3	0	0	3
6	HS	CHSE2	English Language & Communication Skills Lab	0	0	2	1
7	BS	CBSC8	Chemistry Lab	0	0	3	1.5
8	ES	CESCP2	C Programming for Problem Solving Lab	0	0	3	1.5
9	MC	MC001	Sports	0	0	0	Satisfactory
			Total Credits				19

Mandatory Course: SPORTS
The students need to participate in any physical activity such as sports, marathon, conducted by any college or any organization, students should produce participation certificate for clearing this course.

SEMESTER II

S.No.	Class	Course Code	Name of the Subject	L	T	P	C
1	BS	CBSM1	Ordinary Differential Equations & Vector Calculus	3	0	0	3
2	BS	CBSP1	Applied Physics	3	1	0	4
3	ES	CESBE2	Basic Electrical Engineering	3	0	0	3
4	ES	CESSD1	Semi-Conductor Devices & Circuits	3	0	0	3
5	BS	CBSP2	Applied Physics Lab	0	0	3	1.5
6	ES	CESBE4	Basic Electrical & Simulation Lab	0	0	3	1.5
7	ES	CESSD2	Semi-Conductor Devices & Circuits Lab	0	0	3	1.5
8	ES	CESIT1	IT Workshop	0	0	3	1.5
9	MC	MC002	Yoga	0	0	0	Satisfactory
			Total Credits				19

Mandatory Course: YOGA
The student should undergo yoga meditation course offered by any organization or conducted by any college. Student should produce the completion certificate for clearing this course.

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T K R COLLEGE OF ENGINEERING & TECHNOLOGY

(Autonomous)

DEPARTMENT OF INFORMATION TECHNOLOGY -R18

COURSE STRUCTURE & SYLLABUS

III SEMESTER

S.No.	Course Code	Course Title	L	T	P	Credits
1.	BBSM3	Probability & Statistics	3	0	0	3
2.	B63PC1	Data Structures	3	0	0	3
3.	B63PC2	Digital Logic Design	3	0	0	3
4.	B63PC3	Object Oriented Programming	3	0	0	3
5.	B63PC4	Introduction to Analytics	3	0	0	3
6.	B63PC5	Data Structures Lab	0	0	3	1.5
7.	B63PC6	Object Oriented Programming Lab	0	0	3	1.5
8.	B63PC7	Digital Logic Design Lab	0	0	3	1.5
					Total	19.5

IV SEMESTER

S.No	Course Code	Course Title	L	T	P	Credits
1.	BBSM5	Discrete Mathematics	3	0	0	3
2.	B64PC2	Computer Organization	3	0	0	3
3.	B64PC3	Database Management Systems	3	0	0	3
4.	B64PC4	Software Engineering	3	0	0	3
5.	B64PC5	Formal Language & Automata Theory	3	0	0	3
6.	B64PC6	Database Management System Lab	0	0	3	1.5
7.	B64PC7	Software Engineering Lab	0	0	3	1.5
8.	BITW1	IT Workshop	0	0	3	1.5
		Total				19.5

T K R COLLEGE OF ENGINEERING & TECHNOLOGY
(Autonomous)
DEPARTMENT OF INFORMATION TECHNOLOGY -R18
B.TECH COURSE STRUCTURE & SYLLABUS

V SEMESTER

S.No.	Course Code	Course Title	L	T	P	Credits
1	B65PC1	Operating Systems	3	0	0	3
3	B65PC2	Computer Networks	3	0	0	3
4	B65PC3	Data Warehousing & Data Mining	3	0	0	3
5	B65PC4	Design and Analysis of Algorithms	3	0	0	3
6	BHSFM	Fundamentals Of Management	3	0	0	3
7	B65PC6	Linux Programming	3	0	0	3
8	B65PC7	Operating Systems and Computer Networks lab	0	0	3	1.5
9	B65PC8	Linux Programming Lab	0	0	3	1.5
10	B65MC1	*Professional Ethics	0	3	0	0
Total Credits						**21**

VI SEMESTER

S.No.	Course Code	Course Title	L	T	P	Credits
1	B66PC1	Web Technologies	3	0	0	3
2	B66PC2	Object Oriented Analysis & Design	3	0	0	3
3	B66PC3	Compiler Design	3	0	0	3
4	B66PE4	1.Software Testing Methodologies 2.Software Project Management 3.Software Metrics and Quality Assurance	3	0	0	3
5	B66OE5	O.E – I	3	0	0	3
6	B66OE6	O.E – II	3	0	0	3
8	B66PC7	Web Technologies Lab	0	0	3	1.5
8	B66PC8	Case Tools Lab	0	0	3	1.5
9	B66MC2	*Environmental Science	0	3	0	0
Total Credits						**21**

TKR COLLEGE OF ENGINEERING & TECHNOLOGY
(Autonomous)
DEPARTMENT OF INFORMATION TECHNOLOGY-R17

COURSE STRUCTURE & SYLLABUS

IV YEAR I SEMESTER

S. No	Course Code	Course Title	L	T	P	Credits
1	A67PC1	Data Warehousing & Data Mining	4	0	0	3
2	A67PC2	Linux Programming	4	0	0	3
3	A67PC3	Python Programming	4	0	0	3
4		**Open Elective-III**	3	0	0	3
5	A67PE5	**Professional Elective-IV** 1. InformationSecurityAssessmentsAnd Audits (SA-II) 2. Big DataAnalytics-II 3. Human ComputerInteraction	3	0	0	3
6	A67PE6	**Professional Elective-V** 1. Semantic Web & SocialNetworks 2. Cloud Computing 3. DistributedDatabases	3	0	0	3
3	A67PE7	**Professional Elective-VI** 1. SoftwareProcessAndProjectManagement 2. ArtificialIntelligence 3. E-Commerce	3	0	0	3
7	A67PC7	Data Warehousing & Data Mining Lab	0	0	4	2
8	A67PC8	Linux Lab	0	0	4	2
9	A67PC9	Python Programming Lab	0	0	4	2
		Total Credits				27

IV YEAR II SEMESTER

S.No	Course Code	Course Title	L	T	P	Credits
1	A68PE1	**Professional Elective-VII** 1. Design Patterns 2. Internet Of Things 3. Advanced Computer Architecture	3	0	0	3
2	A68PE2	**Professional Elective-VIII** 1. PredictiveAnalytics 2. InformationSecurityIncidentResponseAnd Management(SA-III) 3. Software TestingMethodologies	3	0	0	3
3		**Open Elective-IV**	3	0	0	3
4	A68PW4	Industry Oriented Mini Project	0	0	4	2
5	A68SE5	Seminars	0	0	4	2
6	A68CV6	Comprehensive Viva	0	0	4	2
7	A68PW7	Major Project	0	0	18	9
		Total Credits				24

* Satisfactory/Unsatisfactory

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M.TECH - POWER ELECTRONICS
Course Structure R-19

I YEAR – I SEMESTER

S. No	Course Code	Course Title	Int. Marks	Ext. Marks	L	P	C
1	B121PC1	Machine Modeling and Analysis	30	70	3	--	3
2	B121PC2	Modern Control Theory	30	70	3	--	3
3	B121PC3	Power Electronic Devices and Circuits	30	70	3	--	3
4	B121PE4	1. Special Machines 2. HVDC Transmission 3. Programmable Logic Controllers and their Applications	30	70	3	--	3
5	B121PE5	1. Microcontrollers and Applications 2. Embedded Systems 3. Digital Control Systems	30	70	3	--	3
6	B121PC6	Power Converters Simulation Lab	30	70	--	4	2
Total Credits					15	4	17

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M.TECH - POWER ELECTRONICS
Course Structure R-19

I YEAR – II SEMESTER

S. No	Course Code	Course Title	Int. Marks	Ext. Marks	L	P	C
1	B122PC1	Advanced Power Electronic Converters	30	70	3	--	3
2	B122PE2	1. Power Quality 2. Power Electronic Control of DC Drives 3. Switched Mode Power Supplies(SMPS)	30	70	3	--	3
3	B122PE3	1. Flexible AC Transmission Systems 2. Industrial Load Modeling and Control 3. Dynamics of Electrical Machines	30	70	3	--	3
4	B122PE4	1. Power Electronic Control of AC Drives. 2. Advanced Digital Signal Processing 3. Reliability Engineering	30	70	3	--	3
5	B122PC5	Electrical Drives Lab	30	70	--	4	2
6	B122PC6	Machine Modeling Analysis Lab	30	70	--	4	2
7	B122PC7	Advanced Power Electronic Converters Lab	30	70	--	4	2
8	Audit-I	Audit-I	--	--	2	--	0
Total Credits					**14**	**12**	**18**

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M.TECH - POWER ELECTRONICS
Course Structure R-19

II YEAR – I SEMESTER

S. No	Course Code	Course Title	Int. Marks	Ext. Marks	L	P	C
1	B223OE1	1. Business Analytics 2. Industrial Safety 3. Operations Research 4. Cost Management of Engineering Projects 5. Composite Materials 6. Energy from Waste	30	70	3	--	3
2	B223RM2	Research Methodology and IPR	30	70	2	--	2
3	Audit-II	Audit-II			2		0
4		Mini Project with Seminar	100	--	--	6	3
5	Major Project	Phase-I Dissertation	100	--	--	18	9
Total Credits					**7**	**24**	**17**

II YEAR – II SEMESTER

S. No	Course Code	Course Title	Int. Marks	Ext. Marks	L	P	C
1	Major Project	Phase-II Dissertation	---	100	---	32	16
Total Credits						**32**	**16**

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M.TECH - COMPUTER SCIENCE & ENGINEERING
Course Structure - R 19

I YEAR – I SEMESTER

Course Code	Course Title	Int. marks	Ext. marks	L	P	C
B251PC1	Data Structures and Algorithms	30	70	3	--	3
B251PC2	Fundamentals of Data Science	30	70	3	--	3
B251PC3	Distributed Systems	30	70	3	--	3
B251PE1	1. Information Security 2. Mobile Applications Development 3. Wireless Networks 4. Multimedia and Gaming	30	70	3	--	3
B251PE2	1. Machine Learning 2. Natural Language Processing 3. Design Patterns 4. Advanced Computer Architecture	30	70	3	--	3
B251PC4	Software Lab-1	30	70	--	4	2
Total Credits				**15**	**4**	**17**

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M.TECH - COMPUTER SCIENCE & ENGINEERING
Course Structure - R 19

I YEAR – II SEMESTER

Course Code	Course Title	Int. marks	Ext. marks	L	P	C
B252PC5	Network Programming	30	70	3	--	3
B252PE3	1. Cyber Security 2. Advanced Databases 3. Social Network Analysis 4. Cloud Computing	30	70	3	--	3
B252PE4	1. Deep Learning 2. Internet of Things 3. Service Oriented Computing 4. Distributed Computing	30	70	3	--	3
B252PE5	1. Storage Area Networks 2. Mobile Computing 3. Computer Forensics 4. Scripting Languages	30	70	3	--	3
B252PC6	Software Lab-2	30	70	--	4	2
B252PC7	Software Lab-3	30	70	--	4	2
B252PC8	Software Lab-4	30	70	--	4	2
B252AT1	Audit Course-I			2		
Total Credits				14	12	18

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NAAC

M.TECH - COMPUTER SCIENCE & ENGINEERING
Course Structure - R 19

II YEAR - I SEMESTER

Course Code	Course Title	Int. marks	Ext. marks	L	P	C
B253OE1	Open Elective1	30	70	3	--	3
B253RM	Research Methodology	30	70	2	--	2
B253S & MPW	Seminar & Mini Project Work	100		--	6	3
B253PW	Phase-I	100	--	--	18	9
B252AT2	Audit Course-II			2		
Total Credits		---	---	**7**	**24**	**17**

II YEAR – II SEMESTER

Course Code	Course Title	Int. marks	Ext. marks	L	P	C
B254PW	Phase-II	--	100	--	32	16
Total Credits		--	--	--	**32**	**16**

Audit Courses - I
1) English for Research Paper Writing
2) Disaster Management
3) Value Education
4) Constitution of India

Audit Course - II
1) Pedagogical Studies
2) Soft Skills
3) Stress Management by YOGA
4) Personality Development through Life Enlightenment Skills

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NAAC

MASTER OF BUSINESS ADMINISTRATION (Regular)
COURSE STRUCTURE- R 20

I Year I Semester

Course Code	Course Title	Int. Marks	Ext. Marks	L	T	P	Credits
C141PC1	Management and Organizational Behavior	30	70	3	1	0	4
C141PC2	Business Economics	30	70	3	1	0	4
C141PC3	Financial Accounting & Analysis	30	70	3	1	0	4
C141PC4	Research Methodology and Statistical Analysis	30	70	3	1	0	4
C141PC5	Business Law and Environment	30	70	3	1	0	4
Open Elective-I C141OE6	6A Business Ethics and Corporate Governance 6B Project Management 6C Technology Management 6D Cross Cultural Management	30	70	3	0	0	3
C141PC7	Business Communication Lab.	30	70	0	0	4	2
	TOTAL	**210**	**490**	**18**	**5**	**4**	**25**

I Year II Semester

Course Code	Course Title	Int. Marks	Ext. Marks	L	T	P	Credits
C142PC1	Human Resource Management	30	70	3	1	0	4
C142PC2	Marketing Management	30	70	3	1	0	4
C142PC3	Financial Management	30	70	3	1	0	4
C142PC4	Quantitative Analysis for Business Decisions	30	70	3	1	0	4
C142PC5	Management Information Systems	30	70	3	1	0	4
C142PC6	Entrepreneurship	30	70	3	1	0	4
Open Elective-II C142OE7	7A Total Quality Management 7B Marketing Research 7C International Business 7D Logistics & Supply Chain Management	30	70	3	0	0	3
C142PC8	Statistical Data Analysis Lab	30	70	0	0	4	2
	TOTAL	**240**	**560**	**21**	**6**	**4**	**29**

Internship during summer vacation (after Semester –II)

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NAAC

MASTER OF BUSINESS ADMINISTRATION (MBA) R18
From Academic Year 2018- 19 Admitted batch
COURSE STRUCTURE AND SYLLABUS

III Semester

Course Code	Course title	Int. marks	Ext. marks	L	T	P	C
B143PC1	Production &Operations Management	30	70	3	1	0	3
B143PC2	Innovation Management	30	70	3	1	0	3
B143OE3	**B141OE3A:** Project Management **B141OE3B:** Technology management **B141OE3C:** Rural Marketing **B141OE3D:** Indian Ethos in Management	30	70	3	0	0	3
B143PE4	(MRKG/HRM/FIN/ Entrepreneurship)	30	70	3	1	0	4
	B143M1: Digital Marketing						
	B143F1: Security Analysis and portfolio Management						
	B143H1: Performance Management Systems						
	B143E1: Start up Management						
B143PE5	(MRKG/HRM/FIN/ Entrepreneurship)	30	70	3	1	0	4
	B143M2: Advertising and Sales management						
	B143F2: Financial Institutions, Markets & Services						
	B143H2: Learning and Development						
	B143E2 MSME Management						
B143PE6	(MRKG/HRM/FIN/ Entrepreneurship)	30	70	3	1	0	4
	B143M3: Consumer Behavior						
	B143F3: Strategic Management Accounting						
	B143H3: Management of Industrial Relations						
	B143E3: Family Business Management						
B143PC7	Summer Internship	100		0	3	2	
	TOTAL	280	420	18	5	3	23

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MASTER OF BUSINESS ADMINISTRATION (MBA) R18
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COURSE STRUCTURE AND SYLLABUS

IV Semester

Course Code	Course title	Int. marks	Ext. marks	L	T	P	C
B144PC1	Strategic Management	30	70	3	1	0	3
B144OE2	**B144OE2A:** Corporate Governance	30	70	3	0	0	3
	B144OE2B: International Business						
	B144OE2C: Supply Chain Management						
	B144OE2D: Computing Skills						
B144PE3	(MRKG/HRM/FIN/ Entrepreneurship)	30	70	3	1	0	4
	B144M1: Customer Relationship Management						
	B144F1: International Finance Management						
	B144H1: International Human Resource Management						
	B144E1: Entrepreneurial Finance						
B144PE4	(MRKG/HRM/FIN/ Entrepreneurship)	30	70	3	1	0	4
	B144M2: International Marketing						
	B144F2: Strategic Investment and Financing Decisions						
	B144H2: Leadership and Change Management						
	B144E2 Entrepreneurial Marketing						
B144PE5	(MRKG/HRM/FIN/Entrepreneurship)	30	70	3	1	0	4
	B144M3: Marketing of Services						
	B144F3: Risk Management						
	B144H3: Talent and Knowledge Management						
	B144E3: Creativity Innovation and Entrepreneurship						
B144PC6	Pre Submission of Project Work	(100) (NCR)	-	0	0	0	0
B144PC7	Comprehensive Viva-Voce	-	100	0	1	2	3
B144PC8	Main Project Viva-Voce	50	150	0	1	3	4
	TOTAL	200 (100 pre submission)	600	15	5	5	25

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