

Syllabus

PhD Entrance (Monsoon Semester 2017)
Department of Economics & Public Policy
Central University of Himachal Pradesh

Part I: Research Methodology

Research Paradigms; Ontology, Epistemology, Methodology, and Methods; Scientific Research (Characteristics, Types, and Methods); Concepts, Constructs, Variables, and Types of Measurement Scale; Formulation of Research Problem; Research Design; Sampling; Questionnaire, Interview Schedule, Interview, Observation, Case Study; Measures of Central Tendency, Measures of Dispersion; Hypothesis; Test of Hypotheses; Type I and II Errors, Level of Significance; Tests involving Normal Distributions, Tests Involving Sample Differences; Tests Involving Binomial Distributions; Small Sampling Theory; The Chi-square Test

Part II: Economic Theory, Mathematics and Econometric Methods

Theory of Consumer and Producer Behaviour; Market Structures: Perfect Competition, Monopoly and Oligopoly; Factor pricing, Externalities and Public Goods; General Equilibrium.

Theories of consumption and Investments; Derivation, properties and shifts in IS and LM curves and simultaneously equilibrium in the goods and money market. Monetary and Fiscal policy; Effects of monetary and fiscal policies under different cases in IS and LM framework including derivation of aggregate demand curve; Rational Expectations.

Linear and Non-linear functions and their applications - Application of Differential and Integral Calculus in consumer behaviour and production theories – Matrix algebra and its application. Optimisation without constraint, Optimisation under constraint; Statistics & Econometrics: Theory of Probability, Ordinary Least Squares (OLS) Model Estimation, BLUE Properties, Hypothesis Testing & Prediction, Heteroscedasticity, Autocorrelation & Multicollinearity, Dummy Variables, Simultaneous Equation System & the Problem of Identification;