

COs & POs

2021-22

ODD SEMESTER



DEPARTMENT OF ELECTRICAL & ELECTRONICS ENGINEERING

SUBJECT	ELECTRIC CIRCUIT ANALYSIS	SUBJECT CODE	18EE32
---------	---------------------------	--------------	--------

COURSE OUTCOME

- CO1:** Understand the basic concepts, basic laws and methods of analysis of DC and AC networks and reduce the complexity of network using source shifting, source transformation and network reduction using transformations
- CO2:** Solve complex electric circuits using network theorems
- CO3:** Discuss resonance in series and parallel circuits and also the importance of initial conditions and their evaluation
- CO4:** Synthesize typical waveforms using Laplace transformation
- CO5:** Solve unbalanced three phase systems and also evaluate the performance of two port networks.

PROGRAM OUTCOMES

- P01** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- P02** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- P03** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- P04** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- P05** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- P06** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- P07** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- P08** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- P09** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- P010** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- P011** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- P012** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. Ram
H. O.
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106

Principal
PRINCIPAL
S.I.E.T., TUMKUR

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	Mr. G. H. RAVIKUMAR											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER			III	SECTION			EEE			
SUBJECT	ELECTRIC CIRCUIT ANALYSIS					SUBJECT CODE			18EE32			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	2	3	2	-	-	-	-	-	-	-	-	2
CO2	2	3	2	-	-	-	-	-	-	-	-	2
CO3	1	3	1	-	-	-	-	-	-	-	-	1
CO4	3	3	3	-	-	-	-	-	-	-	-	3
CO5	2	3	2	-	-	-	-	-	-	-	-	2
AVERAGE	2	3	2	-	-	-	-	-	-	-	-	2
OVERALL MAPPING OF SUBJECT												2.25

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	55.78	1.115	1.673	1.115	-	-	-	-	-	-	-	-	1.115
CO2	51.27	1.025	1.538	1.025	-	-	-	-	-	-	-	-	1.025
CO3	48.71	0.487	1.461	0.487	-	-	-	-	-	-	-	-	0.487
CO4	53.89	1.616	1.616	1.616	-	-	-	-	-	-	-	-	1.616
CO5	53.45	1.069	1.603	1.069	-	-	-	-	-	-	-	-	1.069
AVERAGE		1.062	1.578	1.062	-	-	-	-	-	-	-	-	1.062
FINAL ATTAINMENT LEVEL													1.191

G. H. Ravi
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering &
 TUMKUR-572106

Principal
 PRINCIPAL
 SIET, TUMKURU.

Academic year	2021-22			SEM III			Total strength			8			Subject				CTRIC CIRCUIT ANAL				Subject Code				18EE32																		
SEM III	IA TEST 1(30M)			IA TEST 2(30M)			IA TEST 3(30M)			ASSIGNMENT / QUIZ(10 M)				SEE MARKS(60)				Total COs ATTAINMENT				% of individual CO					SEE Tot																
USN	CO1	CO2	TOTAL	CO3	CO4	TOTAL	CO4	CO5	TOTAL	CO1	CO2	CO3	CO4	CO5	CO1-1	CO2	CO3	CO4	CO5	CO1-29	CO2-34	CO3-34	CO4-34	CO5-49	CO1	CO2	CO3	CO4	CO5	68M													
15V19EE003	10	10	20	10	9	19	6	6	12	2	2	2	2	2	5.2	5.2	5.2	5.2	5.2	17.2	17.2	16.2	16.2	13.2	59.31	50.59	47.65	47.65	26.94	26													
15V19EE018	11	10	21	7	7	14	10	13	23	2	2	2	2	2	4.8	4.8	4.8	4.8	4.8	17.8	23.8	11.8	16.8	19.8	61.38	54.09	47.59	37.93	68.28	24													
15V20EE001	0	0	0	4	4	8	6	6	12	2	2	2	2	2	4.2	4.2	4.2	4.2	4.2	8.2	10.2	10.2	12.2	12.2	21.38	23.18	35.17	42.07	42.07	23													
15V20EE002	10	10	20	6	5	11	5	6	11	2	2	2	2	2	1.8	1.8	1.8	1.8	1.8	13.8	19.8	8.8	8.8	9.8	47.59	45.00	30.34	30.34	33.79	9													
15V20EE003	14	13	27	7	6	13	10	10	20	2	2	2	2	2	8.2	8.2	8.2	8.2	8.2	24.2	30.2	16.2	20.2	20.2	83.45	68.64	55.86	69.66	69.66	41													
15V20EE004	12	11	23	10	10	20	7	7	14	2	2	2	2	2	4.8	4.8	4.8	4.8	4.8	18.8	27.8	16.8	11.8	13.8	64.83	63.18	57.83	47.59	47.59	24													
15V20EE006	12	11	23	13	13	26	13	14	27	2	2	2	2	2	7.8	7.8	7.8	7.8	7.8	21.8	33.8	22.8	22.8	23.8	75.17	76.82	78.62	78.62	82.07	39													
15V20EE007	3	2	5	4	4	8	10	10	20	2	2	2	2	2	4.6	4.6	4.6	4.6	4.6	9.6	12.6	10.6	16.6	16.6	33.10	28.64	36.55	37.24	37.24	23													
																									55.78	51.27	48.71	53.89	53.45	25.875													
																														43.125													

G. H. Ravi

Head of the Department
 Electrical & Electronics Engineering
 Sardar Institute of Engineering & Technology
 TUMKUR-572106.

Principal
 S. R. Srinivasan
 PRINCIPAL
 S. R. Srinivasan
 TUMKUR

**DEPARTMENT OF EEE**3^r 21-22

SUBJECT	TRANSFORMER & GENERATOR	SUBJECT CODE	18EE33
----------------	------------------------------------	---------------------	---------------

COURSE OUTCOME

- CO1.** Explain conduction and breakdown phenomenon in gases, liquid dielectrics and breakdown Phenomenon in solid dielectrics.
- CO2.** Summarize generation of high voltages and currents
- CO3.** Outline measurement techniques for high voltages and currents
- CO4.** Summarize overvoltage phenomenon and insulation coordination in electric power systems.
- CO5.** Explain non-destructive testing of materials and electric apparatus, high-voltage testing of electric apparatus

PROGRAM OUTCOMES

- PO1** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- PO2** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- PO6** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. Rao
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.

(Signature)
Principal

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	MRS. SWETHA T M											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER		III	SECTION							
SUBJECT	TRANSFORMER & GENERATOR				SUBJECT CODE			18EE33				
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	3	3	3	2			2				2	1
CO2	2	3	3	2			2				2	1
CO3	1	3	3	1			2				2	1
CO4	2	3	3	2			2				2	1
CO5	2	3	3	2			2				2	1
AVERAGE	2	3	3	1.8			2				2	1
OVERALL MAPPING OF SUBJECT												2.11

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	58.4	1.75	1.75	1.75	1.17			1.17				1.17	0.58
CO2	50.3	1.01	1.51	1.51	1.01			1.01				1.01	0.50
CO3	67.9	0.68	2.04	2.04	0.68			1.36				1.36	0.68
CO4	65.7	1.31	1.97	1.97	1.31			1.31				1.31	0.66
CO5	55.4	1.11	1.66	1.66	1.11			1.11				1.11	0.55
AVERAGE	59.54	1.172	1.786	1.786	1.055			1.191				1.191	0.595
FINAL ATTAINMENT LEVEL													1.25

G. H. Rana

Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Tech
TUMKUR-572108.

(Signature)
PRINCIPAL
TUMKURU.



SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY

SIRA ROAD, TUMKUR- 572 106.

DEPARTMENT OF ELECTRICAL & ELECTRONICS ENGINEERING

SUBJECT	ANALOG ELECTRONIC CIRCUITS	SUBJECT CODE	18EE34
---------	----------------------------	--------------	--------

COURSE OUTCOME

CO1	Obtain the output characteristics of clipper and clamper circuits
CO2	Design and compare biasing circuits for transistor amplifiers & explain the transistor switching.
CO3	Explain the concept of feedback, its types and design of feedback circuits
CO4	Design and analyze the power amplifier circuits and oscillators for different frequencies.
CO5	Design and analysis of FET and MOSFET amplifiers.

PROGRAM OUTCOMES

- P01** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- P02** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- P03** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- P04** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- P05** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modelling to complex engineering activities.
- P06** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- P07** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- P08** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- P09** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- P010** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- P011** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- P012** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. Rama
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.

(Signature)
PRINCIPAL
SIET, TUMAKURU.

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	Mr. RAJESH KUMAR. V											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER		III	SECTION			EEE				
SUBJECT	ANALOG ELECTRONIC CIRCUITS					SUBJECT CODE			18EE34			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	2	2										2
CO2	2	2										2
CO3	2	2										2
CO4	2	2										2
CO5	2	2										2
AVERAGE	2	2										2
OVERALL MAPPING OF SUBJECT												2

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	52.33	1.046	1.046										1.046
CO2	54.39	1.087	1.087										1.087
CO3	53.22	1.064	1.064										1.064
CO4	58.82	1.176	1.176										1.176
CO5	63.00	1.26	1.26										1.26
AVERAGE		1.126	1.126										1.126
FINAL ATTAINMENT LEVEL													1.126

B. H. Ravi

Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Technology
 TUMAKURU-572108

Manjunath
 PRINCIPAL
 S.I.E.T., TUMAKURU.



SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY

SIRA ROAD, TUMKUR- 572 106.

DEPARTMENT OF ELECTRICAL & ELECTRONICS ENGINEERING

SUBJECT	DIGITAL SYSTEM DESIGN	SUBJECT CODE	18EE35
---------	-----------------------	--------------	--------

COURSE OUTCOME

CO1	Develop simplified switching equation using Karnaugh Maps and Quine McClusky techniques.
CO2	Design Multiplexer, Encoder, Decoder, Adder, Subtractors and Comparator as digital combinational control circuits.
CO3	Design flip flops, counters, shift registers as sequential control circuits.
CO4	Develop Mealy/Moore Models and state diagrams for the given clocked sequential circuits.
CO5	Explain the functioning of Read only and Read/Write Memories, Programmable ROM EPROM and Flash memory

PROGRAM OUTCOMES

- P01** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- P02** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- P03** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- P04** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- P05** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modelling to complex engineering activities.
- P06** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- P07** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- P08** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- P09** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- P010** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- P011** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- P012** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.


G. H. R. a z
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.

Principal Signature
PRINCIPAL
SIR

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	Mrs. NAYANA. M. S											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER			III	SECTION			EEE			
SUBJECT	DIGITAL SYSTEM DESIGN					SUBJECT CODE			18EE35			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	2	2										2
CO2	2	2										2
CO3	2	2										2
CO4	2	2										2
CO5	2	2										2
AVERAGE	2	2										2
OVERALL MAPPING OF SUBJECT												2

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	41.98	0.839	0.839										0.839
CO2	41.56	0.831	0.831										0.831
CO3	46.06	0.921	0.921										0.921
CO4	56.56	1.131	1.131										1.131
CO5	60.16	1.203	1.203										1.203
AVERAGE		0.985	0.985										0.985
FINAL ATTAINMENT LEVEL													0.985


 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Tech.
 TUMKUR-572106.


 PRINCIPAL
 SET. TUMKUR.

DEPARTMENT OF EEE


SUBJECT	Electrical & Electronic Measurement	SUBJECT CODE	18EE36
----------------	--	---------------------	---------------


COURSE OUTCOME

CO1	Measure resistance, inductance and capacitance using bridges and determine earth resistance.
CO2	Explain the working of various meters used for measurement of Power, Energy & understand the adjustments, calibration & errors in energy meters.
CO3	Understand methods of extending the range of instruments & instrument transformers.
CO4	Explain the working of different electronic instruments.
CO5	Explain the working of different display and recording devices.

PROGRAM OUTCOME

- PO1** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- PO2** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- PO6** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

S. H. R. 
Head of the Department
Electrical & Electronics Engineering
Shri Devi Institute of Engineering & Technology
TUMKUR-572106.


PRINCIPAL
Shri Devi Institute of Engineering & Technology

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	UMABAI											
BRANCH	EEE			ACADEMIC YEAR			2021-2022					
COURSE	B.E	SEMESTER		III	SECTION							
SUBJECT	Electrical & Electronic Measurement					SUBJECT CODE		18EE36				
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	3	2	2	2	2	2						1
CO2	3	2	2	2	2	2						1
CO3	3	2	3	2	2	2						1
CO4	3	2	2	2	2	2						1
CO5	3	2	2	2	2	2						2
AVERAGE	3	2	2.2	2	2	2						1.2
OVERALL MAPPING OF SUBJECT												2.05

CO AND PO ATTAINMENT


	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	43	1.29	0.86	0.86	0.86	0.86	0.86						0.43
CO2	44	1.32	0.88	0.88	0.88	0.88	0.88						0.44
CO3	60	1.8	1.2	1.8	1.2	1.2	1.2						0.6
CO4	49	1.47	0.98	0.98	0.98	0.98	0.98						0.49
CO5	49	1.47	0.98	0.98	0.98	0.98	0.98						0.49
AVERAGE	49	1.47	0.98	1.1	0.98	0.98	0.98						0.49
FINAL ATTAINMENT LEVEL													0.997

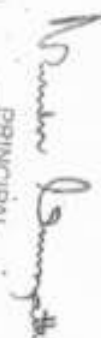
G. H. Rane
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Technology
 TUMKUR-572106.

Principals Signature
 PRINCIPAL
 SIET., TUMAKURU

SEM: V, EEE	IA TEST 1			IA TEST 2			IA TEST 3			Assignment						SEE					TOTAL					AVERAGE					
	USN	CO1	CO2	TOTAL	CO3	CO4	TOTAL	CO4	CO5	0	CO1	CO2	CO3	CO4	CO5	TOTAL	CO1	CO2	CO3	CO4	CO5	TOTAL	CO1(34)	CO2(34)	CO3(34)	CO4(34)	CO5(34)	CO1	CO2	CO3	CO4
15V19EE003	10	12	22	10	13	23	12	12	24	2	2	2	2	2	10	4.2	4.2	4.2	4.2	4.2	21	16.2	18.2	16.2	31.2	18.2	48	54	48	58	54
15V19EE018	10	12	22	10	7	17	13	13	26	2	2	2	2	2	10	4.6	4.6	4.6	4.6	4.6	23	16.6	18.6	16.6	26.6	19.6	49	55	49	49	58
15V20EE001	0	0	0	9	11	14	10	14	24	2	2	2	2	2	10	2.4	2.4	2.4	2.4	2.4	12	4.4	4.4	13.4	25.4	18.4	13	13	39	47	54
15V20EE002	5	4	9	12	8	20	10	4	14	2	2	2	2	2	10	3.6	3.6	3.6	3.6	3.6	18	10.6	9.6	17.6	23.6	9.6	31	28	52	44	28
15V20EE003	10	15	25	13	13	26	10	14	24	2	2	2	2	2	10	6.2	6.2	6.2	6.2	6.2	31	18.2	23.2	21.2	31.2	22.2	54	68	62	58	65
15V20EE004	9	9	18	20	7	27	12	13	25	2	2	2	2	2	10	4.6	4.6	4.6	4.6	4.6	33	15.6	15.6	26.6	25.6	19.6	46	46	78	47	58
15V20EE006	16	10	26	17	10	27	17	11	28	2	2	2	2	2	10	5	5	5	5	5	25	23	17	24	34	18	68	50	71	63	53
15V20EE007	3	4	7	20	7	27	0	0	0	2	2	2	2	2	10	6	6	6	6	6	30	11	12	28	15	8	32	35	82	28	24
TOTAL	63	66	129	111	76	181	84	81	165	16	16	16	16	16	80	36.6	36.6	36.6	36.6	36.6	193	115.6	118.6	163.6	212.6	133.6	340	349	481.2	393.7	392.941
Total students	8	8	8	8	8	8	8	8	8	6	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8
Average	1.25	1.5	2.75	1.25	1.63	2.875	1.5	1.5	3	2	2	2	2	2	10	0.53	0.53	0.53	0.53	0.53	2.63	2.03	2.28	2.03	3.90	2.28	43	44	60	49	49

**ELECTRICAL & ELECTRONICS MEASUREMENTS
2021-22
18EE36**


 G. H. Rana
 Associate Professor
 Electrical & Electronics Engineering
 Student Institute of Engineering & Technology
 TUMKUR-572106


 Pravin Sampath
 PRINCIPAL
 Student Institute of Engineering & Technology
 TUMKUR-572106



SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY

SIRA ROAD, TUMKUR- 572 106.

DEPARTMENT OF ELECTRICAL AND ELECTRONICS ENGG

SUBJECT	MANAGEMENT & ENTREPRENEURSHIP	SUBJECT CODE	18EE51
---------	-------------------------------	--------------	--------

COURSE OUTCOME

CO1	Explain the field of management, task of the manager, planning and steps in decision making
CO2	Discuss the structure of organization, importance of staffing, leadership styles, modes of communication, techniques of coordination and importance of managerial control in business
CO3	Explain the concepts of entrepreneurship and a businessman's social responsibilities towards different groups
CO4	Show an understanding of role of SSI's in the development of country and state/central level institutions/agencies supporting business enterprises
CO5	Discuss the concepts of project management, capital budgeting, project feasibility studies, need for project report and new control techniques

PROGRAM OUTCOMES

- P01 Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- P02 Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- P03 Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- P04 Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- P05 Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- P06 The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- P07 Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- P08 Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- P09 Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- P010 Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- P011 Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- P012 Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.


G. H. Rao
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.

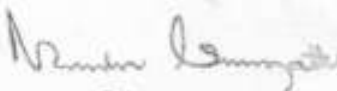

PRINCIPAL
SIET, TUMAKURU.


COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	CHARAN C											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER			V	SECTION			EEE			
SUBJECT	MANAGEMENT & ENTREPRENEURSHIP					SUBJECT CODE			18EE51			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
	1	2	3	4	5	6	7	8	9	10	11	12
CO1	-	-	-	-	-	-	-	3	2	3	-	2
CO2	-	-	-	-	-	2	-	2	3	3	-	2
CO3	-	-	-	-	-	3	-	2	3	2	-	2
CO4	-	-	-	-	-	-	-	2	2	2	-	3
CO5	-	-	-	-	-	-	-	2	3	3	2	2
AVERAGE	-	-	-	-	-	2.5	-	2.2	2.6	2.6	2	2.2
OVERALL MAPPING OF SUBJECT												2.35

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	44.30								0.97	1.15	1.15		0.97
CO2	29.83						0.74		0.65	0.77	0.77		0.65
CO3	44.30						1.10		0.97	1.15	1.15		0.97
CO4	44.30								0.97	1.15	1.15		0.97
CO5	44.30								0.97	1.15	1.15	0.88	0.97
AVERAGE	47.37						0.92		0.90	1.22	1.22	0.88	0.90
FINAL ATTAINMENT LEVEL													1.00


 G. H. Rave
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering &
 TUMKUR-572106.


 PRINCIPAL
 SIET, TUMAKURU.

 SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY SIRA ROAD, TUMKUR- 572 106.
--

DEPARTMENT OF ELECTRICAL AND ELECTRONICS ENGG

SUBJECT	MICROCONTROLLER	SUBJECT CODE	18EE52
---------	-----------------	--------------	--------

COURSE OUTCOME

CO1	Outline the 8051 architecture, registers, internal memory organization, addressing modes
CO2	Discuss 8051 addressing modes, instruction set of 8051, accessing data and I/O port programming
CO3	Develop 8051C programs for time delay, I/O operations, I/O bit manipulation, logic and arithmetic operations, data conversion and timer/counter programming.
CO4	Summarize the basics of serial communication and interrupts, also develop 8051 programs for serial data communication and interrupt programming
CO5	Program 8051 to work with external devices for ADC, DAC

PROGRAM OUTCOMES

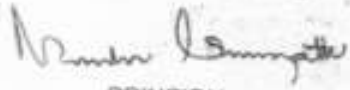
- PO1** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- PO2** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- PO6** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	V.RAJESH KUMAR											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER			V	SECTION			EEE			
SUBJECT	MICROCONTROLLER					SUBJECT CODE			18EE35			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
	1	2	3	4	5	6	7	8	9	10	11	12
CO1	2	2										
CO2	2	2	2									
CO3	2		2									
CO4	2	2	2									
CO5	2											
AVERAGE	2	1.66	2									
OVERALL MAPPING OF SUBJECT												1.8

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	41.58	0.83	0.69										
CO2	38.59	0.77	0.64	0.77									
CO3	40.11	0.80		0.80									
CO4	40.11	0.80	0.66	0.80									
CO5	40.11	0.80											
AVERAGE	40.1	0.8	1.55	0.79									
FINAL ATTAINMENT LEVEL													1.04


 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering &
 TUMKUR-572106.


 PRINCIPAL
 SIET, TUMAKURU.

Academic year		SEM I (B.E.)						V. RAJESH KUMAR																										
2020-21		SEM			5			Total strength			19			Subject			MICROCONTROLLER						Subject Code			ISEESZ								
SEM (ARC. 6A)		IA TEST (RBM)			IA TEST (RMM)			IA TEST (RMM)			ASSIGNMENT / QUIZ (10 M)			SEE MARKS(60)						Total CAs ATTAINMENT			% of individual CA											
LSN	CO1	CO2	TOTAL	CO1	CO2	TOTAL	CO1	CO2	TOTAL	CO1	CO2	CO4	CO5	CO1+12	CO2	CO3	CO4	CO5	CO1-29	CO1-44	CO1-29	CO1-29	CO1	CO2	CO3	CO4	CO5							
19V19E001	5.5	5.5	11	5.5	5.5	11	5.5	5.5	11	2	2	2	2	2	7	8.2	8.2	8.2	8.2	14.5	15.2	15.7	15.7	15.7	50	48.1818	54.1379	54.1379	54.1379					
19V19E001	5.6	5.6	11.2	5.6	5.6	11.2	5.6	5.6	11.2	2	2	2	2	2	4.8	6.6	6.6	6.6	6.6	12.4	19.8	14.2	14.2	14.2	42.7586	45	48.9655	48.9655	48.9655					
19V19E002	5.2	5.1	10.6	5.1	5.1	10.6	5.1	5.1	10.6	2	2	2	2	2	1.8	6.6	6.6	6.6	6.6	9.1	21.2	15.9	15.9	15.9	31.1791	48.1818	54.8275	54.8275	54.8275					
19V19E005	5.6	5.3	10.9	5.3	5.3	10.6	5.3	5.3	10.6	2	2	2	2	2	6.6	8	8	8	8	14	20.6	15.3	15.3	15.3	48.2758	46.8288	52.7586	52.7586	52.7586					
19V19E006	5.1	5.1	10.2	4.2	4.2	8.4	4.2	4.2	8.4	2	2	2	2	2	4.4	5	5	5	5	11.5	16.3	11.2	11.2	11.2	39.6517	17.0954	38.4288	38.4288	38.4288					
19V19E007	5.8	6	11.8	6	6	12	6	6	12	2	2	2	2	2	7.2	8.2	8.2	8.2	8.2	14.8	20.2	14.2	14.2	14.2	51.0348	45.8099	48.9655	48.9655	48.9655					
19V19E008	5.5	5.5	11	4.5	4.5	9	4.5	4.5	9	2	2	2	2	2	4.4	6.4	6.4	6.4	6.4	11.9	16.4	12.9	12.9	12.9	41.0348	41.8181	44.4827	44.4827	44.4827					
19V19E009	5.8	4.1	9.9	4.1	4.1	8.6	4.1	4.1	8.6	2	2	2	2	2	3.2	4.8	4.8	4.8	4.8	10.8	15.4	11.1	11.1	11.1	37.2418	37	38.2758	38.2758	38.2758					
19V19E011	6	6.5	12.5	6.5	6.5	13	6.5	6.5	13	2	2	2	2	2	4.8	9.7	9.7	9.7	9.7	12.8	24.7	18.2	18.2	18.2	44.1791	56.1383	62.7586	62.7586	62.7586					
19V19E012	5.1	5	10.1	5	5	10	5	5	10	2	2	2	2	2	3.4	7.6	7.6	7.6	7.6	10.5	19.6	14.6	14.6	14.6	36.2869	44.5454	50.3448	50.3448	50.3448					
19V19E013	5.5	5.5	11	3.8	3.8	7.6	3.8	3.8	7.6	2	2	2	2	2	2.6	0	0	0	0	10.1	11.1	5.8	5.8	5.8	34.8275	25.6818	20	20	20					
19V19E014	5	5	10	4.5	4.5	9	4.5	4.5	9	2	2	2	2	2	0.8	0	0	0	0	7.8	11.5	6.5	6.5	6.5	26.8965	26.1363	22.4137	22.4137	22.4137					
19V19E016	5.1	1.8	9.1	1.8	1.8	3.6	1.8	1.8	3.6	2	2	2	2	2	4.2	5	5	5	5	11.5	14.6	10.8	10.8	10.8	39.6517	11.1818	17.2418	17.2418	17.2418					
19V19E017	6	6	12	6.5	6.5	13	6.5	6.5	13	2	2	2	2	2	7	8.6	8.6	8.6	8.6	15	23.1	17.1	17.1	17.1	51.7241	51.5	58.9655	58.9655	58.9655					
19V19E020	5.8	5.8	11.6	5.3	5.3	10.6	5.3	5.3	10.6	2	2	2	2	2	9	9	9	9	9	16.8	22.1	16.3	16.3	16.3	57.9101	50.2227	56.2069	56.2069	56.2069					
19V20E400	5	5	10	5	5	10	5	5	10	2	2	2	2	2	6	6	6	6	6	13	18	13	13	13	44.8275	40.8099	44.8275	44.8275	44.8275					
19V20E401	5.1	5.1	10.6	5.1	5.1	10.6	5.1	5.1	10.6	2	2	2	2	2	7	7	7	7	7	14.3	19.6	14.3	14.3	14.3	49.1101	44.5454	49.1101	49.1101	49.1101					
19V20E402	4.6	4.6	9.2	4.6	4.6	9.2	4.6	4.6	9.2	2	2	2	2	2	3	3	3	3	3	9.6	14.2	9.6	9.6	9.6	31.1041	17.2279	31.1041	31.1041	31.1041					
19V20E404	5.6	5.6	11.2	5.6	5.6	11.2	5.6	5.6	11.2	2	2	2	2	2	7	7	7	7	7	14.8	20.2	14.6	14.6	14.6	50.3448	45.8099	50.3448	50.3448	50.3448					
																				32.8884	18.5263	11.2293	13.2263	13.2263	42.6487	42.1056	45.6079	45.6079	45.6079					


 G. H. R. Srinivas
 Head of the Department
 Electrical & Electronics Engineering
 Shri Devi Institute of Engineering & Technology
 Tumkur-572106.

PRINCIPAL
 SIET, TUMKURU.



SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY

SIRA ROAD, TUMKUR- 572 106.

DEPARTMENT OF ELECTRICAL AND ELECTRONICS ENGG

SUBJECT	POWER ELECTRONICS	SUBJECT CODE	18EE53
---------	-------------------	--------------	--------

COURSE OUTCOME

CO1	To give an overview of applications power electronics, different types of power semiconductor devices, their switching characteristics
CO2	To explain power diode characteristics, types, their operation and the effects of power diodes on RL circuits
CO3	To explain the techniques for design and analysis of single phase diode rectifier circuits
CO4	To explain different power transistors, their steady state and switching characteristics and imitations.
CO5	To explain different types of Thyristors, their gate characteristics and gate control requirements.

PROGRAM OUTCOMES

- P01** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- P02** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- P03** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- P04** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- P05** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- P06** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- P07** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- P08** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- P09** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- P010** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- P011** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- P012** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. R.
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology

Principals Signature
PRINCIPAL
SIET, TUMAKURU.

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	RAVIKUMAR G H											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER		V	SECTION			EEE				
SUBJECT	OPERATIONAL AMPLIFIERS AND LINEAR IC'S						SUBJECT CODE		18EE53			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
	1	2	3	4	5	6	7	8	9	10	11	12
CO1	2	-	-	-	-	-	-	-	-	-	-	2
CO2	2	-	-	-	-	-	-	-	-	-	-	2
CO3	2	2	-	-	-	-	-	-	-	-	-	2
CO4	2	2	-	-	-	-	-	-	-	-	-	-
CO5	2	2	-	-	-	-	-	-	-	-	-	-
AVERAGE	2	2	-	-	-	-	-	-	-	-	-	2
OVERALL MAPPING OF SUBJECT												2

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	38.43	0.76											0.76
CO2	25.33	0.50											0.50
CO3	38.43	0.76	0.76										0.76
CO4	38.43	0.76	0.76										
CO5	38.43	0.76	0.76										0.76
AVERAGE	35.81	0.70	0.76										0.69
FINAL ATTAINMENT LEVEL													0.71

G. C. R. ...
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Technology
 TUMKUR-572106

[Signature]
 PRINCIPAL
 SIET, TOMAKURU



SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY
SIRA ROAD, TUMKUR- 572 106.

DEPARTMENT OF ELECTRICAL AND ELECTRONICS ENGG

SUBJECT	SIGNALS & SYSTEM	SUBJECT CODE	18EE54
----------------	-----------------------------	---------------------	---------------

COURSE OUTCOME

CO1	Explain the generation of signals, behavior of system and the basic operations that can be performed on signals and properties of systems.
CO2	Apply convolution in both continuous and discrete domain for the analysis of systems given impulse response of a system.
CO3	Solve the continuous time and discrete time systems by various methods and their representation by block diagram
CO4	Perform Fourier analysis for continuous and discrete time, linear time invariant systems.
CO5	Apply Z-transform and properties of Z transform for the analysis of discrete time systems

PROGRAM OUTCOMES

- PO1** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- PO2** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- PO6** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. Ramesh
Head of the Department
Electrical & Electronics Engineering
Engineering & Technology

Principals
PRINCIPAL
SIET, TUMAKURU

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	RAVIKUMAR G H											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER			V	SECTION			EEE			
SUBJECT	SIGNALS & SYSTEMS						SUBJECT CODE			18EE54		
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
	1	2	3	4	5	6	7	8	9	10	11	12
CO1	2	3	-	-	-	-	-	-	-	-	-	2
CO2	2	3	-	-	-	-	-	-	-	-	-	-
CO3	3	3	-	-	2	-	-	-	-	-	-	2
CO4	2	3	-	-	2	-	-	-	-	-	-	-
CO5	2	3	-	-	2	-	-	-	-	-	-	-
AVERAGE	2.2	3	-	-	2	-	-	-	-	-	-	2
OVERALL MAPPING OF SUBJECT												2.3

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	39.78	0.87	1.31										0.79
CO2	26.22	0.57	0.78										
CO3	39.78	0.87	1.31			0.79							0.79
CO4	39.78	0.87	1.31			0.79							
CO5	39.78	0.87	1.31			0.79							
AVERAGE	37.06	0.81	1.20			0.79							0.79
FINAL ATTAINMENT LEVEL													0.89

G. H. Ramesh
 Head of the Department
 Electrical & Electronics Engg.
 Shridevi Institute of Engineering & Technology
 TUMKUR-572106.

(Signature)
 PRINCIPAL
 SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY
 TUMKUR.



SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY

SIRA ROAD, TUMKUR- 572 106.

DEPARTMENT OF ELECTRICAL AND ELECTRONICS

SUBJECT

ELECTRICAL MACHINE DESIGN

SUBJECT CODE

18EE55

COURSE OUTCOME:

CO1: The properties of electrical, magnetic and insulating materials used in the design of electrical machines.

CO2: The output equation of DC machine, single phase, three phase transformers, induction motor and synchronous machines, The selection of specific loadings, for various machines The separation of main dimensions for different electrical machines, The design of field windings for DC machines and synchronous machines. To evaluate the performance parameters of transformer, induction motor.

CO3: The design of cooling tubes for the transformer for a given temperature rise, The short circuit ratio and discuss its effect on machine performance, The output equation of DC machine, single phase, three phase transformers, induction motor and synchronous machines. The selection of specific loadings, for various machines, The separation of main dimensions for different electrical machines, The design of field windings for DC machines and synchronous machines. To evaluate the performance parameters of transformer, induction motor.

CO4: The design of rotor of squirrel cage rotor and slip ring rotor, The output equation of DC machine, single phase, three phase transformers, induction motor and synchronous machines, The selection of specific loadings, for various machines, The separation of main dimensions for different electrical machines, The design of field windings for DC machines and synchronous machines. To evaluate the performance parameters of transformer, induction motor.

CO5: The output equation of DC machine, single phase, three phase transformers, induction motor and synchronous machines, The separation of main dimensions for different electrical machines, The design of field windings for DC machines and synchronous machines. To evaluate the performance parameters of transformer, induction motor.

PROGRAM OUTCOMES:

PO1 Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.

PO2 Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.

PO3 Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.

PO4 Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.

PO5 Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.

PO6 The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.

PO7 Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.

PO8 Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.

PO9 Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.

G. H. Ramesh
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.


PRINCIPAL
SIET, TUMAKURU

PO10 Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.

PO11 Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.

PO12 Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY												
FACULTY NAME	TANUJA K.S												
BRANCH	EEE			ACADEMIC YEAR				2021-22					
COURSE	B.E	SEMESTER			VI	SECTION			EEE				
SUBJECT	ELECTRICAL MACHINE DESIGN					SUBJECT CODE			18EE54				
CO & PO MAPPING													
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12	
18EE54.1	2		2			2	2						
18EE54.2	1		2				2						
18EE54.3	1	3	3	3							2		
18EE54.4	1	3	3										
18EE54.5	2	3	3	3									
Avg Map	1.4	3	2.6	3		2	2				2		
OVERALL MAPPING OF SUBJECT												2.29	

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	81.89	1.64		1.64			1.64	1.64					
CO2	32.56	0.33		0.65				0.65					
CO3	49.58	0.496	1.49	1.49	1.49							0.99	
CO4	51.94	0.52	1.56	1.56									
CO5	54.81	1.1	1.64	1.64	1.64								
AVERAGE	54.16	0.82	1.56	1.4	1.57		1.64	1.15				0.99	
FINAL ATTAINMENT LEVEL													1.4

G. H. Rang
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.

Principal
PRINCIPAL
SIET, TUMAKURU.

**DEPARTMENT OF EEE**

SUBJECT	High Voltage Engineering	SUBJECT CODE	18EE56
----------------	---------------------------------	---------------------	---------------

COURSE OUTCOME

- CO1.** Explain conduction and breakdown phenomenon in gases, liquid dielectrics and breakdown Phenomenon in solid dielectrics.
- CO2.** Summarize generation of high voltages and currents
- CO3.** Outline measurement techniques for high voltages and currents
- CO4.** Summarize overvoltage phenomenon and insulation coordination in electric power systems.
- CO5.** Explain non-destructive testing of materials and electric apparatus, high-voltage testing of electric apparatus

PROGRAM OUTCOMES

- PO1** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- PO2** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- PO6** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. Rane
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.

Manjunath
PRINCIPAL
SIET, TUMAKURU

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME		MRS. SWETHA T M										
BRANCH		EEE			ACADEMIC YEAR				2021-22			
COURSE	B.E	SEMESTER			V	SECTION						
SUBJECT	High Voltage Engineering					SUBJECT CODE			18EE56			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	2	3	2	2	1						2	1
CO2	2	2	3	1	2						2	1
CO3	2	3	3	2	1						2	1
CO4	2	2	2	2	2						2	1
CO5	2	3	3	1	1						2	1
AVERAGE	2	2.6	2.6	1.6	1.4						2	1
OVERALL MAPPING OF SUBJECT												1.88

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	68.9	1.378	2.067	1.378	1.378	0.689						1.378	0.689
CO2	62.5	1.25	1.25	1.875	0.625	1.25						1.25	0.625
CO3	66.9	1.338	2.007	2.007	1.338	0.669						1.338	0.669
CO4	61	1.22	1.22	1.22	1.22	1.22						1.22	0.61
CO5	59.4	1.188	1.782	1.782	0.594	0.594						1.188	0.594
AVERAGE	63.74	1.2748	1.6652	1.6524	1.031	0.8844						1.2748	0.6374
FINAL ATTAINMENT LEVEL													1.202

G. H. Ramesh

Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMAKURU-572106

Principals Swetha

PRINCIPAL
SIET, TUMAKURU.

Vth Sem	IA TEST 1			IA TEST 2			IA TEST 3			Assignment					SEE HVE 2021-2022					TOTAL					Average							
	USN	CO1	CO2	TOTAL	CO3	CO4	TOTAL	CO4	CO5	TOTAL	CO1	CO2	CO3	CO4	CO5	TOTAL	CO1	CO2	CO3	CO4	CO5	TOTAL	CO1	CO2	CO3	CO4	CO5	CO1	CO2	CO3	CO4	CO5
15V18EE001	16	15	31	7	14	21	19	15	34	2	2	2	2	2	10	6.8	6.8	6.8	6.8	6.8	34	24.8	23.8	15.8	37.8	23.8	73	70	46	70	70	
15V19EE001	17	17	34	19	14	33	20	14	34	2	2	2	2	2	10	6.6	6.6	6.6	6.6	6.6	33	25.6	25.6	27.6	36.6	22.6	75	75	81	68	66	
15V19EE002	13	14	27	16	4	20	18	12	30	2	2	2	2	2	10	7.2	7.2	7.2	7.2	7.2	36	22.2	23.2	25.2	25.2	21.2	65	68	74	47	62	
15V19EE005	19	15	34	18	16	34	14	8	22	2	2	2	2	2	10	8.4	8.4	8.4	8.4	8.4	42	29.4	25.4	28.4	34.4	18.4	86	75	84	64	54	
15V19EE006	9	7	16	7	8	15	14	15	29	2	2	2	2	2	10	8.4	8.4	8.4	8.4	8.4	42	19.4	17.4	17.4	33.4	25.4	57	51	51	62	75	
15V19EE007	19	19	38	15	14	29	19	17	36	2	2	2	2	2	10	4.2	4.2	4.2	4.2	4.2	21	25.2	25.2	21.2	37.2	23.2	74	74	62	69	68	
15V19EE008	19	15	34	10	14	24	9	8	15	2	2	2	2	2	10	4.2	4.2	4.2	4.2	4.2	21	25.2	21.2	16.2	28.2	14.2	74	62	48	52	42	
15V19EE009	5	13	18	16	7	23	20	15	35	2	2	2	2	2	10	1	1	1	1	1	5	8	16	19	25	18	24	47	56	46	53	
15V19EE011	19	17	36	19	20	39	17	15	32	2	2	2	2	2	10	8	8	8	8	8	40	29	27	29	45	25	85	79	85	83	74	
15V19EE012	16	14	30	18	15	33	14	16	30	2	2	2	2	2	10	4.4	4.4	4.4	4.4	4.4	22	22.4	20.4	24.4	37.4	22.4	66	60	72	69	66	
15V19EE013	16	8	24	16	14	30	16	7	23	2	2	2	2	2	10	4.8	4.8	4.8	4.8	4.8	24	22.8	14.8	22.8	27.8	13.8	67	44	67	51	41	
15V19EE014	19	13	32	16	14	30	16	7	23	2	2	2	2	2	10	2.8	2.8	2.8	2.8	2.8	14	23.8	17.8	20.8	25.8	11.8	70	52	61	48	35	
15V19EE016	11	14	25	13	14	27	8	7	15	2	2	2	2	2	10	3	3	3	3	3	15	16	19	18	26	12	47	56	53	48	35	
15V19EE017	19	17	36	19	20	39	19	15	34	2	2	2	2	2	10	9.6	9.6	9.6	9.6	9.6	48	30.6	28.6	30.6	46.6	26.6	90	84	90	86	78	
15V19EE020	18	8	26	15	16	31	19	15	34	2	2	2	2	2	10	7.4	7.4	7.4	7.4	7.4	37	27.4	17.4	24.4	40.4	24.4	81	51	72	75	72	
15V20EE400	15	14	29	16	16	32	19	15	34	2	2	2	2	2	10	4.4	4.4	4.4	4.4	4.4	22	21.4	20.4	22.4	37.4	21.4	63	60	66	69	63	
15V20EE401	17	15	32	17	7	24	16	17	33	2	2	2	2	2	10	4.8	4.8	4.8	4.8	4.8	24	23.8	21.8	23.8	30.8	23.8	70	64	70	57	70	
15V20EE402	19	19	38	18	15	33	15	9	24	2	2	2	2	2	10	3.2	3.2	3.2	3.2	3.2	16	24.2	24.2	23.2	29.2	14.2	71	71	68	54	42	
15V20EE404	16	7	13	14	0	14	4	14	18	2	2	2	2	2	10	5.8	5.8	5.8	5.8	5.8	29	23.8	14.8	21.8	21.8	21.8	70	44	64	40	64	
TOTAL		302	261		553	289	242	531	296	241	535	38	38	38	38	190	105	105	105	105	105	525	445	404	432	626	384	1309	1188	1271	1159	1129
Total students		19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19
Average		15.9	14	29.10526	15	12.7	27.95	15.6	12.7	28.2	2	2	2	2	10	5.526	5.526	5.526	5.526	5.526	27.632	23.42	21.26	22.74	32.95	20.211	68.9	62.5	66.9	61.0	59.4	

18EE56 HVE 2021-2022

G. V. R. Rao

Head of the Department
Electrical & Electronics Engineering
Shri Devi Institute of Engineering & Technology
TUMKUR-572106

Manjunath D. Srinivas
PRINCIPAL
SIET, TUMAKURU



SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY

SIRA ROAD, TUMKUR- 572 106.

DEPARTMENT OF ELECTRICAL AND ELECTRONICS

7th 21-22

SUBJECT	POWER SYSTEMS-2	SUBJECT CODE	18EE71
---------	-----------------	--------------	--------

COURSE OUTCOME:

CO1: form the different incidence matrices for a given power system network
formulate network matrices by different methods for a given power system network

CO2: Identify different types of buses

CO2,3 : perform load flow analysis for a given power system

CO4 : perform economic generation scheduling of power generation plants

CO4,5 : perform transient stability study of a given power system

PROGRAM OUTCOMES:

PO1 Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.

PO2 Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.

PO3 Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.

PO4 Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.

PO5 Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.

PO6 The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.

PO7 Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.

PO8 Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.

PO9 Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.

PO10 Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.

PO11 Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.

PO12 Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. Rane

Head of the Department

Electrical & Electronics Engineering

Shridevi Institute of Engineering & Technology

TUMKUR-572106

TUMKUR-572106

Principal Signature

PRINCIPAL
SIET, TUMAKURU.

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	TANUJA K.S											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER			VII	SECTION			EEE			
SUBJECT	POWER SYSTEMS-2					SUBJECT CODE			18EE71			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
18EE71.1	1	3	3	2	3	3	-	-	-	-	3	3
18EE71.2	1	3	3	2	3	3	-	-	-	-	3	3
18EE71.3	1	3	3	2	3	3	-	-	-	-	3	3
18EE71.4	1	3	3	2	3	3	-	-	-	-	3	3
18EE71.5	1	3	3	2	3	3	-	-	-	-	3	3
Avg. Mapping	1	3	3	2	3	3	-	-	-	-	3	3
OVERALL MAPPING OF SUBJECT												1.75

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	50.65	0.51	1.52	1.52	1.01	1.52	1.52					1.52	1.52
CO2	33.39	0.334	1.002	1.002	0.67	1.002	1.002					1.002	1.002
CO3	66.71	0.67	2.001	2.001	1.33	2.001	2.001					2.001	2.001
CO4	67.18	0.67	2.02	2.02	1.34	2.02	2.02					2.02	2.02
CO5	47.56	0.48	1.43	1.43	0.95	1.43	1.43					1.43	1.43
AVERAGE	53.09	0.533	1.59	1.59	1.06	1.59	1.59					1.59	1.59
FINAL ATTAINMENT LEVEL													1.39

G. H. Rame
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Technology
 TUMKUR-572106.

Nimisha Ramgopal
 PRINCIPAL
 SIET, TUMAKURU

18EE71

SEM / REG. NO.	TOTAL STRENGTH					SUBJECT: POWER SYSTEM ANALYSIS										SUBJECT CODE: 18EE71														
	IA TEST (30%)		IA TEST (30%)			IA TEST (30%)			ASSIGNMENT / QUIZ					SEE MARKS					Total Cms ATTAINMENT					No of individual C's						
	CO1	TOTAL	CO1	CO2	TOTAL	CO1	CO2	TOTAL	CO1	CO2	CO3	CO4	CO5	CO1-12	CO1	CO2	CO3	CO4	CO5	CO1-25	CO1-44	CO1-25	CO1-25	CO1-25	CO1	CO2	CO3	CO4	CO5	
18V18E001	11	11	7	8	15	11	10	21	2	2	2	2	2	11.2	11.2	11.2	11.2	11.2	11.2	24.2	20.2	28.2	28.2	19.2	58.5517	45.9099	87.2418	87.2418	46.2088	
18V18E002	12	12	5	4	9	11	12	23	2	2	2	2	2	5	6	6	6	6	6	20	13	19	19	12	44.8275	35.3645	65.5174	68.9552	41.2781	
18V18E003	15	15	8	8	16	15	15	30	2	2	2	2	2	8	8	8	8	8	8	23	18	21	21	18	55.1741	36.2684	79.1204	79.1204	51.1741	
18V18E004	2	2	8	8	16	11	12	23	2	2	2	2	2	7.4	7.4	7.4	7.4	7.4	7.4	11.4	17.4	24.4	24.4	15.4	40	39.5445	70.2482	71.7931	52.2245	
18V18E005	11	11	8	8	16	7	8	15	2	2	2	2	2	9.4	9.4	9.4	9.4	9.4	9.4	24.4	18.4	18.4	18.4	18.4	48.5915	41.0295	61.4418	66.8915	56.8915	
18V18E006	19	19	7	7	14	8	7	15	2	2	2	2	2	7	7	7	7	7	7	28	18	17	17	18	35.1241	36.2684	58.8208	55.1741	35.1741	
18V18E007	12	12	8	8	16	10	11	21	2	2	2	2	2	7.2	7.2	7.2	7.2	7.2	7.2	21.2	17.2	19.2	20.2	17.2	38.1884	39.0991	66.7089	69.5517	38.1884	
18V18E008	18	18	9	9	18	15	15	30	2	2	2	2	2	4.6	4.6	4.6	4.6	4.6	4.6	15.6	14.6	11.6	20.6	15.6	30.2482	31.1818	74.4818	71.0448	52.7931	
18V18E009	14	14	10	11	21	15	14	29	2	2	2	2	2	6.5	6.5	6.5	6.5	6.5	6.5	22.5	18.5	21.5	21.5	19.5	64.1271	42.7272	81.1781	77.8118	67.5821	
18V18E010	17	17	10	9	19	15	15	30	2	2	2	2	2	6.8	6.8	6.8	6.8	6.8	6.8	21.8	18.8	21.8	21.8	17.8	64.8275	42.7272	81.0897	81.0897	61.2781	
18V18E011	12	12	6	7	13	13	14	27	2	2	2	2	2	7.2	7.2	7.2	7.2	7.2	7.2	21.2	15.2	21.2	21.2	21.2	32.4218	34.5445	76.5172	80	55.8817	
18V18E012	11	11	5	8	13	12	11	23	2	2	2	2	2	6.2	6.2	6.2	6.2	6.2	6.2	19.2	13.2	20.2	20.2	19.2	31.2	40.5174	30	69.5517	68.2089	38.8208
18V18E013	5	5	0	0	0	5	4	9	2	2	2	2	2	5.2	5.2	5.2	5.2	5.2	5.2	12.2	7.2	12.2	11.2	7.2	14.8275	16.2684	47.0897	43.0448	24.8275	
18V18E014	8	8	8	8	16	10	10	20	2	2	2	2	2	5.8	5.8	5.8	5.8	5.8	5.8	18.8	18.8	20.8	21.8	18.8	37.2418	37.2418	71.0448	74.4818	52.2418	
18V18E015	20	20	18	7	25	9	8	17	2	2	2	2	2	4.4	4.4	4.4	4.4	4.4	4.4	24.4	24.4	12.4	12.4	11.4	34.1271	55.4545	42.7882	42.7882	46.2088	
18V18E016	18	18	10	11	21	13	14	27	2	2	2	2	2	3	3	3	3	3	3	13	13	19	19	18	51.7241	44.0295	62.0897	65.1741	51.1741	
18V18E017	11	11	14	8	22	15	15	30	2	2	2	2	2	4.4	4.4	4.4	4.4	4.4	4.4	17.4	20.4	11.4	21.4	11.4	70.2482	46.2684	73.7931	73.7931	42.7882	
18V18E018	7	7	14	8	22	15	12	27	2	2	2	2	2	4.8	4.8	4.8	4.8	4.8	4.8	13.8	20.8	17.8	18.8	11.8	71.7241	47.2727	61.1781	64.8275	44.1781	
18V18E019	18	18	4	4	8	15	15	30	2	2	2	2	2	4.2	4.2	4.2	4.2	4.2	4.2	24.2	19.2	21.2	21.2	11.2	35.1241	21.1818	71.1818	75.1045	45.1241	
18V18E020	10	10	2	2	4	10	9	19	2	2	2	2	2	0	0	0	0	0	0	12	5	12	11	4	17.2418	11.2684	41.1781	37.8118	14.7931	
18V18E021	8	8	8	8	16	7	8	15	2	2	2	2	2	5.2	5.2	5.2	5.2	5.2	5.2	16.2	13.2	14.2	15.2	13.2	45.5174	30	48.5915	52.4179	45.5174	
18V18E022	5	5	1	2	3	4	12	16	2	2	2	2	2	0	0	0	0	0	0	7	2	14	14	4	10.2482	8.81818	48.2788	48.2788	13.7931	
18V18E023	10	10	6	7	13	7	8	15	2	2	2	2	2	4.8	4.8	4.8	4.8	4.8	4.8	13.8	12.8	13.8	14.8	13.8	42.0897	27.7272	45.5174	48.9552	45.5174	
18V18E024	5	5	7	8	15	12	12	24	2	2	2	2	2	4.3	4.3	4.3	4.3	4.3	4.3	11.3	13.3	18.3	18.3	14.3	45.5174	30	62.7882	61.7882	48.9552	
18V18E025	15	15	0	0	0	15	15	30	2	2	2	2	2	4.2	4.2	4.2	4.2	4.2	4.2	21.2	8.2	21.2	21.2	8.2	31.1781	14.0295	71.1045	71.1045	21.1781	
18V18E026	20	20	10	11	21	15	15	30	2	2	2	2	2	4.8	4.8	4.8	4.8	4.8	4.8	21.8	18.8	21.8	21.8	17.8	57.8118	38.1818	75.1741	75.1741	62.7931	
18V18E027	24	24	5	6	11	15	15	30	2	2	2	2	2	4.2	4.2	4.2	4.2	4.2	4.2	30.2	11.2	21.2	21.2	11.2	38.8208	25.4545	71.1045	71.1045	42.0897	
18V18E028	13	13	5	5	10	13	13	26	2	2	2	2	2	4.8	4.8	4.8	4.8	4.8	4.8	13.8	17.8	21.8	21.8	17.8	61.1781	40.4545	63.0897	61.0897	41.1781	
18V18E029	18	18	7	7	14	15	15	30	2	2	2	2	2	4.2	4.2	4.2	4.2	4.2	4.2	21.2	21.2	13.2	13.2	13.2	45.5174	30	71.1045	71.1045	45.5174	
20.7882	14.8886	15.3445	15.8279	13.7931	10.8518	31.2658	46.7065	67.1818	47.5424																					

G. H. Ramesh
 Head of the Department
 Electrical & Electronics Engineering
 Sree Siddaganga Institute of Engineering & Technology
 Tumkur-572106.

Tangirala

Minister
 PRINCIPAL
 SIET, TUMAKURU.

SEM/SEC. R/R	TOTAL STRENGTH=28					SUBJECT: POWER SYSTEM ANALYSIS										SUBJECT CODE :					Total Cos ATTAINMENT	COL	%		
	IA TEST 1(RM)	IA TEST 2(RM)		IA TEST 3(RM)		ASSIGNMENT / QUIZ					SEE MARKS(R)														
ISN	CO1	TOTAL	CO2	CO3	TOTAL	CO3	CO4	TOTAL	CO1	CO2	CO3	CO4	CO5	CO1+2	CO2	CO3	CO4	CO5	CO1+2+3	CO2+4	CO3+5	CO4+2+3	CO5+2+3	CO1	CO2
15V18E003	11	11	7	6	13	15	15	30	2	2	2	2	2	11.2	11.2	11.2	11.2	11.2	24.2	20.2	28.2	28.2	28.2	88.6517	45.90909
15V18E029	12	12	5	4	9	11	12	23	2	2	2	2	2	6	6	6	6	6	20	13	19	20	12	44.82759	29.54545
15V18E021	15	15	8	8	16	15	15	30	2	2	2	2	2	6	6	6	6	6	23	16	23	23	18	55.17241	36.36364
15V18E034	2	2	8	8	16	11	12	23	2	2	2	2	2	7.4	7.4	7.4	7.4	7.4	11.4	17.4	20.4	21.4	15.4	60	39.54545
15V18E032	13	13	8	8	16	7	8	15	2	2	2	2	2	9.4	9.4	9.4	9.4	9.4	24.4	19.4	18.4	19.4	19.4	68.09055	44.90909
15V17E001	19	19	7	7	14	8	7	15	2	2	2	2	2	7	7	7	7	7	28	16	17	15	16	55.17241	36.36364
15V17E003	12	12	8	8	16	10	11	21	2	2	2	2	2	7.2	7.2	7.2	7.2	7.2	21.2	17.2	19.2	20.2	17.2	58.31034	39.09091
15V17E006	19	19	9	9	18	15	15	30	2	1	2	1	2	4.8	4.8	4.8	4.8	4.8	25.8	18.8	21.8	20.6	15.8	50.34483	33.18182
15V17E007	14	14	10	11	21	15	18	29	2	2	2	2	2	6.8	6.8	6.8	6.8	6.8	22.8	18.8	23.8	22.6	19.8	64.15793	42.77273
15V17E008	17	17	10	9	19	15	15	30	2	2	2	2	2	6.8	6.8	6.8	6.8	6.8	25.8	18.8	23.8	23.8	17.8	64.82759	42.72727
15V17E011	12	12	6	7	13	13	14	27	2	2	2	2	2	7.2	7.2	7.2	7.2	7.2	21.2	15.2	22.2	23.2	16.2	52.41379	34.54545
15V17E012	11	11	5	4	9	12	11	23	2	2	2	2	2	6.2	6.2	6.2	6.2	6.2	19.2	13.2	20.2	19.2	11.2	45.51724	30
15V18E002	5	5	0	0	0	5	4	9	2	2	2	2	2	5.2	5.2	5.2	5.2	5.2	12.2	7.2	12.2	11.2	7.2	24.82759	16.36364
15V18E003	9	9	9	9	18	13	14	27	2	2	2	2	2	5.6	5.6	5.6	5.6	5.6	16.6	16.6	20.6	21.6	16.6	57.24138	37.72727
15V18E004	29	29	18	7	25	6	6	12	1	2	2	2	2	4.4	4.4	4.4	4.4	4.4	34.4	24.4	12.4	12.4	12.4	94.13793	55.45455
15V18E005	18	18	10	11	21	13	14	27	2	2	2	2	2	3	3	3	3	3	23	15	16	19	16	51.72414	34.09091
15V18E006	11	11	14	6	6	15	15	30	2	2	2	2	2	4.4	4.4	4.4	4.4	4.4	17.4	20.4	21.4	21.4	12.4	70.34483	46.36364
15V18E007	7	7	14	6	5	11	12	23	2	2	2	2	2	6.8	6.8	6.8	6.8	6.8	13.8	20.8	17.8	18.8	12.8	71.72414	47.27273
15V18E008	18	18	4	4	8	15	15	30	2	2	2	2	2	4.2	4.2	4.2	4.2	4.2	24.2	10.2	21.2	21.2	21.2	35.17241	23.18182
15V18E009	10	10	3	2	5	10	9	19	2	2	2	2	2	0	0	0	0	0	12	9	12	13	4	17.24138	11.36364
15V18E011	8	8	6	6	12	7	8	15	2	2	2	2	2	5.2	5.2	5.2	5.2	5.2	16.2	13.2	14.2	15.2	13.2	45.51724	30
15V18E012	5	5	1	2	3	12	12	24	2	2	2	2	2	0	0	0	0	0	7	3	14	14	4	10.34483	6.818182
15V18E401	10	10	6	7	13	7	9	15	2	2	2	2	2	4.3	4.3	4.3	4.3	4.3	16.2	12.2	13.2	14.2	13.2	42.06897	27.72727
15V18E400	5	5	7	8	15	12	12	24	2	2	2	2	2	4.3	4.3	4.3	4.3	4.3	13.2	11.2	18.2	18.2	14.2	40.51724	30
15V18E401	15	15	0	0	0	15	15	30	2	2	2	2	2	4.2	4.2	4.2	4.2	4.2	21.2	6.2	21.2	21.2	6.2	21.27911	14.09091
15V18E402	16	16	10	11	21	15	15	30	2	2	2	2	2	4.8	4.8	4.8	4.8	4.8	22.8	16.8	21.8	21.8	17.8	57.83303	38.18182
15V18E403	24	24	5	6	11	15	15	30	2	2	2	2	2	4.2	4.2	4.2	4.2	4.2	30.2	12.2	21.2	21.2	12.2	38.42866	25.45455
15V18E404	23	23	9	9	18	15	15	30	2	2	2	2	2	6.8	6.8	6.8	6.8	6.8	21.8	17.8	23.8	23.8	17.8	61.77911	40.45455
15V18E405	19	19	7	7	14	15	15	30	2	2	2	2	2	4.2	4.2	4.2	4.2	4.2	25.2	13.2	21.2	22.2	13.2	45.51724	30
																			30.75862	14.68966	19.34483	14.68776	13.7991	56.65398	33.36558

G. H. Ravi
 Head of the Department
 Electrical & Electronics Engineering
 Sree Siddhanta Institute of Engineering & Technology
 TUMKUR-572106.

Principal
 Sree Siddhanta Institute of Engineering & Technology
 TUMKUR-572106.

DEPARTMENT OF EEE

SUBJECT	POWER SYSTEM PROTECTION	SUBJECT CODE	18EE72
----------------	--------------------------------	---------------------	---------------

COURSE OUTCOME

21-22

CO1	Discuss performance of protective relays, components of protection scheme and relay terminology over current protection.
CO2	Explain the working of distance relays and the effects of arc resistance, power swings, line length and source impedance on performance of distance relays.
CO3	Discuss pilot protection, construction, operating principles and performance of differential relays and discuss protection of generators, motors, transformer and Bus Zone Protection.
CO4	Explain the construction and operation of different types of circuit breakers.
CO5	Outline features of fuse, causes of over voltages and its protection, also modern trends in Power System Protection

PROGRAM OUTCOME

- PO1** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- PO2** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- PO6** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. Rana
Head of the Department
Electrical & Electronics Engineering
Shreevi Institute of Engineering & Technology
TUMKUR-572106.

Principal
PRINCIPAL
SIET., TUMAKURU.

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	RAJESH KUMAR V											
BRANCH	EEE			ACADEMIC YEAR				2021-2022				
COURSE	B.E	SEMESTER			VII	SECTION						
SUBJECT	POWER SYSTEM PROTECTION						SUBJECT CODE			18EE72		
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	3	-	-	-	-	-	-	-	-	-	-	-
CO2	2	2	-	-	-	2	-	-	-	-	-	-
CO3	3	-	-	-	-	2	-	-	-	-	-	-
CO4	3	-	-	-	-	2	-	-	-	-	-	-
CO5	2	2	-	-	-	2	2	-	-	-	-	2
AVERAGE	2	-	-	-	-	2	2	-	-	-	-	2
OVERALL MAPPING OF SUBJECT												1.92

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	21.2	0.63	-	-	-	-	-	-	-	-	-	-	-
CO2	23.2	0.46	0.46	-	-	-	0.46	-	-	-	-	-	-
CO3	20.2	0.60	-	-	-	-	0.40	-	-	-	-	-	-
CO4	20.2	0.60	-	-	-	-	0.40	-	-	-	-	-	-
CO5	26.2	0.52	0.52	-	-	-	0.52	0.52	-	-	-	-	0.52
AVERAGE	22.2	0.56	0.49				0.35	0.52					0.52
FINAL ATTAINMENT LEVEL													0.48

Ramesh Kumar
 PRINCIPAL
 SIET, TUMAKURU.

G. H. Ramesh
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & T.
 TUMKUR-572106.

**DEPARTMENT OF EEE**

SUBJECT	Solar & Wind Energy	SUBJECT CODE	18EE731
----------------	--------------------------------	---------------------	----------------

COURSE OUTCOME

- CO1.** Discuss the importance of the role of renewable energy, the concept of energy storage and the principles of energy storage devices.
- CO2.** Discuss the concept of solar radiation data and solar PV system fabrication, operation of solar cell, sizing and design of PV system.
- CO3.** Describe the process of harnessing solar energy and its applications in heating and cooling.
- CO4.** Explain basic Principles of Wind Energy Conversion, collection of wind data, energy estimation and site selection
- CO5.** Discuss the performance of Wind-machines, energy storage, applications of Wind Energy and environmental aspects.

PROGRAM OUTCOMES

- P01** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- P02** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- P03** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- P04** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- P05** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- P06** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- P07** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- P08** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- P09** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- P010** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- P011** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- P012** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. R. me
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.

Principals Signature
PRINCIPAL
SIET, TUMAKURU.

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	MRS. SHWETHA T M											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER		VII	SECTION							
SUBJECT	Solar & Wind Energy						SUBJECT CODE		18EE731			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	2	3	3			1	1					1
CO2	2	3	3			1	1					1
CO3	2	3	3			1	1					1
CO4	2	3	3			1	1					1
CO5	2	3	3			1	1					1
AVERAGE	2	3	3			1	1					1
OVERALL MAPPING OF SUBJECT												1.83

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	61	1.22	1.83	1.83			0.61	0.61					0.61
CO2	58	1.16	1.74	1.74			0.58	0.58					0.58
CO3	63	1.26	1.89	1.89			0.63	0.63					0.63
CO4	63	1.26	1.89	1.89			0.63	0.63					0.63
CO5	61	1.22	1.83	1.83			0.61	0.61					0.61
AVERAGE	61.2	1.224	1.836	1.836			0.612	0.612					0.612
FINAL ATTAINMENT LEVEL													1.122

G. H. Ramu
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Technology
 TUMKUR-572100.

[Signature]
 PRINCIPAL
 SIE, TUMKUR.

USN	IA TEST 1			IA TEST 2			IA TEST 3			Assignment						SEE SWE 2021-2022					Total					AVERAGE					
	CO1	CO2	TOTAL	CO3	CO4	TOTAL	CO4	CO5	TOTAL	CO1	CO2	CO3	CO4	CO5	TOTAL	CO1	CO2	CO3	CO4	CO5	TOTAL	CO1(34)	CO2	CO3	CO4	CO5	CO1(34)	CO2(34)	CO3(34)	CO4(34)	CO5(34)
1SV17EE006	12	14	26	13	12	25	14	13	27	2	2	2	2	2	10	8.2	8.2	8.2	8.2	8.2	41	22.2	24.2	23.2	36.2	23.2	65	71	68	67	68
1SV17EE012	13	10	23	11	9	20	13	13	26	2	2	2	2	2	10	5.2	5.2	5.2	5.2	5.2	26	20.2	17.2	18.2	29.2	20.2	59	51	54	54	59
1SV18EE002	9	8	17	9	10	19	11	10	21	2	2	2	2	2	10	7.6	7.6	7.6	7.6	7.6	38	18.6	17.6	18.6	30.6	19.6	55	52	55	57	58
1SV18EE003	14	10	24	13	12	25	14	12	26	2	2	2	2	2	10	7	7	7	7	7	35	23	19	22	35	21	68	56	65	65	62
1SV18EE004	17	10	27	13	12	25	13	13	26	2	2	2	2	2	10	7.6	7.6	7.6	7.6	7.6	38	26.6	19.6	22.6	34.6	22.6	78	58	66	64	66
1SV18EE005	12	13	25	14	13	27	14	12	26	2	2	2	2	2	10	9	9	9	9	9	45	23	24	25	38	23	68	71	74	70	68
1SV18EE006	14	14	28	13	13	26	18	12	30	2	2	2	2	2	10	9	9	9	9	9	45	25	25	24	42	23	74	74	71	78	68
1SV18EE007	6	7	13	9	8	17	10	8	18	2	2	2	2	2	10	6.2	6.2	6.2	6.2	6.2	31	14.2	15.2	17.2	26.2	16.2	42	45	51	49	48
1SV18EE008	12	10	22	12	12	24	15	14	29	2	2	2	2	2	10	6.4	6.4	6.4	6.4	6.4	32	20.4	18.4	20.4	35.4	22.4	60	54	60	66	66
1SV18EE009	9	8	17	10	9	19	11	10	21	2	2	2	2	2	10	6.6	6.6	6.6	6.6	6.6	33	17.6	16.6	18.6	28.6	18.6	52	49	55	53	55
1SV18EE011	9	9	18	11	9	20	12	10	22	2	2	2	2	2	10	7	7	7	7	7	35	18	18	20	30	19	53	53	59	56	56
1SV18EE012	9	9	18	12	8	20	9	10	19	2	2	2	2	2	10	5.2	5.2	5.2	5.2	5.2	26	16.2	16.2	19.2	24.2	17.2	48	48	56	45	51
1SV19EE400	13	13	26	13	12	25	17	10	27	2	2	2	2	2	10	7	7	7	7	7	35	22	22	22	38	19	65	65	65	70	56
1SV19EE401	10	10	20	13	11	24	14	14	28	2	2	2	2	2	10	7	7	7	7	7	35	19	19	22	34	23	56	56	65	63	68
1SV19EE402	13	13	26	15	13	28	16	14	30	2	2	2	2	2	10	8.4	8.4	8.4	8.4	8.4	42	23.4	23.4	25.4	39.4	24.4	69	69	75	73	72
1SV19EE403	12	12	24	12	14	26	15	10	25	2	2	2	2	2	10	8	8	8	8	8	40	22	22	22	39	20	65	65	65	72	59
1SV19EE404	11	9	20	13	10	23	14	12	26	2	2	2	2	2	10	6.4	6.4	6.4	6.4	6.4	32	19.4	17.4	21.4	32.4	20.4	57	51	63	60	60
1SV19EE405	12	12	24	14	13	27	15	14	29	2	2	2	2	2	10	7.2	7.2	7.2	7.2	7.2	36	21.2	21.2	23.2	37.2	23.2	62	62	68	69	68
TOTAL	207	191	398	220	200	420	245	211	456	36	36	36	36	36	180	129	129	129	129	129	645	372	356	385	610	376	1094	1047	1132	1130	1106
Total students	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18
Average	12	11	22	12	11	23	14	12	25	2	2	2	2	2	10	7	7	7	7	7	36	21	20	21	34	21	61	58	63	63	61

18EE731 SVE 2021-2022


 PRINCIPAL
 SIET, TUMAKURU

 G. H. R. me
 Head of the Department
 Electrical & Electronics Engineering
 Shree Institute of Engineering & Technology
 TUMKUR-572106.

DEPARTMENT OF EEE

SUBJECT	Utilization Of Electrical Power	SUBJECT CODE	18EE742
----------------	---------------------------------	---------------------	---------

COURSE OUTCOME

CO1	Discuss different methods of electric heating & welding.
CO2	Discuss the laws of electrolysis, extraction, refining of metals and electro deposition process.
CO3	Discuss the laws of illumination, different types of lamps, lighting schemes and design of lighting systems.
CO4	Analyze systems of electric traction, speed time curves and mechanics of train movement.
CO5	Explain the motors used for electric traction, their control & braking and power supply system used for electric traction

PROGRAM OUTCOME

- PO1** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- PO2** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- PO6** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. R. me

Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572196

Principal

PRINCIPAL
SIET, TUMAKURU

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	UMABAI											
BRANCH	EEE			ACADEMIC YEAR			2021-2022					
COURSE	B.E	SEMESTER		VII	SECTION							
SUBJECT	Utilization Of Electrical Power					SUBJECT CODE		18EE742				
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	2	3	2	2	2	1	1	-	1	-	-	1
CO2	2	3	3	3	2	1	1	-	1	-	-	3
CO3	2	3	2	1	2	1	1	-	1	-	-	1
CO4	2	3	-	1	2	1	1	-	1	-	-	1
CO5	2	3	2	1	2	1	2	-	1	-	-	3
AVERAGE	2	3	2.25	1.62	2	1	1.2		1			1.8
OVERALL MAPPING OF SUBJECT												1.763

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	51	1.02	1.53	1.02	1.02	1.02	0.51	0.51		0.51			0.51
CO2	45	0.9	1.35	1.35	1.35	0.9	0.45	0.45		0.45			1.35
CO3	52	1.04	1.56	1.04	0.52	1.04	0.52	0.52		0.52			0.52
CO4	53	1.06	1.59		0.53	1.06	0.53	0.53		0.53			0.53
CO5	52	1.04	1.56	1.04	0.52	1.04	0.52	1.04		0.52			1.53
AVERAGE	50.6	1.012	1.518	1.112	0.788	1.012	0.506	0.61		0.506			0.888
FINAL ATTAINMENT LEVEL													0.8835

G. U. Rave
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Technology
 TUMKUR-572106

VII SEM EEE	IA TEST 1			IA TEST 2			IA TEST 3			Assignment						SEE						TOTAL					AVERAGE						
	USN	CO1	CO2	TOTAL	CO3	CO4	TOTAL	CO4	CO5	TOTAL	CO1	CO2	CO3	CO4	CO5	TOTAL	CO1	CO2	CO3	CO4	CO5	TOTAL	CO1(34)	CO2	CO3	CO4	CO5	CO1(34)	CO2(34)	CO3(34)	CO4(34)	CO5(34)	
15V17EE006	10	16	26	13	15	28	16	14	30	2	2	2	2	2	10	7.6	7.6	7.6	7.6	7.6	38	19.6	25.6	22.6	40.6	23.6	0.576	0.753	0.665	0.752	0.6941		
15V17EED12	9	7	16	9	11	20	10	14	24	2	2	2	2	2	10	4.2	4.2	4.2	4.2	4.2	21	15.2	13.2	15.2	27.2	20.2	0.447	0.388	0.447	0.504	0.5941		
15V18EED02	8	1	9	3	9	12	9	6	15	2	2	2	2	2	10	6.4	6.4	6.4	6.4	6.4	32	16.4	9.4	11.4	26.4	14.4	0.482	0.276	0.335	0.489	0.4235		
15V18EED03	10	8	18	13	7	20	13	12	25	2	2	2	2	2	10	5.2	5.2	5.2	5.2	5.2	26	17.2	15.2	20.2	27.2	19.2	0.506	0.447	0.594	0.504	0.5647		
15V18EED04	16	10	26	12	13	25	12	15	27	2	2	2	2	2	10	6.2	6.2	6.2	6.2	6.2	31	24.2	18.2	20.2	33.2	23.2	0.712	0.535	0.594	0.615	0.6824		
15V18EED05	10	14	24	14	11	25	11	15	26	2	2	2	2	2	10	6.6	6.6	6.6	6.6	6.6	33	18.6	22.6	22.6	30.6	23.6	0.547	0.665	0.665	0.567	0.6941		
15V18EED06	13	15	28	16	10	26	18	12	30	2	2	2	2	2	10	5.8	5.8	5.8	5.8	5.8	29	20.8	22.8	23.8	35.8	19.8	0.612	0.671	0.700	0.663	0.5824		
15V18EED07	9	7	16	10	9	19	9	10	19	2	2	2	2	2	10	4.6	4.6	4.6	4.6	4.6	23	15.6	13.6	16.6	24.6	16.6	0.459	0.400	0.488	0.456	0.4882		
15V18EED08	5	3	8	3	7	10	7	5	12	2	2	2	2	2	10	4.8	4.8	4.8	4.8	4.8	24	11.8	9.8	9.8	20.8	11.8	0.347	0.288	0.288	0.385	0.3471		
15V18EED09	8	2	10	8	4	12	3	5	8	2	2	2	2	2	10	0	0	0	0	0	0	10	4	10	9	7	0.294	0.118	0.294	0.167	0.2059		
15V18EED11	14	6	20	9	7	16	11	13	24	2	2	2	2	2	10	5.2	5.2	5.2	5.2	5.2	26	21.2	13.2	16.2	25.2	20.2	0.624	0.388	0.476	0.467	0.5941		
15V18EED12	5	3	8	8	4	12	4	6	10	2	2	2	2	2	10	0	0	0	0	0	0	7	5	10	10	8	0.206	0.147	0.294	0.185	0.2353		
15V19EE400	9	11	20	13	11	24	13	15	28	2	2	2	2	2	10	4.4	4.4	4.4	4.4	4.4	22	15.4	17.4	19.4	30.4	21.4	0.453	0.512	0.571	0.563	0.6294		
15V19EE401	7	13	20	13	10	23	15	11	26	2	2	2	2	2	10	5.4	5.4	5.4	5.4	5.4	27	14.4	20.4	20.4	32.4	18.4	0.424	0.600	0.600	0.600	0.5412		
15V19EE402	13	16	29	18	10	28	19	11	30	2	2	2	2	2	10	5.4	5.4	5.4	5.4	5.4	27	20.4	23.4	25.4	36.4	18.4	0.600	0.688	0.747	0.674	0.5412		
15V19EE403	10	5	15	14	11	25	12	8	20	2	2	2	2	2	10	5.4	5.4	5.4	5.4	5.4	27	17.4	12.4	21.4	30.4	15.4	0.512	0.365	0.629	0.563	0.4529		
15V19EE404	13	9	22	9	20	29	10	14	24	2	2	2	2	2	10	4.4	4.4	4.4	4.4	4.4	22	19.4	15.4	15.4	36.4	20.4	0.571	0.453	0.453	0.674	0.6000		
15V19EE405	20	6	26	8	17	25	17	10	27	2	2	2	2	2	10	6.2	6.2	6.2	6.2	6.2	31	28.2	14.2	16.2	42.2	18.2	0.829	0.418	0.476	0.781	0.5353		
TOTAL	189	152	341	193	186	379	209	196	405	36	36	36	36	36	180	87.8	87.8	87.8	87.8	87.8	439	312.8	275.8	316.8	519	319.8	9.2	8.11176	9.31765	9.60741	9.405882		
Total students	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18	18
Average	11	8	19	11	10	21	12	11	23	2	2	2	2	2	10	5	5	5	5	5	24	17	15	18	29	18	51	45	52	53	52		

**UTILIZATION OF ELECTRIC POWER
18EE742
2021-22**

S. H. Ravi
Head of the Department
Principal
Electrical & Electronics Engineering
TUMAKURU
TUMAKURU-572106



21-22

Academic Year	:2021-22 (Odd Sem)	Faculty	: MS. Niranjani B
Subject	ENVIRONMENTAL PROTECTION AND MANAGEMENT	Semester	: 7
Code	: 18CV753		

Course Outcomes

- | | |
|-----|---|
| CO1 | Appreciate the elements of Corporate Environmental Management systems complying to international environmental management system standards. |
| CO2 | Lead pollution prevention assessment team and implement waste minimization options. |
| CO3 | Develop, Implement, maintain and Audit Environmental Management systems for Organizations. |

PROGRAM OUTCOMES

PO1 Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.

PO2 Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.

PO3 Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.

PO4 Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.

PO5 Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.

PO6 The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.

PO7 Environment and sustainability: Understand the impact of the professional engineering

solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.

PO8 Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.

PO9 Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.

PO10 Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.

G. H. Ram
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering
TUMKUR-572106.

Niranjani B
PRINCIPAL
SIET, TUMAKURU.



PO11 Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.

PO12 Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

CO-PO Mapping

COS	POs											
	1	2	3	4	5	6	7	8	9	10	11	12
CO1	2	0	0	0	0	2	2	2	0	1	0	1
CO2	2	0	0	0	0	2	2	2	0	1	0	1
CO3	2	0	0	0	0	2	2	2	0	1	0	1
Average	2	0	0	0	0	2	2	2	0	1	0	1

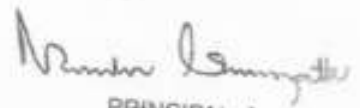
OVERALL MAPPING OF SUBJECT 1.67**CO-PO ATTAINMENT**

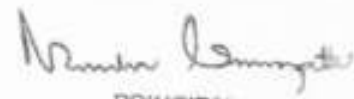
COS	% COS	1	2	3	4	5	6	7	8	9	10	11	12	
CO1	64.45	1.29	0	0	0	0	1.29	1.29	1.29	0	0.64	0	0.64	1.07
CO2	62.95	1.26	0	0	0	0	1.26	1.26	1.26	0	0.63	0	0.63	1.05
CO3	73.26	1.47	0	0	0	0	1.47	1.47	1.47	0	0.73	0	0.73	1.22
Average	66.89	1.34	0.00	0.00	0.00	0.00	1.34	1.34	1.34	0.00	0.67	0.00	0.67	1.12

FINIAL ATTAINMENT 1.12

Course Instructor

G. H. Ramesh
HOD
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Technology
 TUMKUR-572106.


Principal
 S.I.E.T., TUMAKURU.


Principal
 S.I.E.T., TUMAKURU.

Sl No.	USN NO	IA1		IA2		IA3		ASSIGNMENT				CIE MARKS			SIE MARKS			60 MARKS	COS PERCENTAGE		
		CO1	TOTAL	CO2	TOTAL	CO3	TOTAL	CO1	CO2	CO3	TOTAL	CO1	CO2	CO3	SIE	CO1	CO2		CO3		
1	ISV17EE006	24	24	23	23	23	23	3.33	3.33	3.33	10	27.33	26.33	26.33	11.67	11.67	11.67	35	73.13	71.25	71.25
2	ISV17EE012	21	21	26	26	29	29	3.33	3.33	3.33	10	24.33	29.33	32.33	15	15	15	45	73.75	83.12	86.75
3	ISV18EE002	20	20	5	5	26	26	3.33	3.33	3.33	10	23.33	8.33	29.33	13.67	13.67	13.67	41	69.38	41.25	80.63
4	ISV18EE003	19	19	23	23	30	30	3.33	3.33	3.33	10	22.33	26.33	33.33	11	11	11	33	62.50	70.00	83.12
5	ISV18EE004	29	29	20	20	30	30	3.33	3.33	3.33	10	32.33	23.33	33.33	13	13	13	39	85.00	68.12	86.87
6	ISV18EE005	17	17	11	11	30	30	3.33	3.33	3.33	10	20.33	14.33	33.33	14.67	14.67	14.67	44	65.63	54.38	90.01
7	ISV18EE006	27	27	27	27	30	30	3.33	3.33	3.33	10	30.33	30.33	33.33	11	11	11	33	77.50	77.50	83.12
8	ISV18EE007	17	17	17	17	15	15	3.33	3.33	3.33	10	20.33	20.33	18.33	9	9	9	27	55.00	55.00	51.25
9	ISV18EE008	20	20	17	17	9	9	3.33	3.33	3.33	10	23.33	20.33	12.33	11.67	11.67	11.67	35	65.63	60.00	45.00
10	ISV18EE009	11	11	8	8	8	8	3.33	3.33	3.33	10	14.33	11.33	11.33	0	0	0	0	26.87	21.25	21.25
11	ISV18EE011	23	23	18	18	24	24	3.33	3.33	3.33	10	26.33	21.33	27.33	12	12	12	36	71.87	62.50	73.75
12	ISV18EE012	11	11	9	9	24	24	3.33	3.33	3.33	10	14.33	12.33	27.33	9.67	9.67	9.67	29	45.00	41.25	69.38
13	ISV19EE400	17	17	22	22	30	30	3.33	3.33	3.33	10	20.33	25.33	33.33	12.67	12.67	12.67	38	61.88	71.25	86.26
14	ISV19EE401	19	19	17	17	23	23	3.33	3.33	3.33	10	22.33	20.33	26.33	11	11	11	33	62.50	58.75	70.00
15	ISV19EE402	25	25	29	29	30	30	3.33	3.33	3.33	10	28.33	32.33	33.33	11.67	11.67	11.67	35	75.00	82.51	84.38
16	ISV19EE403	22	22	26	26	23	23	3.33	3.33	3.33	10	25.33	29.33	26.33	10.33	10.33	10.33	31	66.87	74.37	68.74
17	ISV19EE404	23	23	21	21	30	30	3.33	3.33	3.33	10	26.33	24.33	33.33	11.67	11.67	11.67	35	71.25	67.50	84.38
18	ISV19EE405	24	24	26	26	30	30	3.33	3.33	3.33	10	27.33	29.33	33.33	9.67	9.67	9.67	29	69.38	73.13	80.63
		20.50	20.50	19.17	19.17	24.67	24.67	3.33	3.33	3.33	10.0	23.83	22.50	28.00	11.00	11.00	11.00	33.22	65.45	62.95	73.26

G. H. Ramesh

Head of the Department
Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572108.

Principal
TUMKUR.

COs & POs

2021-22

EVEN SEMESTER

**DEPARTMENT OF EEE**

4 21-22

SUBJECT	POWER GENERATION ECONOMICS	SUBJECT CODE	18EE42
----------------	-----------------------------------	---------------------	---------------

COURSE OUTCOME

- CO1.** Describe the working of hydroelectric, steam, nuclear power plants and state functions of major equipment of the power plants.
- CO2.** Classify various substations and explain the functions of major equipments in substations.
- CO3.** Explain the types of grounding and its importance
- CO4.** Infer the economic aspects of power system operation and its effects
- CO5.** Explain the importance of power factor improvement.

PROGRAM OUTCOMES

- PO1** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- PO2** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- PO6** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. Ram
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.


PRINCIPAL
SIRA ROAD, TUMKUR

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME		MRS. SWETHA T M										
BRANCH		EEE			ACADEMIC YEAR				2021-22			
COURSE	B.E	SEMESTER			SECTION							
SUBJECT	POWER GENERATION ECONOMICS				SUBJECT CODE			18EE42				
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	3	3	2			2	2	1	1	1		1
CO2	2	2	2			2	1	1	1	1		1
CO3	3	2	2			2	2	1	1	1		1
CO4	2	2	2			2	2	1	1	1		1
CO5	3	2	2			2	1	1	1	1		1
AVERAGE	2.6	2.2	2			2	1.6	1	1	1		1
OVERALL MAPPING OF SUBJECT												1.6

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	76	2.28	2.28	1.52			1.52	1.52	0.76	0.76	0.76		0.76
CO2	68	1.36	1.36	1.36			1.36	0.68	0.68	0.68	0.68		0.68
CO3	72	2.16	1.44	1.44			1.44	1.44	0.72	0.72	0.72		0.72
CO4	77	1.54	1.54	1.54			1.54	1.54	0.77	0.77	0.77		0.77
CO5	60	1.8	1.2	1.2			1.2	0.6	0.6	0.6	0.6		0.6
AVERAGE	70.6	1.828	1.564	1.412			1.412	1.156	0.706	0.706	0.706		0.706
FINAL ATTAINMENT LEVEL													1.1328

G. H. Rana
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Tech.
 TUMAKURU-572106.

Swetha T M
 PRINCIPAL
 SIET, TUMAKURU

ROLL NO.	TEST 1									IA TEST 1									Assignment									MID SEM 2021-2022									TOTAL									Average			
	CO1	CO2	TOTAL	CO1	CO2	TOTAL	CO1	CO2	CO3	CO1	CO2	CO3	CO1	CO2	CO3	TOTAL	CO1	CO2	CO3	CO1	CO2	CO3	TOTAL	CO1	CO2	CO3	CO1	CO2	CO3	CO1	CO2	CO3	CO1	CO2	CO3	CO1	CO2	CO3	CO1	CO2	CO3	CO1	CO2	CO3					
17A19R1001	12	18	30	18	18	36	18	11	18	19	9	20	2	2	2	2	2	2	2	2	2	2	2	2	20	7.2	7.2	7.2	7.2	7.2	7.2	76	36	36	44	48	48	48	48	48	48	48	48	48	48	48	48	48	48
17A19R1002	18	5	23	19	17	36	17	18	9	19	13	27	2	2	2	2	2	2	2	2	2	2	2	2	10	4.2	4.2	4.2	4.2	4.2	4.2	32	26	26	28	35	35	34	34	49	31	35	35	35	35	35	35	35	35
17A19R1003	15	9	24	16	15	31	18	11	9	21	4	26	2	2	2	2	2	2	2	2	2	2	2	2	100	9.2	9.2	9.2	9.2	9.2	9.2	46	46	46	46	46	46	46	46	46	46	46	46	46	46	46	46	46	46
17A19R1004	17	18	35	19	20	39	19	19	19	19	13	32	2	2	2	2	2	2	2	2	2	2	2	2	100	9	9	9	9	9	9	49	49	49	50	50	50	50	50	50	50	50	50	50	50	50	50	50	50
17A19R1005	18	12	30	18	17	35	18	19	18	17	13	30	2	2	2	2	2	2	2	2	2	2	2	2	100	7	7	7	7	7	7	35	35	46	40	40	40	40	40	40	40	40	40	40	40	40	40	40	40
17A19R1006	19	13	32	19	18	37	18	17	18	18	19	37	2	2	2	2	2	2	2	2	2	2	2	2	100	1.8	1.8	1.8	1.8	1.8	1.8	19	47	47	47	47	47	47	47	47	47	47	47	47	47	47	47	47	47
17A19R1007	7	16	23	9	18	27	18	12	18	13	9	22	2	2	2	2	2	2	2	2	2	2	2	2	100	7	7	7	7	7	7	35	35	37	37	37	37	37	37	37	37	37	37	37	37	37	37	37	37
TOTAL	114	100	214	128	125	253	125	117	208	223	87	321	16	16	16	16	16	16	16	16	16	16	16	16	80	39	39	39	39	39	39	226	317	376	376	376	376	376	376	376	376	376	376	376	376	376			
Total students	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	
Average	14.5	12.5	27	15.8	16.88	32.63	17	15.6	19.5	15.375	16.667	35.675	2	2	2	2	2	2	2	2	2	2	2	2	10	7.875	7.875	7.875	7.875	7.875	7.875	37	46.875	48.675	47	49	49	49	49	49	49	49	49	49	49	49			

PGECET-2022

G. U. Ramesh
 Head of the Department
 Electrical & Electronics Engineering
 Shree Sai Institute of Engineering & Technology
 TUMKUR-572106.

(Signature)
 Principal
 Shree Sai Institute of Engineering & Technology
 TUMKUR

**DEPARTMENT OF ELECTRICAL AND ELECTRONICS**

SUBJECT	TRANSMISSION & DISTRIBUTION	SUBJECT CODE	18EE43
----------------	--	---------------------	---------------

COURSE OUTCOME:

- CO1:** Explain transmission and distribution scheme, identify the importance of different Transmission systems and types of insulators.
CO2: Analyze and compute the parameters of the transmission line for different configurations.
CO3: Assess the performance of overhead lines.
CO4: Interpret corona, explain the use of underground cables.
CO5: Classify different types of distribution systems; examine its quality & reliability.

PROGRAM OUTCOMES:

- PO1** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- PO2** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- PO6** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. Rang
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.

Manjunath
PRINCIPAL
SIRA ROAD, TUMKUR.

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	TANUJA K.S											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER			IV	SECTION			EEE			
SUBJECT	TRANSMISSION & DISTRIBUTION					SUBJECT CODE			18EE43			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
18EE54.1	3		2		3	2	2			2		
18EE54.2	1	2	2		2		2					
18EE54.3	1	3	3	3		2				2	2	
18EE54.4	1	3	3		2							
18EE54.5	2	3	3	3						2	2	
Avg Map	1.6	2.75	2.6	3	2.33	2	2			2	2	
OVERALL MAPPING OF SUBJECT												2.25

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	86.64	2.6		1.73		2.6	1.73	1.73			1.73		
CO2	34.38	0.34	0.69	0.69		0.69		0.69					
CO3	52.59	0.53	1.6	1.6	1.6		1.05				1.05	1.05	
CO4	48.71	0.49	1.46	1.46		0.97							
CO5	49.14	0.98	1.47	1.47	1.47						0.98	0.98	
AVERAGE	61.81	1	1.3	1.39	1.54	1.42	1.39	1.21			1.25	1.02	
FINAL ATTAINMENT LEVEL													1.28

G. H. Ram
 Head of the Department
 Electrical & Electronics Engineering
 Shri. Institute of Engineering & Technology
 02022-272106.

(Signature)
 PRINCIPAL
 Shri. Institute of Engineering & Technology

Academic Year	SEM I		SEM II		Total strength			S	Subject				TRANSMISSION AND DISTRIBUTION				Subject Code		IEEE42				Total Coe ATTAINMENT				% of individual CO			
	IA TEST (HMM)		IA TEST (HMM)		IA TEST (HMM)				ASSIGNMENT / QUIZ (H)				SEE MARKS (H)																	
	CO1	TOTAL	CO1	TOTAL	CO1	CO2	TOTAL		CO1	CO2	CO3	CO4	CO1	CO1-12	CO2	CO3	CO4	CO5	CO1-20	CO2-24	CO3-28	CO4-29	CO5-35	CO1	CO2	CO3	CO4	CO5		
15V2010000	21	21	5	5	11	7	7	4	2	2	2	2	2	4.4	4.4	4.4	4.4	4.4	27.4	11.4	17.4	8.4	8.4	86.6276	35.9090	62.7583	28.9652	28.9652		
15V2010001	0	0	7	7	14	10	10	20	2	2	2	2	2	4.2	4.2	4.2	4.2	4.2	6.2	18.2	13.2	16.2	10.2	21.3791	30	62.0687	35.86207	35.86207		
15V2010002	14	14	4	4	8	6	6	11	2	2	2	2	2	2.4	2.4	2.4	2.4	2.4	18.4	8.4	8.4	10.4	9.4	61.84828	29.0905	28.9652	35.86207	31.43179		
15V2010003	15	15	9	9	18	5	5	11	2	2	2	2	2	2.4	2.4	2.4	2.4	2.4	20.4	16.4	16.4	10.4	11.4	70.14483	42.72727	49.65517	35.86207	39.43284		
15V2010004	20	20	11	11	20	7	7	14	2	2	2	2	2	2	2	2	2	2	18	16	16	10.4	17	124.4828	54.94945	62.7583	35.77241	38.62589		
15V2010005	22	22	7	7	14	10	10	20	2	2	2	2	2	4.2	4.2	4.2	4.2	4.2	25.2	18.2	18.2	16.2	16.2	100.6897	30	48.9652	35.86207	35.86207		
15V2010006	18	18	12	12	24	15	15	30	2	2	2	2	2	2	2	2	2	2	21	21	21	24	24	88.2069	47.72727	73.61179	62.7583	62.7583		
15V2010007	19	19	9	9	18	5	5	10	2	2	2	2	2	4.4	4.4	4.4	4.4	4.4	35.4	15.4	15.4	11.4	11.4	122.069	35	51.1045	39.31018	39.31018		
																			25.125	15.125	15.125	14.125	14.125	86.61781	34.875	52.38671	48.7069	48.12791		

Tanjil K.S

G. U. Ram
 Head of the Department
 Electrical & Electronics Engineering
 Engineering & Technology
 TUMKUR-572106

(Signature)
 Head of the Department
 Electrical & Electronics Engineering
 Engineering & Technology
 TUMKUR-572106

DEPARTMENT OF EEE

SUBJECT	ELECTRIC MOTORS	SUBJECT CODE	18EE44
----------------	------------------------	---------------------	---------------

COURSE OUTCOME

CO1	Explain the construction, operation and classification of DC Motor, AC motor and Special purpose motors
CO2	Describe the performance characteristics & applications of Electric motors.
CO3	Demonstrate and explain the methods of testing of DC machines and determine losses and Efficiency
CO4	Control the speed of DC motor and induction-motor.
CO5	Explain the starting methods, equivalent circuit and phasor diagrams, torque angle, effect of change in excitation and change in load, hunting and damping of synchronous motors

PROGRAM OUTCOME

- P01** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- P02** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- P03** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- P04** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- P05** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- P06** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- P07** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- P08** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- P09** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- P010** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- P011** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- P012** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. V. R. Rao
Head of the Department
Electrical & Electronics Engineering
Shreevi Institute of Engineering & Technology
TUMKUR-572106.

Principals Signature
PRINCIPAL
SIET - ANANTURU

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	UMABAI											
BRANCH	EEE			ACADEMIC YEAR				2021-2022				
COURSE	B.E	SEMESTER		IV	SECTION							
SUBJECT	ELECTRIC MOTORS					SUBJECT CODE			18EE44			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	3	2	2	2	2	2						1
CO2	3	2	2	2	2	2						1
CO3	3	2	3	2	2	2						1
CO4	3	2	2	2	2	2						1
CO5	3	2	2	2	2	2						2
AVERAGE	3	2	2.2	2	2	2						1.2
OVERALL MAPPING OF SUBJECT												2.05

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	62	1.86	1.24	1.24	1.24	1.24	1.24						0.62
CO2	49	1.47	0.98	0.98	0.98	0.98	0.98						0.49
CO3	69	2.07	1.38	2.07	1.38	1.38	1.38						0.69
CO4	61	1.83	1.22	1.22	1.22	1.22	1.22						0.61
CO5	63	1.89	1.26	1.26	1.26	1.26	1.26						0.63
AVERAGE	60.8	1.824	1.216	1.354	1.216	1.216	1.216						0.608
FINAL ATTAINMENT LEVEL													1.235

G. U. Rana
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Technology
 TUMKUR-572106.

PRINCIPAL
 SIET, TUMAKURU

SEM: IV, EEE	IA TEST 1			IA TEST 2			IA TEST 3			Assignment						SEE						TOTAL					AVERAGE				
	USN	CO1	CO2	TOTAL	CO3	CO4	TOTAL	CO4	CO5	TOTAL	CO1	CO2	CO3	CO4	CO5	TOTAL	CO1	CO2	CO3	CO4	CO5	TOTAL	CO1(34)	CO2(34)	CO3(34)	CO4(34)	CO5(34)	CO1	CO2	CO3	CO4
15V19EE003	20	9	29	14	17	31	18	13	31	2	2	2	2	2	10	4.8	4.8	4.8	4.8	4.8	24	26.8	15.8	20.8	37	19.8	79	46	61	69	58
15V19EE018	20	12	32	13	8	21	19	9	28	2	2	2	2	2	10	4.2	4.2	4.2	4.2	4.2	21	26.2	18.2	19.2	29	15.2	77	54	56	54	45
15V20EE001	4	10	14	16	9	25	14	8	22	2	2	2	2	2	10	2.4	2.4	2.4	2.4	2.4	12	8.4	14.4	20.4	25	12.4	25	42	60	46	36
15V20EE002	11	0	11	18	6	24	12	20	32	2	2	2	2	2	10	4.8	4.8	4.8	4.8	4.8	21	17.8	6.8	24.8	20	26.8	52	20	73	37	79
15V20EE003	16	15	31	19	17	36	20	18	38	2	2	2	2	2	10	7.6	7.6	7.6	7.6	7.6	38	25.6	24.6	28.6	39	27.6	75	72	84	72	81
15V20EE004	15	10	25	17	19	36	18	18	36	2	2	2	2	2	10	3.6	3.6	3.6	3.6	3.6	18	20.6	15.6	22.6	39	23.6	61	46	66	72	69
15V20EE006	13	16	29	16	16	32	20	20	40	2	2	2	2	2	10	7.8	7.8	7.8	7.8	7.8	39	22.8	25.8	25.8	38	29.8	67	76	76	70	88
15V20EE007	11	4	15	17	16	33	18	9	27	2	2	2	2	2	10	6.4	6.4	6.4	6.4	6.4	32	19.4	12.4	25.4	36	17.4	57	36	75	67	51
TOTAL	110	76	186	130	108	238	139	115	254	16	16	16	16	16	80	41.6	41.6	41.6	41.6	41.6	205	167.6	133.6	187.6	263	172.6	493	393	552	487	508
Total student	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8
Average	13.75	9.5	23.25	16.3	13.5	29.75	17.4	14.38	31.75	2	2	2	2	2	10	5.2	5.2	5.2	5.2	5.2	25.63	20.95	16.7	23.45	32.9	21.575	62	49	69	61	63

ELECTRIC MOTOR: 18EE44 2021-22

M. S. S. S.
PRINCIPAL
St. Joseph's Institute of Technology

S. V. R. S.
Head of the Department
Electrical & Electronics Engineering
Shri Dew Institute of Engineering & Technology
TUMKUR-572106



SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY

SIRA ROAD, TUMKUR- 572 106.

DEPARTMENT OF EEE

SUBJECT	ELECTROMAGNETIC FIELD THEORY	SUBJECT CODE	18EE45
----------------	-------------------------------------	---------------------	---------------

COURSE OUTCOME

CO1	Use different coordinate systems, Coulomb's Law and Gauss Law for the evaluation of electric fields produced by different charge configurations.
CO2	Calculate the energy and potential due to a system of charges & Explain the behavior of electric field across a boundary conditions
CO3	Explain the Poisson's, Laplace equations and behavior of steady magnetic fields.
CO4	Explain the behavior of magnetic fields and magnetic materials.
CO5	Asses time varying fields and propagation of waves in different media.

PROGRAM OUTCOMES

- P01** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- P02** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- P03** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- P04** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- P05** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- P06** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- P07** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- P08** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- P09** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- P010** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- P011** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- P012** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

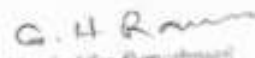
G. H. Ramesh
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.

(Signature)
Date: _____
Place: _____

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	MR. G.H. RAVIKUMAR											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER		IV		SECTION						
SUBJECT	ELECTROMAGNETIC FIELD THEORY						SUBJECT CODE		18EE45			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	3	2	-	-	-	-	-	-	-	-	-	-
CO2	3	2	-	-	-	-	-	-	-	-	-	-
CO3	2	3	-	-	-	-	-	-	-	-	-	-
CO4	2	3	-	-	-	-	-	-	-	-	-	-
CO5	2	3	-	-	-	-	-	-	-	-	-	-
AVERAGE	2.4	2.6	-	-	-	-	-	-	-	-	-	-
OVERALL MAPPING OF SUBJECT												2.5

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	73.79	2.213	1.475										
CO2	65.92	1.977	1.318										
CO3	56.39	1.127	1.691										
CO4	66.30	1.326	1.989										
CO5	73.16	1.463	2.194										
AVERAGE	53.73	1.621	1.733										
FINAL ATTAINMENT LEVEL													1.677


 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Technology
 TUMKUR-572106.



SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY

SIRA ROAD, TUMKUR- 572 106.

DEPARTMENT OF ELECTRICAL & ELECTRONICS ENGINEERING

SUBJECT	Operational Amplifiers & Linear ICs	SUBJECT CODE	18EE46
----------------	--	---------------------	---------------

COURSE OUTCOME

CO1	Describe the characteristics of ideal and practical operational amplifier.
CO2	Design filters and signal generators using linear ICs.
CO3	Demonstrate the application of Linear ICs as comparators and rectifiers.
CO4	Analyze voltage regulators for given specification using op-amp and IC voltage regulators.
CO5	Summarize the basics of PLL and Timer.

PROGRAM OUTCOMES

- PO1** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- PO2** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modelling to complex engineering activities.
- PO6** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. Rao
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.


PRINCIPAL
SIFT, TUMKURU.

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	Mr. NAVEEN KUMAR											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER		IV	SECTION			EEE				
SUBJECT	Operational Amplifiers & Linear ICs					SUBJECT CODE			18EE46			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	2	2										2
CO2	2	2										2
CO3	2	2										2
CO4	2	2										2
CO5	2	2										2
AVERAGE	2	2										2
OVERALL MAPPING OF SUBJECT												2

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	76.03	1.52	1.52										1.52
CO2	78.52	1.57	1.57										1.57
CO3	66.81	1.336	1.336										1.336
CO4	82.93	1.658	1.658										1.658
CO5	50.07	1.001	1.001										1.001
AVERAGE		1.417	1.417										1.417
FINAL ATTAINMENT LEVEL													1.417

Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Technology
 TUMKUR-572106

Naveen Kumar
 PRINCIPAL
 SIET, TUMAKURU.



DEPARTMENT OF ELECTRICAL AND ELECTRONICS

SUBJECT	CONTROL SYSTEMS	SUBJECT CODE	18EE61
---------	-----------------	--------------	--------

615
21-22

COURSE OUTCOME:

- CO1: Analyze and model electrical and mechanical system using analogous.
- CO2: Formulate transfer functions using block diagram and signal flow graphs.
- CO3: Analyze the stability of control system, ability to determine transient and steady state time response.
- CO4: Illustrate the performance of a given system in time and frequency domains, stability analysis using Root locus and Bode plots.
- CO5: Discuss stability analysis using Nyquist plots, Design controller and compensator for a given specification.

PROGRAM OUTCOMES:

- PO1 Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- PO2 Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3 Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4 Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5 Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- PO6 The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7 Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8 Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9 Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10 Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11 Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12 Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. Ramesh
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.

Principal
PRINCIPAL
SIEET, TUMKURU.

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	TANUJA K.S											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER			VI	SECTION			EEE			
SUBJECT	CONTROL SYSTEMS						SUBJECT CODE			18EE61		
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
18EE61.1	2	3	2	2			1	1			1	1
18EE61.2	2	3	2	2	1		1	1			1	1
18EE61.3	3	3	2	2		1		1				1
18EE61.4	2	3	2	2			1	1			1	1
18EE61.5	3	2	3	3		1		1			1	1
Avg Map	2.4	2.8	2.2	2.2	1	1	1	1			1	1
OVERALL MAPPING OF SUBJECT												1.56

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	78.29	1.57	2.35	1.57	1.57			0.78	0.78			0.78	0.78
CO2	44.02	0.88	1.32	0.88	0.88	0.44		0.44	0.44			0.44	0.44
CO3	46.72	1.4	1.4	0.93	0.93		0.47		0.47				0.47
CO4	53.25	1.07	1.59	1.07	1.07			0.53	0.53			0.53	0.53
CO5	53.43	1.6		1.6	1.6		0.53		0.53			0.53	0.53
AVERAGE	55.14	1.3	1.67	1.21	1.21	0.44	0.5	0.58	0.55			0.57	0.55
FINAL ATTAINMENT LEVEL													1.00

G. H. Rao
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Technology
 TUMKUR-572196.

Nandini Sanyal
 PRINCIPAL
 SIET., TUMAKURU.

Academy #	2013-14		SEM			I			Total strength			IN			Subject			CONTROL SYSTEMS				Subject Code				BRED				Total Cw ATTAINMENT				% of individual Cw			
EN/ECU/EA	IA TEST 1(MM)		IA TEST 2(MM)			IA TEST 3(MM)			ASSIGNMENT / Q/ QZ (P/N)			SEE MARKS(P)				Total Cw ATTAINMENT				%																	
SRN	CRH	TOTAL	COI	COJ	TOTAL	COI	COJ	TOTAL	COI	COJ	COI	COJ	COI	COJ	COI	COJ	COI	COJ	COI	COJ	COI	COJ	COI	COJ	COI	COJ	COI	COJ	COI	COJ							
10V200001	17	17	7	7	14	7	7	14	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200002	18	18	6	7	13	10	10	20	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200003	18	18	4	4	8	8	8	16	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200004	14	14	5	5	10	8	8	16	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200005	12	12	2	2	4	8	8	16	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200007	27	27	10	10	20	11	11	22	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200008	15	15	5	5	10	8	7	15	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200009	15	15	10	6	16	7	7	14	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200011	18	18	12	12	24	11	11	22	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200012	11	11	1	4	5	7	7	14	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200013	14	14	7	7	14	9	9	18	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200014	12	12	0	0	0	8	8	16	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200016	17	17	6	5	11	7	7	14	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200017	29	29	15	15	30	15	15	30	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200020	9	9	6	5	11	7	8	15	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200000	14	14	8	7	15	7	7	14	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200001	20	20	4	4	8	7	7	14	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200002	20	20	10	10	20	10	11	21	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
10V200000	0	0	0	0	0	0	0	0	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2							
																			21.70526	20.28842	13.54757	13.86231	11.49976	78.29401	44.20164	46.71596	51.34864	52.43012									

G. H. Ram
 Head of the Department
 Electrical & Electronics Engineering
 Shri Dew Institute of Engineering & Technology
 TUMKUR-572106.

Tamiraj K.S

Principal
 SLET, TUMKURURU

Individual CO		
COF	COA	COB
07.24138	07.24138	06.2069
65.51724	68.96552	41.37931
79.12034	79.12034	55.17241
70.34489	73.7931	53.10345
63.44828	66.89655	60.69655
38.62069	55.17241	55.17241
66.2069	69.65517	59.21034
74.48276	71.03448	33.7931
61.37931	77.93103	67.58621
62.06897	62.06897	61.37931
76.55177	80	55.86207
66.65517	66.2069	38.62069
42.06897	38.62069	24.82759
71.03448	74.48276	57.24138
42.75862	42.75862	46.2069
62.06897	65.51724	55.17241
73.7931	73.7931	42.75862
61.37931	64.82759	44.12793
71.03448	73.10345	75.17241
41.37931	37.93103	13.7931
48.96552	52.41379	45.51724
46.27586	48.27586	13.7931
45.51724	48.96552	45.51724
62.75862	62.75862	48.96552
73.10345	73.10345	21.37931
75.17241	75.17241	61.37931
73.10345	73.10345	42.06897
62.06897	62.06897	61.37931
73.10345	73.10345	45.51724
66.7063	67.18193	47.56203

DEPARTMENT OF EEE

SUBJECT	POWER SYSTEM ANALYSIS I	SUBJECT CODE	18EE62
----------------	--------------------------------	---------------------	---------------

COURSE OUTCOME

CO1	Model the power system components & construct per unit impedance diagram of power system.
CO2	Analyze three phase symmetrical faults on power system.
CO3	Compute unbalanced phasor in terms of sequence components and vice versa, also develop sequence networks.
CO4	Analyze various unsymmetrical faults on power system.
CO5	Examine dynamics of synchronous machine and determine the power system stability

PROGRAM OUTCOME

- PO1** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- PO2** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- PO6** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. Ramesh
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Tech. TUMKUR-572106.

Nandini Srinivas
PRINCIPAL
SIET., TUMAKURU.

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	UMABAI											
BRANCH	EEE			ACADEMIC YEAR			2021-2022					
COURSE	B.E	SEMESTER		VI	SECTION							
SUBJECT	POWER SYSTEM ANALYSIS I					SUBJECT CODE		18EE62				
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	3	3	-	-	-	-	1	-	-	-	-	-
CO2	3	3	-	-	-	-	1	-	-	-	-	-
CO3	2	3	-	-	-	1	-	-	-	-	-	-
CO4	2	3	-	3	-	1	-	-	1	-	-	2
CO5	2	3	-	3	-	1	1	-	1	-	-	2
AVERAGE	2.4	3	-	3	-	1	1	-	1	-	-	2
OVERALL MAPPING OF SUBJECT												1.92

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	52.9	1.587	1.587										
CO2	52.9	1.587	1.587					0.529					
CO3	40.1	0.802	1.203				0.401						
CO4	60.5	1.21	1.815		1.815		0.605			0.605			1.21
CO5	53.3	1.33	1.59		1.59		0.533	0.533		0.533			1.33
AVERAGE	51.94	1.30	1.55		1.70		0.513	0.531		0.569			1.27
FINAL ATTAINMENT LEVEL													1.061

G. U. Ramesh
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Technology
 TUMKUR-572106.

USN	IA TEST 1			IA TEST 2			IA TEST 3			Assignment					SEE					TOTAL					AVERAGE						
	CO1	CO2	TOTAL	CO3	CO4	TOTAL	CO4	CO5	TOTAL	CO1	CO2	CO3	CO4	CO5	TOTAL	CO1	CO2	CO3	CO4	CO5	TOTAL	CO1	CO2	CO3	CO4	CO5	CO1	CO2	CO3	CO4	CO5
15V18EE001	15	12	27	7	20	27	20	9	29	2	2	2	2	2	10	4.2	4.2	4.2	4.2	4.2	21	21.2	18.2	13.2	46.2	15.2	62	54	39	86	45
15V19EE001	5	18	23	5	18	23	10	20	30	2	2	2	2	2	10	5	5	5	5	5	25	12	25	12	35	27	35	74	35	65	79
15V19EE002	11	12	23	0	0	0	16	0	16	2	2	2	2	2	19	2.4	2.4	2.4	2.4	2.4	12	15.4	16.4	4.4	20.4	4.4	45	48	13	38	13
15V19EE005	10	5	15	14	12	26	10	0	10	2	2	2	2	2	10	5.2	5.2	5.2	5.2	5.2	26	17.2	12.2	21.2	29.2	7.2	51	36	62	54	21
15V19EE006	5	6	11	0	0	0	9	18	27	2	2	2	2	2	10	5.2	5.2	5.2	5.2	5.2	26	12.2	13.2	7.2	16.2	25.2	36	39	21	30	74
15V19EE007	14	0	14	11	16	27	20	13	33	2	2	2	2	2	10	7.8	7.8	7.8	7.8	7.8	39	23.8	9.8	20.8	45.8	22.8	70	29	61	85	67
15V19EE008	5	5	10	6	12	18	20	0	20	2	2	2	2	2	10	5.8	5.8	5.8	5.8	5.8	29	12.8	12.8	13.8	39.8	7.8	38	38	41	74	23
15V19EE009	9	11	20	12	13	25	16	0	16	2	2	2	2	2	10	4.2	4.2	4.2	4.2	4.2	21	15.2	17.2	18.2	35.2	6.2	45	51	54	65	18
15V19EE011	20	20	40	10	20	30	19	14	33	2	2	2	2	2	10	8	8	8	8	8	40	30	30	20	49	24	88	88	59	91	71
15V19EE012	4	14	18	10	20	30	5	13	18	2	2	2	2	2	10	7	7	7	7	7	35	13	23	19	34	22	38	68	56	63	65
15V19EE013	12	13	25	0	16	16	6	20	26	2	2	2	2	2	10	0	0	0	0	0	0	14	15	2	24	22	41	44	6	44	65
15V19EE014	9	6	15	0	0	0	10	10	20	2	2	2	2	2	10	2.8	2.8	2.8	2.8	2.8	14	13.8	10.8	4.8	14.8	14.8	41	32	14	27	44
15V19EE016	10	10	20	4	8	12	10	20	30	2	2	2	2	2	10	5.2	5.2	5.2	5.2	5.2	26	17.2	17.2	11.2	25.2	27.2	51	51	33	47	80
15V19EE017	20	18	38	7	20	27	20	9	29	2	2	2	2	2	10	8.8	8.8	8.8	8.8	8.8	44	30.8	28.8	17.8	50.8	19.8	91	85	52	94	58
15V19EE020	12	9	21	5	15	20	18	0	18	2	2	2	2	2	10	6.4	6.4	6.4	6.4	6.4	32	20.4	17.4	13.4	41.4	8.4	60	51	39	77	25
15V20EE400	13	12	25	10	20	30	5	13	18	2	2	2	2	2	10	4.2	4.2	4.2	4.2	4.2	21	19.2	18.2	16.2	31.2	19.2	56	54	48	58	56
15V20EE401	4	10	14	4	0	4	10	20	30	2	2	2	2	2	10	6	6	6	6	6	30	12	18	12	18	28	35	53	35	33	82
15V20EE402	19	12	31	6	20	26	2	11	13	2	2	2	2	2	10	6.4	6.4	6.4	6.4	6.4	32	27.4	20.4	14.4	30.4	19.4	81	60	42	56	57
15V20EE404	6	10	16	9	20	29	6	15	21	2	2	2	2	2	10	6.4	6.4	6.4	6.4	6.4	32	14.4	18.4	17.4	34.4	23.4	42	54	51	64	69
TOTAL	203	203	406	120	250	370	232	205	437	38	38	38	38	38	199	101	101	101	101	101	505	342	342	259	621	344	1006	1006	762	1150	1012
Total students	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19	19
Average	10.7	10.7	21.4	6.32	13.16	19.47	12.2	10.8	23	2	2	2	2	2	10.5	5.3	5.3	5.3	5.3	5.3	26.6	18.0	18.0	13.6	32.7	18.1	52.9	52.9	40.1	60.5	53.3

Power System Analysis - I
2021-22
18EE62

G. H. R. ...
Head of the Department
Electrical & Electronics Engineering
Sri Devi Institute of Engineering & Technology
TUMKUR-572106
PRINCIPAL
SIET, TUMAKURU

**DEPARTMENT OF ELECTRICAL & ELECTRONICS ENGINEERING**

SUBJECT	DIGITAL SIGNAL PROCESSING	SUBJECT CODE	18EE63
----------------	----------------------------------	---------------------	---------------

COURSE OUTCOME

- CO1:** Apply DFT and IDFT to perform linear filtering techniques on given sequences to determine the output.
- CO2:** Apply fast and efficient algorithms for computing DFT and inverse DFT of a given sequence
- CO3:** Design and realize infinite impulse response Butterworth and Chebyshev digital filters using impulse invariant and bilinear transformation techniques
- CO4:** Develop a digital IIR filter by direct, cascade, parallel, ladder and FIR filter by direct, cascade and linear phase methods of realization
- CO5:** Design and realize FIR filters by use of window function and frequency sampling method

PROGRAM OUTCOMES

- PO1** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- PO2** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- PO6** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. Ram
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.

Principals
PRINCIPAL
SIET, TUMAKURU.

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	Mr. G. H. RAVIKUMAR											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER		VI	SECTION			EEE				
SUBJECT	DIGITAL SIGNAL PROCESSING					SUBJECT CODE			18EE63			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	2	3	-	-	-	-	-	-	-	-	-	-
CO2	3	2	2	-	-	-	-	-	-	-	-	-
CO3	3	2	2	-	2	-	-	-	-	-	-	-
CO4	3	2	2	-	2	-	-	-	-	-	-	-
CO5	2	3	-	-	2	-	-	-	-	-	-	-
AVERAGE	2.6	2.4	2	-	2	-	-	-	-	-	-	-
OVERALL MAPPING OF SUBJECT												2.25

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	51.84	1.03	1.55	-	-	-	-	-	-	-	-	-	-
CO2	55.78	1.67	1.11	1.11	-	-	-	-	-	-	-	-	-
CO3	44.14	1.32	0.88	0.88	-	0.88	-	-	-	-	-	-	-
CO4	47.28	1.41	0.94	0.94	-	0.94	-	-	-	-	-	-	-
CO5	54.03	1.08	1.62	-	-	1.08	-	-	-	-	-	-	-
AVERAGE	50.61	1.30	1.22	0.97	-	0.966	-	-	-	-	-	-	-
FINAL ATTAINMENT LEVEL													1.114

G. H. Ramesh
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Technology
 TUMKUR-572106

N. S. Srinivas
 PRINCIPAL
 SIET, TUMKUR

Academic year	2021-22			SEM VI			Total strength			18			Subject:ITAL SIGNAL PROCESS					Subject Code					18EE63										
SEM:VI	IA TEST 1(30M)			IA TEST 2(30M)			IA TEST 3(30M)			ASSIGNMENT / QUIZ(10 M)					SEE MARKS(60)					Total COs ATTAINMENT					% of individual CO					SEE Tot	60M		
USN	CO1	CO2	TOTAL	CO3	CO4	TOTAL	CO4	CO5	TOTAL	CO1	CO2	CO3	CO4	CO5	CO1-12	CO2	CO3	CO4	CO5	CO1-29	CO2-34	CO3-34	CO4-44	CO5-49	CO1	CO2	CO3	CO4	CO5	60M			
15V18EE001	12	11	23	12	8	20	6	11	17	2	2	2	2	2	4.8	4.8	4.8	4.8	4.8	18.8	17.8	14.8	18.8	19	64.83	52.35	43.53	55.29	38.78	24			
15V19EE001	13	14	17	0	0	0	8	10	18	2	2	2	2	2	5	5	5	5	5	20	21	7	15	17	68.97	47.73	24.14	51.72	58.62	25			
15V19EE002	6	5	11	6	3	9	8	6	14	2	2	2	2	2	0.2	0.2	0.2	0.2	0.2	8.2	13.2	5.2	10.2	8.2	28.28	30.00	17.93	35.17	28.28	1			
15V19EE005	7	6	13	5	4	9	8	12	20	2	2	2	2	2	4.2	4.2	4.2	4.2	4.2	13.2	17.2	10.2	14.2	18.2	45.52	39.09	35.17	48.97	62.76	21			
15V19EE006	12	9	21	8	2	10	12	5	17	2	2	2	2	2	4.6	4.6	4.6	4.6	4.6	18.6	23.6	8.6	18.6	11.6	64.14	53.64	29.66	64.14	40.00	23			
15V19EE007	11	10	21	11	8	19	9	9	18	2	2	2	2	2	6.6	6.6	6.6	6.6	6.6	19.6	29.6	16.6	17.6	17.6	67.59	67.27	57.24	60.69	60.69	33			
15V19EE008	7	5	12	12	2	14	5	12	17	2	2	2	2	2	4.6	4.6	4.6	4.6	4.6	13.6	23.6	8.6	11.6	18.6	46.90	53.64	29.66	40.00	64.14	23			
15V19EE009	8	10	18	6	4	10	4	13	17	2	2	2	2	2	1.6	1.6	1.6	1.6	1.6	11.6	19.6	7.6	7.6	16.6	40.00	44.55	26.21	26.21	57.24	8			
15V19EE011	15	15	30	15	15	30	12	12	24	2	2	2	2	2	6	6	6	6	6	23	38	23	20	20	79.31	86.36	79.31	68.97	68.97	30			
15V19EE012	10	13	23	13	10	23	9	12	21	2	2	2	2	2	3.2	3.2	3.2	3.2	3.2	15.2	31.2	15.2	14.2	17.2	52.41	70.91	52.41	48.97	59.31	16			
15V19EE014	9	8	17	8	9	17	7	8	15	2	2	2	2	2	0.2	0.2	0.2	0.2	0.2	11.2	18.2	11.2	9.2	10.2	38.62	41.36	38.62	31.72	35.17	1			
15V19EE016	4	6	10	12	8	20	4	11	15	2	2	2	2	2	2.8	2.8	2.8	2.8	2.8	8.8	22.8	12.8	8.8	15.8	30.34	51.82	44.14	30.34	54.48	14			
15V19EE017	15	15	30	13	13	26	11	13	24	2	2	2	2	2	6.4	6.4	6.4	6.4	6.4	23.4	36.4	21.4	19.4	21.4	80.69	82.73	73.79	66.90	73.79	32			
15V19EE020	10	9	19	10	5	15	10	7	17	2	2	2	2	2	4.2	4.2	4.2	4.2	4.2	16.2	25.2	11.2	16.2	13.2	55.86	57.27	38.62	55.86	45.52	21			
15V20EE400	5	8	13	12	8	20	7	12	19	2	2	2	2	2	1.8	1.8	1.8	1.8	1.8	8.8	23.8	11.8	10.8	15.8	30.34	54.09	40.69	37.24	54.48	9			
15V20EE401	4	5	9	10	11	21	5	12	17	2	2	2	2	2	4.6	4.6	4.6	4.6	4.6	10.6	21.6	17.6	11.6	18.6	36.55	49.09	60.69	40.00	64.14	23			
15V20EE402	7	8	15	12	11	23	8	12	20	2	2	2	2	2	2.4	2.4	2.4	2.4	2.4	11.4	24.4	15.4	12.4	16.4	39.31	55.45	53.10	42.76	56.55	12			
15V20EE404	12	14	26	9	8	17	7	8	15	2	2	2	2	2	4.4	4.4	4.4	4.4	4.4	18.4	29.4	14.4	13.4	14.4	63.45	66.82	49.66	46.21	49.66	22			



SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY

SIRA ROAD, TUMKUR- 572 106.

DEPARTMENT OF ELECTRICAL & ELECTRONICS ENGINEERING

SUBJECT	SENSORS & TRANSDUCERS	SUBJECT CODE	18EE647
---------	-----------------------	--------------	---------

COURSE OUTCOME

- CO1:** Use gauges and transducers to measure pressure, direction and distance
- CO2:** Discuss the use of light transducers and other devices used for the measurement of electromagnetic radiations
- CO3:** Explain the working of different temperature sensing devices
- CO4 :** Discuss the principles and applications of audio electrical sensors and transducers used for the Measurement of sound
- CO5:** Discuss the use of sensors for the measurement of mass, volume and environmental quantities

PROGRAM OUTCOMES

- PO1** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- PO2** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- PO6** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. U. R. Department
of Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.


PRINCIPAL
SIET, TUMAKURU.

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	Mr. G. H. RAVIKUMAR											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER			VI	SECTION			EEE			
SUBJECT	SENSORS & TRANSDUCERS					SUBJECT CODE			18EE647			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	3	-	-	-	-	-	3	-	-	-	-	3
CO2	2	-	-	-	-	-	-	-	-	-	-	-
CO3	2	-	-	-	-	-	2	-	-	-	-	2
CO4	2	-	-	-	-	-	2	-	-	-	-	2
CO5	3	-	-	-	-	-	3	-	-	-	-	3
AVERAGE	2.4	-	-	-	-	-	2.5	-	-	-	-	2.5
OVERALL MAPPING OF SUBJECT												2.2

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	73.524	2.20	-	-	-	-	-	2.20	-	-	-	-	2.20
CO2	78.497	1.57	-	-	-	-	-	-	-	-	-	-	-
CO3	75.057	1.50	-	-	-	-	-	1.50	-	-	-	-	1.50
CO4	72.519	1.45	-	-	-	-	-	1.45	-	-	-	-	1.45
CO5	76.590	2.30	-	-	-	-	-	2.30	-	-	-	-	2.30
AVERAGE	75.23	1.80	-	-	-	-	-	1.86	-	-	-	-	1.86
FINAL ATTAINMENT LEVEL													1.84

G. H. R. Ramesh
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106

(Signature)
PRINCIPAL
SIET, TUMAKURU.



SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY

SIRA ROAD, TUMKUR- 572 106.

DEPARTMENT OF ELECTRICAL AND ELECTRONICS ENGG

SUBJECT	NON CONVENTIONAL ENERGY SOURCES	SUBJECT CODE	18ME651
---------	---------------------------------	--------------	---------

COURSE OUTCOME

CO1	Describe the environmental aspects of non-conventional energy resources. In Comparison with various conventional energy systems, their prospects and limitations.
CO2	Know the need of renewable energy resources, historical and latest developments
CO3	Describe the use of solar energy and the various components used in the energy production with respect to applications like-heating, cooling, desalination, power generation, drying, cooking etc.
CO4	Appreciate the need of Wind Energy and the various components used in energy generation and know the classifications.
CO5	Understand the concept of Biomass energy resources and their classification, types of biogas Plants- applications

PROGRAM OUTCOMES

- P01** Engineering knowledge: An ability to apply knowledge of mathematics (including probability, statistics and discrete mathematics), science, and engineering for solving Engineering problems and Knowledge.
- P02** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- P03** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- P04** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- P05** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- P06** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- P07** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- P08** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- P09** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- P010** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- P011** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- P012** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	THIPPESWAMY											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER			VI	SECTION			EEE			
SUBJECT	NON CONVENTIONAL ENERGY SOURCES					SUBJECT CODE			18ME651			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
	1	2	3	4	5	6	7	8	9	10	11	12
CO1	3	1	2									
CO2	1	2	3			2			2			
CO3	3	1	2									
CO4	1	2	3		2		2		2			
CO5	3	1	3		2		2		2			
AVERAGE	2.2	1.4	2.6		2	2	2		2			
OVERALL MAPPING OF SUBJECT												2.02

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	45	0.99	0.63	1.17									
CO2	41	0.90	0.57	1.06			0.82			0.82			
CO3	45.02	0.99	0.63	1.17									
CO4	45.02	0.99	0.63	1.17		0.90		0.90		0.90			
CO5	45.02	0.99	0.63	1.17		0.90		0.90		0.90			
AVERAGE	44.21	0.97	0.62	1.14		0.9	0.82	0.90		0.87			
FINAL ATTAINMENT LEVEL													0.88

G. H. Ramesh
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Technology
 TUMKUR-572106

Principal
 PRINCIPAL
 SIET, TUMKURU.

STAFF NAME: THIPPESWAMY																																																			
Academic	SEM						19						Subject						Subject Code						SEMESTER																										
REG. NO.	IA TEST (100)			IA TEST (100)			IA TEST (100)			ASSIGNMENT / QUIZ (100)			SEE MARKS (100)			Total Class ATTAINMENT						% of individual CG																													
ENR	CO1	CO2	TOTAL	CO1	CO2	TOTAL	CO1	CO2	TOTAL	CO1	CO2	CO3	CO4	CO5	CO1-12	CO2	CO3	CO4	CO5	CO1-20	CO2-44	CO3-25	CO4-25	CO5-25	CG1	CG2	CG3	CG4	CG5																						
SW19E01	5	5	10	5	5	10	5	5	10	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																			
SW19E02	4.2	4.2	8.4	4.2	4.2	8.4	4.2	4.2	8.4	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																			
SW19E03	4	4	8	4	4	8	4	4	8	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																			
SW19E04	5.3	5.3	10.6	5.3	5.3	10.6	5.3	5.3	10.6	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
SW19E05	4.2	4.2	8.4	4.2	4.2	8.4	4.2	4.2	8.4	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
SW19E06	6	6	12	6	6	12	6	6	12	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
SW19E07	4.5	4.5	9	4.5	4.5	9	4.5	4.5	9	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
SW19E08	4.3	4.3	8.6	4.3	4.3	8.6	4.3	4.3	8.6	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
SW19E09	6.5	6.5	13	6.5	6.5	13	6.5	6.5	13	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
SW19E10	5	5	10	5	5	10	5	5	10	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
SW19E11	3.8	3.8	7.6	3.8	3.8	7.6	3.8	3.8	7.6	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
SW19E12	4.3	4.3	8.6	4.3	4.3	8.6	4.3	4.3	8.6	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
SW19E13	3.8	3.8	7.6	3.8	3.8	7.6	3.8	3.8	7.6	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
SW19E14	6.5	6.5	13	6.5	6.5	13	6.5	6.5	13	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
SW19E15	5.3	5.3	10.6	5.3	5.3	10.6	5.3	5.3	10.6	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
SW20E16	5	5	10	5	5	10	5	5	10	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
SW20E17	5.3	5.3	10.6	5.3	5.3	10.6	5.3	5.3	10.6	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
SW20E18	4.6	4.6	9.2	4.6	4.6	9.2	4.6	4.6	9.2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
SW20E19	5.6	5.6	11.2	5.6	5.6	11.2	5.6	5.6	11.2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2																		
																				13.04737	17.97368	11.05785	13.05789	13.05789	13.05789	44.90053	40.88818	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722	45.02722

G. H. Ramesh
 Head of the Department
 Electrical & Electronics Engineering
 Shivdew Institute of Engineering & Technology
 TUMKUR-572106

PRINCIPAL
 SIET, TUMAKURU



SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY

SIRA ROAD, TUMKUR- 572 106.

DEPARTMENT OF ELECTRICAL & ELECTRONICS ENGINEERING

25 21-22

SUBJECT	POWER SYSTEM OPERATION & CONTROL	SUBJECT CODE	18EE81
---------	----------------------------------	--------------	--------

COURSE OUTCOME

- CO1: Describe various levels of controls in power systems, architecture and configuration of SCADA
- CO2: Develop and analyze mathematical models of Automatic Load Frequency Control.
- CO3: Develop mathematical model of Automatic Generation Control in Interconnected Power system
- CO4: Discuss the Control of voltage, Reactive Power and Voltage collapse
- CO5: Explain security, contingency analysis, state estimation of power systems

PROGRAM OUTCOMES

- PO1 Engineering knowledge: An ability to apply knowledge of mathematics, science, and engineering for solving Engineering problems and Knowledge.
- PO2 Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3 Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4 Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5 Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- PO6 The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7 Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8 Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9 Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10 Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11 Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12 Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. R. ...
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.

Principal
PRINCIPAL
SIET, TUMAKURU

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	Mr. G. H. RAVIKUMAR											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER			VIII	SECTION			EEE			
SUBJECT	POWER SYSTEM OPERATION & CONTROL					SUBJECT CODE			18EE81			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	2	3	-	-	2	-	-	-	-	-	-	1
CO2	2	3	2	-	2	-	-	-	-	-	-	1
CO3	2	3	-	-	2	-	-	-	-	-	-	1
CO4	2	3	-	-	2	-	-	-	-	-	-	1
CO5	2	3	-	-	2	-	-	-	-	-	-	1
AVERAGE	2	3	-	-	2	-	-	-	-	-	-	1
OVERALL MAPPING OF SUBJECT												2

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	59.04	1.18	1.77			1.18							0.590
CO2	62.27	1.245	1.868			1.245							0.622
CO3	62.43	1.248	1.872			1.248							0.624
CO4	70.61	1.412	2.118			1.412							0.706
CO5	56.90	1.138	1.707			1.138							0.569
AVERAGE	62.25	1.244	1.867			1.244							0.622
FINAL ATTAINMENT LEVEL													1.244

G. H. Ravi
 Head of the Department
 Electrical & Electronics Engineering
 Shridevi Institute of Engineering & Technology
 TUMKUR-572106.

(Signature)
 PRINCIPAL
 SIET, TUMAKURU



DEPARTMENT OF ELECTRICAL & ELECTRONICS ENGINEERING

SUBJECT	POWER SYSTEM PLANNING	SUBJECT CODE	18EE824
---------	-----------------------	--------------	---------

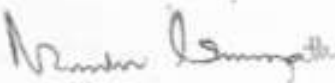
COURSE OUTCOME

- CO1:** Discuss primary components of power system planning, planning methodology for optimum power system expansion and load forecasting
- CO2:** Understand economic appraisal to allocate the resources efficiently and appreciate the investment decisions
- CO3:** Discuss expansion of power generation and planning for system energy in the country, evaluation of operating states of transmission system, their associated contingencies and the stability of the system
- CO4:** Discuss principles of distribution planning, supply rules, network development and the system studies
- CO5:** Discuss reliability criteria for generation, transmission, distribution and reliability evaluation and analysis, grid reliability, voltage disturbances and their remedies
- CO6:** Discuss planning and implementation of electric –utility activities, market principles and the norms framed

PROGRAM OUTCOMES

- PO1** Engineering knowledge: An ability to apply knowledge of mathematics, science, and engineering for solving Engineering problems and Knowledge.
- PO2** Problem analysis: Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- PO3** Design / development of solutions: An ability to design solution for engineering problems and design system components or process to meet desired specifications and needs.
- PO4** Conduct investigations of complex Problem: An ability to identify, formulate, comprehend, analyze, design synthesis of the information to solve complex engineering problems and provide valid conclusions.
- PO5** Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modeling to complex engineering activities.
- PO6** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal, and cultural issues.
- PO7** Environment and sustainability: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- PO8** Ethics: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- PO9** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- PO10** Communication: Communicate effectively on complex engineering activities with the engineering community and with the society.
- PO11** Project management and finance: An ability to use the modern engineering tools, techniques, skills and management principles to do work as a member and leader in a team, to manage projects in multidisciplinary environments.
- PO12** Life-long learning: A recognition of the need for, and an ability to engage in, to resolve contemporary issues and acquire lifelong learning.

G. H. Rao
Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.


PRINCIPAL
SIET, TUMAKURU

COLLEGE	SHRIDEVI INSTITUTE OF ENGINEERING & TECHNOLOGY											
FACULTY NAME	Mr. G. H. RAVIKUMAR											
BRANCH	EEE			ACADEMIC YEAR				2021-22				
COURSE	B.E	SEMESTER			VIII	SECTION			EEE			
SUBJECT	POWER SYSTEM PLANNING					SUBJECT CODE			18EE824			
CO & PO MAPPING												
	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	-		3	-	-	2	-	-	-	-	-	-
CO2	-	3	-	-	-	-	-	-	-	-	-	2
CO3	-	-	3	-	-	2	-	-	-	-	-	2
CO4	-	-	3	3	-	2	-	-	-	-	-	2
CO5	-	-	-	3	-	2	-	-	-	-	-	2
CO6	-	-	-	3	-	2	-	-	-	-	-	2
AVERAGE	-	3	3	3	-	2	-	-	-	-	-	2
OVERALL MAPPING OF SUBJECT												2.4

CO AND PO ATTAINMENT

	CO%	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO1	58.876	-	-	1.76	-	-	1.177	-	-	-	-	-	
CO2	61.533	-	1.84	-	-	-	-	-	-	-	-	-	1.23
CO3	58.118	-	-	1.743	-	-	1.162	-	-	-	-	-	1.162
CO4	58.118	-	-	1.743	1.743	-	1.162	-	-	-	-	-	1.162
CO5	61.1607	-	-	-	1.834	-	1.223	-	-	-	-	-	1.223
CO6	62.598	-	-	-	1.877	-	1.251	-	-	-	-	-	1.251
AVERAGE	60.067		1.84	1.75	1.818		1.195	-	-	-	-	-	1.205
FINAL ATTAINMENT LEVEL													1.561

Head of the Department
Electrical & Electronics Engineering
Shridevi Institute of Engineering & Technology
TUMKUR-572106.

Manjunath
PRINCIPAL
SIET, TUMAKURU

