

UNIVERSITY DEPARTMENT OF ECONOMICS
VINOBA BHAVE UNIVERSITY, HAZARIBAGH



Syllabus and Scheme for Examination
For
M. A. Economics
Under
UGC – CHOICE BASED CREDIT SYSTEM
Approved by Board of Studies on 07/04/2018
Effective from July 2018

SEMESTER – I (2018)

SEMESTER - I

ECN– F01

FOUNDATION OF QUANTITATIVE ECONOMICS

Full Marks – 70, Pass Marks 28

Time - 3 Hrs.

*Candidates will have to answer **five** questions out of total of **nine** questions. At least one question from each module will be set. **Question no. 1 will be compulsory**, which will contain **7** short answer questions carrying **2** marks each.*

Module – I Introduction to Differential Calculus

- 1.1 Functions and graphs, Exponential and logarithmic function, Limit and Continuity
- 1.2 Derivatives, Partial Differentiation and their application in Economics
- 1.3 Elasticity of Economic Functions, Relation Between AR, MR and Elasticity of Demand
- 1.4 Production function, Young's Theorem, Homogenous function and Euler's Theorem

Module – II Differential Calculus and Extreme Values (Optimization)

- 2.1 Maxima and Minima, Point of Inflexion & their uses in Economics
- 2.2 Pricing under Perfect Competition, Monopoly,
- 2.3 Unconstrained Optimization of a function of several variables

Module- III Integral Calculus and Economic Dynamics

- 3.1 Indefinite integrals and inverse differentiation
- 3.2 Technique of integration, Integration by substitution –
- 3.3 Integration and Application to Economic Dynamics (Consumer Surplus, Producer's Surplus)
- 3.4 Definite integrals and approximate integration

Module – IV Determinant & Matrix Algebra

- 4.1 Determinant and its properties,
- 4.2 Matrix Operations
- 4.3 Inverse and Solution of Equation by determinant
- 4.4 Rank of Matrix

BASIC READING LIST

- Allen, R.G.D. (1974) Mathematical analysis for Economics, Macmillan press & ELBS London.
(Chapters: 2,3,4, 5,6, 7, 8,9, 10,11, 12,13,14, 15, 18)
- Chiang, A.C. (1986) Fundamental Methods of Mathematical Economics, McGraw Hill Co. Ltd., New York.
- Handry A.T. (1999) Operations Research, Prentice Hall of India, New Delhi.
- Taha, H.A. (1997) Operations Research: An Introduction (6th Edition) Prentice Hall of India (p) Ltd., New Delhi.
- Yamane, Taro (1975) Mathematics for Economics Prentice Hall of India, New Delhi
- A. C Chiang & K Wainwright (2013) Fundamental Method of Mathematical Economics, McGraw Hill
- E. T. Dowling (2001) Introduction to Mathemeatical economics, McGraw Hill
- K Sydaster & P J Hammond (2015) Mathematics for economic Analysis, Pearson.

SEMESTER - I

ECN – C02

MICRO ECONOMIC ANALYSIS

Full Marks – 70, Pass Marks 28

Time - 3 Hrs.

*Candidates will have to answer **five** questions out of total of **nine** questions. At least one question from each module will be set. **Question no. 1 will be compulsory**, which will contain **7** short answer questions carrying **2** marks each.*

Module – I Fundamentals of Consumption & Production

- 1.1 Approaches to Consumer Behaviour; Indifference Curve Analysis, Derivation of Demand Curve from Indifference Curve Analysis; Revealed Preference approach , Revision of Demand Theory by Hicks
- 1.2 Iso-quant, Marginal Rate of technical substitution, Elasticity of substitution — Least cost combination of inputs
- 1.3 Production function: Cobb-Douglas Production Function and Its Properties

Module – II Production & Distribution

- 2.1 Marginal productivity theory under different Market condition and Modern theory of distribution; Product exhaustion theorem;
- 2.2 Factor pricing in perfect and imperfect factor markets; Classical and Modern theories of Wage, Keynesian and modern theory of Interest, Risk, uncertainty & innovation theory of profit
- 2.3 Macro theories of distribution — Ricardian and Marxian.

Module – III Welfare Economics - I

- 3.1 Definition of Welfare Economics, Concept of Social welfare; Measurement of Welfare;
- 3.2 Role of Value Judgments in Welfare Economics, Pigou's Welfare Economics;
- 3.3 Pareto optimality — Optimum exchange conditions; The production optimum;
- 3.4 The consumption optimum; Concept of contract curve;

Module –IV Welfare Economics - II

- 4.1 Compensation criteria - Contributions of Kaldor and Hicks
- 4.2 Scitovsky double criterion,
- 4.3 Bergson's, Samuelson social welfare function,

BASIC READING LIST

- Kreps, David M. (1990), A Course in Microeconomic Theory. Princeton University Press, Princeton.
- Koutsoyiannis, A. (1979), Modern Microeconomic (second edition) Macmillan Press, London.
- Layard, P.R.G. and A.W. Walters (1978), Microeconomic Theory, McGraw Hill, New York.
- Sen, A. (1999), Microeconomics Theory and Applications Oxford University Press, New Delhi.
- Stigler, G. (1996), Theory of Price (4th edition) Prentice Hall of India, New Delhi.
- Varian, H. (2000), Microeconomic Analysis, W.W. Norton, New York.
- Case KE, Fair R C Osters, (2009) Principles of Economics (9th edition), Pearson
- Myint, H. (1948), Theories of Welfare Economics, Longmans, London.
- Ng Y.K. (1979), Welfare Economics, Macmillan, London.
- Nicholas, B. (Ed.) (2001), Economic Theory and the Welfare State, Edward Elgar Publishing Ltd., U.K.
- Pigou, A.C. (1962), The Economics of Welfare (4th Edition), Macmillan.
- Quirk, J. and R. Saposnik (1968), Introduction to General Equilibrium Theory and Welfare Economics, McGraw Hill, New York.
- Samuelson, P.A. (1947), Foundations of Economic Analysis, Harvard University Press, Cambridge, Mass.
- N Gregory Mankiw (2007) Economics: Principles and Applications, Learning India private limited.
- Joseph's Stiglitz and C. E Walsh (2007) Economics, W.W Norton and Co.

SEMESTER - I

ECN – C03

MACRO ECONOMIC ANALYSIS

Full Marks - 70 Pass Marks 28

Time - 3 Hrs.

*Candidates will have to answer **five** questions out of total of **nine** questions. At least one question from each module will be set. **Question no. 1 will be compulsory**, which will contain **7** short answer questions carrying **2** marks each.*

Module – I , Consumption Function

- 1.1 Keynes Psychological law of consumption, Income- Consumption relationship,
- 1.2 Absolute income, Relative income, Life Cycle and Permanent income Hypothesis.
- 1.3 Consumption and Asset Price

Module –II Investment Function

- 2.1 Marginal Efficiency of capital and investment – long run and short run, Factors affecting Investment Function, Derivation of MEC
- 2.2 Investment Multiplier,
- 2.3 Acceleration Principle, Investment Behaviour,

Module – III Macro Economic models

- 3.1 Neo – Classical Macro Economic Model
- 3.2 Keynesian Macro Economic Model
- 3.3 Post Keynesian Macro Economic Model – Rational and Adaptive Expectation Model, Mundell Fleming Model

Module – IV Theories of Inflation

- 4.1 Inflationary Gap, Measures to remove the gap, Demand Pull and Cost Push theory of inflation.
- 4.2 Phillips curve analysis —Short-run and long-run; The Natural rate of Unemployment Hypothesis; Tobin's modified Philips Curve.
- 4.3 Control of Inflation by Monetary, Non Monetary and fiscal measures

BASIC READING LIST

- Ackley, G. (1997), *Macroeconomics, Theory and policy* Macmillan, New York.
- Blackhouse, R. and A. Salansi (Eds.) (2000), *Macroeconomics and the Real World; (2 volumes)* Oxford University Press, London.
- Branson, W.A. (1989), *Macroeconomics Theory and Policy (3rd edition)* Harper & Row, New York.
- Hall, R.E. and J.B. Taylor (1986), *Macroeconomics* W.E. Norton, New York.
- Heijdra, B.J. and V.P. Fredrick (2001), *Foundations of Modern Macroeconomics*, Oxford University Press, New Delhi.
- Jha, R. (1991), *Contemporary Macroeconomic Theory and Policy*, Wiley Eastern Ltd., New Delhi.
- Romer, D.L. (1996) *Advanced Macroeconomics*, McGraw Hill Co. Ltd., New York.
- Scarfe, B.L. (1997) *Cycles Growth and Inflation* McGraw Hill, New York.
- Shapiro, E (1996) *Macroeconomics Analysis*, Ggotia Publications, New Delhi
- Errol Desuza (2009) : *Macro Economic Analysis*, Pearson
- Dornbuseh Fischer and Startz (2010) *Macroeconomics*, McGrawHiall
- N Gregory mankiw (2010) *Macroeconomics*, Worth Publisher
- Oliver Blanchard (2009) *Macroeconomics*, pearson.

SEMESTER - I

ECN – C04

ECONOMICS OF ENVIRONMENT AND SOCIAL SECTOR

Full Marks – 70, Pass Marks 28

Time - 3 Hrs.

*Candidates will have to answer **five** questions out of total of **nine** questions. At least one question from each module will be set. **Question no. 1 will be compulsory**, which will contain **7** short answer questions carrying **2** marks each.*

Module – I Basics of Environmental Economics

- 1.1 Economic Development and Environment- Inter-relationship between Economic Development and Environment
- 1.2 Sustainable Development - Concept, Characteristics and Sustainable Development Goals (SDGs)
- 1.3 Concept of Externalities, Types and Measures to control Negative Environmental Externalities- Pigovian tax, Property Rights and, Carbon tax.

Module II: Environmental Valuation & Accounting

- 2.1 Concept of Environmental Values- Use Value, Non-use Value and Option Value. Basics of the valuation of environment- Contingent Valuation Method, Travel Cost Method, Hedonic Price Method.
- 2.2 Environmental Accounting: Objectives forms, functions & importance,
- 2.3 Natural Resource Management, Introduction to Natural resource accounting, Salient features of System of Environment

Module – III Economics of Social Sector – I

- 3.1 Social Sector - Importance of Social Sector, Education and Health,
- 3.2 Human Capital Vs Physical Capital, Education as Instrument of Economic Growth
- 3.3 Human Capital Formation- Concept and Role in Social Sector Development

-Module – IV Economics of Social Sector – II

- 4.1 Health Sector- Status, Problems, Determinants of health
- 4.2 Poverty, malnutrition and environmental issues,
- 4.3 Solutions and Financing of Health Sector

BASIC READING LIST

- Chenery H. and TN. Srinivasan (Eds.) (1989), Hand Book of Development Economics, Vol. 1 & 2 Elsevier, Amsterdam.
- Baumol, W.J. and W.E. Oates (1988), The Theory of Environmental Policy, (2nd Edition), Cambridge University Press, Cambridge.
- Bromely, D.W. (Ed.) (1995), Handbook of Environmental Economics, Blackwell, London.
- Fisher, A.C. (1981), Resource and Environmental Economics, Cambridge University Press, - Cambridge.
- Hanley, N., J.F. Shogern and B. White (1997), Environmental Economics in Theory and Practice, Macmillan.
- Hussen, A.M. (1999), Principles of Environmental Economics, Routledge, London.
- Sinha U.P (2007), Economics of social sector and development, Concept Publishing company, New Delhi.
- United Nations - Human Development Report (various issues)
- Blaug. M (1972) - Introduction to Economics of Education (Penguin)
- Cohen, E and T. Gaske (1989) - Economics of Education. Pergamon Press, London
- Schultz, T. W(1971) - Investment in Human Capital, Free Press, New York.
- Tilak, J.B.G. (1994) - Education for Development in Asia, Sage Publications, New Delhi.
- World Bank (1993) - The World Development Report, 1993: Investing in Health, Oxford University Press, New York.
- Bhattacharya, R.N. (2001), "Environmental Economics – An Indian Perspective", Oxford University Press, Delhi.
- Singh, K. and A. Shishodia, (2007), "Environmental Economics: Theory and Applications", Sage Publications, New Delhi
- Charles Kolstad (2010) Intermediate Environmental Economics, Oxford University Press.
- Robert N. Stavins (ed) (2005) Economics of Environment : Selected Readings
- Robert, Yue Ma, James MCGilvray and Micle C (2003) Natural Resource and Environment Economics, Pearson Education.

