#### STUDY AND EVALUATION SCHEME FORLATERAL ENTRY AND ITI PASSED STUDENTS DIPLOMA PROGRAMME IN ELECTRICAL ENGINEERING

### THIRD SEMESTER

	SUBJECTS		STUDY			MARKS IN EVALUATION SCHEME										
Sr.			SCHEME Periods/Week			INTERNAL ASSESSMENT					Marks of Internal					
No.		L	Т	Р		Th	Pr	Tot	Th	Hrs	Pr	Hrs	Tot	& External		
3.1	*Applied Mathematics -III	5	-	-	4	20	-	20	50	2 1/2	-	-	50	70		
3.2	Electrical Instrumentation and Measurement	6	-	4	6	20	20	40	50	2 1/2	40	3	90	130		
3.3	Electrical and Electronics Engineering Materials	6	-	-	5	20	-	20	50	2 1/2	-	-	50	70		
3.4	Digital Electronics	5	-	4	5	20	20	40	50	2 1/2	40	3	90	130		
3.5	Electrical Machine - I	6	-	4	6	20	20	40	50	2 1/2	40	3	90	130		
3.6	*Environmental Studies	3	-	2	3	20	10	30	50	2 1/2	20	3	70	100		
#Student Centred Activities including Energy Conservation Awareness		-	-	3	2		30	30	-	-	-	-	-	30		
	Total	31	-	17	31	120	100	220	300	-	140	-	440	660		

\* Common with other diploma programmes

# Student Centred Activities will comprise of co-curricular activities like extension lectures, games, hobby clubs e.g. photography etc., seminars, declamation contests, educational field visits, N.C.C., NSS, Cultural Activities and self study etc.

# A. COMPULSORY SUBJECT OF I & II SEMESTER ELECTRICAL ENGINEERING TO BE TAUGHT IN III & IV SEMESTER TO ITI PASSED STUDENTS OF TRADES ARE AS FOLLOWS :

I. WIREMAN II. ELECTRICIAN III. ELECTROPLATER IV. ELECTRICAL SECTOR

	SUBJECTS	STUDY SCHEME Periods/Week			Credits		Total Morika of							
Sr. No.						INTERNAL ASSESSMENT					Marks of Internal			
190.		L	Т	Р		Th	Pr	Tot	Th	Hrs	Pr	Hrs	Tot	& External
1.1	*Communication Skills-I	4	-	2	4	-	-	-	50	2 1/2	20	3	70	70
1.2	*Applied Mathematics - I	5	-	-	4	-	-	-	50	2 1/2	-	-	50	50
1.3	*Applied Physics – I	5	-	2	5	-	-	-	50	2 1/2	20	3	70	70
1.4	*Applied Chemistry	5	-	2	5	-	-	-	50	2 1/2	20	3	70	70
		19		6	18	-	-	-	200		60		260	260

\* Common with other diploma programmes

# Student Centred Activities will comprise of co-curricular activities like extension lectures, self study, games, hobby clubs e.g. photography etc., seminars, declamation contests, educational field visits, N.C.C., NSS, Cultural Activities, disaster management and safety etc.

(\*) It is compulsory to appear & to pass in examination From III Semester To VI Semester, But credit/marks will not be included for division and percentage of obtained marks.

(\*) Four Semester (Two Years) of Extra Time will be given after diploma curriculum period (If Required) to pass the above paper (1.1 To 1.4 and 2.1 to 2.2) examination (As Per G. O. No. 2221/16-Pra. Shi.-3-2009 Dated 28-08-2009) & Revised G.O. No. 2704/16-Pra.Shi.-3-2013-46(8)/2002 Dated 09-01-2013 and B.T.E Order No. Pra.Shi.Pa/C.D.C./2022/872021 Dated 21.02.22

#### FOURTH SEMESTER

	SUBJECTS		STUDY			MARKS IN EVALUATION SCHEME										
Sr.		SCHEME Periods/Week			Credits	INTERNAL ASSESSMENT				Marks of Internal						
No.		L	Т	Р		Th	Pr	Tot	Th	Hrs	Pr	Hrs	Tot	& External		
4.1	*Communication Skill- II	4	-	2	4	20	10	30	50	2 1/2	20	3	70	100		
4.2	Industrial Electronics and Control	5	1	4	6	20	20	40	50	2 1/2	40	3	90	130		
4.3	Electrical Design, Drawing and Estimating-I	3	-	8	5	20	20	40	50	3	40	4	90	130		
4.4	Power Plant Engineering	5	-	-	4	20	-	20	50	2 1/2	-	-	50	70		
4.5	Transmission and Distribution of Electrical Power	6	1	-	5	20	-	20	50	2 1/2	-	-	50	70		
4.6	*Energy Conservation	3	-	2	3	20	10	30	50	2 1/2	20	3	70	100		
4.7	Universal Human Values	2	-	1	1	-	20	20	-	-	30	3	30	50		
# Stu	dent Centred Activities	-	-	1	1	-	30	30	-	-	-	-	-	30		
	Total		2	18	29	120	110	230	300	-	150	-	450	680		

Note: Industrial Training for 4 weeks after fourth semester during summer vacation.

# Student Centred Activities will comprise of co-curricular activities like extension lectures, games, hobby clubs e.g. photography etc., seminars, declamation contests, educational field visits, N.C.C., NSS, Cultural Activities and self study etc.

B. COMPULSORY SUBJECT OF I & II SEMESTER ELECTRICAL ENGINEERING TO BE TAUGHT IN III & IV SEMESTER TO ITI PASSED STUDENTS OF TRADES ARE AS FOLLOWS :

I. WIREMAN II. ELECTRICIAN III. ELECTROPLATER IV. ELECTRICAL SECTOR

Sr.	SUBJECTS	STUDY SCHEME Periods/Week			Credits	MARKS IN INTERNAL ASSESSMENT			EVAL	Total Marks of Internal				
No.		L	Т	Р	1	Th	Pr	Tot	Th	Hrs	Pr	Hrs	Tot	& External
2.1	*Applied Mathematics - II	5	-	-	4	-	-	-	50	2 1/2	-	-	50	50
2.2	*Applied Physics -II	5	-	2	5	-	-	-	50	2 1/2	20	3	70	70
	Total		-	2	9	-	-	-	100	-	20	-	120	120

\* Common with other diploma programme

# Student Centred Activities will comprise of co-curricular activities like extension lectures, self study, games, hobby clubs e.g. photography etc., seminars, declamation contests, educational field visits, N.C.C., NSS, Cultural Activities, disaster management and safety etc. Industrial training of 4 weeks duration to be organised after 4<sup>th</sup> semester exams

(\*) It is compulsory to appear & to pass in examination From III Semester To VI Semester, But credit/marks will not be included for division and percentage of obtained marks.

(\*) Four Semester (Two Years) of Extra Time will be given after diploma curriculum period (If Required) to pass the above paper (1.1 To 1.4 and 2.1 to 2.2) examination (As Per G. O. No. 2221/16-Pra. Shi.-3-2009 Dated 28-08-2009) & Revised G.O. No. 2704/16-Pra.Shi.-3-2013-46(8)/2002 Dated 09-01-2013 and B.T.E Order No. Pra.Shi.Pa/C.D.C./2022/872021 Dated 21.02.22

### FIFTH SEMESTER

	SUBJECTS		STUDY				Total Marks of Internal							
Sr.		SCHEME Periods/Week			Credits	INTERNAL ASSESSMENT								
No.		L	Т	Р		Th	Pr	Tot	Th	Hrs	Pr	Hrs	Tot	& External
-	Industrial Training	-	-	-	2	-			-	-	50	3	50	50
5.1	*Industrial Management and Entrepreneurship Development	5	-	-	4	20	-	20	50	2 1/2	-	-	50	70
5.2	Switchgear andProtection	5	1	-	5	20	-	20	50	2 1/2	-	-	50	70
5.3	PLC, Microcontroller and SCADA	6	-	6	7	20	35	55	50	2 1/2	70	3	120	175
5.4	Electrical Machine – II	6	1	6	8	20	35	55	50	2 1/2	70	3	120	175
5.5	**Elective	6	-	-	5	20	-	20	50	2 1/2	-	-	50	70
#Stuc	#Student Centred Activities(SCA)		-	6	2	-	30	30	-	-	-	-	-	30
	Total		2	18	33	100	100	200	250	-	190	-	440	640

\* Common with other diploma programmes

\*\* Elective (Any one out of the following)

5.5.1 Renewable Sources of Energy

5.5.3 Control of Electrical Machine

- 5.5.2 Electric Traction
- 5.5.4 Energy Management

# Student Centred Activities will comprise of co-curricular activities like extension lectures, games, hobby clubs e.g. photography etc., seminars, declamation contests, educational field visits, N.C.C., NSS, Cultural Activities and self study etc.

## SIXTH SEMESTER

		STUDY SCHEME Periods/Week				MARKS IN EVALUATION SCHEME										
Sr.	SUBJECTS				Credits	INTERNAL ASSESSMENT					Marks of Internal					
No.		L	Т	Р		Th	Pr	Tot	Th	Hrs	Pr	Hrs	Tot	& External		
6.1	Installation, Maintenance and Repair of Electrical Equipment	6	-	6	7	20	35	55	50	2 1⁄2	70	3	120	175		
6.2	Electrical Design, Drawing and Estimating II	5	-	8	7	20	20	40	50	3	40	4	90	130		
6.3	Utilization of Electrical Energy	5	-	-	4	20	-	20	50	2.5	-	-	50	70		
6.4	Application of Computer Software in Electrical Engineering	-	-	2	1	-	20	20	-	-	30	3	30	50		
6.5	Project Work	-	-	12	5	-	50	50	-	-	100	3	100	150		
#Stuc	dent Centred Activities	-	-	4	2	-	30	30	-	-	-	-	-	30		
	Total		-	32	26	60	155	215	150	-	240	-	390	605		

#Student Centred Activities will comprise of co-curricular activities like extension lectures, games, hobby clubs e.g. photography etc., seminars, declamation contests, educational field visits, N.C.C., NSS, Cultural Activities and self study etc.