



GANDHI INSTITUTE OF TECHNOLOGY AND MANAGEMENT (GITAM)

(Declared as Deemed to be University u/s 3 of UGC Act, 1956)

Visakhapatnam | Hyderabad | Bengaluru

Accredited by **NAAC** with **A++** Grade

Website: www.gitam.edu

PhD Entrance Test Syllabus: AY-2024-2025

Research Aptitude

**Common for Engineering, Science, Management, Humanities and Social Sciences,
Pharmacy and Law**

Syllabus for Research Aptitude

Unit I: Understanding the Research: Definitions, Quality, Purpose, Importance, and Objectives. Research Ethics: Integrity, Moral Principles, and Ethical Practices, Values, Privacy, and Confidentiality.

Unit II: Types of Research: Basic and Applied Research, Quantitative and Qualitative Research, Descriptive and Analytical Research.

Unit III: Writing a Research Proposal: Identifying and selecting the Research problem, Research questions, Background or literature review, Method and design, and References.

Unit IV: Definition and Importance of Hypothesis, Types of Hypothesis (Null Hypothesis and Alternative Hypothesis). Sampling Techniques – Random sampling, Stratified sampling, Cluster sampling, Systematic sampling, convenience sampling, and Judgment sampling.

Unit V: Data Collection Tools: Primary data and secondary data, Types of Questionnaire, Interview protocol, observation methods, Data Interpretation. Data Analysis: Tabulation, Diagrammatical representation of the data, Graphical representation of the data; Basics of documentation software tools.