#### Semester - III

Course Title	RESEARCH METHODOLOGY
Total Hrs	75
Hrs/Week	5
Sub. Code	21PCEN34
Course Type	DSC -XII
Credits	3
Marks	100

**General Objective:** To explore the issues and salient features of the research process and to search, select, and critically analyse research articles and papers.

# **Course Objectives:**

CO No.	The learners will be able to								
CO-1	Explain in selecting and defining the appropriate research								
	problems.								
CO-2	Organize ideas and format of dissertation.								
CO-3	Analyze the mechanics and methodology of writing a literary								
	project.								
CO-4	Evaluate the various methodologies and formats of research.								
CO-5	Compose and describe the Research Questions.								

# Unit 1 Research Methodology: An Introduction (Page 1 - 23)

Meaning of Research, Objectives of Research, Motivation in Research, Types of Research, Research Approaches, Significance of Research, Research Methods versus Methodology, Research and Scientific Method, Importance of Knowing How Research is Done, Research Process, Criteria of Good Research, Problems Encountered by Researchers in India.

## Unit 2 Defining the Research Problem (Page 24-52)

What is a Research Problem? Selecting the Problem, Necessity of Defining the Problem, Technique Involved in Defining a Problem, Research Design, Meaning of Research Design, Need for Research Design, Features of a Good Design, Important Concepts Relating to Research Design, Different Research Designs, Basic Principles of Experimental Designs.

#### Unit 3 Testing of Hypotheses-I (Page 184 – 232)

Parametric or Standard Tests of Hypotheses, What is a Hypothesis? Basic Concepts Concerning Testing of Hypotheses, Procedure for Hypothesis Testing, Flow Diagram for Hypothesis Testing, Measuring the Power of a Hypothesis Test, Tests of Hypotheses, Important Parametric Tests, Hypothesis Testing of Means, Hypothesis Testing for Differences between Means, Hypothesis Testing for Comparing Two Related Samples, Hypothesis Testing of Proportions, Hypothesis Testing for Comparing a Variance to Some Hypothesized Population Variance, Testing the Equality of Variances of Two Normal Populations, Hypothesis Testing of Correlation Coefficients, Limitations of the Tests of Hypotheses

## Unit 4 Methods of Data Collection (Page 95 – 118)

Collection of Primary Data, Observation Method, Interview Method, Collection of Data through Questionnaires, Collection of Data through Schedules, Difference between Questionnaires and Schedules, Some Other Methods of Data Collection, Collection of Secondary Data, Contents xiii Selection of Appropriate Method for Data Collection, Case Study Method, Appendices (i) Guidelines for Constructing Questionnaire/Schedule (ii) Guidelines for Successful Interviewing (iii) Difference between Survey and Experiment.

#### Unit 5 Interpretation and Report Writing (Page 344 – 374)

Meaning of Interpretation, Why Interpretation? Technique of Interpretation: Precaution in Interpretation, Significance of Report Writing, Different Steps in Writing Report, Layout of the Research Report, Types of Reports, Oral Presentation, Mechanics of Writing a Research Report, Precautions for Writing Research Reports,

**The Computer:** Its Role in Research, Introduction, The Computer and Computer Technology, The Computer System, Important Characteristics, The Binary Number System, Computer Applications, Computers and Researcher.

#### **TEXTBOOKS:**

Kothari C R. Research Methodology: Methods and Techniques. New Age International Publishers. 2004.

#### **REFERENCE BOOKS:**

- 1. *MLA Handbook* 7<sup>th.</sup> Affiliated East West Press PVT. LTD. New Delhi, 2008.
- 2. MLA Handbook 8th .Modern Language Association of America. 2016.
- 3. APA Handbook 6th Edition.

## Course Outcomes: The learners would have learned to:

CO No.	Upon completion of the course,	PSOs	Cognitive
	the students will be able to	Addressed	Level
CO-1	Understand and familiar with current uses of the term's reliability and validity in their research.	1,2	Understanding
CO-2	Develop the criteria that can be used to select an appropriate research question or hypothesis.	1,2,3	Applying
CO-3	Categorise the conventions with good MLA and APA style for scholarly writing.	2,3	Analyzing
CO-4	Consider the recommendations of the research methodology and compose drafts free of plagiarism.	1,3,4	Evaluating
CO-5	Formulate the various ways of	1,3,4,5	Creating

growth	and	development	of	the		
Languag	ge.					

# Relationship Matrix

Semester	Course Code		le	Title of the Course			Hours		Credits	
III	211	PCEN34	EN34 RESEARCH METHODOLOG			75 Y			3	
Course	]	earning	<b>5</b>	Programme Specific						
Outcomes	Outcomes (PLOs) Outcomes (PSOs)									
(COs)	PLO1	PLO2	PLO3	PLO4	PLO5	PSO1	PSO2	PSO3	PSO4	PSO5
CO-1	<b>√</b>	<b>√</b>		✓	✓	✓		<b>√</b>	<b>√</b>	<b>√</b>
CO-2	<b>✓</b>		✓	✓	✓	<b>√</b>	✓	✓		✓
CO-3		✓	✓	✓	✓	<b>√</b>	✓		✓	✓
CO-4	<b>✓</b>	✓	✓		✓	✓	✓	✓	✓	<b>√</b>
CO-5	<b>√</b>	<b>√</b>	✓	<b>√</b>	✓	✓	✓	<b>√</b>	✓	<b>√</b>
	Number of matches (✓) = 43							ı		
	Relationship = High									