



FYUGP

ECONOMICS HONOURS/ RESEARCH

FOR UNDER GRADUATE COURSES UNDER RANCHI UNIVERSITY



Implemented from
Academic Session 2022-2026





Ref. No. EC/96/22

Date 2/9/2022

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HIGHLIGHTS OF REGULATIONS OF FYUGP

PROGRAMME DURATION

- The Full-time, Regular UG programme for a regular student shall be for a period of four years with multiple entry and multiple exit options.
- The session shall commence from **1st of July**.

ELIGIBILITY

- The selection for admission will be primarily based on availability of seats in the Major subject and marks imposed by the institution. Merit point for selection will be based on marks obtained in Major subject at Class 12 (or equivalent level) or the aggregate marks of Class 12 (or equivalent level) if Marks of the Major subject is not available. Reservation norms of The Government of Jharkhand must be followed as amended in times.

ADMISSION PROCEDURE

- The reservation policy of the Government of Jharkhand shall apply in admission and the benefit of the same shall be given to the candidates belonging to the State of Jharkhand only. The candidates of other states in the reserved category shall be treated as General category candidates. Other relaxations or reservations shall be applicable as per the prevailing guidelines of the University for FYUGP.

ACADEMIC CALENDAR

- Each year the University shall draw out a calendar of academic and associated activities, which shall be strictly adhered to. The same is non-negotiable. Further, the Department will make all reasonable endeavors to deliver the programmes of study and other educational services as mentioned in its Information Brochure and website. However, circumstances may change prompting the Department to reserve the right to change the content and delivery of courses, discontinue or combine courses and introduce or withdraw areas of specialization.

PROGRAMME OVERVIEW/ SCHEME OF THE PROGRAMME

- Undergraduate degree programmes of either 3 or 4-year duration, with multiple entries and exit points and re-entry options within this period, with appropriate certifications such as:
 - a Certificate after completing 1 year (2 semesters) of study in the chosen fields of study,
 - a Diploma after 2 years (4 semesters) of study,
 - a Bachelor after a 3-year (6 semesters) programme of study,
 - a Bachelor (with Hons. / Research) after a 4-year (8 semesters) programme of study

VALIDITY OF REGISTRATION

- Validity of a registration for FYUGP will be for maximum for Seven years from the date of registration.

CALCULATION OF MARKS FOR THE PURPOSE OF RESULT

- Student's final marks and the result will be based on the marks obtained in Semester Internal Examination and End Semester Examination organized taken together.
- Passing in a subject will depend on the collective marks obtained in Semester internal and End Semester University Examination both. However, students must pass in Theory and Practical Examinations separately.

PROMOTION AND SPAN PERIOD

- i. The Requisite Marks obtained by a student in a particular subject will be the criteria for promotion to the next Semester.
- ii. No student will be detained in odd Semesters (I, III, V & VII).
- iii. To get promotion from Semester-II to Semester-III a student will be required to pass in at least 75% of Courses in an academic year (a student has to pass in minimum 9 papers out of the total 12 papers. However, it will be necessary to procure pass marks in each of the paper before completion of the course.
- iv. To get promotion from Semester-IV to Semester-V (taken together of Semester I, II, III & IV) a student has to pass in minimum 16 papers out of the total 22 papers.
- v. Eligibility to get entry in Semester VII is to secure a minimum of 7.5 CGPA up to semester VI along with other criteria imposed by the Institution.

PUBLICATION OF RESULT

- The result if the examination shall be notified by the Controller of Examinations of the University in different newspapers and also on University website.
- If a student is found indulged in any kind of malpractice/ unfair means during examination, the examination taken by the student for the semester will be cancelled. The candidate has to reappear in all the papers of the session with the students of next coming session and his one year will be detained. However, marks secured by the candidate in all previous semesters will remain unaffected.
- There shall be no Supplementary or Re-examination for any subject. Students who have failed in any subject in an even semester may appear in the subsequent even semester examination for clearing the backlog. Similarly, the students who have failed in any subject in an odd semester may appear in the subsequent odd semester examination for clearing the backlog.
- Regulation related with any concern not mentioned above shall be guided by the Regulations of the University for FYUGP.

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COURSE STRUCTURE FOR FYUGP 'HONOURS/ RESEARCH'

Table 1: Credit Framework for Four Year Undergraduate Programme (FYUGP) under State Universities of Jharkhand [Total Credits = 176]

Semester	Common Courses (29)									Introductory Courses (15)		Internship/ Project (4)	Major* (54) + Adv. Major (24)	Minor** (32)		Research Courses (18)				Total Credit
	Language and Communication Skills (Modern Indian Language including TRL) (6)	Language and Communication Skills (English) (6)	Environmental Studies (3)	Understanding India (2)	Health & Wellness, Yoga Education, Sports & Fitness (2)	Digital Education (3)	Mathematical & Computational Thinking and Analysis (2)	Value-Based Course/ Global Citizenship Education (2)	Community Engagement/ NCC/ NSS/ (3)	Introductory Courses [Natural Sc./ Humanities/ Social Sc./Commerce] (9)	Introductory Course [Vocational Studies] (6)			Natural Sc./ Humanities/ Social Sc./ Commerce (18)	Vocational Studies (14)	Research Methodology Courses (6)	Research Proposal, Review of literature (4)	Research Internship/ Field Work (4)	Preparation of the Research Project Report (4)	
1	2	3	4	5	6	7	8			9	10	11	14	15	16	17	18	19	20	21
I	6			2	2					3	3		6							22
II		6					2	2		3	3		6							22
Exit Point: Undergraduate Certificate																				
III			3			3			3	3		4	6							22
IV													6+6	6	4					22
Exit Point: Undergraduate Diploma																				
V													6+6	6	4					22
VI													6+6	6	4					22
Exit Point: Bachelor's Degree																				
VII													6+6 (Adv. Topics)			6	4			22
VIII													6+6 (Adv. Topics)		2			4	4	22
Exit Point: Bachelor's Degree with Hons. /Research																				

*There will be four disciplinary areas: A-Natural Science, B-Humanities, C-Social Science, and D-Commerce; each having basket of courses. A student will have to select a 'Major' from any of the four disciplinary areas (out of A, B, C & D). The selection for admission will be primarily based on availability of seats in Major and marks imposed by the institution.

**A student has to select three subjects for 'Introductory Regular Courses' from a pool of subjects associated with the Major offered by the institution. One of the three subjects will continue as 'Minor' from semester IV onwards, based on the academic interest and performance of the student.

Session 2022-26 onwards

COURSES OF STUDY FOR FOUR YEAR UNDERGRADUATE PROGRAMME

Table 2: Course structure for Undergraduate Certificate Programme [May Exit after Sem.-II]

Semester	Common Courses			Introductory Courses		Major	Total Credits
Sem.-I	LCS (MIL/TRL) (6 Credits)	Understanding India (2 Credits)	Health & Wellness, Yoga Education, Sports & Fitness (2 Credits)	IRC-1 (3 Credits)	IVS-1A (3 Credits)	MJ-1 (6 Credits)	(22)
Sem.-II	LCS (English) (6 Credits)	Global Citizenship Education (2 Credits)	Mathematical & Computational Thinking (2 Credits)	IRC-2 (3 Credits)	IVS-1B (3 Credits)	MJ-2 (6 Credits)	(22)

Total = 44 Credits

(LCS: Language and Communication Skills; MIL: Modern Indian Languages; TRL: Tribal Regional Languages;
IRC: Introductory Regular Courses; IVS: Introductory Vocational Studies, MJ: Major)

Table 3: Course structure for Undergraduate Diploma Programme [May Exit after Sem.-IV]

Semester	Common Courses			Introductory Courses	Major	Minor	Internship/ Project	Vocational	Total Credits
Sem.-III	Environmental Studies (3 Credits)	Community Engagement/ NCC/ NSS (3 Credits)	Digital Education (3 Credits)	IRC-3 (3 Credits)	MJ-3 (6 Credits)		Internship/ Project (4 Credits)		(22)
Sem.-IV					MJ-4, MJ-5 (6+6=12 Credits)	MN-1 (6 Credits)		VS-1 (4 Credits)	(22)

Total = 88 Credits

(MN: Minor; VS: Vocational Studies)

Table 4: Course structure for Bachelor's Degree Programme [May Exit after Sem.-VI]

Semester	Major Courses	Minor Courses	Vocational	Total Credits
Sem.-V	MJ-6, MJ-7 (6+6 = 12 Credits)	MN-2 (6 Credits)	VS-2 (4 Credits)	(22)
Sem.-VI	MJ-8, MJ-9 (6+6 = 12 Credits)	MN-3 (6 Credits)	VS-3 (4 Credits)	(22)

Total = 132 Credits**Table 5: Course structure for Bachelor's Degree with Hons./Research Programme**

Semester	Advance Courses	Research Courses	Vocational	Total Credit
Sem.-VII	AMJ-1, AMJ-2	Research Methodology (6+6=12 Credits)	Research Proposal (6 Credits)	(4 Credits) (22)
Sem.-VIII	AMJ-3, AMJ-4 (6+6=12 Credits)	Research Int./Field Work (4 Credits)	Research Report (4 Credits)	VSR (2 Credits) (22)

Total = 176 Credits

(AMJ: Advance Major; VSR: Vocational Studies associated with Research)

Table 6: Semester wise Course Code and Credit Points:

Semester	Common, Introductory, Major, Minor, Vocational & Internship Courses		Credits
	Code	Papers	
I	CC-1	Language and Communication Skills (Modern Indian language including TRL)	6
	CC-2	Understanding India	2
	CC-3	Health & Wellness, Yoga Education, Sports & Fitness	2
	IRC-1	Introductory Regular Course-1	3
	IVS-1A	Introductory Vocational Studies-1	3
	MJ-1	Major paper 1 (Disciplinary/Interdisciplinary Major)	6
II	CC-4	Language and Communication Skills (English)	6
	CC-5	Mathematical & Computation Thinking Analysis	2
	CC-6	Global Citizenship Education & Education for Sustainable Development	2
	IRC-2	Introductory Regular Course-2	3
	IVS-1B	Introductory Vocational Studies-2	3
	MJ-2	Major paper 2 (Disciplinary/Interdisciplinary Major)	6
III	CC-7	Environmental Studies	3
	CC-8	Digital Education (Elementary Computer Applications)	3
	CC-9	Community Engagement & Service (NSS/ NCC/ Adult Education)	3
	IRC-3	Introductory Regular Course-3	3
	IAP	Internship/Apprenticeship/ Project	4
	MJ-3	Major paper 3 (Disciplinary/Interdisciplinary Major)	6
IV	MJ-4	Major paper 4 (Disciplinary/Interdisciplinary Major)	6
	MJ-5	Major paper 5 (Disciplinary/Interdisciplinary Major)	6
	MN-1	Minor Paper 1 (Disciplinary/Interdisciplinary Minor)	6

	VS-1	Vocational Studies-1 (Minor)	4
V	MJ-6	Major paper 6 (Disciplinary/Interdisciplinary Major)	6
	MJ-7	Major paper 7 (Disciplinary/Interdisciplinary Major)	6
	MN-2	Minor Paper 2 (Disciplinary/Interdisciplinary Minor)	6
	VS-2	Vocational Studies 2 (Minor)	4
VI	MJ-8	Major paper 8 (Disciplinary/Interdisciplinary Major)	6
	MJ-9	Major paper 9 (Disciplinary/Interdisciplinary Major)	6
	MN-3	Minor Paper 3 (Disciplinary/Interdisciplinary Minor)	6
	VS-3	Vocational Studies 3 (Minor)	4
VII	AMJ-1	Advance Major paper 1 (Disciplinary/Interdisciplinary Major)	6
	AMJ-2	Advance Major paper 2 (Disciplinary/Interdisciplinary Major)	6
	RC-1	Research Methodology	6
	RC-2	Research Proposal	4
VIII	AMJ-3	Advance Major paper 3 (Disciplinary/Interdisciplinary Major)	6
	AMJ-4	Advance Major paper 4 (Disciplinary/Interdisciplinary Major)	6
	RC-3	Research Internship/Field Work	4
	RC-4	Research Report	4
	VSR	Vocational Studies (Associated with Research)	2
		Total Credit	176

Abbreviations:

CC Common Courses

IRC Introductory Regular Courses

IVS Introductory Vocational Studies

IAP Internship/Apprenticeship/ Project

VS Vocational Studies

MJ Major Disciplinary/Interdisciplinary Courses

MN Minor Disciplinary/Interdisciplinary Courses

AMJ Advance Major Disciplinary/Interdisciplinary Courses

RC Research Courses

VSR Vocational Studies associated with Research

SEMESTER WISE COURSES IN ECONOMICS FOR FYUGP

2022 onwards**Table 7: Semester wise Examination Structure in Discipline Courses:**

Semester	Common, Introductory, Major, Minor, Vocational & Internship Courses		Examination Structure			
	Code	Papers	Credits	Mid Semester Theory (F.M.)	End Semester Theory (F.M.)	End Semester Practical/ Viva (F.M.)
I	MJ-1	Introductory Economics	6	25	75	---
II	MJ-2	Introductory Macro Economics	6	25	75	---
III	MJ-3	Indian Economy: Principles and Policies	6	25	75	---
IV	MJ-4	Public Economics	6	25	75	---
	MJ-5	Theory of Statistics	6	25	75	---
V	MJ-6	Economics of Growth and Development	6	25	75	---
	MJ-7	Introductory Mathematical Economics	6	25	75	---
VI	MJ-8	History of Economic Thought	6	25	75	---
	MJ-9	International Economics	6	25	75	---
VII	AMJ-1	A. Advance Mathematical Economics B. Agricultural Economics	6	25	75	---
	AMJ-2	A. Demography B. Labour and Industrial Economics	6	25	75	---
	RC-1	Research Methodology	6	25	75	---
	RC-2	Research Proposal	4	25	75	---
VIII	AMJ-3	A. Econometrics B. Problems of Indian Agriculture	6	25	75	---
	AMJ-4	A. Environmental Economics B. Jharkhand Economy	6	25	75	---
	RC-3	Research Internship/Field Work	4	---	---	100
	RC-4	Research Report	4	---	---	100
	VSR	Vocational Studies (Associated With Research)	2	---	---	100
		Total Credit	98			

Table 8: Semester wise Course Code and Credit Points:

Semester	Introductory, Minor Courses		Examination Structure			
	Code	Papers	Credits	Mid Semester Theory (F.M.)	End Semester Theory (F.M.)	End Semester Practical/ Viva (F.M.)
I/ II/ III	IRC	Introductory Economics	3	---	100	---
IV	MN-1	Elementary Micro Economics	6	25	75	---
V	MN-2	Money, Banking, Public Finance and International Trade	6	25	75	---
VI	MN-3	Indian Economy	6	25	75	---
		Total Credit	21			

AIMS OF BACHELOR'S DEGREE PROGRAMME IN ECONOMICS

The broad aims of the LOCF for Economics are to:

- i. Train students in basic economic theory;
- ii. Equip students with the mathematical and statistical techniques necessary for a
- iii. proper understanding of the discipline;
- iv. Discuss real world economic issues and problems facing the country and the world;
- v. Enable students to understand proper policy responses to economic problems;
- vi. Train students to collect primary data and learn sampling techniques;
- vii. Train students to use statistical and econometric methods to arrive at conclusions about the validity of economic theories;
- viii. Train students to learn the art of economic modelling.

To provide knowledge and skill to the students' thus enabling them to undertake further studies in Economics in related areas or multidisciplinary areas that can be helpful for self-employment/entrepreneurship

PROGRAM LEARNING OUTCOMES

The broad programme learning outcomes in Economics are:

1. Get an understanding of basic economic theory;
2. Learn the mathematical and statistical techniques necessary for a proper
3. understanding of the discipline;
4. Get an introduction to real world economic issues and problems facing the
5. country and the world;
6. Gain an understanding of proper policy responses to economic problems;
7. Get trained to collect primary data and learn sampling techniques;
8. Learn to use scientific empirical methods to arrive at conclusions about the
9. validity of economic theories;
10. Get trained in the art of economic modelling.

SEMESTER I

I. MAJOR COURSE –MJ 1:

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100	Pass Marks: Th (SIE + ESE) = 40
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Instruction to Question Setter for

Semester Internal Examination (SIE 20+5=25 marks):

There will be **two** group of questions. **Question No.1** will be **very short answer type in Group A** consisting of five questions of 1 mark each. **Question No.2** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be **two** group of questions. **Group A is compulsory** which will contain three questions. **Question No.1** will be **very short answer type** consisting of five questions of 1 mark each. **Question No.2 & 3** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

INTRODUCTORY ECONOMICS

Theory: 60 Lectures

Course Objectives:

1. This course aims to train students in the basic economic theory.
2. It will also enable them to discuss real world economic issues & problems related to Consumer's Behaviour, Production, Market, Distribution & Welfare.

Course Learning Outcomes:

1. The student will be able to understand the Basic Economic Theory.
2. It will also enable them to learn to use empirical methods to derive conclusions about the validity of Economic Theories.

Course Content:

UNIT- I Introduction

1. Definition of Economics: Adam Smith, Alfred Marshall, Lionel Robbins & Samuelson.
2. Micro and Macro Economics: Difference and Scope.
3. Normative and Positive Economics.

UNIT- II Consumer's Behaviour

1. Utility; Marshallian Utility Analysis- Law of Diminishing Marginal Utility; Law of Equi-Marginal Utility;
2. Indifference curve Analysis- Definition; Properties of Indifference curves; Budget line; Consumer's Equilibrium; Price Effect; Income Effect; Substitution Effect; Application of Indifference Curve Analysis

3. Demand- Meaning; Factors affecting Demand; Law of Demand; Elasticity of Demand – Meaning; Types; Measurement
4. Consumer's Surplus –Concept; Measurement with the help of Marshallian Utility Analysis and Indifference Curve Analysis

UNIT- III Theory of Production

1. Factors of production.
2. Law of Variable Proportions (Short run Law of Production).
3. Law of Returns to Scale (Long-run Law of Production).
4. Isoquant- Definition; Properties, Cobb Douglas Production Function.
5. Producer's Equilibrium –Concept & Measurement with the help of Isoquant and Isocost.
6. Traditional Theory of Cost.

UNIT- IV Market Forms and Equilibrium

1. Types of Markets - Perfect and Imperfect; Revenue Curves in different forms of Markets
2. Perfect Competition- Characteristics; Equilibrium of Firms in short run and long run; Equilibrium of Industry in short run and long run
3. Monopoly- Characteristics; Equilibrium of Firm in short run and long run; Degrees of Price Discrimination & its Equilibrium
4. Oligopoly- Characteristics; Collusive and Non-Collusive Oligopoly; Paul M. Sweezy's model; Price Leadership model
5. Monopolistic Competition- Meaning; Characteristics

UNIT- V Theories of Distribution

1. Rent- Classical Theory; Modern Theory
2. Interest- Classical Theory; IS-LM Theory; Keynesian Theory
3. Wages- Classical Theory; Marginal Productivity Theory of Distribution
4. Profit- Innovation Theory; Risk Bearing Theory

UNIT- VI Welfare Economics

1. Meaning of Welfare, Economic Welfare, Individual Welfare and Social Welfare
2. Pigouvian Welfare Economics
3. Pareto Optimality; Pareto Optimality in Production, Consumption and Exchange
4. Compensation Criteria
5. Social Welfare Function

Reference Books:

1. Varian, Hal R., Intermediate Microeconomics, 8TH Edition, Affiliated East-West Press.
 2. Stonier, Alfred W. & Hague, Douglas C., A Textbook of Economic Theory, 5TH Edition, Pearson.
 3. Koutsoyiannis, A., Modern Microeconomics, 2ND Edition, Palgrave Macmillan.
 4. Pindyck, Robert & Rubinfeld, Daniel. Microeconomics, 8th Edition, Pearson
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SEMESTER II

I. MAJOR COURSE- MJ 2:

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100	Pass Marks: Th (SIE + ESE) = 40
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Instruction to Question Setter for

Semester Internal Examination (SIE 20+5=25 marks):

There will be **two** group of questions. **Question No.1** will be **very short answer type in Group A** consisting of five questions of 1 mark each. **Question No.2** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be **two** group of questions. **Group A is compulsory** which will contain three questions. **Question No.1** will be **very short answer type** consisting of five questions of 1 mark each. **Question No.2 & 3** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

INTRODUCTORY MACRO ECONOMICS

Theory: 60 Lectures

Course Objectives:

1. The course aims to introduce the students to the basic concepts of Macro Economics which deals with the economy as a whole.

Course Learning Outcomes:

1. After completing this course, the students will be able to explain the basic concepts of GDP, National Income, Money, Inflation, Functions of Central bank, Credit Creation and Credit Control, Trade Cycle and its different phases.

Course Content:

UNIT- I Introduction to Macroeconomics

1. Macroeconomics, Meaning and Scope;
2. Concept and Measurement of GDP, GNP, NDP and NNP at market price and factor cost;
3. Methods of measuring National Income (Product Method, Expenditure, Income Method);
4. Circular Flow of Income in a Two Sector, Three Sector and Four Sector Model; Real and Nominal GDP.

UNIT- II Money

1. Functions of money.
2. Determinants of Demand for Money and Supply of Money.
3. Quantity Theory of Money – Cash Transaction and Cash Balance Approach; Keynesian
4. Theory of Money and Prices.

UNIT- III Inflation

- 1 Definition and types of inflation.
- 2 Demand Pull and Cost Push Inflation.
- 3 Measures to control inflation- Fiscal and Monetary policy;
- 4 Phillips Curve.

UNIT- IV Banking

- 1 Objectives, Functions of Central bank;
- 2 Methods of Credit Control – Quantitative and Qualitative methods;
- 3 Monetary Policy- objectives and instruments.

UNIT- V Theories of Employment and Income

- 1 Classical theory of Employment; Keynesian theory of Effective Demand.
- 2 Consumption Function, Saving Function – MPC and MPS; Factor affecting Consumption Function; Investment Function- Autonomous and Induced Investment.
- 3 Marginal Efficiency of Capital (MEC) and Factors affecting MEC;
- 4 Keynesian Multiplier.

UNIT- VI Trade Cycle

- 1 Meaning, Phases of trade cycle;
- 2 Hawtrey's theory of trade cycle.
- 3 Monetary measures to control trade cycle.
- 4 Fiscal measures to control trade cycle

Reference Books:

- 1 Dornbusch, Fischer, Startz, Macro Economics, Mc Graw Hill, 11th edition, 2010.
 - 2 N. Gregory Mankiw, Macro Economics, Worth Publishers, 11th edition, 2021.
 - 3 Seth, M.L., Macro Economics, Laxmi Narayan Publications (Both in English & Hindi).
 - 4 Ahuja, H.L., Advanced Macro Economics, S.Chand Publications.(Both in English & Hindi).
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SEMESTER III

I. MAJOR COURSE- MJ 3:

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100	Pass Marks: Th (SIE + ESE) = 40
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Instruction to Question Setter for

Semester Internal Examination (SIE 20+5=25 marks):

There will be **two** group of questions. **Question No.1** will be **very short answer type in Group A** consisting of five questions of 1 mark each. **Question No.2** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1 mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be **two** group of questions. **Group A is compulsory** which will contain three questions. **Question No.1** will be **very short answer type** consisting of five questions of 1 mark each. **Question No.2 & 3** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

INDIAN ECONOMY: PRINCIPLES AND POLICIES

Theory: 60 Lectures

Course Objectives:

- 1 On completion of the course, students will be able to develop an understanding of the basic structure of the Indian economy.
- 2 They will understand the importance, causes and impact of population growth and relate them with economic development.
- 3 The course also enables the students to understand the agricultural and industrial structure, their problems and contributions to the economy.
- 4 Lastly, it deals with foreign trade of the economy.

Course Learning Outcomes:

- 1 At the end of the course student will be able to pinpoint and understand the past and present economic conditions of the country in various sectors.
- 2 They will also be able to forecast the future course of development through their knowledge of policies and programmes set by the Government and other development agencies.

Course Content:

UNIT- I Structure of the Indian Economy

- 1 Major economic features of the Indian economy at the eve of independence.
- 3 Sectors and Sub-sectors of the Indian Economy: Their income and employment generation; contribution to GDP.
- 4 Basic economic indicators: GDP; Growth Rate; National Debt; Balance of Trade.
- 5 Appraisal of growth and development status of Indian Economy.

UNIT- II Planning and Development

- 1 Economic Planning in India – Historical background up to NITI Aayog.
- 2 Objectives of Indian Planning.
- 3 New Economic Policy (1991)-Objectives, Features, Impact on different sectors.
- 4 Recent initiatives for development – MGNREGA; NRLM; Make in India Program Start Up India Scheme; Pradhan Mantri Kaushal Vikas Yojana.

UNIT- III Population and Human Development

- 1 Demographic trends in size, population growth rate, age, sex, rural-urban and occupational distribution in India.
- 2 Human development: Meaning; Indicators: HDI; GDI- Concept and India's global ranking.
- 3 Human capital and its Components: Education (Importance, Gross Enrolment Ratio, Literacy rate); Health (Importance, Status and Trends of MMR, IMR, Life Expectancy); Skill Enhancement; Workforce Participation.
- 4 Problems of Indian Population: Malnutrition, Poverty and Unemployment- Meaning, Status and Government measures to eradicate.

UNIT- IV Indian Agriculture

- 1 Role of agriculture in the Indian economy; Trend of share of Agriculture in GDP
- 2 Problems of Indian agriculture.
- 3 Land reforms; Green revolution.
- 4 Regional disparities in Indian agriculture (in Gross Cultivated area, Production and Productivity of food grains, Percentage share in Gross State Domestic Product).

UNIT- V Indian Industry

- 1 Role of industry in the Indian economy; Trend of share of industry in GDP.
- 2 Large Scale Industries: Importance; Pattern of industrialization.
- 3 MSME: Composition; Importance; Major Problems faced by MSME.
- 4 New Industrial Policy 1991- Goals, Objectives, Main features.

UNIT- VI India's Foreign Trade

- 1 Composition of Foreign Trade; Direction of Foreign Trade.
- 2 India's Balance of Payment since 1991.
- 3 Foreign Trade Policy- Importance, Objectives, Features of 2015 Policy.
- 4 Regulatory bodies of Foreign Trade – FEMA; WTO and India- Favourable and Unfavourable Impact of WTO on Indian Economy.

Reference Books:

- 1 Puri V.K and Mishra S.K, Indian Economy, (English and Hindi) (January 2022), Himalaya Pub. House.
- 2 Dutt, Gaurav and Sundaram, Indian Economy, (English and Hindi) (Latest edition), S Chand & Co Ltd.
- 3 Kapila, Uma, Indian Economy: Performance and Policies, (22nd edition 2021), Academic Foundation Publications.
- 4 Jalan Bimal, India's Economic Policy (2000), Penguin India Publication.
- 5 Sinha V.C, Indian Economy Performance and Policies (2019), SBPD Publications
- 6 Verma Sanjeev, The Indian Economy (2020), Unique Publishers.
- 7 Mishra J.P, Bharat ki Arthik Nitiyan (2019), Sahitya Bhavan Publications.
- 8 Singh, Ramesh, Bharitiya Arthavyavastha (14th edition), McGraw Hills.

SEMESTER IV

I. MAJOR COURSE- MJ 4:

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100	Pass Marks: Th (SIE + ESE) = 40
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Instruction to Question Setter for

Semester Internal Examination (SIE 20+5=25 marks):

There will be **two** group of questions. **Question No.1** will be **very short answer type in Group A** consisting of five questions of 1 mark each. **Question No.2** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SLA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be **two** group of questions. **Group A is compulsory** which will contain three questions. **Question No.1** will be **very short answer type** consisting of five questions of 1 mark each. **Question No.2 & 3** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

PUBLIC ECONOMICS

Theory: 60 Lectures

Course Objectives:

- 1 Public Economics is a study of government activities from the point of view of efficiency and equity.
- 2 The course aims to introduce students to the importance of government intervention by exposing the students to a host of topics including public goods, market failures and externalities.
- 3 It covers the main theoretical and empirical concepts in public economics mainly relating to public expenditure, taxation and public debt.
- 4 It aims to equip students with understanding the role of fiscal policy in achieving the desired macro-economic goals. The centre-state financial relations in a federal system have also been included.

Course Learning Outcomes:

1. At the end of the module the students should be able to demonstrate their understanding of the theory of three tools of public economics, namely, public expenditure, taxation and public debt.
2. Extensive use of diagrams will enhance their comprehension of the concepts.
3. Study of functioning of fiscal policy and Centre- Statefinancial relations will enhance their knowledge on public economics

Course Content:

UNIT- I Nature and Scope of Public Finance

- 1 Meaning and Scope of Public Finance.
4. Distinction between Private and Public Finance; Public goods and Private goods; Merit goods.
5. Principle of Maximum Social Advantage.
6. Market Failure; Role of the government.

Unit-II Public Expenditure

- 1 Meaning, Classification and Principles of Public Expenditure.
- 2 Cannons of Public Expenditure; Effects of Public Expenditure.
- 3 Causes of Growth of Public Expenditure; Wiseman Peacock Hypothesis.
- 4 Trends in Public Expenditure in India.

Unit 3: Taxation

- 1 Taxation: Meaning, Cannons of Taxation; Classification of Taxes; Characteristics of a good Tax System.
- 2 Division of tax burden—The Benefit Approach; Ability-to-Pay Approach.
- 3 Impact and Incidence of Taxes.
- 4 Taxable Capacity.
- 5 Effects of Taxation on production and distribution.
- 6 Tax reforms; VAT and GST

Unit 4: Public Debt and Financial Administration

- 1 Public Debt: Meaning, Types, Sources and Need.
- 2 Effects of Public Debt; Burden of Public Debt.
- 3 Methods of Debt Redemption.
- 4 The Public Budget—Kinds of budget; Economic and Functional Classification of Budget.

Unit 5: Fiscal Policy

- 1 Meaning and objectives of fiscal policy.
- 2 Function of fiscal policy
- 3 Instruments of fiscal policy
- 4 Fiscal policy during inflation and depression

Unit 6: Financial Decentralization in India

- 1 Centre-State Financial Relationship.
- 2 Role of Finance Commission.
- 3 Features of current Finance Commission.

Reference Books:

1. Musgrave R. A. & Musgrave P. B.— Public Finance in Theory and Practice, McGraw Hill.
 2. Singh, S. K., Public Finance in Theory and Practice, S. Chand Publications.
 3. Singh, S. K., Lok Vitt (Hindi), S. Chand Publications.
 4. Bhatia, H. L., Public Finance, Vikas Publishing House.
 5. Bhatia, H.L., Lok Vitt, (Hindi), Vikas Publishing House.
 6. Sundaram, K. P. M. and Andley, K. K., Public Finance, S. Chand Publications.
 7. Tyagi, B. P.— Public Finance, Jai Prakash Nath &Co.
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II. MAJOR COURSE- MJ 5:

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100**Pass Marks: Th (SIE + ESE) = 40*****Instruction to Question Setter for******Semester Internal Examination (SIE 20+5=25 marks):***

There will be **two** group of questions. **Question No.1** will be **very short answer type in Group A** consisting of five questions of 1 mark each. **Question No.2** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1 mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be **two** group of questions. **Group A is compulsory** which will contain three questions. **Question No.1** will be **very short answer type** consisting of five questions of 1 mark each. **Question No.2 & 3** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

THEORY OF STATISTICS**Theory: 60 Lectures****Course Objectives:**

1. The Course aims to Introduce the Students to the basic concepts of Statistics and its application in real world.

Course Learning Outcomes:

- 1 After completing this course, the students will be able to explain basic concepts of data and its measurement, univariate and bivariate analysis, time series analysis, index number, probability.
- 2 Learn data analysis & interpretation that are widely used to solve the economic and business problems.

Course Content:**UNIT- I Introduction to Statistics**

- 1 Definition and scope of Statistics
- 3 Types of Data – Primary and Secondary Data
- 4 Methods of Collection of Data - Census and Sampling methods
- 5 Classification and Presentation of Data- Tabular; Diagrammatic and Graphic

UNI-II Univariate Analysis

- 1 Measures of Central Tendency: Mathematical average –Arithmetic Mean, Geometric Mean and Harmonic Mean, Positional Average- Median and Mode.
- 2 Measures of Dispersion: Absolute measure of Dispersion, Range, Inter Quartile Range, Quartile Deviation, Mean Deviation, Standard Deviation, Relative measure of Dispersion, Co-efficient of Range, Quartile Deviation, , Mean Deviation and Standard Deviation (co-efficient of variation).
- 3 Skewness Moments and Kurtosis

UNIT-III Bivariate Analysis

- 1 Co- relation Definition: Type; Karl Pearson and Rank Correlation
- 2 Properties of Correlation co-efficient; co-efficient of determination, Co-efficient of Alienation
- 3 Regression Equations, Lines of Regression; Least Square Method.
- 4 Interpretation of Regression co-efficient and Relation with Correlation co-efficient.

UNIT-IV Time Series and Index Number

- 1 Time Series Analysis – Concept; Component; Trend Line and Trend Value by Least Square Method
- 2 Index Number – Concept; Price relative; quantity relative; weighted Index Number; Problem in the construction of Index Number and Limitation of Index Number
- 3 Methods of Construction of Index Number – Laspeyre’s, Pasche’s , Fisher’s, Marshall’s, Edgeworth’s and Consumer Price Index.
- 4 Tests for Adequacy of Index Number – Laspeyre’s, Pasche’s, Fisher’s, Marshall’s, Edgeworth’s and Consumer Price Index.

UNIT V Probability

- 1 Basic Concept – Random Experiments, Sample Space and Events
- 2 Definition of Probability - Classical, Statistical and Axiomatic 5.4: Fiscal policy during inflation and depression
- 3 Rules of Probability Addition and Multiplication Theorem; Conditional Probability; Bayes Theorem

UNIT VI Data Analysis & Interpretation

- 1 How can the representation and analysis of data help us to study real world problems- publicly available data sets.
- 2 Available Statistical Software – steps in data storage, organisation and cleaning.
- 3 Visualization and Representation: Alternative forms for presenting, summarizing and presenting data.
- 4 estimation techniques and test for statistical inference and interpretation.

Reference Books:

- 1 Sah, N.M., Statistics for Economics, Arya Publication.
 - 2 Schaum Outline of Theory and Problem of Statistics, Murray R. Spiegel, Larry J. Stephens, Tata McGraw-Hill.
 - 3 Agrawal, V.L. Basic Statistics, New Age International Publishers.
 - 4 Gupta, V.N., Quantitative Technique (Hindi Edition), SPBD Publication.
 - 5 Sinha, V.C. and Gupta Alok, Business Statistics, SPBD Publication.
 - 6 Gupta, S.C., Fundamental of Statistics Himalaya Publishing House.
 - 7 Singh A, C., Sankhayaki, S Chand Publications.
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SEMESTER V

I. MAJOR COURSE- MJ 6:

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100	Pass Marks: Th (SIE + ESE) = 40
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Instruction to Question Setter for

Semester Internal Examination (SIE 20+5=25 marks):

There will be **two** group of questions. **Question No.1** will be **very short answer type in Group A** consisting of five questions of 1 mark each. **Question No.2** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SLA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be **two** group of questions. **Group A is compulsory** which will contain three questions. **Question No.1** will be **very short answer type** consisting of five questions of 1 mark each. **Question No.2 & 3** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

GROWTH AND DEVELOPMENT ECONOMICS

Theory: 60 Lectures

Course Objectives:

1. The course begins with a discussion of issues of growth and development, their measures and indicators. Human Development and international comparisons with India. Basic growth models and theories of development have been included.
2. Issues of poverty, inequality and population growth linking them to economic growth are explored.
3. Role of macroeconomic policies as well as foreign investments in economic development of a nation are included.

Course Learning Outcomes:

- 1 This course is designed to enable students to have an understanding of the basics of economics of growth and development along with theories and models.
- 2 An understanding of macro policies and global linkages in context of economic development of a nation will give a direction to minds of students to take a wholistic view on growth and development.

Course Content:

UNIT- I Economic Growth and Development:

- 1 Meaning and Measurement of Economic Growth; Distinction between Economic Growth and Development, Indicators of Economic Development
- 3 Factors affecting Growth and Development; Main obstacles to Economic Development; Sustainable Development
- 4 Indices of Development: HDI, GDI, GEM, PQLI; International variations in these measures; Comparisons with India.

UNIT-II Growth Models

- 1 The Harrod - Domar Model
- 2 Solow Model
- 3 Endogenous Growth Models
- 4 The Mahalanobis Model

UNIT-III Theories of Economic Development

- 1 Ricardian Theory
- 2 Marxian Theory
- 3 Rostow's stages of Growth
- 4 Balanced Growth Theory

UNIT-IV Leading Issues in Poverty, Inequality and Development

- 1 Meaning of Poverty; Absolute & Relative Poverty; Characteristics of Poverty; Vicious Circle of Poverty; Mechanisms that generate poverty trap.
- 2 Measurement of Poverty: Income based measures and Poverty Line, Non- monetary Measures (PQLI)
- 3 Concept of Economic Inequality; Measurement of Inequality: The Lorenz Curve; GINI Coefficient; Inequality and Economic Development
- 4 Population and Economic Development: Population as a drag on development in underdeveloped countries; Human Resource Development-Role of Health and Education

UNIT V Macro Economic Policy & Economic Development

- 1 Role of Monetary Policy in Promoting Economic Development, Fiscal Policy and Economic Development
- 2 External Resources in Development: FDI, Adverse Trade; Technology Inflow; MNC and Economic Growth
- 3 Indian Planning Commission and NITI Aayog.

UNIT VI Global Issues in Development:

- 1 Globalisation in historical perspective; The economics and politics of multilateral agreements
- 2 Trade, production patterns and world inequality
- 3 Financial instability in a globalised world

Reference Books:

- 1 Ray, D. (1998). Development economics. Princeton University Press.
- 2 Meier, G., Rauch, J. (2005). Leading issues in economic development. Oxford University Press.
- 3 Gullybaba IGNOU, MEC-004 Economics of Growth and Development.
- 4 Ahuja, H L, (2016) Development Economics. S Chand Publishing.
- 5 Sinha, U P, Economic Development and Growth Models. Bharti Publications.
- 6 Human Development Report. Relevant years.
- 7 Todaro, M., Smith, S. (2015). Economic Development. Pearson.
- 8 Higgins, B (1959) Economic Development, WW Norton, New York.
- 9 Lekhi, R K, Joginder Singh, The Economics of Development and Planning, Kalyani publishers.
- 10 Mishra J P. (2022 revised Ed.) Samvridhi evam Vikas ka Arthshastra, Sahitya Bhawan Publications.

II. MAJOR COURSE- MJ 7:

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100**Pass Marks: Th (SIE + ESE) = 40*****Instruction to Question Setter for******Semester Internal Examination (SIE 20+5=25 marks):***

There will be **two** group of questions. **Question No.1** will be **very short answer type in Group A** consisting of five questions of 1 mark each. **Question No.2** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be **two** group of questions. **Group A is compulsory** which will contain three questions. **Question No.1** will be **very short answer type** consisting of five questions of 1 mark each. **Question No.2 & 3** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

INTRODUCTORY MATHEMATICAL ECONOMICS**Theory: 60****Lectures****Course Objectives:**

- 1 The course aims to transmit the body of basic mathematics and its application to the study of economic theory at the Undergraduate level.
- 2 It starts from the basic concepts of set theory, functions and equations.
- 3 Thereafter it deals with the techniques of differentiation and their applications in economics.
- 4 The concept of matrix, determinants and their basic applications in solution of equation, linear programming and game theory.

Course Learning Outcomes:

- 1 The course provides the mathematical foundations necessary for further study of a variety of disciplines including most of the theoretical papers of post-graduate economics, statistics, econometrics and data analysis that is essential for higher studies in economics as well as getting employment in corporate world/ banking/civil services by enhancing their skills in the field of data analysis.

Course Content:**UNIT- I Basic Concepts**

1. Set Theory: Types; Set operation; Use of Venn Diagram
- 2 Functions: Concept; Types of Function and graphical presentation; Homogeneous and homothetic function.
- 3 Equations: System of equations; Economic application of equations
- 4 Coordinate Geometry and Economic Applications: Straight line (Keynesian Saving Function and Consumption Function; Parabola (Average Cost Curve and Total Product Curve);

Hyperbola (Unit Elastic Demand Curve and Average Fixed Cost Curve).

UNIT-II Limit and Differentiation

- 1 Limit: Concept; Rules.
2. Differentiation of functions of one independent variable [$y=f(x)$]: Concept; 1st order and 2nd order derivatives.
3. Partial Differentiation of Function with two independent variables: 1st order and 2nd order.

UNIT-III Application of Differentiation to Economics

- 1 Total and Marginal utilities; Total cost and Marginal cost; Total revenue and Marginal revenue, Relationship between Average revenue and Marginal revenue, Average cost and Marginal cost.
- 2 Elasticity: Income elasticity of demand; Price elasticity of demand; Supply elasticity; Cross elasticity of demand; Relationship of elasticity with Average revenue and Marginal revenue;
- 3 Unconstrained Maxima and Minima of a function in one independent variable: 1st order and 2nd order conditions.
- 4 Economic application of Maximisation and Minimization in one independent variable; Unconstrained optimization: Maximisation of total revenue; profit; Minimisation of Average cost and Marginal cost
- 5 Equilibrium of a firm under Perfect Competition and Monopoly; Effect of tax and subsidy on equilibrium

UNIT 4 Integration, Difference and Differential Equation

- 1 Integration: concepts; Definite Integrals, Indefinite Integrals
- 2 Economic applications: Obtaining total functions from Marginal cost; Marginal revenue; MPS; MPC
- 3 Economic applications of Definite Integrals: Consumer surplus and producers' surplus under perfect competition.

UNIT V Matrix and Determinants

- 1 Matrix: Meaning and Types of matrices
- 2 Matrix operations
- 3 Determinants operations
- 4 Inverse of a matrix; Rank of a matrix

UNIT VI Application of Matrix Algebra

- 1 Solution of Linear Non-Homogeneous Equations using Cramer's rule and Matrix rule
- 2 Linear Programming: Meaning; Features; Graphical Solution.
- 3 Game Theory: Meaning; Concepts; Graphical Solution

Reference Books:

- 1 Allen, R.G.D., Mathematical Analysis for Economists; All India publishers and distributors
- 2 Chiang, A.C., Fundamental Methods of Mathematical Economics; McGraw Hill Publication
- 3 Taro Yamane, Mathematics for Economists; Printing Hall of India
- 4 Mehta, B.C. and Madhani, G.M.K. (English and Hindi); Mathematics for Economists; Sultan Chand and sons.

SEMESTER VI

I. MAJOR COURSE- MJ 8:

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100	Pass Marks: Th (SIE + ESE) = 40
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Instruction to Question Setter for

Semester Internal Examination (SIE 20+5=25 marks):

There will be **two** group of questions. **Question No.1** will be **very short answer type in Group A** consisting of five questions of 1 mark each. **Question No.2** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be **two** group of questions. **Group A is compulsory** which will contain three questions. **Question No.1** will be **very short answer type** consisting of five questions of 1 mark each. **Question No.2 & 3** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

HISTORY OF ECONOMIC THOUGHT

Theory: 60 Lectures

Course Objectives:

The course will seek to achieve the following objectives:

1. The course comprises of a study of the main schools of economic thought starting from early views of Mercantilists and Physiocrats.
2. The Classical, Neo-Classical and the Marginalist Revolution, Economic thought of Socialists like Sismondi and Marx have been covered.
3. The syllabus also includes the valuable contributions of Indian economic thinkers like Kautilya, Dada Bhai Naoroji, B.R. Ambedkar, M.K. Gandhi and A.K. Sen.

Course Learning Outcomes:

- 1 The students will analytically learn how the economic thought has evolved over time.
- 2 They will critically and analytically study the main contributions of great economists who have influenced economic thought over time.

Course Content:

UNIT- I Economic Thought of Early Modern School

- 1 Mercantilism (16th to 18th century): Main Characteristics; Thomas Munn as a Mercantilist.
- 3 Physiocracy (1757-1776): Quesnay (1759 -1766): Natural Order, Laissez faire, Primacy of Agriculture, Social Classes, Tableau Economique, Taxation.
- 4 Economic ideas of Physiocrats - Turgot, Petty, Locke and Hume.

UNIT-II Economic Thought in the Classical Period

- 1 Adam Smith (1723-1790): Division of Labour, Theory of Value, Capital Accumulation,

- Distribution, Views on Trade, Economic Progress.
- 2 David Ricardo (1772-1823): Value, Theory of Rent, Stationary State, Distribution, Ideas on International Trade.
 - 3 Thomas R. Malthus (1776-1834): Theory of Population, Theory of General Glut.
 - 4 J. B. Say (1767-1832): Individual liberty and private property; Importance of free markets; Law of Markets.

UNIT-III Economic Ideas of Neo-Classical School and Marginalists

- 1 Comparison of Neo-Classical and Classical economics; Assumptions of Neo- Classical analysis; Main ideas on Utility and Marginalism.
- 2 Jevons (1835-1882): Mathematical Deductive reasoning, Subjective theory of value, Marginalism in Price Determination, Capital and interest rates, Disparity in effects of inflation, Business cycle.
- 3 Leon Walras (1834-1910): Marginal theory of value, General equilibrium theory, Walras law.
4. H. H. Gossen (1810-1858): Utilitarianism; Marginalism; Gossen's first law, Second Law, Third Law. Marshal 1 (1842-1924): Markets and Role of Time in Price Determination, Economic Methods, Ideas on Consumer's Surplus, Elasticity, Representative Firm, Quasi-Rent, External and Internal Economies; Partial equilibrium analysis, long-run and short-run analysis.
5. A.C. Pigou (1877-1959): Dual criteria for increase in Social Welfare, Conditions for welfare maximisation; Policy recommendations for increasing Social Welfare.
6. Vilfredo Pareto (1848-1923): Pareto principle (80/20 rule), Welfare economics- Pareto optimality; Pareto efficiency.

UNIT-IV Economic Thought of Socialists

1. J.C.L. Sismondi (1773-1842): His criticism of Capitalist system, Human welfare , Class conflict, State intervention.
2. Karl Marx (1818-1883): Dynamics of Social Change, Labour Theory of Value, Surplus Value, Profit and Theory of Capitalist Crisis.
3. J.S. Mill (1806-1873): Liberal Socialism, Liberty and Utilitarianism; Advocate of government intervention for social upliftment.

UNIT V Keynesian and Post Keynesian Thoughts

1. Neo-classicism and Keynesianism.
2. J M Keynes (1883-1946), A monetary economist: Keynesian Revolution, General Theory, Liquidity Preference, Multiplier, Rejection of Say's law and Laissez-faire, Recommendations for economic policy.
3. Post-Keynesianism: Nicholas Kaldor (1908-1986) Piero Staffa (1898-1983): Role of Aggregate Demand; Rejection of Walras General equilibrium; Views on economic growth and development; Uncertainty and Expectations; The Institution of Money; Macroeconomic paradoxes- paradox of thrift, paradox of debt, paradox of inequality.
4. Neo-Keynesianism: (Alvin Hansen 1887-1975, John Hicks 1904-1989) Keynesian versus Neo-Keynesian views; Stickiness of prices, Market failures and need for government intervention, Expansionary Monetary Policy.
5. New- Classical School: Robert Lucas (1937): Rational expectations, Unique equilibrium of economy at full employment, Trade liberalisation and free market approach.

UNIT VI Economic Thought of Indian Writers

1. Kautilya (375-283 BC): Wealth, Varta and importance of agriculture, labour, trade, population, welfare state, public finance.
2. Dada Bhai Naoroji (1825-1917): National income of India, Taxation and Military Expenditure, Drain theory and Poverty.
3. B. R. Ambedkar (1891-1956): Contributions to Public Finance, Contribution to Monetary Economics, Analysis of Indian Economic Problems, Economics of Caste System and Untouchability, Agriculture and Poverty, Women Empowerment, Ambedkar and Mahatma Gandhi.
4. M. K. Gandhi (1869-1948): Non-Violent Economy, Decentralisation- Cottage industries, Khadi Industry, Village Sarvodaya, Trusteeship Doctrine, Food problem, Population, Labour Welfare, Exchange economy.
5. Amartya Kumar Sen (1933): Poverty and Famines, Poverty and Inequality, Concept of Capability, Entitlement, Choice of Technology, Time Series Criterion.

Reference Books:

1. Schumpeter J., A History of Economic Analysis. Oxford University Press, (1954).
 2. Keynes J.M. General Theory of Employment, Interest and Money., Atlantic Publishers and Distributors, (any edition).
 3. Schumpeter J.A. Ten Great Economists: From Marx to Keynes. (Any edition).
 4. Bhatia, H.L., History of Economic Thought, (English, Hindi) Vikash Publishing House.
 5. Ganguli, B.N(1977): Indian Economic Thought: A 19th Century Perspective, Tata Mcgraw Hill.
 6. Hajela, T.N (2011) : History Of Economic Thought (English, Hindi) , Ane Books.
 7. Jhingan, M.L (2008): Aarthik Vicharon Ka Itihas, Vrinda Publications, New Delhi.
 8. Kautilya (1992), The Arthashastra, Translated And Introduced By L.N.Rangarajan, Penguin Books.
 9. Loknathan, V (2009): History of Economic Thought, S.Chand & Company.
 10. Roll, Eric: History of Economic Thought, Faber.
 11. Sinha, V.C (2011): Aarthik Vicharon Ka Itihas, Mayur Publications.
 12. Staley, Charles.E, "A History of Economic Thought: From Aristotle To Arrow", Blackwell Publishing.
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II. MAJOR COURSE- MJ 9:

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100**Pass Marks: Th (SIE + ESE) = 40*****Instruction to Question Setter for******Semester Internal Examination (SIE 20+5=25 marks):***

There will be **two** group of questions. **Question No.1** will be **very short answer type in Group A** consisting of five questions of 1 mark each. **Question No.2** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be **two** group of questions. **Group A is compulsory** which will contain three questions. **Question No.1** will be **very short answer type** consisting of five questions of 1 mark each. **Question No.2 & 3** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

INTERNATIONAL ECONOMICS**Theory: 60 Lectures****Course Objectives:**

1. This course is designed to expose the students to the theory and practice of international trade and of trade-related policies.
2. It focuses on analysing the gains from trade, the changing patterns of trade, the income distributional consequences of liberalising foreign trade, the relationship between trade, investment, and economic growth, and the reasons for and consequences of trade policies.

Course Learning Outcomes:

1. On successful completion of this course students will be able to understand different theories of international trade and their economic implications, international trade policies, foreign exchange and Balance of Payment.
2. They will be familiar with the major recent developments in the world trading system, and be able to critically analyse key international issues.

Course Content:**UNIT- I Scope and Theories of International Trade**

International Economics: Definition, Nature and Importance.

- 1 Absolute Cost Advantage.
3. Ricardian Comparative Cost Advantage.
4. Heckscher-Ohlin Theory of International Trade
5. Theory of Reciprocal Demand and Offer Curves

UNIT-II International Trade and Factor Prices

1. Trade, Factor movement and Factor prices.
2. Factor Price – Equalisation Theorem.
3. Stolper-Samuelson Theorem.

UNIT-III International Trade Policy

1. Free Trade vs. Protection; Case for and against Free Trade and Protection.
2. Methods of Trade Restriction: Tariff-Types, Optimum Tariff, Impact of Tariff in partial equilibrium analysis.
3. Quotas-Types, Their impact in partial equilibrium analysis.
4. Forms of Economic Co-operation – Free Trade area, Customs Union and Common Market.

UNIT IV Foreign Exchange

1. Exchange Rate Determination: Gold Standard (Mint Parity); Purchasing Power Parity Theory.
2. Devaluation and Appreciation of Currency & impact on International Trade.
3. Foreign Exchange Control: Meaning and Importance.

UNIT V Balance of trade and Balance of Payment

1. Balance of Trade and Balance of Payment: Concept and Components.
2. Equilibrium and Dis-equilibrium in Balance of Payment; Consequences of Disequilibrium in Balance of Payment.
3. Measures to Correct Deficit in the Balance of Payments.

UNIT VI International Financial Institutions and India

1. Functions of IMF; World Bank; WTO with reference to India.
2. Need and Importance of Foreign Capital in Developing Economies.
3. Multinational Corporations: Meaning; Advantages and Disadvantages.

Reference Books:

1. Bhagwati, J. International Trade, Cambridge Uni. Press
 2. Verma, M.L. International Trade, Vikas Publication
 3. Singh, S. K. International Monetary System-Trends & Issues, Indus Publishing Company
 4. Mannur, H.G. International Economics, Vikas publication
 5. Krugman, Paul R International Economics-Theory and Practice, Pearson Publication
 6. D. Salvatore, International Economics, Wiley India
 7. Sachdeva, International Economics, Vikas Bharati Publication
 8. Vaishya & Sachdeva Singh-Antarashtriya Arthshastra, Oxford & IBH Com.
 9. Sodersten, B.O. and Geoffrey Reed, International Economics, Palgrave Macmillan Publisher.
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SEMESTER VII

I. ADVANCE MAJOR COURSE- AMJ 1A:

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100	Pass Marks: Th (SIE + ESE) = 40
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Instruction to Question Setter for

Semester Internal Examination (SIE 20+5=25 marks):

There will be **two** group of questions. **Question No.1** will be **very short answer type in Group A** consisting of five questions of 1 mark each. **Question No.2** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SLA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1 mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be **two** group of questions. **Group A is compulsory** which will contain three questions. **Question No.1** will be **very short answer type** consisting of five questions of 1 mark each. **Question No.2 & 3** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

ADVANCED MATHEMATICAL ECONOMICS

Theory: 60 Lectures

Course Objectives:

1. This course techniques optimisation of functions in one and more variables using the tools of first and second order differentiation in one and more explanatory variables.
2. The use of total differentials and Hessians have been incorporated. Course includes the technique and use of integration in economics.
3. Dynamic analysis has been explained with the help of difference and differential equations.
4. Finally, the application of Matrix algebra in solving system of linear equations and in the fields of Linear Programming, Game Theory and Input-Output have been covered.

Course Learning Outcomes:

- 1 The course will enable the students to have an understanding of economics with the help of mathematics.
- 2 Study of Mathematical Economics equips the students to develop models. It is useful in problem-solving and decision-making in organisations.

Course Content:

UNIT- I **Optimisation of Functions**

- 1 Optimisation of function with one independent variable- Relative versus Absolute extreme value; First and Second order conditions for Relative maxima and minima; Inflexion point; Economic applications of optimisations - Maximisation of Total Utility, Total Revenue and Profit; Minimisation of Costs
- 3 Functions of two or more independent variables; Production function and Isoquants; Utility function and Indifference Curves

- 4 First and second order partial differentiation; Young's theorem

UNIT II Total Differentials and Applications of Partial and Total Derivatives in Economics

- 1 Total Differentials- Meaning and Technique; Maxima and Minima of functions using two or more independent variables (with the help of Total Differentials or Hessian determinants)
- 2 Homogeneous production function and properties; Properties of Cobb Douglas production function
- 3 Slope of demand curve; Income and Price elasticity of demand (when demand is function of price and income)
- 4 Marginal utility in case of consumption of more than one commodity

UNIT III Constrained Optimisation in Case of More Than One Independent Variable

- 1 Technique of Optimisation in case of two independent variables - Necessary Condition (using Lagrangian multiplier) and Sufficient condition (Using Total differential or bordered Hessian)
- 2 Consumer's equilibrium- Maximisation of utility subject to budget constraint
- 3 Producers equilibrium- Maximisation of output subject to cost constraint; Minimisation of cost subject to output constraint

UNIT IV Integration and It's Applications

- 1 Integration: Indefinite and Definite Integrals
- 2 Economic Applications of Indefinite Integrals- MC, MR, MPS, MPC, Investment
- 3 Economic Applications of Definite Integrals- Consumer's Surplus; Consumer's Surplus under Monopoly; Consumer's and Producer's Surplus under Perfect Competition

UNIT V Difference and Differential Equations

- 1 Difference Equations- Concept; Solution of Linear Non-Homogeneous First Order Difference Equation- General and Particular Solutions
- 2 Application of First Order Difference Equations to Market- Simple Cobweb Model
- 3 Differential Equations- Concept and Types; Solution of Linear Non-Homogeneous First Order Differential Equations - General and Particular Solutions

UNIT VI Matrix Operations and Their Applications

- 1 Singular and Non-Singular Matrix; Matrix Inversion; Rank of Matrix
- 2 Solution of Linear Non-Homogeneous Equation System using Matrix Method
- 3 Linear Programming- Concepts; Assumptions and Limitations; Formulating a Linear Programming problem; Graphic Solution to a Linear Programming problem; Dual of LLP problem
- 4 Game Theory- Concepts of Zero sum and Constant Sum game, Saddle point; Graphic Solution of Game Involving Pure and Mixed Strategies
- 5 Input-Output Analysis- Meaning and Assumptions; Transaction Matrix and Technology Matrix; Solution of Open- Static Input-Output model

Reference Books:

1. Allen, R D G, Mathematical Analysis for Economists, All India Publishers and Distributors
2. Allen, R D G, Mathematical Economics, All India Publishers and Distributors
3. Chiang, A C, Fundamental Methods of Mathematical Economics, McGraw Hill Publications
4. Srivastava, R, A Textbook on Advanced Mathematical Economics, Disha International Pub. House
5. Mehta, B C and Madhani G M K (Hindi) Mathematics for Economists, Sultan Chand and Sons Beginning Theory- Peter Barry

OR**ADVANCE MAJOR COURSE- AMJ 1B:**

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100**Pass Marks: Th (SIE + ESE) = 40*****Instruction to Question Setter for******Semester Internal Examination (SIE 20+5=25 marks):***

There will be two group of questions. Question No.1 will be very short answer type in Group A consisting of five questions of 1 mark each. Question No.2 will be short answer type of 5 marks. Group B will contain descriptive type two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be two group of questions. Group A is compulsory which will contain three questions. Question No.1 will be very short answer type consisting of five questions of 1 mark each. Question No.2 & 3 will be short answer type of 5 marks. Group B will contain descriptive type six questions of fifteen marks each, out of which any four are to answer.

Note: *There may be subdivisions in each question asked in Theory Examinations.*

AGRICULTURAL ECONOMICS**Theory: 60 Lectures****Course Objectives:**

- 1 This course is designed to expose the students to the nature, scope and Principles of agricultural Economics.
- 2 The emphasis of this course is on concepts and introduction of various tools required for analysis in agricultural economics.
- 3 In particular, the course aims to deepen students' understanding of how economic theory can be applied to analyse policy problems of agricultural sectors.
- 4 It also focuses on analysing the Principles of Agricultural production, costs and prices.

Course Learning Outcomes:

- 1 On completion of the course, the students will be able to understand the role of agriculture in economic growth and development, analyse the progress and changing nature of agricultural sector and its contribution to the economy as a whole.
- 2 The students can develop understanding of economic theories applicable in analysing the problems of agricultural production, costs and prices.

Course Content:**UNIT- I Overview of Agricultural Economics**

- 1 Nature and scope of agriculture: Traditional agriculture and its modernization;
- 3 Role of Agriculture in economic development; Interdependence of Agriculture and Industry
- 4 Mellor's approach and Lewis Model; Linkages between agriculture and industry; Sustainable agricultural development.
- 5 Ranis – Fie Model of Agricultural Growth.

UNIT II Principles of Agricultural Economics

- 1 Farm Management; Features and Kinds of firm ownership
- 2 Farm size and productivity

- 3 Intensive and extensive cultivation
- 4 Classification of agricultural products (cash and food crops, cereal and non- cereal crops)

UNIT III Principles of Agricultural Production

- 1 Production and Production Functions: Short Run and Long Run Production Function.
- 2 Relationship between TPP, APP and MPP.
- 3 Factor-Product Relationship
- 4 Factor-Factor Relationship: Isoquant, Iso Cost line, least cost combination.
- 5 Laws of Returns: Law of Increasing Returns, Law of Constant Returns and Law of Diminishing Returns.
- 6 Product-Product Relations: Production Possibility Curve, Iso Revenue line, Optimum Product combination.

UNIT IV Principles of Agricultural Cost and Pricing

- 1 Cost relationships and Profit maximization.
- 2 Marketing Costs and Margins.
- 3 Supply behaviour in Agriculture.
- 4 Risk and uncertainty in Farming: Sources of Risk, Measuring the Expectation and Variation, Measures to manage Farm Risk.

UNIT V Agricultural Prices

- 1 Meaning.
- 2 Types of Price instability, causes and impact of price fluctuations.
- 3 Agricultural price determination.
- 4 Cobweb model of Agricultural Pricing.
- 5 Trends in Agricultural Prices.

UNIT VI Agricultural Marketing

- 1 Meaning and scope of Agricultural Marketing.
- 2 Significance of Agricultural Marketing.
- 3 Market Risks.
- 4 Marketed and Marketable Surplus.

Reference Books:

- 1 Andrew Barkley, Principles of Agricultural Economics, Routledge Taylor and Francies, London and New York.
 - 2 Sadhu, A. N. and Singh Amarjeet: Fundamental of Agricultural Economics, Himalaya Publishing House, New delhi.
 - 3 Lekhi, R. K. & Singh, Joginder: Agricultural Economics-An Indian Perspective, Kalyani Publishers, New Delhi.
 - 4 S. Subba Reddy, P. Raghu Ram, T.V. Neelakanta Sastry, I. Bhavani Devi: Agricultural Economics, Oxford & IBH Publishing Co. Pvt. Ltd., New Delhi.
 - 5 Arun Katyan: Krishi Vigyan ke Sidhant, Kitab Mahal Publishers, New Delhi
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II. ADVANCE MAJOR COURSE- AMJ 2A:

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100**Pass Marks: Th (SIE + ESE) = 40*****Instruction to Question Setter for******Semester Internal Examination (SIE 20+5=25 marks):***

There will be **two** group of questions. **Question No.1** will be **very short answer type in Group A** consisting of five questions of 1 mark each. **Question No.2** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be **two** group of questions. **Group A is compulsory** which will contain three questions. **Question No.1** will be **very short answer type** consisting of five questions of 1 mark each. **Question No.2 & 3** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

DEMOGRAPHY**Theory: 60 Lectures****Course Objectives:**

- 1 The course aims to orient the students with the positive aspects of population and how it can help in the Economic Development of the nation.
- 2 It exposes the students to the important theories of demography.
- 3 The concepts of fertility, mortality and Nuptiality have a direct bearing on growth of population, hence have been taken up. Various population indices have been included.
- 4 The course also focuses on demographics of India and the Population Policy in India.

Course Learning Outcomes:

- 1 At the end of the course, the students will be oriented towards appreciating the link between demography and development of an economy.
- 2 They will understand the subject with the help various theoretical aspects of demography.
- 3 They will have a grasp of quantitative and qualitative aspects of population study and various demographic concepts and indices.

Course Content:**UNIT- I Population and Development**

- 1 Meaning of Demography; Scope of Demography.
- 4 Meaning of Population Growth; Components of Population growth; Measurement of Population growth.
- 5 Theories of Population-Malthus theory; Optimum theory; Theory of Demographic Transition.

UNIT-II Analysis of Population Data

- 1 Fertility: Meaning; Importance of study of fertility; Meaning and formula of important Birth Rate Concepts: Crude Birth Rate, Age Specific Birth Rate; Total Fertility Rate, Gross Reproduction Rate and Net Reproduction Rate; Factors affecting fertility rate; Trend of fertility

ratio India.

- 2 Mortality – Meaning; Concepts and measurements of important Death rates- Crude Death Rate, Age Specific Death Rate; Infant Mortality Rate; Neo-Natal Mortality Rate; Maternal Mortality Rate; Factors responsible for decline in mortality in recent past.
- 3 Nuptiality - Meaning; Concepts and formula of Total Marriage Rate; Total Marriage Rate; Total Divorce Rate; Gross Nuptiality Rate; Meaning and types of Marital status; Trends in age at marriage in India.

UNIT-III Migration and Urbanisation

- 1 Migration: Meaning; Types; Factors promoting migration
- 2 Effects of Out-Migration; Effects of In-Migration
- 3 Urbanisation: Meaning; Characteristics of Urban and Rural areas
- 4 Status and Trend of Urbanisation in India; Reasons for increasing urbanisation in India

UNIT-IV Population Indices

- 1 Meaning of Life table; Basic concepts of Life Table, Forms of Life Table; Preparation of life table.
- 2 Population Pyramid- Concept; Significance; Construction of Population Pyramid; Shapes of Population Pyramid and their implications.
- 3 Population Projection: stable and stationary population.
- 4 Concepts of population Cohort; Meaning and components of Vital Statistics, ‘defacto’ and ‘dejure’ Census of an area.

UNIT-V Sources of Demographic Data in India

- 1 Sources of Demographic data: Census, Registration and Sample Survey-Their relative merits and demerits.
- 2 Population Census: Methodology of collecting Census data; Characteristics of Census; Nature of information collected in 1991, 2001 and 2011.
- 3 Registration method in India; Data collected by Registration method.
- 4 NSSO and its Rounds; MOSPI and Demographic data.

UNIT-VI Population Policy in India

- 1 Meaning of Population Policy
- 2 Five Year Plans and Population policy.
- 3 The new population policy 2000.

Reference Books:

- 1 Desai, J. N. Jhingan M. L. and Bhatt B. K. (2003), Demography, Vrinda Publications.
 - 2 Mishra J, (2016), Demography, Sahitya Bhawan Publications.
 - 3 Preston, S, Heuveline, P, and Guillot, Michel (2000), Demography: Measuring and Modelling Population Processes, John Wiley and Sons Publications.
 - 4 Sinha, V. C. and Sinha, P, (2018) (English and Hindi), Demography, SBPD Publication.
 - 5 Weinstein, Jay and Pillai, Vijayan K. (2000), Demography: The Science of Population, Rowman and Littlefield Publications (2015).
 - 6 Mishra, J. P., Jananki (Hindi), (Revised edition 2021) Sahitya Bhawan Publications.
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OR**ADVANCE MAJOR COURSE- AMJ 2B:**

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100**Pass Marks: Th (SIE + ESE) = 40*****Instruction to Question Setter for******Semester Internal Examination (SIE 20+5=25 marks):***

There will be two group of questions. Question No.1 will be very short answer type in Group A consisting of five questions of 1 mark each. Question No.2 will be short answer type of 5 marks. Group B will contain descriptive type two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be two group of questions. Group A is compulsory which will contain three questions. Question No.1 will be very short answer type consisting of five questions of 1 mark each. Question No.2 & 3 will be short answer type of 5 marks. Group B will contain descriptive type six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

LABOUR AND INDUSTRIAL ECONOMICS**Theory: 60 Lectures****Course Objectives:**

- 1 The syllabus is designed to enable the students to have an understanding of the basics of industrial economics and labour economics.
- 2 It covers the nature, scope and importance of industrial economics. Important topics like Industrial Revolution, Business organisations, Industrial productivity, and Industrial finance are included. Industrial growth pattern in India along MSME sector has been covered.
- 3 Different aspects of Labour Economics have been introduced before exploring the labour market, labour legislations and wage boards in India.
- 4 The course ends with composition of labour force, Industrial disputes and social security of labour in India.

Course Learning Outcomes:

- 1 The course has been so designed that it will equip the students to have a thorough grasp of different aspects of Industrial and Labour Economics with focus on India.

Course Content:**UNIT- I Industrial Economics: An Introductory Framework**

- 1 Meaning and Definition of Industrial Economics; Subject Matter of Industrial Economics; Nature of Industrial Economics Importance of the study of Industrial Economics;
- 2 Industrial Revolution; Industrialisation in India; Index of Industrial Production (IIP)
- 3 Need for rapid industrialisation; Obstacles to Industrialisation
- 4 Business Organisation: Definition; Types (Proprietorship, Partnership, Corporations and Limited Liability Companies); Firms: Meaning; Ownership; Objectives

UNIT-II Industrial Productivity and Finance

- 1 Meaning of Industrial Productivity
- 2 Factors affecting Industrial Productivity, Indicators of Industrial Productivity
- 3 Internal and External Sources of Industrial finance; Debt versus Equity
- 4 Major funding agencies -IDBI, IFCI, SFCs, SIDBI and Commercial Banks.

UNIT-III Industrial Growth Pattern

- 1 New Industrial Policy in India
- 2 Role of Public and Private Sector; Performance of Private and Public Sector in India
- 3 Large Scale Industries: Meaning; Advantages
- 4 Medium Small and Micro Enterprises (MSME)- Classification; Importance; Features

UNIT-IV Labour Economics and Labour market

- 1 Meaning and Definition of Labour Economics; Scope and Importance of Labour Economics
- 2 Major Labour Problems in India
- 3 Concept of Labour Market; Analysis of Demand and Supply of labour; Factors affecting demand and Supply of labour
- 4 Characteristics of labours Market in India.

UNIT-V Wages

- 1 Theories of Wage determination: Classical; Neo-Classical; Bargaining Theory
- 2 Types of wages in India; Wage Policies in India- Payment of Wages Act 1936, Minimum wages Act 1948, Equal Remuneration Act 1976, Payment of Bonus Act 1965 Wage Board: Meaning and Objectives; Wage Board in India.

UNIT-VI Labour in India and Social Security Measures

- 1 Working age population and labour force participation rate; Labour Force Participation Rate in India
- 2 Meaning of Industrial Disputes; Causes and effects of Industrial Disputes; Machinery of settling the Industrial Disputes in India
- 3 Social Security: Meaning; Scope; Objectives; Importance; Category of Social Security Measures; Social Security Schemes in India

Reference Books:

- 1 George, J.Borjas, (2013 6th edition)Labour Economics, McGraw Hill.
 - 2 Hay, D. and Morris, D J (1979) Industrial Economics: Theory and Evidences, Oxford University Press, New Delhi.
 - 3 Burthwal, R.R. (1985), Industrial economics, Wiley Eastern Ltd., New Delhi.
 - 4 Singh, A. and Sadhu, A.N. (1988), Industrial Economics, Himalaya Publishing House.
 - 5 Tyagi, B.P. (2009), Economics and social welfare-Revised Edition, Sage Publication, New Delhi.
 - 6 Gupta, S.B., (2022), Audyogik Arthshastra, SBPD Publications.
 - 7 Sinha, V.C., Shram Arthashastra, SBPD Publications.
 - 8 Yadav, Ravi Prakash (2015) Social Security in India, Avishkar Publishers.
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SEMESTER VIII

I. ADVANCE MAJOR COURSE- AMJ 3A:

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100	Pass Marks: Th (SIE + ESE) = 40
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Instruction to Question Setter for***Semester Internal Examination (SIE 20+5=25 marks):***

There will be two group of questions. Question No.1 will be very short answer type in Group A consisting of five questions of 1 mark each. Question No.2 will be short answer type of 5 marks. Group B will contain descriptive type two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be two group of questions. Group A is compulsory which will contain three questions. Question No.1 will be very short answer type consisting of five questions of 1 mark each. Question No.2 & 3 will be short answer type of 5 marks. Group B will contain descriptive type six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

ECONOMETRICS

Theory: 60 Lectures**Course Objectives:**

- 1 The course is designed to introduce the students to the basic concepts of econometrics and its application.
- 2 The students will learn how to conduct empirical studies by using statistical techniques to analyse and interpret empirical results.
- 3 The course includes basic concepts of econometrics, methodology of studying econometrics, Two Variable Linear Regression Model, Interval Estimation and hypothesis testing, Multiple Linear Regression Analysis and problems in regression analysis

Course Learning Outcomes:

- 1 After completing the course successfully, the students will be able to understand the use of various statistical techniques to analyse the data and interpret the results.
- 2 Through this course you will get a broad knowledge to make use of econometric models in your academic work.
- 3 Moreover, job of data scientists, financial analysts require knowledge of econometrics.

Course Content:**UNIT- I Introduction**

- 1 What is Econometrics?
- 1 Why a separate discipline? (Importance of studying econometrics)
- 2 Relationship between Econometrics, Mathematical Economics and Statistics
- 3 Types of Econometrics
- 4 Limitations

UNIT-II Methodology of Econometrics

- 1 Stage 1: Specification of the model
- 2 Stage 2: Collection of data and estimation of the model
- 3 Stage 3: Evaluation of the coefficients of the model and Hypothesis testing
- 4 Stage 4: Prediction or Forecasting of the model

UNIT-III Two Variable Regression Model

- 1 Stochastic and Non- Stochastic Relations
- 2 Reasons for the inclusion of random or stochastic variable
- 3 The Classical Linear Regression Model and its assumptions
- 4 Ordinary Least Square Method – estimation of parameters
- 5 Properties of Least Square Estimates – The Gauss Markow Theorem
- 6 The Coefficient of Determination R^2 – A measure of Goodness of Fit

UNIT-IV Two Variable Regression: Interval Estimation and Hypothesis Testing

- 1 Interval Estimation: Some basic ideas
- 2 Confidence Interval for regression Coefficients
- 3 Hypothesis Testing: The confidence interval approach (two tail test and one tail test)
- 4 Hypothesis Testing: The test of significance approach (standard error test, t-test, Z-test)
- 5 Regression Analysis and Analysis of Variance
- 6 Application of Regression Analysis: The problem of Prediction

UNIT-V Multiple Linear Regression Analysis: The problem of Estimation

- 1 The Three Variable Model – Notation and Assumptions
- 2 Interpretation of Multiple Linear Equation _ Partial Regression Coefficients
- 3 OLS and ML Estimation of Partial Regression Coefficients
- 4 The Multiple Coefficient of Determination – R^2 and Multiple Coefficient of Correlation R ; R^2 and Adjusted R^2

UNIT-VI Relaxing the Assumptions of the Classical Model

- 1 Problems in regression analysis – Autocorrelation, Heteroscedasticity and Multicollinearity – nature, tests, consequences and remedial steps

Reference Books:

- 1 Koutsoyiannis A (1977) Theory of Econometrics, 2nd Edition, the Mc Milan Press Ltd, London
 - 2 Gujarati, D.N; (1995) Basic Econometrics, 2nd Edition, Mc Graw Hill, New Delhi
 - 3 Gujarati, D.N., C Porter and Sangeetha Gunasekar (2012) Basic Econometrics, 5th Edition, Tata Mc Graw Hill Eduaction Pvt. Ltd, New Delhi
 - 4 Maddala G.S. (Ed) 1993, Econometric Methods and Application, Aldershot, UK
 - 5 Shyamala, Navdeep Kaur and T.Arul Pragasam (2008) A Textbook on Econometrics Theory and Application, 16th Edition, Vishal Publishing Co., New Delhi
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OR**ADVANCE MAJOR COURSE- AMJ 3B:**

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100**Pass Marks: Th (SIE + ESE) = 40*****Instruction to Question Setter for******Semester Internal Examination (SIE 20+5=25 marks):***

There will be two group of questions. Question No.1 will be very short answer type in Group A consisting of five questions of 1 mark each. Question No.2 will be short answer type of 5 marks. Group B will contain descriptive type two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be two group of questions. Group A is compulsory which will contain three questions. Question No.1 will be very short answer type consisting of five questions of 1 mark each. Question No.2 & 3 will be short answer type of 5 marks. Group B will contain descriptive type six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

PROBLEMS OF INDIAN AGRICULTURE**Theory: 60 Lectures****Course Objectives:**

- 1 This course is designed to make the students understand the nature of development of Indian agriculture and study the agriculture and farming in the economic system; basic economic concepts, and problems of agriculture; credit and marketing problems, state farm programs affecting the farmer's economic position and impact of economic reforms on Indian agriculture.
- 2 It provides the students an exposure to selected aspects of sustainability of agricultural development in India.

Course Learning Outcomes:

- 1 On completion of course, the students will gain knowledge on the development and problems of Indian agriculture. The students can analyse the impacts of economic reforms on Indian agriculture.

Course Content:**UNIT- I Rural Economy of India**

- 1 Structure of Indian Economy: Place of agriculture in rural economy; Composition of the Indian rural economy.
- 2 Farm sector and non-farm sector in Indian economy.
- 3 Diversification of Agriculture; Agriculture and Allied Activities (Fisheries, Horticulture, Floriculture) Status and Growth, Problems and State Policies, Cattle Wealth of India and Dairying in Indian Economy.
- 4 Rural Industrialization: Food Processing and Agro Based Industries; Development of Rural Infrastructure.

UNIT-II Development of Agriculture

- 1 Agricultural Resources in India: Land Utilization, Cropping Pattern

- 2 Irrigation in India, Command Area Development and Flood Control
- 3 Trends in Agriculture Growth and Agriculture Productivity Pattern of Agricultural Development in India and Regional Variation.
- 4 Land reforms and Agricultural Labour in India; Agrarian relations; Historical Evolution; Land Reform Programs during Post Independence in India.
- 5 Agricultural labour: characteristics and problems.

UNIT-III Technological Changes in Agriculture

- 1 Technological Advancement in agriculture; Traditional techniques and practices; Green Revolution and HYV seeds, fertilizer and water technology.
- 2 Sustainable Agriculture; Emerging Trend in Agricultural Technology.
- 3 Evaluation of the New Agricultural Strategy.
- 4 Micro Farming; Organic Farming; Contract Farming; Dry Land Farming; Use of Bio-Technology Techniques.

UNIT-IV Agricultural Marketing

- 1 Nature of Demand and Supply of Agricultural Products.
- 2 Structure and Type of Agricultural Markets.
- 3 Marketing Channels for food grains.
- 4 Defects and Problem of Agricultural Marketing.
- 5 Need for State Intervention in Agricultural Marketing.

UNIT-V State and Agriculture

- 1 Agriculture Planning in India: Decentralized Planning and Indicative Planning
- 2 Incentives in Agriculture: Price and Non-Price Incentives: Input Subsidies; Agriculture Price Policies (APP)
- 3 Agricultural Credit: Meaning, Definition, Need and Classification
- 4 Food Security in India and Public Distribution System.

UNIT-VI WTO and Indian Agriculture

- 1 Origin of WTO; Objectives of WTO.
- 2 WTO Agreements: TRIPS; TRIMS; GATS.
- 3 WTO & Agreement on Agriculture.

Reference Books:

- 1 C.B. Marmoria: Agricultural Problems of India, Kitab Mahal, New Delhi.
 - 2 Amarjit Singh & A.N. Sadhu: Agricultural Problems in India, Himalayan Publishing House.
 - 3 C.H. Hanumantha Rao: Agriculture, Food Security, Poverty and Environment, Oxford University Press, New Delhi.
 - 4 B.B. Tripathi: Bhartiya Krishi Samasyain, Vikas Evam Sambhavnayein, Kitab Mahal, New Delhi.
 - 5 O.P. Sharma: Bhartiya Krishi Ki Adhunik Pravritiyan, Subline.
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II. ADVANCE MAJOR COURSE- AMJ 4A:

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100**Pass Marks: Th (SIE + ESE) = 40*****Instruction to Question Setter for******Semester Internal Examination (SIE 20+5=25 marks):***

There will be two group of questions. Question No.1 will be very short answer type in Group A consisting of five questions of 1 mark each. Question No.2 will be short answer type of 5 marks. Group B will contain descriptive type two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be two group of questions. Group A is compulsory which will contain three questions. Question No.1 will be very short answer type consisting of five questions of 1 mark each. Question No.2 & 3 will be short answer type of 5 marks. Group B will contain descriptive type six questions of fifteen marks each, out of which any four are to answer.

Note: *There may be subdivisions in each question asked in Theory Examinations.*

ENVIRONMENTAL ECONOMICS**Theory: 60 Lectures****Course Objectives:**

- 1 The course is designed to enable the students to have a clear understanding of the meaning and scope of environmental economics and issues of Common Property Resources, Green GDP and Carbon Footprint.
- 2 It deals with various aspects of environmental externalities, Environmental degradation and Renewable and Non- Renewable resources.
- 3 It also explores the link between Environment and Development. Finally, the major environmental policies have been covered.

Course Learning Outcomes:

- 1 At the end of the course, the students will be able to comprehend the issues related to economics of environment, issues of environmental degradation, renewable and non-renewable resources as well as the important debate on link between environment and development.

Course Content:**UNIT- I Introduction**

- 1 Meaning and Scope of Environmental Economics.
- 2 Meaning and characteristics of Environmental goods.
- 3 Common Property Resources.
- 4 Green GDP; Carbon Footprint.

UNIT-II Environmental Externalities

- 1 Environmental Externalities: Concept & Types.
- 2 Pareto Optimality and market failure in the presence of externalities.
- 3 Pigouvian taxes and subsidies.

UNIT-III Issues in Environmental Degradation

- 1 Environmental Degradation – Land, Forest and Natural Resource.
- 2 Causes, Effects and Solutions to Environmental Degradation.
- 3 Problem of Air Pollution; Problem of Water Pollution.

UNIT-IV Economics of Natural Resources

- 1 Renewable and Non-Renewable Resources.
- 2 Optimal use of Non-Renewable Resources – The Theory of Extraction.
- 3 Optimal use; Theory of Optimal Use.

UNIT-V Environment and Development

5. Environment and Economic Development – Two-way Linkage.
6. Sustainable Development – Concept and Indicators.
7. Sustainable Development goals of United Nations.
8. Environmental Kuznets Curve.

UNIT-VI Environmental Economics

1. National Environment Policy.
2. National Water Policy.
3. National Forest Policy
4. WTO & Environment.
5. Climate Change and International Agreements.

Reference Books:

1. Bhattacharya, R.N. (2006): Environmental Economics, An Indian Perspective, Oxford University Press, New York.
 2. Divan Shyam and Armin Rosencranz (2008): Environmental Law and Policy in India, Cases, Material and Statutes, Oxford University Press, New York.
 3. Ganesamurthy, V.S. (2009): Environmental Economics in India, New Century Publications, New Delhi, India.
 4. Sankar, Ulaganthan (2006): Environmental Economics, Oxford University Press, New York.
 5. Eugene T. (2008): Environmental Economics, Vrinda Publications (P) Ltd.
 6. Tietenberg, Tom (2004): Environmental and Natural Resource Economics, Pearson Education.
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OR**ADVANCE MAJOR COURSE- AMJ 4B:**

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100**Pass Marks: Th (SIE + ESE) = 40*****Instruction to Question Setter for******Semester Internal Examination (SIE 20+5=25 marks):***

There will be two group of questions. Question No.1 will be very short answer type in Group A consisting of five questions of 1 mark each. Question No.2 will be short answer type of 5 marks. Group B will contain descriptive type two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be two group of questions. Group A is compulsory which will contain three questions. Question No.1 will be very short answer type consisting of five questions of 1 mark each. Question No.2 & 3 will be short answer type of 5 marks. Group B will contain descriptive type six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

JHARKHAND ECONOMY**Theory: 60 Lectures****Course Objectives:**

- 1 The course intends to expose the students to the evolution, structure and sectoral growth of Jharkhand.
- 2 The major demographic features of the state with special focus on poverty and unemployment, migration, urbanisation, education and health have been included. Minerals, forests and environmental issues have been included in the course.

Course Learning Outcomes:

- 1 At the end of the course, the students be able to understand different aspects of demography and the problems associated with it like poverty, unemployment, malnutrition, migration, to name a few.
- 2 Students will comprehend the mineral, forest and environmental issues in the state. Lastly, they will learn about the important policies for development.

Course Content:**UNIT- I Jharkhand Economy and its Growth**

- 1 Evolution of Jharkhand economy; Basic economic features of Jharkhand's Economy; Sectoral composition of Jharkhand and contributions to GSDP
- 1 Growth in GSDP and per capita NSDP since 2000; Causes of backwardness of Jharkhand economy.
- 2 Composition, Production and Productivity in Agriculture in Jharkhand; Agricultural Growth in Jharkhand.
- 3 Major Industries of Jharkhand; Industrial growth in Jharkhand; Main problems of Industrial development in Jharkhand.

UNIT-II Demographic features of Jharkhand

- 1 Population growth, Density, and regional distribution of population.

- 2 Present Status and change with reference to Census 2001 and 2011 in - Literacy Rate, Sex Ratio, Sex Composition of work force, Occupational Distribution and Rural- Urban composition.
- 3 Tribal population in Jharkhand: Main tribes; Proportion in total population; Demographic features of tribal population in the state.
- 4 Status and economic causes of problems of Human trafficking and Witch Craft.
- 5 Rural-Urban migration and Intra state migration in Jharkhand; Causes of migration in Jharkhand – push and pull factors.

UNIT-III Poverty, Unemployment and Urbanisation in Jharkhand

- 1 Status of poverty in Jharkhand; Major Poverty Alleviation Programs in Jharkhand and their outcomes (MGNREGA, PMGSY, NRLM).
- 2 Unemployment in Jharkhand-status and trend in Rural and Urban areas.
- 3 Urbanization in Jharkhand - Status and Trend; Causes of rising Urbanisation; Consequences of rising urbanization in the state.

UNIT-IV Education and Health in Jharkhand

- 1 Trends in Government expenditure on different levels of education in Jharkhand; Obstacles to achieving Universal Primary Education.
- 2 Education indicators in Rural and Urban areas of Jharkhand- Literacy rates, Enrolment Ratios, Dropout rates (sex wise).
- 3 Status and trends in Health indicators in Rural and Urban areas of Jharkhand - Mortality Rates, Maternal Mortality Rates, Child Mortality Rates and Total Fertility Rates in Jharkhand.
- 4 Status of food security in Jharkhand; Child and Women Malnutrition in Jharkhand; Food security schemes.

UNIT-V Minerals, Land, Forest and Environmental issues in Jharkhand

- 1 Mineral Resources of Jharkhand; Land reforms and Agrarian Relations in Jharkhand.
- 2 Forests in Jharkhand; Non-Timber Forest Products of Jharkhand (NTFPs); Issues and Challenges in NTFPs in Jharkhand
- 3 Impacts of Development-Induced Displacement; Policy initiatives undertaken by Government.
- 4 Causes of Environmental Degradation in Jharkhand.

UNIT-VI Development Policies in Jharkhand

- 1 NITI Aayog - Objectives, function & role in Jharkhand.; Public Finance trends in Jharkhand.
- 2 Industrial policy in Jharkhand 2021; Forest Rights Act in Jharkhand.
- 3 Role of Panchayati Raj in Economic Development in Jharkhand.

Reference Books:

- 1 Ranjan, Manish, Jharkhand Samanya gyan
 - 2 Sahu, Dileep. Jharkhand Economy. Disha International Publishing House
 - 3 Kunal Vikram Micro Planning of Jharkhand; Kunal Vikram
 - 4 Kumar. Raj. and Ram, S. Jharkhand-Land and People, Arjun publication
 - 5 Bhat, S. C. Jharkhand – A State Study Guide, Neeraj Kumar Jha, Jeevonsons Publications District Gazetteer of Jharkhand, Gyan Publishing House
 - 6 Kumar, Sharat, Jha, Pravin Kumar. Development of Bihar and Jharkhand, Shipra Publications
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COURSES OF STUDY FOR **INTRODUCTORY/ MINOR ELECTIVE** FYUGP IN
“ECONOMICS”

SEMESTER I/ II/ III

INTRODUCTORY REGULAR COURSE

1 Paper

I. INTRODUCTORY REGULAR COURSE (IRC)

(Credits: Theory-03)

- All Four Introductory & Minor Papers of Economics to be studied by the Students of **Other than Economics Honours**.
- Students of **Economics Honours** must Refer Content from the **Syllabus of Opted Introductory & Minor Elective Subject**.

Marks: 100 (ESE: 3Hrs) = 100

Pass Marks: Th (ESE) = 40

*Instruction to Question Setter for**End Semester Examination (ESE 100 marks):*

*There will be two group of questions. **Group A is compulsory** which will contain three questions. **Question No.1 will be very short answer type** consisting of ten questions of 1 mark each. **Question No.2 & 3 will be short answer type** of 5 marks. **Group B will contain descriptive type** six questions of twenty marks each, out of which any four are to answer.*

Note: There may be subdivisions in each question asked in Theory Examinations.

INTRODUCTORY ECONOMICS**Theory: 45 Lectures****Course Objectives:**

1. This course is designed to introduce the students to the basic concepts and principles of Micro Economic theory comprising of central problems of the economy, national income, public finance and international trade.

Course Learning Outcomes:

- 1 The students will be able to understand the functioning of the economy at the micro and macro level.
- 2 They will also have an idea about the monetary and fiscal policies, taxes and development issues.
- 3 A study about the Jharkhand Economy will enlighten them about its growth and sectoral composition.

Course Content:**UNIT- I Introduction**

- 1 Definition of Economics;
- 4 Central problems of the economy;
- 5 Micro and Macro Economics - Meaning, difference, importance and limitations.

UNIT-II Micro Economics

- 1 Law of diminishing marginal utility; Law of Equi - marginal utility.
- 2 Law of demand and supply; Factors affecting demand and supply.
- 3 Elasticity of demand - types, measurement.
- 4 Market Equilibrium with the help Market demand and Market Supply.

UNIT-III Macro Economics

- 1 National income - different concepts.
- 2 Money - definition, functions.
- 3 Inflation - definition, Cost push and demand-pull inflation.
- 4 Commercial and Central Banks – definition and functions.
- 5 Monetary and Fiscal policies – meaning and objectives.

UNIT-IV Indian Economy

- 1 Sectoral growth of Indian Economy.
- 2 Large Scale Industries of India, Definition and classification of MSME sector;
- 3 Problems of Agricultural sector; Sources of Agricultural Credit in India; Green Revolution.
- 4 Jharkhand Economy - Growth and sectoral composition; sex, age, education, workforce and social composition.

UNIT-V Public Finance and International Trade

- 1 Taxes - sources, Direct and Indirect taxes.
- 2 Public expenditure; Public Debt; GST.
- 3 Comparative Cost Advantage Theory.
- 4 Balance of Payment- Meaning and Components

UNIT-VI Developmental Issues in Economics

- 1 Millennium Development Goals.
- 2 Concepts of Growth; Development; Poverty; Unemployment; Human Development.

Reference Books:

- 1 Ahuja, H.L, Principles of Microeconomics.22nd Edition, S. Chand Publications (English & Hindi).
 - 2 Ahuja, H.L. Macroeconomics Theory & Policy. 20th Edition, S. Chand Publications (English & Hindi).
 - 3 Varian, Hal R., Intermediate Microeconomics,8TH Edition, Affiliated East-West Press.
 - 4 Mankiw, N. Gregory. Principles of Macroeconomics. 7TH Edition, Cengage Learning India.
 - 5 Lekhi, R.K. & Singh, Joginder. Public Finance. 11TH Edition, Kalyani Publishers.
 - 6 Mithani, D.M., Money, Banking, International Trade & Public Finance. 20TH Revised Edition, Himalayan Publication.
 - 7 Dutt, R. & KPM Sundaram, Indian Economy, 57th Edition, S. Chand Publications.
 - 8 Misra, J.P. & Singhai, J.C. Antar rashtriya Vyapar evam Vitt, (2019). Sahitya Bhawan Publications.
 - 9 Seth, M.L.,Money, Banking ,International Trade & Public Finance(2020). L.N. Agarwal Publication.
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SEMESTER IV

MINOR ELECTIVE-1

1 Paper

I. MINOR ELECTIVE (MN 1)

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100

Pass Marks: Th (SIE + ESE) = 40

Instruction to Question Setter for***Semester Internal Examination (SIE 20+5=25 marks):***

There will be **two** group of questions. **Question No.1** will be **very short answer type in Group A** consisting of five questions of 1 mark each. **Question No.2** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be **two** group of questions. **Group A is compulsory** which will contain three questions. **Question No.1** will be **very short answer type** consisting of five questions of 1 mark each. **Question No.2 & 3** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

ELEMENTARY MICRO ECONOMICS**Theory: 60 Lectures****Course Objectives:**

- 1 This course is designed to expose the students to the principles of Microeconomics in the field of consumption, production, equilibrium under different market forms, distribution and welfare economics.

Course Learning Outcomes:

- 1 On completion of course, the student will be able to understand the basic principle of microeconomics in the optimizing behavior of consumer, producers and firm. They will be able to apprehend the process by which factors of production are priced and also the welfare aspects of distribution of income in an economy.

Course Content:**UNIT- I Introduction**

- 1 Definition of Economics; Scope of Economics.
- 2 Central problems of an Economy.
- 3 Economic Systems (Socialism & Capitalism).
- 4 Micro and Macro Economics.
- 5 Production Possibility Curve.

UNIT-II Market Forces: Demand & Supply

- 1 Demand – Meaning & Determinants; Law of Demand; Individual demand and Market demand curve.
- 2 Elasticity of Demand – Meaning; Types; Measurement

- 3 Supply – Meaning and Determinants, Law of Supply, Individual Supply and Market Supply Curve, Elasticity of supply
- 4 Market Equilibrium will the help of Demand & Supply

UNIT-III Consumer Behavior

- 1 Utility – Cardinal and Ordinal.
- 2 Cardinal Utility Analysis – Total and Marginal Utility, Law of Diminishing Marginal Utility, Law of Equi-Marginal Utility & Consumers equilibrium.
- 3 Indifference Curves (Ordinal Utility Analysis) – Meaning; properties; Budget line; Consumer Equilibrium.
- 4 Price Effect; Income Effect; Substitution Effect (Hicks & Slutsky).
- 5 Consumer's Surplus.

UNIT-IV Production, Cost and Revenue

- 1 Product function – concept and types
- 2 Law of variable proportions
- 3 Isoquants – Meaning and Properties
- 4 Optimum factor combination and Expansion Path
- 5 Returns to Scale
- 6 Concept of cost; Cost Curves: Short run and long run; relationship among cost curves.
- 7 Concept of Revenue; Revenue curves under P.C. & Monopoly; Relationship among Revenue curves.

UNIT-V Market Forms & Equilibrium

- 1 General Analysis of Firm's Equilibrium.
- 2 Market Classification and Firm's Revenue Concepts.
- 3 Concept of Market, perfect Market and Imperfect Market.
- 4 Perfect competition - Characteristics, Concept of Firm and Industry; Short Run and Long Run Equilibrium of firm under Perfect competition; Industry Equilibrium.
- 5 Monopoly – Meaning & Characteristics; Equilibrium in Short Run and Long Run.

UNIT-VI Factor Pricing / Distribution

- 1 Factor of production & Rewards of the factors.
- 2 Theories of Distribution; Rent – Concept; Ricardian Theory of Rent, Modern Theory of Rent.
- 3 Wage – Concept; Classical Theory; Marginal Productivity Theory
- 4 Interest; Profit – Concept; Risk & Uncertainty Theory of Profit, Innovation Theory of Profit

Reference Books:

- 1 Koutsoyiannis A. (1975). Modern Micro-economics (2nd edition). London Macmillan Publishers Ltd.
 - 2 Ahuja, H.L., "Advance Economic Theory", S. Chand & Company Pvt. Ltd (English & Hindi medium).
 - 3 Jhingan, M.L., "Micro Economics", Vrinda Publication Pvt. Ltd. (English & Hindi medium).
 - 4 Verma, K.N. (2014). Micro Economic Theory (2nd edition). Vishal Publishing Co., Hindi Medium.
 - 5 Dwivedi, D.N. (2006). Micro-economics Theory & Application Pearson.
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SEMESTER V**MINOR ELECTIVE-2****1 Paper****I. MINOR ELECTIVE (MN 2)**

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100**Pass Marks: Th (SIE + ESE) = 40*****Instruction to Question Setter for******Semester Internal Examination (SIE 20+5=25 marks):***

There will be two group of questions. Question No.1 will be very short answer type in Group A consisting of five questions of 1 mark each. Question No.2 will be short answer type of 5 marks. Group B will contain descriptive type two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be two group of questions. Group A is compulsory which will contain three questions. Question No.1 will be very short answer type consisting of five questions of 1 mark each. Question No.2 & 3 will be short answer type of 5 marks. Group B will contain descriptive type six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

MONEY, BANKING, PUBLIC FINANCE AND INTERNATIONAL TRADE**Theory: 60 Lectures****Course Objectives:**

- 1 This course is designed to introduce the students to the basic concepts and principles of Money, Banking, Public Finance and international Trade.

Course Learning Outcomes:

- 1 The students will be able to understand the financial behaviour of the individual, institution and economy. They will also have an idea about the monetary and fiscal policies, taxes and development issues.

Course Content:**UNIT-I Money**

- 1 Money: Concepts and Functions
- 2 Determinants of Demand for Money and Supply of Money.
- 3 Components of Money Supply (M1, M2, M3 & M4).

UNIT-II Banking

- 1 Functions of Central Bank; Functions of Commercial Banks.
- 2 Money creation by the Commercial Banking System.
- 3 Instruments of Credit Control of Central Bank – Quantitative and Qualitative.

UNIT-III Public Finance

- 1 Importance of Public Finance; Scope of Public Finance.

- 2 Theories of Public Finance; Theory of Maximum Social advantage.
- 3 Taxation: Definition; characteristics; Types of taxation; Merits and Demerits of Direct Tax and Indirect Tax.
- 4 Public Expenditure; Trends in Public Expenditure in India.

UNIT-IV Government Budget and Economy

- 1 Government Budget: Meaning; Objectives; Components.
- 2 Classification of Receipts: Revenue Receipts and Capital Receipts.
- 3 Classification of Expenditure: Revenue Expenditure and Capital Expenditure.
- 4 Meaning of Government Deficit – Revenue Deficit and Fiscal Deficit.

UNIT-V International Trade

- 1 Theories of International Trade: Absolute Cost Advantage Theory; Comparative Cost Advantage Theory; Heckscher Ohlin Theory.
- 2 Free Trade Vs Protection.
- 3 Gains from Trade.

UNIT-VI Balance of Trade and Balance of Payment

- 1 Components of Balance of Payment.
- 2 Disequilibrium in the Balance of Payment
- 3 Measures to correct the disequilibrium in the Balance of Payment.

Reference Books:

- 1 Vaish, M.C., Money, Banking, Trade & Public Finance, New Age International Pvt Ltd.
- 2 Sundaram, K.P.M., Money, Banking and International Trade, S Chand Publications.
- 3 Varian, Hal R., Intermediate Microeconomics, 8th Edition, Affiliated East-West Press.
- 4 Lekhi, R.K., & Singh, Joginder. Public Finance, 11th Edition, Kalyani Publishers.
- 5 Mithani, D.M., Money Banking, International Trade & Public Finance, 20th Edition, Himalayan Publishers

SEMESTER VI

MINOR ELECTIVE-3

1 Paper

I. MINOR ELECTIVE (MN 3)

(Credits: Theory-06)

Marks: 25 (5 Attd. + 20 SIE: 1Hr) + 75 (ESE: 3Hrs) = 100

Pass Marks: Th (SIE + ESE) = 40

Instruction to Question Setter for***Semester Internal Examination (SIE 20+5=25 marks):***

There will be **two** group of questions. **Question No.1** will be **very short answer type in Group A** consisting of five questions of 1 mark each. **Question No.2** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** two questions of ten marks each, out of which any one to answer.

The Semester Internal Examination shall have two components. (a) One Semester Internal Assessment Test (SIA) of 10 Marks, (b) Class Attendance Score (CAS) of 5 marks. Conversion of Attendance into score may be as follows: (Attendance Upto 45%, 1mark; 45<Attd.<55, 2 marks; 55<Attd.<65, 3 marks; 65<Attd.<75, 4 marks; 75<Attd, 5 marks)

End Semester Examination (ESE 75 marks):

There will be **two** group of questions. **Group A is compulsory** which will contain three questions. **Question No.1** will be **very short answer type** consisting of five questions of 1 mark each. **Question No.2 & 3** will be **short answer type** of 5 marks. **Group B** will contain **descriptive type** six questions of fifteen marks each, out of which any four are to answer.

Note: There may be subdivisions in each question asked in Theory Examinations.

INDIAN ECONOMY**Theory: 60 Lectures****Course Objectives:**

- 1 On completion of the course students will be able to develop ideas of the nature and features and also understand the trends and growth of Indian economy.
- 2 They will understand the problems of poverty and unemployment. Course also covers topic on human development, agricultural and industrial problems, remedies and also foreign trade of the economy.

Course Learning Outcomes:

- 1 At the end of the course students will aware about recent economic affairs. Students will get benefit about various economic issues at national and global level.

Course Content:**UNIT- I Indian Economy and Its Problems**

- 1 Nature of the Indian Economy – India as a developing economy.
- 2 Trends and growth of Indian Economy.
- 3 Poverty– causes and its remedial measures.
- 4 Unemployment – causes and Government initiatives.

UNIT-II Planning and Development

- 1 Economic Planning in India – Historical background up to NITI Aayog.
- 2 Objectives of Indian Planning.
- 3 New Economic Policy (1991)-Objectives, Features, Impact on different sectors.

- 4 Recent initiatives for development – MGNREGA; NRLM; Make in India Program Start Up India Scheme; Pradhan Mantri Kaushal Vikas Yojana.

UNIT-III Population and Human Development

- 1 India's population – size and growth trends.
- 2 Demographic transition of three stage.
- 3 Population and economic development.
- 4 Essential components of Human development.

UNIT-IV Agriculture

- 1 Role of agriculture in Indian economy
- 2 Trend in agriculture production and productivity
- 3 New agriculture policy in India
- 4 Problem of food security and National Food Security Act

UNIT-V Industrial Sector

- 1 Trends in Industrial production.
- 2 Problems of Industrial Development in India.
- 3 New Industrial Policy.
- 4 Performance of the Public Sector.

UNIT-VI Indians Foreign Trade

- 1 Composition and Direction of Foreign Trade.
- 2 India's BOP since 1991.
- 3 Foreign Trade Policy.
- 4 Regulatory bodies of Foreign Trade – FERA, FEMA.

Reference Books:

- 1 Puri V.K and Mishra S.K, Indian Economy, (English and Hindi) (January 2022), Himalaya Publishing House.
 - 2 Dutt, Gaurav and Sundaram, Indian Economy, (English and Hindi) (Latest edition), S Chand & Co Ltd.
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FORMAT OF QUESTION PAPER FOR SEMESTER INTERNAL EXAMINATION

Question format for 10 Marks:

Subject/ Code		Exam Year
F.M. =10	Time=1Hr.	
General Instructions:		
i. Group A carries very short answer type compulsory questions.		
ii. Answer 1 out of 2 subjective/ descriptive questions given in Group B .		
iii. Answer in your own words as far as practicable.		
iv. Answer all sub parts of a question at one place.		
v. Numbers in right indicate full marks of the question.		
Group A		
1.		[5x1=5]
i.	.....
ii.	.....
iii.	.....
iv.	.....
v.	.....
Group B		
2.	.....	[5]
3.	.....	[5]
Note: There may be subdivisions in each question asked in Theory Examination.		

Question format for 20 Marks:

Subject/ Code		Exam Year
F.M. =20	Time=1Hr.	
General Instructions:		
i. Group A carries very short answer type compulsory questions.		
ii. Answer 1 out of 2 subjective/ descriptive questions given in Group B .		
iii. Answer in your own words as far as practicable.		
iv. Answer all sub parts of a question at one place.		
v. Numbers in right indicate full marks of the question.		
Group A		
1.		[5x1=5]
i.	.....
ii.	.....
iii.	.....
iv.	.....
v.	.....
2.	.....	[5]
Group B		
3.	.....	[10]
4.	.....	[10]
Note: There may be subdivisions in each question asked in Theory Examination.		

FORMAT OF QUESTION PAPER FOR END SEMESTER UNIVERSITY EXAMINATION

Question format for 50 Marks:

Subject/ Code	Time=3Hrs.	Exam Year
F.M. =50		
General Instructions:		
i. Group A carries very short answer type compulsory questions.		
ii. Answer 3 out of 5 subjective/ descriptive questions given in Group B .		
iii. Answer in your own words as far as practicable.		
iv. Answer all sub parts of a question at one place.		
v. Numbers in right indicate full marks of the question.		
<u>Group A</u>		
1.		[5x1=5]
i.	
ii.	
iii.	
iv.	
v.	
<u>Group B</u>		
2.	[15]
3.	[15]
4.	[15]
5.	[15]
6.	[15]
Note: There may be subdivisions in each question asked in Theory Examination.		

Question format for 60 Marks:

Subject/ Code	Time=3Hrs.	Exam Year
F.M. =60		
General Instructions:		
i. Group A carries very short answer type compulsory questions.		
ii. Answer 3 out of 5 subjective/ descriptive questions given in Group B .		
iii. Answer in your own words as far as practicable.		
iv. Answer all sub parts of a question at one place.		
v. Numbers in right indicate full marks of the question.		
<u>Group A</u>		
1.		[5x1=5]
i.	
ii.	
iii.	
iv.	
v.	
2.	[5]
3.	[5]
<u>Group B</u>		
4.	[15]
5.	[15]
6.	[15]
7.	[15]
8.	[15]
Note: There may be subdivisions in each question asked in Theory Examination.		

Question format for 75 Marks:

F.M. = 75	Subject/ Code Time=3Hrs.	Exam Year
General Instructions:		
i. Group A carries very short answer type compulsory questions. ii. Answer 4 out of 6 subjective/ descriptive questions given in Group B . iii. Answer in your own words as far as practicable. iv. Answer all sub parts of a question at one place. v. Numbers in right indicate full marks of the question.		
Group A		
1.		[5x1=5]
i.	
ii.	
iii.	
iv.	
v.	
2.	[5]
3.	[5]
Group B		
4.	[15]
5.	[15]
6.	[15]
7.	[15]
8.	[15]
9.	[15]
Note: There may be subdivisions in each question asked in Theory Examination.		

Question format for 100 Marks:

F.M. = 100	Subject/ Code Time=3Hrs.	Exam Year
General Instructions:		
i. Group A carries very short answer type compulsory questions. ii. Answer 4 out of 6 subjective/ descriptive questions given in Group B . iii. Answer in your own words as far as practicable. iv. Answer all sub parts of a question at one place. v. Numbers in right indicate full marks of the question.		
Group A		
1.		[10x1=10]
i.	
ii.	
iii.	
iv.	
v.	
vi.	
vii.	
viii.	
ix.	
x.	
2.	[5]
3.	[5]
Group B		
4.	[20]
5.	[20]
6.	[20]
7.	[20]
8.	[20]
9.	[20]
Note: There may be subdivisions in each question asked in Theory Examination.		