Chemistry Lab

Course Code	23BS1151	**Year**	I	**Semester**	I
Course Category	Basic Sciences	**Branch**	**ECE**	**CourseType**	Lab
Credits	1	**L-T-P**	0-0-2	**Prerequisites**	Nil
ContinuousInternal Evaluation:	**30**	**SemesterEnd Evaluation:**	**70**	**Total Marks:**	**100**

Course Outcomes	
Upon successful completion of the course, the student will be able to	
CO1	**Demonstrate** the working of potentiometer and conductometer instruments.L3
CO2	**Prepare** advanced materials like polymers and Nano materials L3
CO3	**Calculate** the strength of Pb-Acid battery L4
CO4	**Examine** the ferrous iron content in a sample using dichrometry L4
CO5	**Calculate** the wave length of a sample using UV-Visible Spectroscopy and colorimetry L4

Contribution of Course Outcomes towards achievement of Program Outcomes & Strength ofcorrelations (3:High, 2: Medium, 1:Low)

	PO1	**PO2**	**PO3**	**PO4**	**PO5**	**PO6**	**PO7**	**PO8**	**PO9**	**PO10**	**PO11**	**PSO 1**	**PSO 2**
CO1	3												
CO2	3												
CO3		3											
CO4		3											
CO5		3											

Syllabus		
Exp.No.	**Contents**	**Mapped CO**
	Experiments	
1	Conductometric titration of strong acid vs strong base	CO-1
2	Conductometric titration of weak acid vs. strong base	CO-1
3	Determination of cell constant and conductance of solutions	CO-1
4	Potentiometry - determination of redox potentials and emfs	CO-1
5	Determination of Strength of an acid in Pb-Acid battery	CO-3
6	Preparation of a Bakelite	CO-2
7	Verify Lambert-Beer's law	CO-5
8	Wavelength measurement of sample through UV-Visible Spectroscopy	CO-5
9	Preparation of nanomaterials by precipitation method	CO-2
10	Estimation of Ferrous Iron by Dichrometry	CO-4

Learning Resources
J. Mendham, R.C. Denney, J.D. Barnes and B. Sivasankar, Vogel's Quantitative Chemical Analysis, 6th Ed., Pearson Publications