

**SYLLABUS FOR
B.A PASS & HONOURS
ECONOMICS
(REVISED)
2019**



**NAGALAND UNIVERSITY
HQS. LUMAMI**

2019

ECONOMICS B.A (Pass & Honours)

COURSE STRUCTURE

COMPULSORY PAPERS FOR B.A (General & Honours)			
Semester	Code No	TITLE	General/Honours
Semester-I	ECO-101	Micro Economics-I	General/Honours
	ECO-102	Quantitative Technique-I (Mathematics)	Honours
Semester-II	ECO-201	Micro Economics-II	General/Honours
	ECO-202	Quantitative Technique-II (Statistics)	Honours
Semester-III	ECO-301	Macro Economics-I	General/Honours
	ECO-302	Public Finance and Banking	Honours
Semester-IV	ECO-401	Macro Economics-II	General/Honours
	ECO-402	International Economics	Honours
Semester- V	ECO-501	Indian Economy-I	General/Honours
	ECO-502	Economics of Growth and Development	Honours
		Optional-I for Honours	
	ECO-503(a)	Agricultural Economics	Honours
	ECO-503(b)	Mathematical Economics	Honours
	ECO-503(c)	History of Economic Thought	Honours
	ECO-503(d)	Industrial Economics	Honours
Semester-VI	ECO-601	Indian Economy-II	General/Honours
	ECO-602	Economics of Environment	Honours
		Optional-II for Honours	
	ECO-603(a)	Demography	Honours
	ECO-603(b)	Financial Institutions and Markets	Honours
	ECO-603(c)	Econometric Methods	Honours
	ECO-603(d)	Regional Economics	Honours
	ECO-603(e)	Project	Honours

SEMESTER WISE PAPER DISTRIBUTION (Pass and Honours)

COURSE	FIRST YEAR		SECOND YEAR		THIRD YEAR	
	SEMESTER I	SEMESTER II	SEMESTER III	SEMESTER IV	SEMESTER V	SEMESTER VI
B.A (Pass and Honours)	ECO 101 Micro Economics-I	ECO 201 Micro Economics-II	ECO 301 Macro Economics-I	ECO 401 Macro Economics-II	ECO 501 Indian Economy-I	ECO 601 Indian Economy-II
B.A (Honours)	ECO 102 Quantitative Technique-I (Mathematics)	ECO 202 Quantitative Technique-II (Statistics)	ECO 302 Public Finance and Banking	ECO 402 International Economics	ECO 502 Economics of Growth and Development	ECO 602 Economics of Environment
					*OPTIONAL (I) ECO- 503 (a)-(d)	**OPTIONAL (II) ECO - 603 (a)- (d) or ***ECO 603(e) PROJECT

* Students can choose any one of the optional papers [ECO-503 (a to d)] during V Semester

**Students can opt for an optional papers [ECO-603 (a to d)] or ECO 603 (e) Project during semester VI.

*** For course “ECO 603(e) PROJECT”, the department shall decide the topics which will be assigned to the student at the beginning of the semester. The project report should be submitted one month before the end semester examinations. The report shall contain a minimum of 5000 words, including tables and annexure.

SEMESTER I
(General & Honours)
Eco-101: MICRO ECONOMICS-I

Total Marks: 100
Credit: 4

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	Nature and Scope of Economics: Basic economic problem. Definition of Economics. Methodology of economics. Concept of demand and supply- measurement and elasticity. Concept of Equilibrium.	12	20
Unit II	Theories of Consumer Demand: Utility approach (cardinal and ordinal). Indifference curves approach; Consumer equilibrium-Hicks and Slutsky's theorem, Compensated demand, Engel curve. Consumer surplus.	15	20
Unit III	Theory of Production: Importance of the theory of production; Returns to a factor: total, average and marginal products; Laws of returns to scale. Laws of variable proportions. Production functions-short and long run. Cobb-Douglas production functions. Least cost combination of input. Factor substitution.	15	20
Unit IV	Theory of Cost: Cost functions; Concept of cost. Traditional and Modern theory of cost. Derivation of long and short run cost curves and their relationship, Recent development in cost theory. Analysis of Economics of scale-Real and Pecuniary.	13	20
Unit V	Welfare Economics: Nature, scope and concept. Problems in measuring social welfare. Role of value judgment. Criteria of social welfare-Growth of GNP, Bentham's, Cardinalist and Pareto.	13	20
Total contact hours and Marks		68	100

Basic Reading List.

- Ahuja, H L. (1990) Advance economic Theory, S. Chand & Co, New Delhi.
- Henderson, J and R.E Quandt (1980), Microeconomic Theory: A Mathematical Approach, McGraw Hill, New Delhi.
- Koutsoyiannis, A. (1990), Modern Microeconomics, Macmillan.
- Sen. A. (1999), Microeconomics: Theory and Applications, Oxford University Press, New Delhi.
- Varian, H.R. (2000), Microeconomics Analysis: W.W. Norton, New York.
- Varian, H.H. (2000), Intermediate Microeconomics: A Modern Approach, East West Press, New Delhi.
- Satya, R. Chakraborty, Micro Economics, Allied Publishers, New Delhi.
- Samuelson P.A and W.D . Nordhus (1998), Economics, Tata McGraw Hills.
- Raj, N.C. (1975), An Introduction to Micro Economics, Macmillan Corporation Ltd India.

SEMESTER I
(Honours)
ECO-102: QUANTITATIVE TECHNIQUE-I (MATHEMATICS)

Total Marks: 100

Credit: 4

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	Sets and Functions: Sets – Concepts and Types, Venn Diagram, Number of elements and Cartesian products. Functions - types of function and its application in economics, System of equations and Inequalities in Market Equilibrium	13	20
Unit II	Number System: Uses of numbers, Axiomatic properties of real number and completeness, complex number, graphical representation of complex number. Analytical Geometry: Application of straight line, points and lines, slope of the line curves, distance and section formulas, parabola, circle, isoprofit and isocost lines.	13	20
Unit III	Differentiation: Functions and limits, Differentiation; Rules of differentiation, Marginal revenue, average revenue, total revenue, marginal cost, average cost and total cost, Maxima and Minima, profit maximisation.	15	20
Unit IV	Integration: Rules of integration. Consumer and producers surplus.	14	20
Unit V	Matrix and Determinants: Different types and solution of simultaneous equation through Cramers rule and matrix methods.	13	20
Total Contact Hours and Marks		68	100

Basic Reading List:

- Mike Rosser, Basic Mathematics for Economists, Routledge Taylor and Francis Group, 29 west 35th street, New York, NY 10001.
- Suranjan Saha, Mathematics and Statistics [for C.A Professional Education (course)- I], New Central Book agency (P) Ltd, 9/1 Chintamani Das Lane, Kolkata 700009.
- Frank Werner and Yuri N. Sotskov, Mathematics of Economics and Business, Routledge, 270 Madison Ave, New York, NY 10016.
- G.S Monga, Mathematics and Statistics for Economics, Vikas Publication.
- Mehta and Madnani, Mathematics for Economists, Sultan Chand and Sons. New Delhi.
- Taro Yamane, Mathematics for Economist, Prentice-Hall of India.

SEMESTER II
(General)

Eco-201: MICRO ECONOMICS-II

Total Marks: 100
Credit: 4

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	Market Structure and Pricing: Perfect and Imperfect markets. Equilibrium of a firm. Perfect Competition-short and long run equilibrium of the firm and industry. Monopoly-short and long run equilibrium. Price Discrimination, Measure of Monopoly Power. Monopoly control and regulation.	14	20
Unit II	Monopolistic Competition: Concepts. General and Chamberlin approach to short and long run equilibrium.	12	20
Unit III	Oligopoly: Characteristics of Oligopoly. Models of Oligopoly-Sweezy, Cournot and Edgeworth.	14	20
Unit IV	Theories of Wages and Rent: Wages and Collective Bargaining. Wage Differential. Marginal Productivity theory. Modern theory of Wage. Rent - Concepts. Scarcity Rent. Differential Rent. Quasi Rent. Ricardian theory of Rent.	14	20
Unit V	Theories of Interest and Profits: Concepts of Interest - Distinction between Gross and Net. Knights theory of Uncertainty, Schumpeter theory of Innovation, Clarke dynamic theory of profit. Hawley risk theory.	14	20
Total contact hours and Marks		68	100

Basic Reading List.

- Ahuja, H L. (1990) Advance economic Theory, S. Chand & Co, New Delhi.
- Henderson, J and R.E Quandt (1980), Microeconomic Theory: A Mathematical Approach, McGraw Hill, New Delhi.
- Koutsoyiannis, A. (1990), Modern Microeconomics, Macmillan.
- Sen. A. (1999), Microeconomics: Theory and Applications, Oxford University Press, New Delhi.
- Varian, H.R. (2000), Microeconomics Analysis: W.W. Norton, New York.
- Varian, H.H. (2000), Intermediate Microeconomics: A Modern Approach, East West Press, New Delhi.
- Satya, R. Chakraborty, Micro Economics, Allied Publishers, New Delhi.
- Samuelson P.A and W.D Nordhus (1998), Economics, Tata McGraw Hills.
- Raj, N.C. (1975), An Introduction to Micro Economics, Macmillan Corporation Ltd India.

**SEMESTER II
(Honours)**

ECO-202: QUANTITATIVE TECHNIQUE-II (STATISTICS)

Total Mark: 100

Credit: 4

UNIT	TOPIC	CONTACT HOURS	WEIGHTAGE
Unit I	Introduction to Statistics: Basic concepts, definitions, frequency distribution, cumulative frequency, graphic and diagrammatic representation of data, techniques of data collection, sampling vs. population, primary and secondary data.	13	20
Unit II	Measure of Central Tendency Measures of central tendency - Mean, Median and Mode.	14	20
Unit III	Measure of Dispersion: Range, Quartile deviation, Mean deviation, Standard deviation, Variance and Coefficient of variation, Skewness and Kurtosis.	14	20
Unit IV	Time Series and Index Numbers: Time series analysis- concept and components, measurement of trend, determination of seasonal variations. Index numbers- concept, methods of constructing index numbers (Laspeyers, Paaches and Fishers index, Family budget method, Chain index numbers), Problems in construction and limitation of index numbers.	14	20
Unit V	Correlation and Regression: Coefficient of correlation – Karl Pearson and Rank correlation, Regression – linear and two regression equations.	13	20
Total Contact Hours and Marks		68	100

Basic Reading List:

- Croxton, F.E. D.J, Dowdon and S Klein (1973), Applied General Statistics, Prentice Hall, New Delhi.
- Goon, A. M, M.K, Gupta and B. Das, Gupta (1993), Fundamentals of Statistics, Vol. 1. The World Press Ltd, Calcutta.
- Gupta, S.P. and V.K Kapoor (1993), Fundamentals of Applied Statistics, S Chand & Sons, New Delhi.
- Millar, J. (1996), Statistic for Advanced level, Cambridge University Press, Cambridge.
- Monga, G.S. Mathematics and Statistics for Economists, Vikas Publication
- Speigal, M.R. (1992), Theory and Problems of Statistics, McGraw Hill London.

SEMESTER III
(General & Honours)
ECO-301: MACRO ECONOMICS- I

Total Marks: 100
Credit: 4

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	National Income and Social Accounting: Concepts and measurement of National Income, factors determining N.I, difficulties in the calculation of N.I, importance of N.I. Social accounting- Meaning, the development of National accounting ; Technique of social accounting, preparation of accounts, nature of double entry, purpose of each accounts. Flow of funds accounts, BOP account, Green accounting.	18	20
Unit II	Output and Employment: Say`s law of market and the Classical theory of employment; Keynes objection to the Classical theory; Aggregate demand and aggregate supply functions; The principle of effective demand, Keynes determination of income and employment.	15	20
Unit III	Consumption Function: Consumption. Short and Long run. Factors influencing average and marginal propensity to consume, Keynes psychological law of consumption spending and Relative Income Hypothesis.	15	20
Unit IV	Theories of Interest: Classical view on interest, Neo-Classical theories of interest, Keynesian theory of interest and Modern theory of interest.	10	20
Unit V	Investment Theory: Theory of investment- Autonomous and Induced investment; marginal efficiency of capital; General equilibrium- IS and LM curve. Investment multiplier and its effectiveness in LDCs.	10	20
Total Contact Hours and Marks		68	100

Basic Reading List:

- Branson W.A (1989), Macro Economic Theory and Policy, Harper and Row, New York.
- Gupta, R.D and A.S. Rana, Keynes and Post Keynesian Economics, Kalyani Publishers, Ludhiana.
- Maria John Kennedy.M (2011), Macroeconomic Theory, PHI Learning Pvt. Ltd, New Delhi.
- Seth, M.L and Lakshmi Narian Agarwal (2010) Macroeconomics.
- H.L. Ahuja (2010) Macroeconomics: Theory and Practices, S Chand & Co, New Delhi.
- Shapiro. E (1996), Macroeconomics Analysis, Galgodia Publications, New Delhi.
- Gregory, N. Mankiw (2000), Macro Economics, Macmillan, New Delhi.
- Gupta, S.B (1983), Monetary Economics, S Chand & Co, New Delhi.

SEMESTER III
(Honours)
ECO-302: PUBLIC FINANCE AND BANKING

Total Marks: 100

Credit: 4

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	Public Finance and Fiscal Policy: Meaning and scope of Public Finance, Principle of maximum advantage, fiscal policy. Objectives and role of fiscal policy.	13	20
Unit II	Public Debt and Expenditure Sources public borrowing, types, causes and effects of public borrowing, burden of public debt, and redemption of public debt. Deficit financing. Wagner's law, Wiseman-peacock hypothesis, Types, causes and effects of public expenditure.	14	20
Unit III	Taxation: Taxation-Direct and indirect taxation, impact and incidence of taxation, canons of taxation, taxable capacity, India's tax structure. Sources of public revenue.	13	20
Unit IV	Indian Public Finance: Centre-State financial relations. Revenue of the states and local bodies. India's public debt and expenditure, Finance Commission, Union Budget.	14	20
Unit V	Budget: Budget; meaning, types and techniques of budget. Requisite of Good Budget. Budgetary theory; classical and modern. Zero based budgeting.	14	20
	Total Contact Hours and Marks	68	100

Basic Reading List:

- Mithani D M (1998) Modern Public Finance, Himalaya Publishing House, Mumbai
- Musgrave, R .A and P.B. Musgrave (1976) Public Finance in Theory and Practice, MacGraw Hill, Kogakusa, Tokyo.
- Musgrave R. A (1959), The Theory of Public Finance , McGraw Hill, Kogakusa, Tokyo.
- H.L Bhatia , Public Finance, Vikas Publishing House Pvt. Ltd
- Misra, B (1997) Public Economics, Macmillan India Limited, New Delhi

SEMESTER IV
(General & Honours)
ECO-401: MACRO ECONOMICS- II

Total Marks: 100
Credit: 4

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	Theory of Demand for Money: Concept of money, functions; Quantity theories of money – Cash Transaction, Cash Balances Approach, Keynesian approach.	12	20
Unit II	Banking: Commercial banking – functions, Credit Creation – purpose and limitations. Central banking – functions. Instruments of Credit control.	12	20
Unit III	Supply of money: Definition, components and definition of supply of money. Money multiplier and high powered money. RBI policies and money supply.	12	20
Unit IV	Inflation: Inflation, definition, types, causes, effects of inflation on different Sectors of economy; Demand – pull inflation and cost – push inflation. Measures to control Inflation. Trade off between inflation and unemployment.	16	20
Unit V	Trade cycle: Nature and characteristics; Hawtrey's monetary theory; Keynes view on trade cycle, Concept of accelerator; Samuelson and Hicks multiplier and accelerator interaction Model, control of trade cycle.	16	20
Total contact hours and Marks		68	100

Basic Reading List:

- Branson W.A (1989), Macro Economic Theory and Policy, Harper and Row, New York.
- Gupta, R.D and A.S. Rana, Keynes and Post Keynesian Economics, Kalyani Publishers, Ludhiana.
- Maria John Kennedy.M (2011), Macroeconomic Theory, PHI Learning Pvt.Ltd, New Delhi.
- Seth, M.L and Lakshmi Narian Agarwal (2010) Macroeconomics.
- H.L. Ahuja (2010) Macroeconomics: Theory and Practices, Advance Analysis, S Chand & Co, New Delhi.
- Shapiro. E (1996), Macroeconomics Analysis, Galgodia Publications, New Delhi.
- Gregory, N. Mankiw (2000), Macro Economics, Macmillan, New Delhi.
- Gupta, S.B (1983), Monetary Economics, S Chand & Co, New Delhi.

**SEMESTER IV
(Honours)
ECO-402: INTERNATIONAL ECONOMICS**

Total Marks: 100

Credit: 4

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	Theories of Trade: Absolute advantage, Comparative advantage and Opportunity Cost. Heckscher-Ohlin theorem and Leontief Paradox.	14	20
Unit II	Tariff: Effects of tariff (Partial and General equilibrium analysis). Theories of Optimum Tariff, Optimum tariff formula and Import Quota.	13	20
Unit III	Balance of Payment: Concept and components of Balance of Trade and Payment. Equilibrium and disequilibrium in the Balance of Payment.	13	20
Unit IV	Multilateral Financial Institutions: IMF, ADB, International Finance Corporation (IFC), International Development Association (IDA) and World Bank.	14	20
Unit V	Trading Blocks: UNCTAD. WTO. EU. ASEAN and SAFTA	14	20
	Total Contact Hours and Marks	68	100

Basic Reading List:

- Salvatore, D.L (1997), International Economics, Prentice Hall, Upper Saddle River, N.J
- Sodersten, Bo (1991), International Economics, Macmillan Press Ltd., London
- Mannur, H. G (1998) International Economics, Vikas Publication, Delhi.
- R.R. Paul, Monetary Economics.

SEMESTER V
(General & Honours)
ECO-501: INDIAN ECONOMY-I

Total marks: 100
Credit: 4

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	Structure of the Indian Economy : Basic feature; Natural resources; Population-size and growth rates, sex composition, rural-Urban migration, occupational distribution, population policy.	13	20
Unit II	Areas of Concern: Poverty and inequality, unemployment, prices and inflation.	13	20
Unit III	National Income: Growth performance, measures for growth performance, National income by industrial origin and occupational structure.	13	20
Unit IV	Planning in India: Objectives, strategy broad achievements and failures, current five year plan- objectives, allocation and targets. Planning commission/NITI Aayog. New economic reforms - liberalization, privatization, rational behind economic reforms; progress of privatization and globalization.	16	20
Unit V	Banking in India: Growth and performance of nationalized banks, Reserve bank and monetary regulation in India.	13	20
Total Contact Hours and Marks		68	100

Basic Reading List:

- Agarwal, A.N, Indian Economy, Vikas Publishers, New Delhi.
- Datt,R. and K.P.M.Sundaram , Indian Economy, S.Chand and company Ltd, New Delhi.
- Misra,S.K and V.K .Puri, Indian economy-Its Development and experience, Himalaya publishing house, Mumbai.
- Kapila Uma, Indian Economy, Academic Foundation, New Delhi.
- Gupta, S.B (1983), Monetary Economics, S Chand & Co, New Delhi.
- Dhingra, I.C (2001). Indian Economy: Environment and Policy, Sultan Chand & Sons, New Delhi.

SEMESTER V
(Honours)
ECO-502: ECONOMICS OF GROWTH AND DEVELOPMENT

Total Marks: 100

Credit: 4

UNITS	TOPICS	CONTACT HOURS	WEIGH TAGE
Unit I	Economic Growth and Development: Development and underdevelopment. Perpetuation of underdevelopment. Measurement of economic development. Factors affecting economic growth. Importance of Agriculture, Industry and Infrastructure.	10	20
Unit II	Theories of Economic Development: Classical theories of development- Smith, Ricardo, Malthus, Mills, Karl Marx and Schumpeter.	15	20
Unit III	Theories of Economic Growth: Harrod and Domar, Solow, Joan Robinson, Kaldor and New Growth theory (Paul Romer).	15	20
Unit IV	Partial Theories of Growth and Development: Circular causation, Rostow's stages of Growth, Big push, Balanced versus Unbalanced growth.	13	20
Unit V	Investment and Planning: Meaning and need for planning. Types of planning. Investment Criterion, Cost-Benefit analysis, Choice of technique in LDCs.	15	20
Total Contact Hours and Marks		68	100

Basic Reading List:

- R.C. Agarwal -Lakshmi Narain Agrawal, Economics of Development and Planning (Theory and Practice)
- Higgins, B, Economic Development, Norton, New York.
- Lekhi, R.K (1990), The Economics of Development and Planning, Kalyani Publishers, Ludhiana.
- Mishra and Puri (2010), Economic Development and Planning.
- Taneja and Myer (2010), Economic Development and Planning and Methods, Vishal Publishing Co, Jhalandhar.
- Todaro, M.P , Economic Development in Third World Countries, Longman, New York.
- Todaro, M.P (1974), Development Planning: Models and Methods, Oxford University Press, Oxford.
- Thirlwall, A.P, Growth and Development, Palgrave, Macmillan.
- Hayami, Y, Development Economics, Oxford University Press, India.

SEMESTER VI
(General & Honours)
ECO-601: INDIAN ECONOMY II

Total Marks: 100
Credit: 4

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	Agriculture: Nature and importance ;trends in agricultural production and productivity, factors determining productivity, Land reforms, Green Revolution, Rural credit, agricultural marketing.	13	20
Unit II	Industry: Industrial development during the planning period; Industrial policies. Industrial licensing policies- MRTP Act, FERA and FEMA. Growth and problems of small scale industries; Role of public sector enterprises.	16	20
Unit III	Public Debt and Expenditure: Sources of public debt; causes of high public debt and meaning to reduce public debt. Trend in public debt and expenditure in India. Items of public expenditure.	13	20
Unit IV	External sector: Role of foreign trade, trends in exports and imports, composition and direction of India's foreign trade, BOP crisis and the new economic reforms - export promotion measures and the new trade policies. Foreign capital - FDI and MNC.	13	20
Unit V	Economy of Nagaland: Population, structural composition, Infrastructure, Agriculture and Industrial sector; problems and prospects.	13	20
	Total Contact Hours and Marks	68	100

Basic Reading List:

- Agarwal, A.N, Indian Economy, Vikas Publishers, New Delhi.
- Datt,R. and K.P.M.Sundaram , Indian Economy, S.Chand and company Ltd, New Delhi.
- Misra,S.K and V.K .Puri, Indian Economy-Its Development and Experience, Himalaya Publishing House, Mumbai.
- Gupta, S.B (1983), Monetary Economics, S Chand & Co, New Delhi.
- Dhingra, I.C (2001). Indian Economy: Environment and Policy, Sultan Chand & Sons, New Delhi.
- Joshua Thomas & Gurudas Das (eds 2002), Dimensions of Development in Nagaland, Regency Publications, New Delhi.
- Joshua Thomas & Gurudas Das (eds), Structural change in North East India: Resource Industry Linkages, Akansha Publishing house, New Delhi.
- Borthagur, Dharendra Nath (1992), Agricultural Development of North East Region with special reference to hill agriculture, Bee Cee Prakashen, Guwahati.
- NUTA, Economic Development in Nagaland: Prospects and Constraints.
- Statistical Hand Books, GON; Economic Surveys (Various Issues), Government of India

**SEMESTER VI
(Honours)
ECO-602: ECONOMICS OF ENVIRONMENT**

Total Marks: 100

Credit: 4

UNITS	TOPICS	CONTACT HOURS	WEIGH TAGE
Unit I	Environment and Ecology: Meaning and elements of ecology, the environment and economic linkages; entropy laws, population environment linkage; environment as a public good; market failure for environmental goods.	14	20
Unit II	Basic Concepts: Pareto optimality and competitive equilibrium; fundamental theories of welfare economics, renewable and non renewable resources, common property resources, social cost-benefit analysis.	12	20
Unit III	The Common problems: Property right approach to environmental problems; concepts and indicators of sustainable development; international trade and the environment. Common property resources.	12	20
Unit IV	Valuation of Environmental Goods: Total economic valuation of environmental goods, valuation of environmental damages/ benefits (willingness to pay and accept), indirect methods (Household production theory) and direct methods (contingent valuation theory)	15	20
Unit V	Environment Regulation Instruments: Prevention, control and abatement of pollution; command and control; market based instruments; Evaluation of environment legislation and institutions in India.	15	20
Total Contact Hours and Marks		68	100

Basic Reading List:

- Bhattacharya, R.N (Ed) (2001), Environmental Economics: An Indian Perspective, Oxford University Press.
- Kolstad, C.D.(2000),Environmental Economics, Oxford University Press, Oxford
- Sengupta, R.P. (Ed.) (2001), Ecology and economics: An Approach to sustainable development, Oxford University Press, New Delhi.
- Woodhall, M,(1992),Cost-Benefit analysis in Educational Planning, UNESCO, Paris.
- Nick Hanley, Jason F, Shogren and Ben White, Environmental Economics in Theory and Practice, Macmillan India Ltd.
- Pearce, D.W and R.K. Turner, (1991), Ecology and Economics: An Approach to Sustainable Development, Oxford University Press.
- Shankar, U, (2001), Environmental Economics, Oxford University Press, New Delhi.

SEMESTER V (Honours)
OPTIONAL - I
ECO-503 (a): AGRICULTURAL ECONOMICS

Total Marks: 100
Credit: 4

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	Development of Agriculture: Role and importance of agriculture in Economic development, changing nature of linkages, agricultural resources in India, land utilization and cropping pattern, irrigation in India, command and development and flood control.	17	20
Unit II	Technological Changes in Agriculture: Traditional techniques and practices, HYV seeds-fertilizers, Green revolution, sustainable agriculture, emerging trends in agricultural technology. Dry land farming, use of bio- technology techniques	17	20
Unit III	Agricultural Marketing and Finance: Markets and functions, channels of distribution of commodities, regulated markets and co-operatives, Role of rural finance, sources of finance-NABARD	10	20
Unit IV	Agricultural Price Policy(APP): Nature of demand and supply of agricultural products; need for state intervention, objectives of the APP, instruments and evaluation, food security and public distribution in India.	12	20
Unit V	Agriculture and Allied Activities: Fisheries, horticulture, floriculture, and forestry - Growth, problems and state policies. Agro based industries and food processing industries, development of rural infrastructure.	12	20
Total Contact Hours and Marks		68	100

Basic Reading List:

- Sadhu, AN and Singh J., Agricultural problems in India- Himalaya Publishing House, Mumbai.
- Sadhu, AN and Singh J., An Introduction to Agricultural Economics, Himalaya Publishing House, Mumbai.
- R.N. Soni ., Leading Issues in Agricultural Economics, Arihant Press, Jalandhar.
- Bilgrami, S.A.R., An Introduction to Agricultural Economics, Himalaya Publishing House, Mumbai.
- John B. Penson Jr., Oral Capps (et al), Introduction to Agricultural Economics, Prentice Hall.
- R.G Desai, Agricultural Economics, Indus books, New Delhi.
- Lekhi, R.K. and Joginder Singh, Agricultural Economics: An Indian Perspective, Kalyani Publishers, Ludiana.

SEMESTER V (Honours)
OPTIONAL - I
PAPER- XIII (b)
ECO-503 (b): MATHEMATICAL ECONOMICS

Total Marks: 100

Credit: 4

UNITS	TOPICS	CONTACT HOURS	WEIGH TAGE
Unit I	Differentiation and Difference Equation: Constrained and unconstrained optimisation, partial differentiation and difference equation.	13	20
Unit II	Quadratic equations and solution to differential equations.	13	20
Unit III	Consumer Theory: Utility function, budget line, consumer equilibrium, marginal rate of substitution and price effects-Slutsky equation, derivatives of demand curves, elasticity of demand and consumer surplus.	14	20
Unit IV	Theory of Production: Constant product curves, constrained profit maximisation, Homogeneous and Non-Homogeneous production function, Cobb-Douglas and CES production function; returns to scale, derivation of cost curves, and equilibrium conditions for producers, adding up theorem.	14	20
Unit V	Market Structure and Prices: Market equilibrium under perfect competition, monopoly, price discrimination, monopolistic competition, prices, subsidies and taxes; Cobweb model.	14	20
	Total Contact Hours and Marks	68	100

Basic Reading List:

- Mike Rosser, Basic Mathematics for Economists, Routledge Taylor and Francis Group, 29 west 35th street, New York, NY 10001.
- Suranjan Saha, Mathematics and Statistics [for C.A Professional Education (course)- I], New Central Book agency (P) Ltd, 9/1 Chintamani Das Lane, Kolkata 700009.
- Frank Werner and Yuri N. Sotskov, Mathematics of Economics and Business, Routledge, 270 Madison Ave, New York, NY 10016.
- GS Monga, Mathematics and Statistics for Economics, Vikas Publication.
- Mehta and Madnani, Mathematics for economists, Sultan Chand and Sons.
- Taro Yamane, Mathematics for economist, Prentice-Hall of India

**SEMESTER V (Honours)
OPTIONAL – I**

ECO-503 (c): HISTORY OF ECONOMIC THOUGHT

Total Marks: 100

Credit: 5

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	Early Period: History of economic thought and economic history. Methodological approaches to economic thought, importance of history of economic thoughts. Contributions of Plato and Aristotle.	17	20
Unit II	Mercantilism and Physiocracy : Factors responsible for the rise of Mercantilism and their main ideas. Contribution Hume and Cantillon. Factors responsible for the rise of Physiocracy. Contribution of Turgot and Quesnay	17	20
Unit III	Classical Period Features of classical economics- Adam Smith on value and economic growth, Ricardo on distribution and economic growth, Malthus theory of population and economic growth.	17	20
Unit IV	New Classical: Wicksell on General theory of capital. Marshall on value and Distribution. Weiser on theory of alternative costs and imputation	17	20
Unit V	Modern Economics: Keynes General theory of employment, interest and money; Friedman on money and consumption; Schumpeter on the role of entrepreneur and innovation.	17	20
Total Contact Hours and Marks		85	100

References

- Blaug, M (1997), Economic Theory in Retrospect A history of thought from Adam Smith to J.M Keynes,(5th.Edition) , Cambridge University Press, Cambridge.
- Blackhouse, R(1985), A History of Modern Economic Analysis, Basil Blackwell Oxford.
- Schumpeter, J.A. (1954), History of Economic Analysis, Oxford University Press, Oxford
- Grey, A and A.E.Thompson (1980), The Development of Economic Doctrine,(2nd. Edition), Longman Group, London.

SEMESTER V (Honours)
OPTIONAL - I
ECO-503 (d): INDUSTRIAL ECONOMICS

Total Marks: 100
Credit: 4

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	Introduction, Efficiency and Organisation: Concept and Scope of Industrial economics; Industrial Efficiency-concepts and measurement; Organisational forms and their motives.	13	20
Unit II	Cost theory, Pricing and Profitability: Theory of cost and production; Pricing decisions; Profitability-concept and measurement; labour productivity.	13	20
Unit III	Industrial Finance, Accounting and Industrial location: Types, sources and choice of finance, role and functions of financial institutions; balance sheet, profit and loss account; Industrial location-determinants and approaches.	14	20
Unit IV	Industrial growth in India: Industrial policies, industrial licensing policies, patterns and trends of industrial growth; Cottage and small industries; Public and Private industries.	14	20
Unit V	Issues regarding Indian Industries: FDI, WTO, MNCs and Indian industries; some large industries (Iron and Steel, Sugar, Jute)	14	20
Total Contact Hours and Marks		68	100

Basic Reading List:

- Barthwal, R.R. (1992), Industrial Economics; An Introductory Text Book, Wiley Eastern Ltd, New Delhi.
- Singh, A and A.N Sadhu (1998), Industrial Economics, Himalaya Publishing House.
- Devine, P. J et.al (1978) An introduction to Industrial Economics (3rd. edition), George Allen and Unwin, London.
- Kuchal, S.C (1980,) Industrial Economy of India (5th, edition) Chaitanya Publishing House, Allahabad.
- Reserve Bank of India, Report on currency and finance (Annual) Mumbai
- Kenneth, D George, Caroline Joll and E.L. Lynk (1991), Industrial organization: Competition, Growth and structural change (4th. Edition) Routledge, New York.

SEMESTER VI (Honours)
OPTIONAL - II
EC0-603 (a): DEMOGRAPHY

Total Marks: 100
Credit : 5

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	Introduction: Population study; its relation with other disciplines; Theories of population-Malthus, Optimum Theory, Demographic transition; historical evidence of population growth in developed and developing countries.	17	20
Unit II	Sources of demographic data and census: Definition, features, organising census and enumeration methods. Sources of demographic data in India. Census-civil registration system and demographic surveys.	17	20
Unit III	Study of fertility and technique of analysis: Meaning- crude birth rate, age, specific fertility rate, total fertility, relation between total fertility and fertility rate and crude birth rate and death rate, age specific birth and death rates. Techniques of analysis of crude birth and death rates, age specific birth and death rates, standardized birth and death rates.	17	20
Unit IV	Marital status, population and growth Definitions, crude marriage, relation between marital age and fertility age. Meaning and uses of life tables. Concept of stationary, stable and quasi stable population. Techniques of population projection and common measures of growth.	17	20
Unit V	Migration and population policy: Kinds of migration, estimation of migration rate. Reproductive and child health in India, aging of population, evaluation of population policy in India. Composition and trends of population in Nagaland.	17	20
Total Contact Hours and Marks		85	100

Basic Reading List:

- Agarwal, S.N. (1985), India's Population Problems, Tata McGraw Hill, Bombay.
- Agarwal U.D. (1999), Population projections, and Their Accuracy, B.R. Publishing Corporation, New Delhi.
- Census Reports, Government of India, Various Issues.
- Gulati, S.C.(1988), Fertility in India: An Econometric Analysis of a Metropolis, Sage Publications, New Delhi.
- Mishra, B.D. (1980), An Introduction to Study of Population, South Asian Publishers, New Delhi.
- Srinivasan, K. (1998), Basic Demographic Techniques and Applications, Sage Publications, New Delhi.

SEMESTER VI (Honours)
Optional –II
Eco-603 (b): FINANCIAL INSTITUTIONS AND MARKETS

Total Marks: 100

Credit: 5

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	Financial system: Structure, role and functions. Growth of the Indian Financial System since 1960. Review of the recent Financial and Banking Sectors reforms and its impact.	15	20
Unit II	Banks and Non-Banks: Commercial Banks- Functions and Role. Credit Creation and its limiting factors. Bank Nationalization-rational and review. Definition and Types of Non-Bank Financial Institutions-Role and Functions. Development Banks-Role and Functions. Distinction between Banks and Non-Banks Financial Institutions.	20	20
Unit III	Central Bank: Functions and Role in Developed and Developing Economics. Goals, Target and Constraints of Monetary policy. Instruments of Monetary Regulation.	15	20
Unit IV	Financial Markets: Regulated and Unregulated credit markets. Capital and Money market. Features of Developed and Undeveloped money and capital market with special reference to India.	15	20
Unit V	Foreign Exchange Markets: Nature, organization and participants. Exchange Rates-Determination, types and system. Determination of exchange rates under fixed and flexible exchange rate regimes. Role of hedging in the determination of exchange rates.	20	20
Total Contact Hours and Marks		85	100

Basic Reading List:

- Bhole, L.M. (2000), Indian Financial System, Chugh Publication, Allahabad.
- Datt, R and K.P.M Sunderam, Indian Economy, S. Chand and Company Ltd, New Delhi.
- Gupta, S.B. (1983), Monetary Economics, S. Chand and Company Ltd, New Delhi.
- Gupta, S.B. (1995), Monetary Economics, Institutions, Theory and Policy, S. Chand and Company Ltd, New Delhi.
- Mitra, S. (1970), Money and Banking, Random House, New York.
- Misra, S.K and V.K Puri, Indian Economy- Its Development and Experience, Himalaya Publishing House, Mumbai.
- Uppal, R.K. (2011). Money, Banking and Finance in India. *Evolution and Present Structure*, New Century Publications, New Delhi.

SEMESTER VI (Honours)

OPTIONAL – II
ECO-603 (c): ECONOMETRIC METHODS

Total Marks: 100

Credit: 4

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	Introduction to Econometrics: Origin, definition, objectives and scope of econometrics, limitations of econometrics, Methodology of econometric research, specification and estimation of an econometric model.	17	20
Unit II	Estimation and Regression Analysis: Basic concept of estimation, desirable properties of estimators, unbiasedness, efficiency, consistency and sufficiency. Correlation and regression, coefficient of determination, estimation of an equation.	17	20
Unit III	Theoretical Distribution and Hypothesis Testing: Theoretical frequency distribution, basic concept of binomial, Poisson and normal distribution. Hypothesis testing-Design and evaluation of test: Type-I and type-II errors, standard errors.	17	20
Unit IV	Estimation theory and problems: Ordinary Least Squares (OLS) method-assumption, Gauss-Markov theorem standard errors of estimates. Testing of regression coefficient; coefficient of determination-test; problems of heteroscedasticity and correlation (1 st order); multicollinearity—their consequences, test and remedies.	17	20
Unit V	Lag models and summary variables: Lag in econometric models-concepts, Koyck model, partial adjustments and adaptive expectation models. Summary variable; Qualitative data, seasonal analysis, use of dummy variables for pooled data, posey variable-concept and uses.	17	20
Total Contact Hours and Marks		68	100

Basic Reading List:

- Green, W, (1997), Econometric Analysis, prentice Hall, New York
- Griffith, W.F., R.H. Hill and G.G. judge (1993), Learning and practicing Econometrics, John Wiley, New York.
- Gujrati, D. (1995), Basic Econometrics, (3rd Edition), MacGraw Hill, New Delhi
- Johnston, J. (1985), Econometric Methods, McGraw Hill, New York.
- Johnston, J. And J.D. Nardo (1997), Econometric Methods, McGraw Hill, New York
- Kmenta, J. (1997), Elements of Econometrics, (2nd Edition), The Macmillan Press Ltd., Hampshire
- Maddala, G.S. (1993), Econometrics-An Introduction, McGraw Hill, New York.

SEMESTER VI (Honours)
OPTIONAL - I
ECO-603 (d): REGIONAL ECONOMICS

Total Marks: 100
Credit: 5

UNITS	TOPICS	CONTACT HOURS	WEIGHTAGE
Unit I	Concepts and Location of Firms: Concepts of Region and Regional Economics, Regional Income, Problem of Estimation. Indicators of Regional Development. One Market One Input Case, Hotelling Phenomena.	15	20
Unit II	Spatial Economic Models: Price equilibrium in geographically separated and interlinked markets. Models of Pricing Under Free Entry, Spatial Monopoly and Price Discrimination. Spatial Monopolistic Competition, Inter Regional Income Models, Inter Regional Factor Movements, Regional Multiplier.	20	20
Unit III	Regional growth models: Neo-classical growth models- cumulative causation, Center-Periphery models. Growth pole analysis, convergence and divergence of disparities in per capital regional income.	15	20
Unit IV	Techniques of Regional Analysis: Techniques of Regional Analysis, regional and interregional input-output analysis, Attraction model; Gravity model; shift- share analysis, Impact studies.	10	20
Unit V	Regional Policy: People prosperity versus place prosperity; Formulation of interregional objectives, consistency between national and regional objectives; Alternate regional policy measures; historical evidence; regional policy in India and Intra regional differences in North-Eastern Region of India (NER)	25	20
Total Contact Hours and Marks		85	100

Basic Reading List:

- Brahmananda, P.R and V.R. Panchmukhi (Eds)(2001), Development Experience in the Indian Economy: Inter-State Perspective, Bookwell, New Delhi.
- Chand, M. And V.K.Puri (1983), Regional planning in India, Allied Publishers, New Delhi.
- Hoover, E.M. (1974), An Introduction to Regional Economics, Alfred A. Knof, New York.
- Rao.Hanumantha (1984), Regional Disparities and Development in India, Ashish Publishing House, New Delhi.
- Seth, V.K (1987), Industrialisation in India: A Spatial Perspective, Commonwealth Publishers, New Delhi.
- Siebert, H (1969), Regional Economic Growth: Theory and Policy, International Textbook Company, Scranton.

SEMESTER VI (Honours)
OPTIONAL - I
ECO-603 (e): PROJECT

Total Marks: 100
Credit: 5

Objective: To let the students get familiarize with the empirical aspects of the subject and develop research aptitude.

	Steps	WEIGHTAGE
Step I	Formulation of project work (theory) Identification of problems, objectives and hypothesis of study, analysis, report writing and presentation	
Step II	Data collection Primary (Field survey) and secondary data collection	
Step III	Data Analysis	
Step IV	Report writing	75
Step V	Presentation	25
	Total Marks	100