

SEMESTER – I

MED 104 Introduction to research method (Credit 4)

Unit – I Concept of Educational Research & Review of related literature (Credit 4)

- 1.1 Meaning, nature, need, importance and scope of educational research.**
- 1.2 Scientific Inquiry and Theory Development – some emerging trends in research.**
- 1.3 Areas of educational research and different sources of generating knowledge.**
- 1.4 Interdisciplinary in Educational Research.**
- 1.5 Purpose and need at different stage of research.**
- 1.6 Sources of literature review.**
- 1.7 Recording of various references – notes taking etc.**
- 1.8 Online/ Offline references.**

Unit – II Research Proposal & Types and Methods of Educational Research (Credit 1)

- 2.1 Conceptual Framework**
- 2.2 Selection & finalization of an educational research problem.**
- 2.3 Operational and functional terms.**
- 2.4 Review of related literature**
- 2.5 Objectives, assumptions, hypothesis**
- 2.6 Selection of method, sample and tools of research**
- 2.7 Data analysis method**
- 2.8 Time schedule, financial budget**
- 2.9 Types of educational research – Fundamental, Applied, Action research.**

2.10 Methods of Educational Research.

(i) Historical Research – need and significance, types, sources and collection of data; establishing validity and interpretation, Ex-Post Facto Research.

(ii) Descriptive Research – Surveys, Case study, developmental correlation studies – nature and use, steps and interpretation, Ex-Post Facto Research.

(iii) Experimental Research – need and significance – nature and steps- validity; internal and external, use and limitation of different types of experimental designs: Pre-experimental- role of control variables.

(iv) Naturalistic inquiry- situation-related integrative, phenomenological, experience based, subjective qualitative.

(v) Product Research.

(vi) Qualitative Research- Ethnomethodical

Unit – III Research problems, Variables, Hypothesis, Population and Sampling (Credit 1)

3.1 Source, selection and Criteria of research problem- based on experience, discussion.

Literature - Scope and delimitations, statement of the problem indifferent forms.

3.2 Concept, nature, characteristics and types of variables-inter relationship among different variables.

3.3 Concept, importance, characteristics and forms of hypothesis- formulation and testing.

3.4 Assumption – Concept

3.5 Population – Concept

3.6 Sampling – Concept and Need, characteristic of good sample.

3.7 Sampling Methods

(i) Probability Sampling: Simple Random sampling, use of random number table, Cluster, stratified and multistage sampling.

(ii) Non-Probability Sampling: Quota, judgment and purposive.

3.8 Errors in sampling.

Unit – IV Tools and Techniques of Educational Research

(Credit

1)

4.1 Observation.

4.2 Interview Schedule.

4.3 Questionnaire.

4.4 Test-achievement, intelligence, aptitude, and personality.

4.5 Opinionnaire- attitude scale, rating scale, check list.

4.6 e-tools – e-mail, fax website, Internet, teleconference.

4.7 Qualities of a good measuring tool and standardization procedure.

4.8 Preparation of tools.

4.9 Implementation of tools

Practical Work:

Study of recent research reviews about the unit wise course content.