

**UNIVERSITY OF CALCUTTA**  
**RECOMMENDED REVISED SYLLABI**  
**F**  
**O**  
**R**  
**THREE-YEAR HONOURS**  
**DEGREE COURSES OF STUDIES**

**PHILOSOPHY**

**2017**

**Syllabus for Three-Year B.A. (Honours) Course in Philosophy**  
Minimum number of classes per paper of 100 marks: 100

### **Part I**

**Paper I:** INDIAN PHILOSOPHY 100 marks

**Paper II:** PSYCHOLOGY AND SOCIAL AND POLITICAL PHILOSOPHY 100 marks

### **Part II**

**Paper III:** HISTORY OF WESTERN PHILOSOPHY 100 marks

**Paper IV:** LOGIC 100 marks

### **Part III**

**Paper V:** INDIAN LOGIC AND EPISTEMOLOGY 100 marks

**Paper VI:** PHILOSOPHY OF LANGUAGE, EPISTEMOLOGY AND METAPHYSICS (WESTERN) 100 marks

**Paper VII:** ETHICS AND PHILOSOPHY OF RELIGION 100 marks

**Paper VIII:** OPTIONAL PAPER (ANY OF THE FOLLOWING) 100 marks

**A: An Enquiry Concerning Human Understanding: David Hume**

**B: Western Logic**

**C: Ethics**

**D: Contemporary Indian Philosophy**

## **Syllabus for Three-Year B.A. (Honours) Course in Philosophy**

Minimum number of classes per paper of 100 marks: 100

**Part-I**  
**PAPER-I**  
**(INDIAN PHILOSOPHY) 100 marks**  
**Half-I (50 marks)**

**Unit-I**

- A. Introduction: Division of Indian Philosophical Schools: Āstika and Nāstika  
B. Cārvāka School—Epistemology, Metaphysics, Ethics.  
C. Jainism—Concept of Sat, Dravya, Paryāya, Guṇa. Anekāntavāda, Syādvāda and Saptabhaṅginaya.  
D. Buddhism—Four noble Truths, Theory of Dependent Origination (Pratītyasamutpādvāda), Definition of Reality (Arthakriyākāritvamsattvam), Doctrine of Momentariness, (Kṣanabhaṅgavāda), Theory of no-soul (Nairātmyavāda), Four Schools of Buddhism (Basic tenets).

**Unit-II**

- A. Nyāya –Pramā and Pramāṇa, Pratyakṣa (Definition), Sannikarṣa, Classification of Pratyakṣa: Nirvikalpaka, Savikalpaka, Laukika, Alaukika;  
B. Anumiti, Anumāna (Definition), vyāpti, parāmarśa, Classification of Anumāna: pūrvavat, śesavat, smānyatodṛṣṭa, kevalānvayī, kevalavyātirekī, anvayavyātirekī, svārthānumāna, parārthānumāna, Upamāna (definition), Śabda (definition)  
C. Vaiśeṣika—Seven Padārthas, dravya, guṇa, karma, sāmānya, viśeṣa, samavāya, abhāva,  
D. Different types of causes: samavayī, asamavayī and nimitta. Asatkāryavāda.

**Half-II (50 marks)**

**Unit-III**

- A. Sāmkhya—Satkāryavāda, Nature of Prakṛti, its constituents and proofs for its existence. Nature of Purusa and proofs for its existence, plurality of purusas, theory of evolution.  
B. Yoga—Citta, Cittavṛtti, Cittabhūmi. Eight fold path of Yoga, God.  
C. Mīmāṃsā (Prābhakara and Bhāṭṭa) : Anvitāvidhānvāda and avihitānvayavāda, Arthāpatti and Anupalabdhi as sources of knowledge.

**Unit-IV**

- A. Advaita Vedānta—Sankara's view of Brahman, Saguṇa and Nirguṇa Brahman, Three grades of Sattā: prātibhāsika, vyavahārika and pāramārthika, Jīva, Jagat and Māyā.  
B. Viśiṣṭādvaita—Rāmānuja's view of Brahman, Jīva, Jagat. Refutation of the doctrine of Māyā.

**Suggested Readings:**

**English:**

- Outlines of Indian Philosophy: M. Hiriyanna
- A Critical Survey of Indian Philosophy: C.D. Sharma
- An Introduction to Indian Philosophy: D. M. Dutta & S.C. Chatterjee
- Classical Indian Philosophy: J.N. Mohanty
- History of Indian Philosophy: S.N. Dasgupta
- Indian Philosophy (Vol. I & II): S. Radhakrishnan
- Indian Philosophy (Vol. I & II): J.N. Sinha
- Studies on the Carvaka/Lokayata: Ramakrishna Bhattacharya
- The Central Philosophy of Buddhism: T.R.V. Murti
- Yogacara Idealism: A.K.Chatterjee

- An Introduction to Maddhyamika Philosophy: Jaydev Singh
- Reflections on Indian Philosophy: K.P. Sinha
- Philosophy of Jainism: K.P. Sinha
- Nyaya Theory of Knowledge: S.C. Chatterjee
- Six Ways of Knowing: D.M. Dutta
- Nyaya-Vaisesika Metaphysics: Sadananda Bhaduri
- The Doctrine of Maya: A.K. Roychoudhuri
- Self and Falsity in Advaita Vedanta: A.K. Roychoudhuri
- The Word and the world: Bimal Krishna Motilal
- Logic, Language and Reality: Bimal Krishna Motilal

### **Bengali:**

- Bharatiya Darshan: Debabrata Sen
- Bharatiya Darshan: Nirodbaran Chakraborty
- Sayan Madhaviya Sarva Darshan Samgraha: Satyajyoti Chakraborti
- Lokayata Darshan: Debiprasad Chatoopadhyay
- Carvakacarca: Ramakrisna Bhattacharya
- Carvaka Darshan: Panchanan Sastri
- Carvaka Darshan: Amit Kumar Bhattacharya
- Bauddha Dharma O Darshan: Swami Vidyananya
- Bauddha Darshan: Panchanan Sastri
- Gautama Buddher Darshan o Dharma: Sukomol Choudhury
- Bauddha Darshan: Amit Kumar Bhattacharya
- Ksanabhangavada: Bidhubhusan Bhattacharya
- Jainadarshaner Digdarshan: Satindra Chandra Bhattacharya
- Nyaya Darshan: Phanibhushan Tarkavagisha
- Nyaya Paricaya: Phanibhushan Tarkavagisha
- Nyaya-Vaisesika Darshan: Karuna Bhattacharya
- Nyaya Tattva Parikrama: Kalikrishna Bandyopadhyaya
- Samkhya Darshan: Bhupendranath Bhattacharya
- Samkhya Darshaner Vivarana: Bidhubhushan Bhattacharya
- Samkhyamata Samiksa: Yogendranath Bagchi
- Samkhya Tattva Kaumudi: Narayan Chandra Goswami
- Samkhya-Patanjal Darshan: Kanakprabha Bandyopadhyaya
- Patanjala Darshan: Purnachandra Vedantachanchu
- Puva Mimasa Darshan: Sukhamaya Bhattacharya
- Vedanta Darshan: Roma Choudhury
- Vedanta Darshan: Advaitavada: Ashutosh Sastri
- Mayavada: Pramatha Nath Tarkabhushan
- Vedanta Darshan: Swami Vidyananya

**PAPER—II**  
**(GENERAL PSYCHOLOGY & SOCIAL AND POLITICAL PHILOSOPHY) 100 marks**  
**Half-I GENERAL PSYCHOLOGY (50 marks)**

**Unit-I**

- A. Psychology: Definition, Nature and Scope  
B. Methods of Psychology: Introspection, Extrospection, Experimental Methods—variables—dependent & independent, controls in experiment, limitations of experimental method.
- C. Sensation and perception: Nature of sensation, nature of perception, relation between sensation and perception, Gestalt theory of perception. Illusion and Hallucination.  
D. Learning: Theories of Learning—Trial and error theory, Thorndike's laws of learning, Gestalt Theory, Pavlov's theory of conditioned response, B.F. Skinner's theory of Operant Conditioning (reinforcement, extinction, punishment).

**Unit-II**

- A. Philosophical Theories of Mind:** Interactionism, Double-aspect theory, Philosophical Behaviorism, Materialism- mind-brain identity theory, The Person theory (Strawson).  
B. Consciousness: Levels of mind—Conscious, Sub-conscious, Unconscious, proofs for the existence of Unconscious, Freud's theory of Dream.  
C. Personality: Types, Factors and Traits of Personality.

**Half-II SOCIAL AND POLITICAL PHILOSOPHY (50 marks)**

**Unit-III**

- A. Nature and Scope of i) Social Philosophy ii) Political Philosophy. Relation between social and political Philosophy.  
B. Primary concepts: Society, community, association, institution, family: nature, different forms of family, role of family in the society.  
C. Social Class and Caste: Principles of class and caste, Marxist conception of class, Varṇāśrama dharma.  
D. Theories regarding the relation between individual and society:  
i) Individualistic theory  
ii) Organic theory  
iii) Idealistic theory

**Unit-IV**

- A. Secularism—its nature, Secularism in India.  
B. Social Change: Nature, Relation to Social progress, Marx-Engles on social change, Gandhi on social change.  
C. Political Ideals: Nature of Democracy and its different forms, direct and indirect democracy, liberal democracy, democracy as a political ideal, Socialism: Utopian and Scientific, Anarchism.

**Suggested Readings:**

**English:**

- A Textbook of Psychology: Pareshnath Bhattacharya
- Introduction to Psychology: G.T. Morgan, R. A. King Jr.
- A Modern Introduction to Psychology: Rex Knight & M. Knight
- A Manual of Psychology: G.F. Stout
- Psychology: Woodworth & Marquis

- Science and Human Behaviour: B.F. Skinner
- About Behaviorism: B.F. Skinner
- General Psychology: G.D. Boaz
- General Psychology: G. Murphy
- Psychology: W. James
- A Textbook of Psychology: E.B. Titchener
- Principles of Psychology: W. James
- Introduction to Psychology: N.L. Muna
- A Materialist Theory of Mind: D.M. Armstrong (Ch.s 1,5,& 6)
- Philosophy of Mind: J. Heil
- Philosophy of Mind: J. Shaffer (Ch.s 2,3 &4)
- An Introduction to Philosophy of Mind: C.J. Lowe (Ch.s 2&3)
- Philosophy: A Guide through the subject: A.C. Grayling (Ed.)
- Individuals: An Essay in Descriptive Metaphysics: P.F. Strawson
- The Concept of Person and Other Essays: A.J. Ayer
- Fundamentals of Sociology: P. Gisbert
- Outlines of Social Philosophy: J.S. Mackenzie
- Problems of Political Philosophy: D.D. Raphael
- Society: R.M. MacIver & C.H. Page
- Sociology: M. Ginsberg
- Sociology: Tom Bottomore
- Sociology: S.N. Shankar Rao
- Sociology: D.C. Bhattacharya
- Sociology: P.B. Kar
- Guide to Modern Thought: C.E.M. Joad
- Introduction to Modern political Theory: C.E.M. Joad
- The Evolution of Political Philosophy of Gandhi: Buddhadeb Bhattacharya
- Social and Political Thought of Gandhi: Jayantanuja Bandyopadhyay
- The Philosophy of Mahatma Gandhi: D.M. Dutta
- The Philosophy of Sarvodaya: K.S. Bharathi
- Communist Manifesto: Karl Marx & Frederick Engels
- Socialism: Utopian and Scientific: F. Engels
- Open Society and Its Enemies: Karl Popper
- The Open Philosophy and The Open Society: M. Cornforth
- Religion in India: T.N. Madan(ed.)
- Religion and Society: S. Radhakrishnan
- Secularism in the Present Indian Society, Amal Kumar Mukhopadhyay in Bulletin of the Ramakrishna Mission Institute of Culture, Vol.LVII, No. 11
- Secularism and Its Critics: Rajeev Bhargava (ed.)
- Civil Society and Its Institutions: Andre Beteille
- Unravelling the Nation: Sectarian Conflict and India's Secular Identity: Kaushik Basu & Sanjay Subramaniam (eds.)
- India as A Secular State: D.E. Smith

- Political Thought: C.L. Wayper
- Political Philosophy: An Introduction: W.T. Blackstone
- Political Philosophy: East and West: Krishna Roy
- Political Philosophy: V.P. Verma
- Essays in Social and Political Philosophy: Krishna Roy & Chhanda Gupta (eds.)
- Western Political Thought: Brian R. Nelson
- Western Political Thought: From Plato to Marx: Shefali Jha

**Bengali:**

- Monovidyā: Priti Bhushan Chattopadhyay
- Monovidyā: Pareshnath Bhattacharya
- Monovidyā: Ira Sengupta
- Monovidyā: Samarendra Bhattacharya
- Monosamikksha: M. N. Mitra o Pushpa Mishra
- Monodarshan-Sarirvada o Tar Vikalap: M. N. Mitra o P. Sarkar (Sampadito)
- Monovijana Prasanga: Saradindu Bandyopadhyay
- Adhunik Monovijana: Ira Sengupta
- Shikshashrayi Monovidyā: Sushil Roy
- Monodarshan: Arabinda Basu o Nibedita Chakraborty

**Bengali:**

- Samaj Darshan Dipika: Pritibhushan Chattopadhyay
- Samaj Tattva: Parimal Bhushan Kar
- Samaj Tattva: T. Bottomore
- Bisay Samaj Tattva: Anadi Kumar Mahapatra
- Samajdarshan o Rashtradarshaner Parichoy: A.K. Mahapatra o P. Mukherjee
- Rashtradarshaner Dhara: Amal kumar Mukhopadhyay
- Samajdarshan o Rashtradarshan: Samarendra Bhattacharya
- Samaj o Rajnaitikdarshan: Sandip Das
- Samyabader Itihas: Marx o Engels
- Samajtantra: Kalpanik o Baijnanik: F. Engels
- Marxiya Rashtrachinta: Shovan Lal Dutta Gupta
- Sarvodaya Andoloner Itihas: Gurudas Bandyopadhyay
- Gandhi Rachanasambhar: M.K. Gandhi
- Bharater Dharmanirapekshatar Sankat, Bholanath Bandyopadhyay in Essays on Science and Society: Biplab Chakraborti
- Dharmanirapekshata Birodhi Istahar: Ashis Nandy.

**PAPER—III**  
**(HISTORY OF WESTERN PHILOSOPHY) 100 marks**  
**Half-I (50 marks)**  
**Unit-I**

- A. Pre Socratic Philosophy : A Brief outline
- B. Plato : Theory of Knowledge, Theory of Forms.
- C. Aristotle : Critique of Plato's theory of Forms, Doctrine of four causes, Form and Matter
- D. St. Thomas Aquinas: Faith and Reason, Essence and Existence.

**Unit—II**

- A. Descartes: Cartesian method of doubt, cogito ergo sum, criterion of truth, types of ideas, Proofs for the existence of God, Proofs for the existence of the external world.
- B. Spinoza: Doctrine of substance, attributes and modes, existence of God, Pantheism, three orders of knowing.
- C. Leibniz: Monads, truths of reason, truths of facts, innateness of ideas, Some metaphysical principles : Law of Identity of indiscernibles, Law of sufficient reason, Law of continuity, Doctrine of Pre-established harmony.

**Half-II (50 marks)**

**Unit—III**

- A. Locke : Refutation of innate ideas, the origin and formation of ideas, simple and complex ideas, substance, modes and relations, nature of knowledge and its degrees, limits of knowledge, primary and secondary qualities, representative realism.
- B. Berkeley: Refutation of abstract ideas. Criticism of Locke's distinction between primary and secondary qualities, Immaterialism, esse-est-percipi, role of God.
- C. Hume: Impression and ideas, association of ideas, distinction between judgements concerning relations of ideas and judgements concerning matters of fact, theory of causality, theory of self and personal identity, Scepticism.

**Unit—IV**

- A. Kant : Conception of critical Philosophy, distinction between a priori and a posteriori judgements, distinction between analytic and synthetic judgements. Synthetic a priori judgements, General problem of the Critique, Copernican Revolution in Philosophy Transcendental Aesthetic : Space & time—Metaphysical & Transcendental expositions of the ideas of space & time.

**Suggested Readings:**

**English:**

- The Greek Philosophers from Thales to Aristotle: W. K. C. Guthrie
- A Critical History of Greek Philosophy: W.T. Stace
- Encyclopedia of Philosophy: P. Edwards (ed.)
- A History of Philosophy: F. Copleston, vols. I, II, IV, V, VI
- History of Western Philosophy: B. Russell
- History of Modern Philosophy: R. Falckenberg
- A Critical History of Modern Philosophy: Y.H. Masih
- A History of Philosophy: F. Thilly
- A History of Modern Philosophy: W.K. Wright
- A Critical History of Western Philosophy: D.J. O'Connor
- A History of Philosophy from Descartes to Wittgenstein: R. Scruton
- The Fundamental Questions of Philosophy: A.C. Ewing
- A Brief History of Western Philosophy: A. Kenny
- The Works of Descartes: Haldane & Ross (eds.)

- Descartes: The Project of Pure Enquiry: B. Williams
- Descartes: A. Kenny
- Spinoza: Leon Roth
- Leibniz: An Introduction to His Philosophy: N. Rescher
- The Rationalists: J. Cottingham
- An Essay Concerning Human Understanding: J. Locke
- John Locke: R. Aron
- Berkeley: G. Pitcher
- The Works of George Berkeley: T.E. Jessop & A.R. Luce(eds.) 8 vols
- An Enquiry Concerning Human Understanding-D. Hume: J. N. Mohanty (ed)
- A Treatise on Human Nature: D. Hume
- Locke, Berkeley, Hume: J. Bennett
- Locke, Berkeley, and Hume: C.R. Morris
- A Critique of Pure Reason-Immanuel Kant: N.K. Smith(tr. & ed.)
- Kant's Metaphysics of Experience: H.J. Paton vols I & II
- The Philosophy of Kant: J. Kemp
- Kant: Paul Guyer
- A Handbook to Kant's Critique of Pure Reason: Rasvihari Das
- Kant: S. Körner
- Kant: Allen W. Wood Lectures on Kant's Critique of Pure Reason: J.N. Mohanty

### **Bengali:**

- Paschatya Darshaner Itihas: Tarak Candra Roy (pratham o dwitiya khanda)
- Paschatya Darshaner Itihas: Kalyan Chandra Gupta
- Paschatya Darshaner Itihas: Susanta Chakraborty
- Paschatya Darshaner Itihas: Samarendra Bhattacharya (pratham o dwitiya khanda)
- Paschatya Darshaner Itihas(Plato o Aristotle): N.B. Chakraborty
- Paschatya Darshaner Itihas(Plato o Aristotle): Debabrata Sen
- Paschatya Darshaner Itihas(Adhunik Yuga-Yuktivada (Descartes), Spinoza,Leibniz:): Chandrodaya Bhattacharya
- Paschatya Darshaner Itihas:Ikshanvada(Locke,Berkeley,Hume): Chandrodaya Bhattacharya
- Paschatya Darshaner Itihas:(Locke,Berkeley,Hume): N.B. Chakraborty
- Hume-er Enquiry-Ekti Upasthapana: Ramaprasad Das
- Kanter Drashan-Tattva o Prayog: Prahlad Kumar Sarkar (ed.)
- Kanter Drashan:Rasvihari Das
- Kanter Shuddha Prajnar Bichar: Mrinal Kanti Bhadra

**PAPER-IV**  
**(WESTERN LOGIC ) 100 marks**  
**Half-I (50 marks)**  
**Unit—I**

A. Logic and Arguments, Deductive and Inductive Arguments, Argument forms and arguments, statement forms and statement, Truth and Validity. Categorical propositions and classes: quality, quantity and distribution of terms, Translating categorical propositions into standard form.

B. Immediate inferences: Conversion, Obversion and Contraposition, Traditional square of opposition and Immediate Inferences based there on; Existential Import, symbolism and Diagrams for categorical propositions.

C. Categorical Syllogism: Standard Form categorical Syllogism; The Formal nature of Syllogistic Argument, Rules and Fallacies, General Rules; To test Syllogistic Arguments for validity (by applying general rules for syllogism); To solve problems and prove theorems concerning syllogism.

D. Boolean Interpretation of categorical propositions; Review of the Traditional Laws of Logic concerning immediate inference and syllogism; Venn Diagram Technique for Testing Syllogisms, Hypothetical and Disjunctive Syllogisms, Enthymeme, The Dilemma.

**Unit—II**

A. Induction: Argument by Analogy, Appraising Analogical Arguments, Refutation by Logical Analogy.

B. Causal Connections: Cause and Effect, the meaning of “Cause”; Induction by Simple Enumeration; Mill’s Method of Experimental Inquiry; Mill’s Method of Agreement, Method of Difference, Joint Method of Agreement and Difference, Method of Residues, Method of Concomitant Variations; Criticism of Mill’s Methods, Vindication of Mill’s Methods.

C. Science and Hypothesis: Explanations; Scientific and Unscientific, Evaluating Scientific Explanations; The pattern of Scientific Investigation; Crucial Experiments and Ad Hoc Hypotheses.

D. Probability: Alternative Conception of Probability; The Probability Calculus; Joint Occurrences; Alternative Occurrences.

**Half-II (50 marks)**

**Unit—III**

A. Symbolic Logic: The value of special symbols; Truth-Functions; Symbols for Negation, Conjunction, Disjunction, Conditional Statements and Material Implication; Material Equivalence and Logical Equivalence; Dagger and stroke functions; inter-definability of truth functors.

B. Tautologous, Contradictory and Contingent Statement-Forms; The Paradoxes of Material Implication; The Three Laws of Thought.

C. Testing Argument Form and Argument for validity by

a) The Method of Truth-table.

b) The Method of Resolution (Fell swoop & Full Sweep)[dot notation excluded];

D. Determining the logical character of statement form and statements by

a) The Method of Truth-table.

b) The Method of Resolution [dot notation excluded]

E. The Method of Deduction: Formal Proof of Validity: Difference between Implicational Rules and the Rules of Replacement; Construction of Formal Proof of Validity by using nineteen rules; Proof of invalidity by assignment of truth-values.

**Unit-IV**

- A. Quantification Theory: Need for Quantification Theory, Singular Propositions; Quantification; Translating Traditional subject predicate proposition into the logical notation of propositional function and quantifiers;
- B. Quantification Rules and Proving Validity; Proving Invalidity for arguments involving quantifiers.

**Suggested Readings:**

**English:**

- Introduction to Logic (13th Edn.): I.M. Copi & C. Cohen
- Symbolic Logic: I.M. Copi
- Methods of Logic (Part I, Ch.s 5,7,9): W.V.O. Quine
- Introduction to Logic and Scientific Method: Cohen & Nagel
- Logic: Informal, Symbolic and Inductive: Chhanda Chakraborty
- Logic: Stan Baronett & Madhuchhanda Sen

**Additional Suggested Readings:**

- The Elements of Logic: Stephen Barker
- Understanding Symbolic Logic: Virginia Klenk
- Logic- A Comprehensive Introduction; S.D. Guttenplan & M. Tamney
- Logic & Philosophy- A Modern Introduction: Howard Kahne
- Logic- A First Course: A.E. Blumberg

**Bengali:**

- Nabya Yuktibijnana(Pratham theke caturtha khanda): Ramaprasad Das
- Sanketik Yuktibijnana: Ramaprasad Das
- Samsad Yuktibijnana Abhidhan: Ramaprasad Das o Subirranjan Bhattacharya

## PAPER-V

### (INDIAN LOGIC AND EPISTEMOLOGY) 100 marks

Recommended Text: Tarkasamgraha with Dīpikā by Annambhatta. (Buddhikhandā- from the definition of cognition to the division of memory into two kinds)

#### Half-I (50 marks)

##### Unit-I

A. Definition of buddhi or jñāna (cognition), its two kinds; Definition of smṛti; Two kinds of smṛti (memory); Definition of anubhava, its division into veridical(yathārtha) and non-veridical(ayathārtha); Three kinds of non-veridical anubhava; Definitions clarified in Tarkasamgraha Dīpikā.

B. Four-fold division of pramā and pramāṇa. Definition of “Kāraṇa” (special causal condition) and “kāraṇa” (general causal condition). The concept of anyathāsiddhi (irrelevance) and its varieties. The definition of kārya (effect). Kinds of cause: smavāyi, a-samavāyi and nimitta kāraṇa (definitions and analysis).

##### Unit-II

A. Definition of pratyakṣa and its two-fold division : nirvikalpaka and savikalpaka jñāna. Evidence for the actuality of nirvikalpaka.

B. Sannikarsa and its six varieties. Problem of transmission of sound; the claim of “anupalabdhi” as a distinctive pramāṇa examined.

#### Half-II (50 marks)

##### Unit-III

A. Definition of anumāna, anumiti and parāmarśa. Analysis of pakṣatā. Definition of vyāpti; Vyāptigraha.

B. Definition of pakṣadharmatā—svārthānumiti and parārthānumiti; Analysis of pañcāvayavi Nyāya. Necessity of parāmarśa. Three kinds of linga or hetu: kevalānvayi, kevalayatirekī and anvayavyatirekī. Definition of pakṣa, Sa-pakṣa and vipakṣa with illustrations. Marks of sadhetu.

C. Hetvābhāsa—two types of definition. Five kinds of hetvābhāsa: (1) “Savyabhicāra and its three kinds—defined and illustrated; (2) “Viruddha” defined and illustrated; (3) “Satpratipakṣa” defined and illustrated; (4) Three kinds of “Asiddha” enumerated; (a) āśrayāsiddhi (b) svarūpāsiddhi and (c) vyāpyatvāsiddhi. Vyāpyatvāsiddhi defined as “sopādhika hetu”. Upādhi and its four kinds (definition and illustration) (5) “Bādhita” (definition and illustration).

##### Unit-IV

A. “Upamāna pramāṇa” :Definition and analysis. “Śabda pramāṇa” : Definition and analysis. “Śakti” (the direct signifying power), the padapadārtha- sambandha considered as Īśvara-samketa, Controversy between the Mīmāṃsakas and the Naiyāyikas regarding the nature of Śakti as universal or particular,

B. “Śaktigraha” (ascertainment of the meaning-relation), lakṣaṇa, varieties of lakṣaṇa, Analysis of “Gauṇī-vṛtti” (the secondary signifying power of a term), “Vyāñjanā-vṛtti” (the suggestive power of a term) analysed as a kind of śakti or lakṣaṇā,

C. The question of lakṣanā-bīja tātparya, The concept of “yoga-rūḍhi”. The three conditions of “śābdabodha”—ākāṅkṣā, yogyatā and sannidhi. Two kinds of statements distinguished— Vaidika and Laukika.

D. “Arthāpatti” as a distinctive pramāṇa: Controversy between the Mīmāṃsakas and the Naiyāyikas.

E. The theory of prāmānya:the issue between svataḥ-prāmānyavada and parataḥ-prāmānyavada regarding utpatti and jñapti;the Prābhākara theory of akhyāti.

#### Suggested Readings:

##### English:

- Tarkasamgraha with Dipika: Gopinath Bhattacharya
- Tarkasamgraha: M.R. Bodas & Y.V. Athalye (tr. & ed.)
- The Elements of Indian Logic and Epistemology: Chanrodaya Bhattacharya

- A Primer of Indian Logic: Kuppuswami Shastri
- Fundamental Questions of Indian Metaphysics & Logic: S.K. Maitra
- The Nyaya Theory of Knowledge: S.C. Chatterjee

**Bengali:**

- Tarkasamgraha with Dipika: Narayan Chandra Goswami
- Tarkasamgraha with Dipika: Indira Mukhopadhyay
- Tarkasamgraha with Dipika: Panchanan Shastri
- Tarkasamgraha with Dipika: Kanailal Poddar

**PAPER--VI**

**(PHILOSOPHY OF LANGUAGE, EPISTEMOLOGY AND METAPHYSICS [WESTERN])**

100 marks

Recommended Text: An Introduction to Philosophical Analysis—John Hospers

**Half-I (50 marks)**

**Unit-I**

**Meaning and Definition:**

- A. Word-meaning, Definitions,
- B. Vagueness,
- C. Sentence-meaning.

**Unit-II**

**Knowledge**

- A. Concepts, Truth,
- B. Sources of Knowledge,
- C. Some Principal uses of the verb “To know”, Conditions of Propositional Knowledge, Strong and weak senses of “know”.

**Necessary Truth**

- A. Analytic truth and logical possibility,
- B. The apriori,
- C. The Principles of Logic.

**Half-II (50 marks)**

**Unit-III**

**Empirical Knowledge:**

- A. Law, Theory and Explanation,
- B. The Problem of Induction,
- C. Testability and Meaning.

**Cause, Determinism and Freedom:**

- A. What is Cause?
- B. The Causal Principles,
- C. Determinism and Freedom.

## Unit-IV

### Our Knowledge of the Physical World:

- A. Realism, Idealism,
- B. Phenomenalism

### Some Metaphysical Problems

- C. Substance and Universal

### Suggested Readings:

#### English:

- The Problem of Knowledge: A.J. Ayer
- Language, Truth and Logic: A.J. Ayer
- Readings in Philosophical Analysis: J. Hospers
- The Central Questions of Philosophy: A.J. Ayer
- Theory of Knowledge: A.J. Woozley
- An Introduction to Philosophy: Shibapada Chakraborty

#### Bengali:

- Darshanik Jijnasa (Bagarthatattva): Ramaprasad Das
- Darshanik Jijnasa (Jnanatattva-Jnaner Svarup): Ramaprasad Das
- Darshanik Jijnasa (Jnanatattva): Ramaprasad Das
- Darshanik Jijnasa (Paratattva o Bhauto Jagater Jnana): Ramaprasad Das
- Darshanik Bishlesaner Ruparekha (Pratham O dvitiya khanda): Samarikanta Samanta
- Paschatya darshaner Ruparekha: Ramaprasad Das o Shibapada Chakraborty

## PAPER—VII

(ETHICS AND PHILOSOPHY OF RELIGION) 100 marks

### Half-I (50 marks)

#### Unit-I

#### Indian Ethics

- A. Introduction: Concerns and Presuppositions Concept of Sthitaprañña, Karmayoga: (Gīta) Puruṣārthas and their inter-relations.
- B. Meaning of Dharma, Concept of ṛṇa and ṛta. Classification of Dharma: Sāmānya dharma, viśeṣadharma, sādharmaṇadharmā,
- C. Vidhi and Niṣedha
- D. Pancaśīla, Brahmavihārabhāvanā (Bauddha) Anuvrata, Mahāvratā, Ahimsā. (Jaina)

#### Unit-II

#### Western Ethics

- A. Nature and Scope of Ethics Moral and Non-moral actions, Object of Moral Judgement—Motive and Intention
- B. Standards of Morality: Hedonism—Ethical, Psychological. Utilitarianism: Act—utilitarianism, Rule-utilitarianism. Deontological Theories: Act-Deontological Theories, Rule-Deontological Theories—Kant's Theory.
- C. Moral theories: Plato and Aristotle
- D. Theories of Punishment.
- E. Environmental Ethics: Its nature, Concepts of Anthropocentrism and Non anthropocentrism

## Half-II (50 marks)

### Unit-III

#### Philosophy of Religion-I

A. Nature and scope of Philosophy of Religion. Doctrine of karma and rebirth, doctrine of liberation, (Hindu, Bauddha and Jaina views).

B. The Philosophical teachings of the Holy Quran: God the ultimate Reality, His attributes, His relation to the world and man.

C. Some basic tenets of Christianity: The doctrine of Trinity, The theory of Redemption

D. Religious Pluralism, Inter-religious dialogue and Possibility of Universal Religion.

### Unit-IV

A. Arguments for the existence of God: Cosmological, Teleological and Ontological arguments, Nyāya arguments

B. Grounds for Disbelief in God: Sociological theory (Durkheim), Freudian theory, Cārvāka, Bauddha and Jaina views

C. The Peculiarity of Religious Language: The doctrine of analogy, Religious statements as Symbolic, Religious language as Non-Cognitive (Randal's view), the language game theory (D.Z. Phillip).

#### Suggested Readings:

##### English:

- The Fundamentals of Hinduism-A Philosophical Study: S.C. Chatterjee
- The Ethics of the Hindus: S.K. Maitra
- An Outline of Hinduism: T.M.P. Mahadevan
- Classical Indian Ethical Thought: K.N. Tewari
- Ethics in the Gita-An Analytical Study (pp-119-145): Rajendra Prasad
- Ethics in the Vedas, Satya prakash Singh in Historical-Developmental Study of Classical Indian Philosophy,[History of Science, Philosophy and Culture in Indian Civilisation(Vol. XII, Part 2)]: Rajendra Prasad (ed.)
- Rta, Satya, Tattva, Tathya, Samiran Chandra Chakraborty in Philosophical Concepts Relevant to Sciences in Indian Tradition,[ History of Science, Philosophy and Culture in Indian Civilisation(Vol. VIII, Part 4)]: P.K. Sen (ed.)
- Development of Moral Philosophy in India; Surama Dasgupta
- Ethical Philosophies of India: I.C. Sharma
- Studies on the Purusarthas: P.K. Mahapatra (ed.)
- A Critical Survey of Indian Philosophy: C.D. Sharma
- Indian Philosophy (Vo. I): J.N. Sinha
- Philosophy of Hindu Sadhana: N.K. Brahma
- History of Philosophy-Eastern and Western:(Vol. I & II): S. Radhakrishnan
- Principles of Ethics: P.B. Chatterjee
- A Manual of Ethics: J.S. Mackenzie

- Ethics: W. Frankena
- An Introduction to Ethics: W. Lillie
- Ethics-Theory and Practice: J. Thiroux (Chs II & III)
- Ethics-Theory and Practice: Y.V. Satyanaryana
- Moral Reasons: J. Nuttal
- Human Conduct: J. Hospers
- Ethics-The Fundamentals: Julia Driver
- An Introduction to Kant's Ethics: R. Sullivan
- Nicomachean Ethics: Aristotle
- Philosophical Ethics-An Introduction to Moral Philosophy: T.L. Beauchamp (ed.)
- Virtue Ethics: Rosalind Hursthorne (Ch. III)
- Karma,Causation and Retributive Morality: Rajendra Prasad
- Philosophy of Religion: J. Hick
- An Introduction to the Philosophy of Religion: Brian Davies
- Indian Philosophy of Religion: A. Sharma
- Comparative Religion: P.B. Chatterjee
- Comparative Religion: Eric J. Sharpe
- Patterns in Comparative Religion: M. Eliade (Ch I, Sec. I)
- Atheism in Indian Philosophy: D.P. Chattopadhyay
- Essays in Indian Philosophy (pp-145-169): Suharanjan Saha (ed.)
- Studies in Nyaya-Vaisesika Theism (pp-102-137,139-159): Gopika Mohon Bhattacharya
- The Religions of the World: R.K.M. Institute of Culture
- Encyclopedia Britannica, Vol. I
- Encyclopedia of Islam,Vols. I & II
- Indian Religions: S. Radhakrishnan
- Foundations of Living Faith: H.D. Bhattacharya
- Aspects of Hindu Morality: Saral Jhingram
- A History of Muslim Philosophy (Vols.I &II): M.M. Sharif
- Islam and Secularism: Sayed Muhammad Al-Naquib Al-Attas
- The History of Philosophy in Islam-T.J. de Boer: E. Jones (tr.)
- The Holy Quran: Mohammad Yusuf Ali (tr.)
- The Spirit of Islam: Syed Amir Ali
- The Meaning of the Glorious Koran: M. Pickthall
- A History of Islamic Philosophy: M. Fakhry
- The Spirit of Islam's Message, Muhammad Qamaruddin in Religions of the People of India: S.R. Saha (ed.)
- Cultural Heritage of Islam: Osman Ghani
- Old Testament: R. Kittel (ed.)
- New Testament: Kilpatrick
- The Doctrine of the Trinity: R.S. Franks
- The Doctrine of the Trinity: Loenard Hodgson
- The Idea of the Holy: R. Otto
- A Brief Account of the Religion of the Hindus: Srilekha Dutta in Religions of the People of

India: S.R. Saha (ed.)

- Dharma in Hinduism: An Ideal Religion: Tapan Kumar Chakraborty in Religions of the People of India: S.R. Saha (ed.)
- Jainism-A Religion of Non-Theistic Humanism: Tushar Sarkar in Religions of the People of India: S.R. Saha (ed.)
- Essays in Analytical Philosophy (Ch.VII): Gopinath Bhattacharya
- Buddhism in India and Abroad: Anukul Badyopadhyay

**Bengali:**

- Nitividya: Mrinal Kanti Bhadra
- Nitividyar Tattvakatha: Somnath Chakraborty
- Nitishastra: Dikshit Gupta
- Nitividya: Samarendra Bhattacharya
- Nitividya: Sibapada Chakraborty
- Pashchatya Darshaner Itihas (Pratham o dwitiya khanda): S. Radhakrishnan
- Dharma Darshan: A. Bandyopadhyay o K.C. Gupta
- Dharma Darshan: Rabindranath Das
- Dharmadarshanser Katipoy Samasya: Dilip Kumar Mohanto
- Dharma Darshan: Sushil Kumar Chakraborty
- Bharatiya Dharmaniti: Amita Chattopadhyay (Sampadita)
- Bharatiya Darshane Nirishvarvada: B.B. Purakayastha (pp-39-50,56-66)
- Bharatiya Darshaner Drishtite Muktir Swarup: Chandana Das
- Sarvadarshanasamgraha: Satyajyoti Chakraborty (Pratham Khanda)
- Islami Darshan: Hasan Ayub
- Quran Sharif: Maulana Mobarak Qarim Zahar (Anudita)
- Quran Sharif: Osman Ghani (Anubad O bhasya)
- Islamer Chinta o Chetanar Kramabikash (dasham Khanda): Osman Gani
- Pabitra Bible (Puratn o Natun Niyam): Bharater Bible Society
- Bauddhadharmer Itihas: Mani Kuntala Halder
- Bauddhadharma o Darshan: Sukomal Chowdhury

**Paper—VIII (OPTIONAL PAPER)**

Any **one** of the following:

- A. An Enquiry Concerning Human Understanding. (Text)
- B. Western Logic. (Text)
- C. Ethics: Theory and Practice
- D. Contemporary Indian Philosophy.

**A: An Enquiry Concerning Human Understanding: David Hume**

**Half-I (50 marks)**

**Unit-I**

Chapter 1—3

**Unit-II**

Chapter 4—6

**Half-II (50 marks)**

**Unit-III**

Chapter 7—9

**Unit-IV**

Chapter 10—12

**Suggested Readings:**

B. (An Enquiry Concerning Human Understanding: D. Hume)

- An Enquiry Concerning Human Understanding-D. Hume: J.N. Mohanty(ed.)
- The Philosophy of David Hume: Pabitra Kumar Roy
- The Philosophy of David Hume: N.K. Smith
- Hume's Theory of Causality: Tapan Kumar Chakraborty
- Hume: V.C. Chappell (ed.)
- Hume-er Enquiry-Ekti Upasthapana: Ramaprasad Das
- Hume -er Darshan – Prahlad Kumar Sarkar (Ed.)

**B: Western Logic**

**Half-I (50 marks)**

**Unit—I**

1. I.M. Copi: Symbolic Logic (fifth edn.) [Sections 3.4, 3.5, 3.6 and 3.7, 3.8 and Appendix B]
2. R.Jeffery: Formal Logic—Its scope and Limits (first edn.) [Ch IV and VI]

**Unit—II**

3. W.V.O. Quine: Methods of Logic (third edn.) [Ch.s 18, 19 and 21]
4. P. Suppes: Introduction to Logic (Indian edn.) [Ch.9,Section 9.1 to 9.7].

**Half-II (50 marks)**

**Unit—III**

H.W.B. Joseph: An Introduction to Logic [Ch.s II & IV]  
[Terms and their principal distinctions, The Predicables]

**Unit—IV**

H.W.B. Joseph: An Introduction to Logic [Ch. V]  
[The Rules of Definition and Division:Classification and Dichotomy]

**Suggested Readings:**

- Sanktetik Yuktivijnan (Vakyakalan O Vidheyakalan): Ramaprasad Das
- Sabdajijnasa-Sabder Prakar o Prkriti: Ramaprasad Das
- Yukhtivaijnani Paddhati: Ramaprasad Das
- Samsad Yuktivijnan Abhidhan: Ramaprasad Das o Subirranjan Bhattacharya

**C: Ethics**

**Half-I (50 marks)**

**Unit—I**

- A. Postulates of morality.
- B. Hume on Virtue.
- C. Virtue Ethics : Rosalind Hursthorne
- D. Concept of value: Types of values, subjectivity/objectivity of values, moral skepticism

E. Analysis of the concept of obligation.

### **Unit—II**

- A. Nature and scope of applied ethics.
- B. Killing: Suicide, Euthanasia, Animal killing.
- C. Poverty, Affluence and Morality.
- D. War and Violence: Terrorism.

### **Half-II (50 marks)**

#### **Unit—III**

- A. Right: Nature and Value of Human Rights—Discrimination on the basis of race, caste and religion.
- B. Concept of Justice and Equality.
- C. Feminist Ethics: Some basic concepts of Feminism: Sexism, Patriarchy and Androcentrism, Liberal and Radical Feminism, The Ethics of Care. Echo-feminism.

#### **Unit—IV**

- A. Value beyond sentient beings, Reverence for life, Deep Ecology, Concepts of Kinship Ethics.
- B. Ecological Concern in Indian thoughts: Jaina and Bauddha views.
- C. Meta-ethics: Nature of meta-ethics, Emotivism (A.J. Ayer's view), Intuitionism (Moore's view), Prescriptivism (R.M. Hare's view)

#### **Suggested Readings:**

- Ethics-The Fundamentals: Julia Driver
- Ethics-Theory and Practice: J. Thiroux (Chs II & III)
- Ethics-Theory and Practice: Y.V. Satyanaryana
- Moral Reasons: J. Nuttal
- Moral Reasons: James Rachels
- Philosophical Ethics-An Introduction to Moral Philosophy: T.L. Beauchamp (ed.)
- Plato's Moral Theory: Terrance Irwine
- Virtue Ethics: R. Crisp & M. Stole (eds.)
- The Nicomachean Ethics: Aristotle trans. David Ross; revised by J.L. Ackrill and J. Urmson
- The Ethics of Aristotle: J.A.K. Thomson
- Aristotles Ethics: Devid Bostock
- Aristotles Ethics: J.O. Urmson
- Virtue Ethics: Rosalind Hursthorne (Ch. III)
- An Enquiry Concerning the Principles of Morals: D. Hume
- Elements of Moral Philosophy: James Rachels
- Theories of Rights: J. Waldron (ed.)
- Human Rights: Alan Gewirth
- Modern Moral Philosophy: W.D. Hudson
- Ethics Since 1900: Mary Warnock
- Introductory Ethics: Fred Feldman
- Ethics: W. Frankena
- Identity and Violence: Amartya Sen
- Twentieth Century Ethics: Roger Hancock
- Aspects of Hindu Morality: Saral Jhingram

- Practical Ethics: Peter Singer (Chs V, VII, VIII, X)
- Applied Ethics: Peter Singer (ed.)
- A Companion to Ethics: Peter Singer (Chs 14, 19, 22)
- A Companion to Bio-Ethics: Peter Singer & H. Kuhse (eds.)
- Human Rights-An Introduction: D.J. O'Byrne
- Man and Nature: G.F. MacLean (ed.)
- Human Rights, Gender and the Environment: Manisha Preya, Krishna Menon, Madhulika Banerjee
- Gender: G. Geetha
- A Short Introduction to Feminist Theory: Rinita Mazumdar
- Feminist Thought: Shefali Moitra
- Justice and Care: Essential Readings in Feminist Ethics: Virginia Held (ed.)
- Language, Truth and Logic: A.J. Ayer
- The language of Morals: R.M. Hare
- Nitishastra: Dikshit Gupta
- Vyavaharik Nitivijnan: N. Nandy & M. Bal
- Nitividya: Sanjib Ghosh
- Nitividyar Tattvakatha: Somnath Chakraborty
- Tattvagata Nitividya o Vyavaharik Nitividya: Samarendra Bhattacharya
- Vyavaharik Nitividya-Peter Singer: Pardip Kumar Roy (tr.)
- Prayogik Nitividya: A.S.M. Abdul Khalek
- Nitibidya- Shibapada Chakraborty

#### **D. Contemporary Indian Philosophy**

Swami Vivekananda, Rabindranath Tagore, Sri Aurobindo and M.K. Gandhi.

#### **Half-I (50 Marks)**

##### **Unit-I**

Swami Vivekananda:

- Real nature of man.
- Nature of Religion.
- Ideal of Universal Religion.
- Concept of Practical Vedanta.

##### **Unit-II**

Rabindranath Tagore:

- Reality and God.
- Nature of Man.
- Surplus in man.
- Nature of Religion.
- Tagore's Humanism.

#### **Half-II (50 marks)**

##### **Unit—III**

Sri Aurobindo:

- Reality as Sat-Cit-Ānanda
- Nature of Creation, the World process: Descent or involution, Maya and Lila, Ascent or evolution.
- Integral Yoga.

#### Unit-IV

M.K.Gandhi:

A. God and Truth.

B. Nature of Man.

C. Non-Violence

Satyāgraha

D. Swaraj

E. Theory of Trusteeship

#### **Suggested Readings:**

- Contemporary Indian Philosophy: T.M.P. Mahadevan & G.V. Saroja
- Contemporary Indian Philosophy: Basant Kumar Lal
- Contemporary Indian Philosophy: Binoy Gopal Roy
- Practical Vedanta (Vol.II,pp-291-358): Swami Vivekananda
- Swami Vivekananda as a Philosopher: J.L. Shaw
- The Philosophy of Swami Vivekananda: Pradip Kumar Sengupta
- The Complete Works of Swami Vivekananda (Vol.I,pp-333-343 & II,pp-70-87,375-396):  
Mayavati Memorial Edition
- The Philosophy of Vivekananda: Govinda Dev
- Life Divine: Sri Aurobinda
- Synthesis of Yoga: Sri Aurobinda
- Integral Yoga: Sri Aurobinda
- Among the Great: Dilip Kumar Roy (Chapter on Sri Aurobinda)
- Towards Superhumanity-The Philosophy of Sri Aurobinda: P.B. Chatterjee
- The Philosophy of Sri Aurobinda: Ramnath Sharma
- An Introduction to the Philosophy of Sri Aurobinda: S.K. Maitra
- Guide to Sri Aurobinda's Philosophy: K.D. Acharya
- Future Evolution of Man-The Divine Life Upon Earth: Sri Aurobinda
- Sri Aurobinda-The Prophet of Life Divine: Haridas Choudhuri
- Sri Aurobinda's Concept of the Superman: Chittaranjan Goswami
- Religion Of Man: Rabindranath Tagore
- Philosophy of Rabindranath Tagore: S. Radhakrishnan
- The Philosophy of Rabindranath Tagore : Binoy Gopal Roy
- Hind Swaraj: M.K. Gandhi
- Trusteeship; M.K. Gandhi
- Selections from Gandhi: N.K. Bose
- Contemporary Indian Philosophy: S.Radhakrishnan & J.H. Murihead (eds.)
- The Evolution of Political Philosophy of Gandhi: Buddhadeb Bhattacharya
- Social and Political Thought of Gandhi: Jayantanuja Bandyopadhyay
- The Philosophy of Mahatma Gandhi: D.M. Dutta
- The Philosophy of Sarvodaya: K.S. Bharathi
- Gandhi's Political Philosophy: Bhikhu Parekh
- Sarvodaya Andoloner Itihas: Gurudas Bandyopadhyay

- Gandhi Parikrama: Sailesh Kumar Bandyopadhyay
- Gandhi Rachanasambhar: M.K. Gandhi
- Chintanayak Vivekananda: Swami Lokeshwarananda (ed.)
- Swami Vivekananda Bani-o-Rachana (Khanda 2,pp-21-64;Khanda 3,pp-105-117,149-173):  
Janma Shatabarshiki Samskaran,Udbodhan
- Karmajibane Vedanta (Khanda 2,pp-219-290): Swami Vivekananda
- Visva-vivek: Asit Kr Bandyopadhyay, Shankari Prasad Basu, Shankar
- Manabjati Bhavisyat Vivartan: Sri Aurobinda Ghosh
- Sri Aurobinda Katha: Manmatha Mukhopadhyay
- Divya Jiban: Srimat Anirban
- Yoga-Samannay: Srimat Anirban
- Sri Aurobinda Janma Shatabarshiki Smarak Grantha: Sri Aurobinda Patha Mandir
- Rabindra Rachanabali (Khanda 12,pp-532-545,567-614): Janmashatbarshiki Samskaran
- Rabindra Darsan: Sachindranath Gangopadhyay, Pabitra Kumar Roy, Nripendranath Bandyopadhyay.

**General instructions regarding question pattern and distribution of marks:**

Each paper will consist of two halves (50 marks each). The pattern of distribution of marks of each unit of each half of a paper will be as follows:

Compulsory:

- *Two* short type questions out of four questions, each carrying 5 marks (2X 5) =10.
- *One* question out of two questions each carrying 15 marks (1X 15) = 15

Total Marks of each unit of each half : (10+15)= 25

Total Marks of a paper: (25 X 4)= 100

Until the introduction of the semester system each paper will be of 100 marks. The pattern of distribution of marks will be as follows:

Q.1 is compulsory.

- Q1:Candidates will be required to answer *four* short type questions, each carrying 5 marks, out of *eight* questions covering the entire syllabus.
- Candidates will be required to answer *five* questions each carrying 16 marks out of *ten* questions taking at least *one* from **each unit**.