UNIT - I

History, development, aim and scope of Anthropology, relationship with other sciences, different branches of Anthropology (including Linguistic Anthropology) and their interrelationship.

Research methodology and methods: Concepts of epistemology, ontology and theoretical perspectives. Types of research (qualitative and quantitative), research design, hypothesis. Fieldwork and fieldwork tradition; Ethnography, Observation, Interview, Case Study, Life History, Focus group, PRA, RRA, Genealogical Method, Schedules and Questionnaires, Grounded Theory, Exploration and Excavation, GIS. Statistics: concept of variables, sampling, measures of central tendency and dispersion, parametric and nonparametric bivariate and multivariate (linear regression and logistic regression) statistical tests. Techniques of Analysis: Content analysis, Discourse analysis and Narratives.

UNIT - II

Lamarckism, Neo-Lamarckism, Darwinism, Neo-Darwinism, Synthetic theory, neutral theory of molecular evolution, concept of cladogenesis and anagenesis, punctuated equilibrium, selection.

Trends in Primate radiation; Primate classification and distribution of extinct and extant species. Characteristics of primates: morphological (hair), skeletal (cranial, post cranial, dental, brain),
physical (opposability of thumb), locomotion (quadrupedalism, brachiation and bipedalism) and posture, Primate social behaviour.

Extant Primates
Distribution, characteristics and classification. Prosimii (Tarsiioidea, Lorisioidea, Lemuroidea), Anthropoidea (Ceboidea, Cercopithecoida, Hominoidea). Morphological and anatomical characteristics of Human, Chimpanzee, Gorilla, Orangutan and Gibbon

Fossils of extinct Primates
Oligocene-Miocene fossils – Parapithecus; Gigantopithecus, Aegyptopithecus, Dryopithecus, Ramapithecus and Sivapithecus.

Pre-hominid groups: Sahelanthropus tchadensis (Toumai), Orrorin tugenensis, Ardipithecus ramidus.
Early Hominids: Australopithecus afarensis, Australopithecus ramidus, Australopithecus africanus, Australopithecus (Paranthropous) boisei, Australopithecus (Paranthropous) robustus, Australopithecus bahrelghazali.

Early Transitional Human: Homo habilis.

Hominid Evolution
Characteristics and distribution of Homo erectus in general, Special reference to the fossil evidences discovered from Africa (Turkana boy), Asia (Java man and Peking man), Europe (Dmanisi), Homo floresiensis (Dwarf variety)
Characteristics of Archaic sapiens with special reference to Europe (Homo heidelbergensis), Africa (Rhodesian Man), Asia (China, Jinniushan; India, Narmada Man).
Neandertal man: Distribution, salient features and phylogenetic position.
Characteristics of anatomically Modern Homo sapiens with special reference to Africa (Omo), Europe (Cro-magnon, Chancelade, Grimaldi), Asia (Jinniushan) and Australia (Lake Mungo).
Dispersal of modern humans: Out of Africa hypothesis, Multiregional hypothesis, Partial Replacement hypothesis.

Unit - III
Modern Human Variation: Typological Model, Populational Model and Clinal Model; overview of Classification proposed by Blumenbach, Deniker, Hooton, Coon, Garn and Birdsell.

Ethnic Classification and distribution of Indian Populations: H.H. Risley; B. S. Guha; S. S. Sarkar.
Linguistic distribution of ethnic groups.
Methods of studying Human Genetics: Cytogenetics, Mendelian Genetics, Twin Genetics, Sib Pair methods, Population Genetics, Molecular Genetics.
Cytogenetics: cell cycle, standard karyotyping and banding techniques (G, C and Q), chromosomal abnormalities, fluorescent in situ hybridization, Lyon’s hypothesis, importance of telomere and centromere.
Linkage and chromosome mapping, genetic imprinting.
Modes of inheritance: Autosomal (dominant, recessive, codominance), sex linked, sex influenced, sex limited, modifying genes, suppressor genes, selfish gene, multiple allelic inheritance, multifactorial inheritance (stature and skin colour), polygenic (dermatoglyphics- Finger-ball Pattern types, Dankmeijer’s Index, Furuhata’s Index and Pattern Intensity Index, Total Finger Ridge Count, Absolute Finger Ridge Count, Palmar formula and mainline index, transversality, atd angle and flexion creases.
Population genetics: Hardy-Weinberg equilibrium, definition and application; mating patterns (random, assortative and consanguineous), inbreeding coefficient, genetic load, genetic isolate, genetic drift, genetic distance; genetic polymorphism (balanced and transient).

Molecular genetics: DNA, RNA, genetic code, protein structure and synthesis, concepts of RFLPs, VNTRs, STRs, and SNPs, Mitochondrial DNA, genic and genomic mutations.
**Unit - IV**

Human Growth, development and maturation: definition, concepts. Basic principles of growth; phases of growth: Prenatal and postnatal (growth and development of different body parts, subcutaneous tissues and physiological variables). Growth curves: Velocity, Distance, Acceleration and Scammon’s Growth curve. Catch up and Catch down growth.  

Aging and senescence with special reference to somatic, skeletal and dental maturation  

Factors affecting growth: Genetic and Environmental. Secular trends in growth.  

Methods of studying human growth: Longitudinal, Cross-sectional, Mixed longitudinal, Linked longitudinal.  

Body composition: Bone mass, body mass, percentage of body fat, segmental fat, body age.  

Human Adaptation: Allen’s and Bergmann’s rule; Human Adaptability Programme; human adaptation to heat, cold, high altitude.  

Somatotyping: Concept, Development (Kretschmer, Sheldon, Parnoll, Health-Carter) and its application.  

Demography: Multidisciplinary nature of demography and its relation with other disciplines.  

Relationship between demography and anthropological demography. Fertility (concept and determinants), Morbidity and mortality (concept and determinants), Migration (concept and determinants), Selection intensity.  

**Unit - V**

Concept of prehistoric archaeology; ethno-archaeology, experimental archaeology, environmental archaeology, settlement archaeology, cognitive archaeology, geo-archaeology, action archaeology. Theoretical paradigms – descriptive to scientific period to interpretative period.  

**Dating:**  
Typology, seriation, geo-archaeological, obsidian, hydration, chemical dating of bones, oxygen isotope, fluorine estimation, dendrochronology, radio-carbon, fission track, thermo-
luminescence, potassium-argon, varve clay, cross dating, amino acid racemization, palaeomagnetic.

**Paleoenvironment:**
Major geological stages (Tertiary, Quaternary, Pleistocene, Holocene). Major climatic changes during Pleistocene and post Pleistocene periods, glacial and interglacial periods, ice age, pluvial and inter-pluvial climatic phases. Evidences of quarternary climatic changes (moraines, varve, river terraces, loess, sea level changes, beach sequences, sea core, fluviatile deposits, palynology, palaeontology). Site formation.

**Lithic tool typology and technology:**
Lower Palaeolithic (pebble tools, chopper and chopping tools, bifaces, handaxes and cleavers); Middle Palaeolithic (Clactonean, Levalloisian and Mousterian flakes, discoid cores, tortoise core, fluted core, scrapers, point); Upper Palaeolithic (blade, knife, blunted back, borer, burin, points); Mesolithic (microliths); Neolithic (ring stone, grind stone, celt, adze).

**Overview of Lithic Cultures of Europe:**
Lower Palaeolithic: Acheulian culture.
Middle Palaeolithic: Mousterian culture.
Upper Palaeolithic: Perigordian, Chatelperronian, Gravettian, Aurignacian, Solutrian, Magdalenian.
Mesolithic: Azilian, Tardenoisean, Maglamosean, Kitchen Midden, Natufian.

**Early Farming Cultures and Neolithic of the Near East:** Sites like Jericho, Jarmo, Çatal Huyuk, Shanidar.

**Unit - VI**
**Lower Palaeolithic Period in India**
Pebble tool culture: Soan
Acheulian culture: Madrasian (Kortalayar Valley), Attirmpakkam, Didwana, Belan Valley, Bhimbetka, Chirki-Nevasa, Hunsgi, Krishna Valley. Importance of Hathnora, Narmada valley.

**Middle Palaeolithic period in India:** Belan valley, Bhimbetka, Nevasa, Narmada valley.

**Upper Palaeolithic period in India:** Renigunta, Billa Surgam, Patne, Bhimbetka, Son and Belan Valleys, Visadi, Pushkar, Gunjan Valley.

**Mesolithic period in India:** Mesolithic economy and society. Post Pleistocene environmental changes. Development in microlithic technology, composite tools and bows and arrows. Sites include Bagor, Tilwara, Langhnaj, Adamgarh, Bagor, Chopani Mando, Bhimbetka, Sarai Nahar Rai, Birbhanpur.

**Neolithic Period in India:** Economic and social consequences of food production. Settlements, population growth, craft specializations, class formation and political institutions. Sites like Burzahom, Gufkrkal, Ahar, Gilund, Nagada, Kayatha, Navdatoli, Eran, Nevasa, Chandoli, Daimabad, Inamgaon, Prakash, Maski, Brahmagiri, Sangankallu, Tekkalkota, Piklihal, Nagarjunakonda, Daojali Hading, Kuchai, Sarutadu.

**Prehistoric Cave art from India:** Bhimbetka, Adamgarh.


**Pottery and Traditions:** Ochre Coloured Pottery (OCP), Black and Red ware, Painted Grey Ware (PGW), Northern Black Polished Ware (NBP). Distribution of the pottery types and period.

**Bronze/Copper Age:** General characteristics, distribution, people.

**Iron Age and Urban Revolution:** General characteristics, distribution, people.

**Megaliths:** concept and types (menhir, dolmen, topica, cist, cairn circle, sarcophagi)

Unit - VII

Conceptual Understanding of Social Anthropology:
Culture: Attributes, Holism, Universals, Acculturation, Enculturation, Transculturation, Culture Change, Culture Shock, Cultural Relativism, Civilization, Folk-Urban Continuum, Great and Little Tradition, Cultural Pluralism and World-View.


Social Institutions:


Kinship: Definition, Descent, kinship terminology, matrilineal puzzle. Joking and avoidance. moiety, phratry, clan and lineage. Types of kinship systems.


Legal Anthropology: Anthropology of Law, Social Sanctions.

Political Organization: Definitions, political processes in band, tribe, chieftain and state systems. Conflicts and social control. Nations and Nation-state, democracy.

**Social Change:** Basic ideas and concepts (Assimilation, Integration, Syncretism, Dominance and Subjugation), Approaches.

**UNIT-VIII**

Theories in Social Anthropology
Evolutionism – Tylor, Morgan, Fraser, Maine, McLennan.
Diffusionism – Three schools (Austro-German, British, American).
Historical Particularism – Boas.
Functionalism – Malinowski.
Structural-Functionalism – Radcliffe-Brown, Firth, Fortes, Eggan, Parsons.
Structuralism – Levi-Strauss.
Cultural Materialism – Marvin Harris.
Symbolic Anthropology – Victor Turner, Raymond Firth, Mary Douglas.
Deep Ethnography, Interpretive Anthropology – Clifford Geertz.
Anthropology and Gender – Leela Dube, Renato Rosaldo, Marilyn Strathern, Zora Neale Hutson.
Postmodernism, Poststructuralism, Postcolonialism – Foucault, Derrida, Bourdieu.
Ethnicity – Barth, Jeffery, Weber.

**UNIT - IX**

**Stages in the Development of Indian Anthropology**

**Concepts:** Social Stratification (eg. Caste), Scheduled Caste (SC), Dalit, OBC, Nomadic Groups. Revivalist/Nativist movements, Peasant movements (Malabar and Telengana movements).
Tribe, Scheduled Tribe (ST), Particularly Vulnerable Groups (PVTGs), Tribal movements (Birsa and Naga movements), Tribal Development, Distribution.
Indian Village and Village Studies in India (S.C. Dube, McKim Marriott, Weiser, Scarlett Epstein, M.N. Srinivas, F.G. Bailey)

Constitutional Safeguards for SC and ST, Inclusion and Exclusion. Panchayati Raj Institutions and other traditional community political organizations, Self-Help Groups (SHGs).

**Theoretical ideas:** Sanskritization, Westernization, Modernization, Globalization, Sacred Complex, Nature-Man-Spirit Complex.


**Unit – X**


Community Development Projects (Rural, Urban and Tribal); Revisits, Re-studies, Reinterpretations, Intervention, Research Process and Social Impact Assessment (SIA).

Anthropological approaches in community studies: public health, education, nutrition, land alienation, bonded labour, housing, alternative economy, livelihood, gender issues, relief, rehabilitation and relocation, identity crisis, communication, training and management, aging and the aged.

Development Strategies (Plan/Sub Plan).

Role of NGOs in Development. Anthropology and NGOs.

Empowerment of Women, LGBT groups.