MASTER OF SCIENCE

(ANTHROPOLOGY)

TWO YEAR FULL-TIME PROGRAMME

RULES, REGULATIONS AND COURSE CONTENTS

Department of Anthropology

FACULTY OF SCIENCE

UNIVERSITY OF DELHI

DELH110007

2009
MASTER OF SCIENCE
(ANTHROPOLOGY)
TWO-YEAR FULL-TIME PROGRAMME

AFFILIATION

The proposed programme shall be governed by the Department of Anthropology, Faculty of Science, University of Delhi, Delhi – 110007.

PROGRAMME STRUCTURE

The M.Sc. Programme is divided into two Parts as under. Each Part will consist of two Semesters.

<table>
<thead>
<tr>
<th>Part</th>
<th>First Year</th>
<th>Semester - 1</th>
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<tbody>
<tr>
<td>Part I</td>
<td></td>
<td>Semester - 1</td>
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<td>Part II</td>
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<td>Semester - 3</td>
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</table>

Each semester would consist of four papers. Semesters I and II (Part-I) would have core Papers to be studied by all students of the M.Sc. –Anthropology programme. Semesters III and IV (Part II) would comprise Optional Papers from which each student to opt for three elective papers from either stream (A or B). He/She is also free to opt for only one elective paper from the list of common elective papers. In this case the other two elective papers have to be from one of the two streams (A or B) he /she has chosen. Selection of papers in Semester III and IV would be based on merit (performance in the Part I Examinations), Choice and other specific guidelines as outlined below. It is mandatory for each student to complete a Dissertation, assigned at the end of 2nd Semester and goes on until 4th semester. It would be based on fieldwork (2-3 weeks).

The schedule of papers prescribed for various semesters shall be as follows:

PART-I Semester 1

Theory
AN 6101 Fundamentals of Physical Anthropology
AN 6102 Fundamentals of Social Anthropology
AN 6103 Archaeological Anthropology
AN 6104 Fundamentals of Population Studies

Practical/ Project
AN 6101 Somatometry, Somatoscopy
AN 6102 Reading of Ethnography
AN 6103 Prehistoric Archaeology
AN 6104 Fundamentals of Population Studies
PART-I Semester 2
Theory
AN 6201 Human Variation and Adaptations
AN 6202 Anthropology of India: Ethnic and cultural diversity (Physical and Social)
AN 6203 Kinship, Marriage and Family
AN 6204 Human Ecology: Biological & Cultural Dimensions

Practical/Project
AN 6201 Osteology, Osteometry and Craniometry
AN 6202 Research Methods & Techniques I
AN 6203 Research Methods & Techniques II
AN 6204 Human Ecology

PART-II Semester 3

Physical Anthropology (Group-A)
Theory
AN 6301 Paleoanthropology
AN 6302 Human Growth, Development and Nutrition
AN 6303 Human Population Genetics
AN 6304 Biostatistics and Computational Anthropology (interdisciplinary)

Practical/Project
AN 6301 Paleoanthropology
AN 6302 Human Growth, Size and Shape measurements
AN 6303 Serology, PTC, Colour Blindness, Dermatoglyphics
AN 6304 Computational Human Genetics and Biostatistics (interdisciplinary)

Social Anthropology (Group-B)
Theory
AN 6305 Anthropological Theory-I
AN 6306 Anthropological Theory -II
AN 6307 Epistemological Foundations of Social and Behaviour Sciences (Interdisciplinary)
AN 6308 Religion and Symbolism

Practical/Project
AN 6305 Based on Anthropological Theory I
AN 6306 Based on Anthropological Theory II
AN 6307 Research Methods
AN 6308 Religion and Symbolism

6401 Dissertation between Sem III and IV on the basis of fieldwork of the duration 2-3 weeks
(To be examined in Semester IV)
PART-II Semester 4

Elective Papers

Physical Anthropology (Group-A)

Theory
AN 7101 Physiological Anthropology
AN 7102 Kinanthropometry and Ergonomics
AN 7103 Biochemical Genetics
AN 7104 Molecular Anthropology
AN 7105 Dermatoglyphics
AN 7106 Primate Behavior
AN 7107 Primate Biology
AN 7108 Statistical Methods in Biological Anthropology

Practical/ Project
AN 7101 Physiological Anthropology
AN 7102 Kinanthropometry and Ergonomics
AN 7103 Biochemical Genetics
AN 7104 Molecular Anthropology
AN 7105 Dermatoglyphics
AN 7106 Primate Behaviour
AN 7107 Primate Biology
AN 7108 Statistical Methods in Biological Anthropology

Social Anthropology (Group-B)

Elective Papers

Theory
AN 7201 Psychological Anthropology
AN 7202 Tribal India
AN 7203 Ecological Anthropology
AN 7204 Urban Anthropology
AN 7205 Gender & Society

Practical/ Project
AN 7201 Psychological Anthropology
AN 7202 Tribal India
AN 7203 Ecological Anthropology
AN 7204 Urban Anthropology
AN 7205 Gender & Society

Common Elective Papers

Theory
AN 7301 Demographic Anthropology
AN 7302 Prehistoric India
AN 7303 Medical Anthropology
AN 7304 Anthropology of Development
Note: A student is permitted to opt for three elective papers from either stream (A or B). He/She is also free to opt for only one elective paper from the list of common elective papers. In this case the other two elective papers have to be from one of the two streams (A or B) he/she has chosen. Dissertation would carry 4 credit (100 marks.)

SCHEME OF EXAMINATIONS

1. English shall be the medium of instruction and examination.

2. Examinations shall be conducted at the end of each Semester as per the Academic Calendar notified by the University of Delhi

3. Each course will carry 100 marks and will have two components:

   (i) Internal Assessment 30 marks

   (ii) End Semester Examination

      (a) Theory Examination 70 marks
      (b) Practical Examination 50 marks

4. The system of evaluation shall be as follows:

4.1 Internal assessment will be broadly based on attendance in Theory and Practicals (5 marks), assignments, seminars and tests in the theory component (15 marks). The internal assessment for the Practical component would be based on continuous evaluation of performance in laboratory exercises and maintenance of regular record notebooks
(10 marks). These criteria are tentative and could be modified by the faculty members associated with teaching of a paper based on guidelines approved by the academic council.

4.2 As regards dissertations / Project Work (Paper -6401), the scheme of evaluation shall be as follows:

4.2.1 Project work would be assigned at the end of Semester II to enable students to initiate work on the same.

4.2.2 It would formally begin from Semester III and shall be based on group fieldwork of 2-3 weeks.

4.2.3 The dissertation based on group field work would be evaluated at the end of Semester IV by a board of examiners consisting of two internal and one external examiner (Dissertation =70 marks, Viva-voce= 30 marks).

5. Examinations for courses shall be conducted only in the respective odd and even Semesters as per the Scheme of Examinations. Regular as well as Ex-Students shall be permitted to appear/re-appear/improve in courses of Odd Semesters only at the end of Odd Semesters and courses of Even Semesters only at the end of Even Semesters.

PASS PERCENTAGE

Minimum marks for passing the examination in each semester shall be 40% in each paper and 45% in aggregate of a semester.

However, a candidate who has secured the minimum marks to pass in each paper but has not secured the minimum marks to pass in aggregate may reappear in any of the paper/s of his choice in the concerned semester in order to be able to secure the minimum marks prescribed to pass the semester in aggregate.

No student would be allowed to avail of more than 3 chances to pass any paper inclusive of the first attempt.

PROMOTION CRITERIA

SEMESTER TO SEMESTER: Students shall be required to fulfill the Part to Part Promotion Criteria. Within the same Part, students shall be allowed to be promoted from a Semester to the next Semester, provided she/he has passed at least half of the courses of the current semester.
PART I TO PART II: Admission to Part-II of the Programme shall be open to only those students who have successfully passed at least 75% papers out of papers offered for the Part-I courses comprising of Semester-1 and Semester-2 taken together. However, he/she will have to clear the remaining papers while studying in Part-II of the Programme.

DIVISION CRITERIA

Successful candidates will be classified on the basis of the combined results of Part-I, Part-II and Part-III examinations as follows:

Candidates securing 60% and above : 1st Division

Candidates securing between 50% and above and less than 60% : 2nd Division

All others : 3rd Division

QUALIFYING PAPERS

No qualifying papers.

SPAN PERIOD

No student shall be admitted as a candidate for the examination for any of the Parts/Semesters after the lapse of four years from the date of admission to the Part-I/Semester-1 of the M.Sc. Anthropology Programme.

ATTENDANCE REQUIREMENT

As per University Rules.

No student shall be considered to have pursued a regular course of study unless he/she is certified by the Head of the Department of Anthropology, University of Delhi, to have attended 75% of the total number of lectures, tutorials and seminars conducted in each semester, during his/her course of study. Provided that he/she fulfills other conditions the Head, Department of Anthropology may permit a student to the next Semester who falls short of the required percentage of attendance by not more than 10 per cent of the lectures, tutorials and seminars conducted during the semester.

COURSE CONTENT FOR EACH COURSE

Attached

LIST OF READINGS

Attached
# M.Sc. (Anthropology)

<table>
<thead>
<tr>
<th>Course No.</th>
<th>Course Title</th>
<th>Page No.</th>
<th>Credits (T+Tu+P)</th>
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<tbody>
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| Semester 2 |                                                   |----------|------------------|
| **Theory** |                                                   |----------|------------------|
| AN 6201    | Human Variation and Adaptations                    | 10       | 3+1+2            |
| AN 6202    | Anthropology of India: Ethnic and cultural diversity (Physical and Social) | 15     | 3+1+2            |
| AN 6203    | Kinship, Marriage and Family                       | 18       | 3+1+2            |
| AN 6204    | Human Ecology: Biological & Cultural Dimensions    | 23       | 3+1+2            |
| **Practical** |                                               |----------|------------------|
| AN 6201    | Osteology, Osteometry and Craniometry              | 11       | 3+1+2            |
| AN 6202    | Research Methods & Techniques I                    | 17       | 3+1+2            |
| AN 6203    | Research Methods & Techniques II                   | 20       | 3+1+2            |
| AN 6204    | Human Ecology: Biological & Cultural Dimensions    | 21       | 3+1+2            |

| Semester 3 |                                                   |----------|------------------|
| **Group-A** | Physical Anthropology                             |----------|------------------|
| **Theory** |                                                   |----------|------------------|
| AN 6301    | Paleoanthropology                                 | 24       | 3+1+2            |
| AN 6302    | Human Growth, Development and Nutrition           | 26       | 3+1+2            |
| AN 6303    | Human Population Genetics                         | 29       | 3+1+2            |
| AN 6304    | Biostatistics and Computational Anthropology (interdisciplinary) | 31     | 3+1+2            |
| **Practical** |                                               |----------|------------------|
| AN 6301    | Paleoanthropology                                 | 25       | 3+1+2            |
| AN 6302    | Human Growth, Size and Shape measurements          | 27       | 3+1+2            |
| AN 6303    | Serology, PTC, Colour Blindness, Dermatoglyphics  | 30       | 3+1+2            |
| AN 6304    | Biostatistics and Computational Anthropology (interdisciplinary) | 32     | 3+1+2            |

<p>| <strong>Group-B</strong> | Social Anthropology                               |----------|------------------|
| <strong>Theory</strong> |                                                   |----------|------------------|
| AN 6305    | Anthropological Theory-I                          | 33       | 3+1+2            |</p>
<table>
<thead>
<tr>
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<td>37</td>
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<td>AN 6308</td>
<td>Religion and Symbolism</td>
<td>39</td>
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<td>34</td>
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<td>36</td>
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<td>Research Methods</td>
<td>38</td>
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**Semester 4**

**Elective Papers**

**Group-A: Physical Anthropology**

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<td>45</td>
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<td>47</td>
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<td>AN 7105</td>
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<td>50</td>
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<td>AN 7106</td>
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<td>54</td>
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<td>Statistical Methods in Biological Anthropology</td>
<td>56</td>
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**Practical**

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**Group-B: Social Anthropology**

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<td>66</td>
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<tr>
<td>AN 7205</td>
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**Practical**

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**Common Elective Papers**

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<td>Prehistoric India</td>
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<td>84</td>
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T-Theory, Tu- Tutorial, P-Practicals

3 hrs. of Teaching = 3 credits
1 hr. of Tutorial = 1 credit
4 hrs. of Practical = 2 credits

Each course = 6 credits (3+1+2)

Total credits = 96 (4 semesters)
AN 6101: Fundamentals of Physical Anthropology

Theory

a. History and development of physical/biological Anthropology, aim, scope and its relationship with allied disciplines.

b. Theories of evolution- Lamarckism, Neolamarckism, Darwinism, Neo-Darwinism, Synthetic theory, Neomutationism.


e. Primate behaviour with special reference to rhesus monkeys, baboons, langurs and apes.

f. Concept of Race, historical development, formation and criteria of racial classification. Racial classification of Hooton's, Deniker's, Coon, Garn and Birdsell's and Boyd's. UNESCO statement.

g. Human evolution with respect to hominoid fossil.

Suggested Literature:


AN 6101: Somatometry, Somatoscopy

Practical/Project

Somatometry

1. Maximum head length
2. Maximum head breadth
3. Minimum frontal breadth
4. Maximum bizygomatic breadth
5. Bigonial breadth
6. Nasal height
7. Nasal length
8. Nasal breadth
9. Physiognomic facial height
10. Morphological facial height
11. Physiognomic upper facial height
12. Morphological upper facial height
13. Head circumference
14. Stature
15. Sitting height
16. Body weight

Somatoscopy

1. Head form
2. Hair form
3. Facial form
4. Eye form
5. Nose form
6. Hair colour
7. Eye colour
8. Skin colour
AN 6102: Fundamentals of Social Anthropology

Theory

a. Subject matter and scope of socio-cultural anthropology and its relations with other subjects, such as sociology, psychology, history and economics.

b. Approaches to the study of society and culture:
   i. Evolutionism
   ii. Historical particularism
   iii. Diffusion
   iv. Functional (pattern and integration)
   v. Interpretative
   vi. Structuralism

c. Concept of society and culture; status and role; groups, association, community, institution and organisation.

d. Institutions- Economic, political and religious.

e. Social stratification- analysis of caste, class and power.

Suggested Literature:

AN 6102: Reading of Ethnography

Practical/ Project

The student will be required to critically comment on the methodology and findings of an ethnographic account as directed by the teacher concerned.

1. The student should be able to critically examine the theoretical approach followed.

2. Make a critical evaluation of data used.

3. Suggest alternative analytical tools.

4. Evaluate the impact made by this ethnography an anthropological theory.
AN 6103: Archaeological Anthropology

Theory

a. The Framework of Archaeology
   i. Formation Processes
   ii. Basics of Archaeology
   iii. Dating Methods- Relative dating and Absolute dating
   iv. Introduction to Social Archaeology
   v. Environmental Archaeology
   vi. Cognitive Archaeology

b. European Prehistory
   i. Introduction to Prehistory of Europe: Chronology and Terminology.
   iii. Lower Palaeolithic Culture of Europe.
   iv. Middle Palaeolithic Culture of Europe.
   v. Upper Palaeolithic Culture of Europe.
   vi. Paleolithic Art of Europe.
   vii. European Prehistory in 21st Century: With Special Reference to Dmanisi of Georgia, Isernia la Pineta, Monte Poggiolo, Pirro Nord of Italy and Atapuerca of Spain.

c. Indian Prehistory
   i. Introduction of Indian Prehistory: Chronology and Terminology.
   ii. Lower Palaeolithic Culture of India.
   iii. Middle Palaeolithic Culture of India.
   iv. Upper Palaeolithic Culture of India.
   v. Paleolithic Art of India.
   vi. Mesolithic Culture of India.
   vii. Neolithic Culture of India.
   viii. Indus Valley Civilization.
   ix. Megalithic Cultures of India.
   x. Indian Prehistory in 21st Century: Problems and Challenges.

   i. The First Human Settlement of Europe during Lower Pleistocene Epoch.
   ii. The First Human Settlement of Asia during Lower Pleistocene Epoch.
Suggested Literature

AN 6103: Prehistoric Archaeology

Practical/Project

1. Quaternary geological formations
2. Detailed Study and Understanding of tool types-
   i. Lower Palaeolithic Culture
   ii. Middle Palaeolithic Culture
   iii. Upper Palaeolithic Culture
   iv. Mesolithic Culture
   v. Neolithic Culture
   vi. Art objects
   vii. Bone Tools and artefacts

Suggested Literature

AN 6104: Fundamentals of Population Studies

Theory

a. Evolution of population studies as a separate discipline. Difference between demography and population studies. Its relevance in Anthropology and scope.
b. Role of other social disciplines; Economics, political Science, Sociology, psychology, Geography, Medical Science, Genetics, Women studies, social work and statistics in population Studies.
c. Human Population: as part of Natural Ecosystem, population growth, impact of population growth of a species on Environment & Ecosystem.
d. History of population growth; Causes of Climatic Change, Environmental changes in the historic period.
e. Population ethics and their role to solve the problems of growing population Factors influencing the distribution of World population: Population Dynamics in an ecosystem,
f. International migration - Demographic variables and its importance. Theories of International Migration. Causes, consequences Dimensions and Dynamics of International Migration, Cultural, Psychological and Ethnic impact of International Migration on the society.
g. Definition of Occupational Health, Health of a worker and interactions in a working environment, Occupational Hazards, Occupational diseases Health problems due to Industrialization, Measures for Health protection of workers
h. Recent trends of population growth in India - Population and Religion: Value of Religion in regulation and maintenance of population growth in India. Demographic profile of different religions in India.

Suggested Literature

AN 6104: Fundamentals of Population Studies

Practical/ Project

1. Survey of census record.

2. Introduction to sample survey reports and various other governmental and non governmental records.

3. A short report based on the available secondary data.
AN 6201: Human Variation and Adaptations

Theory

a. History and development of human genetics, concept, scope and fields of human genetics. Human genetics in relation to other sciences and medicine.


c. Mendelian Genetics in Man: autosomal and sex-linked inheritance, dominant and recessive inheritance, penetrance and expressivity, extra nuclear inheritance, linkage, genetic interaction.

d. Methods of Genetic analysis in localisation of Genes on Chromosome.


g. Human population ecology: Adaptation to different ecozones.

Suggested Literature


Description and identification of the disarticulated skeleton of man:

1. Skull
2. Mandible
3. Clavicle
4. Scapula
5. Vertebral column
6. Humerus
7. Radius
8. Ulna
9. Carpels
10. Metacarpals and Phalanges
11. Os-innominatum
12. Femur
13. Patella
14. Tibia
15. Fibula
16. Tarsal bones
17. Metatarsals and phalanges
   i. Assessment of sex of skull, Mandible and long bones
   ii. Assessment of age of skull and Mandible

Osteometry

Measurements on following human bones (To be specified)

1. Femur
2. Tibia
3. Fibula
4. Pelvis
5. Scapula
6. Humerus
7. Radius
8. Ulna
9. Sacrum

Craniometry

Direct (d) and Indirect (i) Measurements to be taken on skull and Lower Jaw:

Skull

i Linear Curvi-Linear Measurements:
1. Maximum Cranial Length (d+i)
2. Maximum Cranial Breadth (d)
3. Maximum Frontal Breadth (d)
4. Maximum Occipital Breadth (d)
5. Least Frontal Breadth (d)
6. Palatal Breadth (d)
7. Palatal Length (d)
8. Maxillo-Alveolar Breadth (d)
9. Facial depth/Prosthion-Basion line (d)
10. Outer Bi-orbital Breadth/Upper Facial Breadth (d)
11. Inner Bi-orbital Breadth (d)
12. Bizygomatic Breadth (d)
13. Bimaxillary Breadth (d)
14. Morphological Facial Height (d)
15. Morphological Superior Facial Height (d)
16. Anterior Inter orbital Breadth (d)
17. Nasal Height (d)
18. Nasal Breadth (d)
19. Biauricular Breadth (d)
20. Basion-Bregma Length (d + i)
21. Nasion-Inion Line (d+i)
22. Nasion-Lambda Line (d + i)
23. Frontal Chord (d+i)
24. Parietal Chord (d+i)
25. Occipital Chord (d+i)
26. Frontal Perpendicular (i)
27. Parietal Perpendicular (i)
28. Occipital Perpendicular (i)
29. Calvarial Height (i)
30. Lambda Calvarial Height (i),
31. Cranial Valuton Keith's plane.

ii Angles
32. Metopic Angle (d+i),
33. Facial Profile Angle/Total Profile Angle (d + i)
34. Nasal Profile Angle
35. Alveolar Profile Angle (d+i)
36. Profile Angle of Nasal Roof (d+i)
37. Lambda Opisthion Angle/Profile of Occiput (d)
38. Calvarial Base Angle (d + i)
39. Inclination Angle of Occipital Foramen (d+i)
40. Frontal Curvature Angle (i)
41. Parietal Curvature Angle (i)
42. Occipital Curvature Angle (i)
43. Superior Facial Length Angle (i)
44. Bregma Angle of Schwalbe (i)
45. Lambda Angle of Schwalbe (i)
46. Relation of Angles of Superior Facial Triangle (i)

Any other additional measurements may be specified.
II Lower Jaw (Linear measurements and angles)

1. Bicondylar Breadth (d)
2. Bigonial Breadth (d)
3. Height of Ramus (d)
4. Symphyseal Height (d)
5. Minimum Breadth of Ramus (d)
6. Mandibular Angle (d)
AN 6202: Anthropology of India: 
Ethnic and cultural diversity (Physical and Social)

Theory

Section A

a. A critical appraisal of contribution of Risley, Guha, Rickstett and Sarkar towards understanding ethnic elements in the Indian populations.
b. Pre and Proto historic racial elements in India.
c. Linguistic classification of Indian population.
d. Recent trends in Indian Population Genetic Studies.
e. Nutritional problems with reference to women and children in India.

Section B

b. Composition of Indian society: Understanding the diversity in Indian social structure, Culture zones in India. Social reality – Caste, class, tribe, communal and gender hierarchies – their economic and cultural impact.
c. Tribes of India: Definitional Issues, Place in Indian Civilization, Classification and distribution; Diversity of social organization. Linkages with other communities, modernizations and ethnicity issues.
d. Caste system and its structure. Ritual, economic and social aspects of caste. Relevance of caste in Indian social structure, Changes in the caste system.
e. Rural and Urban India: Rural Social Structure, Structure and function in the traditional system, urbanization and urban social structure, Changes in Rural and Urban India.
Suggested Literature


AN 6202: Research methods and techniques-I

Practical/ Project

1. Nature of anthropological research


3. Observation: Direct, Indirect, Participant, Non-participant, Controlled

4. Questionnaire and Schedule, Interview-Unstructured, Structured, Key informant interview, Focussed Group Discussion, and Free listing, pile sorting

5. Case study and life history

6. Participatory Methods

7. Project Report: The student shall undertake a project under which they will investigate and interpret a social problem by collecting primary data from the field.
AN 6203: Kinship, Marriage and Family

Theory

a. Kinship in evolutionary perspective
   i. Non-human primate social organisation
   ii. Evolution of human society: band, tribe, chiefdom and state

b. Kinship, descent and filiation
   i. Kinship as a cultural principle and social mechanism
   ii. The principle and structure of descent: unilineal, cognatic and bilateral principle

c. Kinship nomenclature
   i. Types of terminology
   ii. Rules of marriage and kin terms

d. Meaning, form and regulation of marriage, alliance systems

e. The family
   i. Definition and foundation of the family
   ii. Descent groups and domestic groups
   iii. Variation in family forms
   iv. Approaches to the study of family

f. Kinship, marriage and family in India
   i. North Indian and South Indian kinship systems
   ii. Variations from tribal society: Ethnographic accounts.

Suggested Literature


AN 6203: Research methods and techniques-II

Practical/ Project

1. An Introduction to bio-statistic.
2. Presentation and summarization of data, types of variables and data presentation (tabulation, illustration).
3. Descriptive statistics.
   i. Measures of Central Tendency
   ii. Measure of Variation, Skewness and Kurtosis.
   iii. Variance and standard deviation.
   iv. Normal and binomial distribution.
4. Correlation
5. Regression Analysis
6. Tests of Inference
   i. Variance ratio test
   ii. Student's 't' tests
   iii. Chi-square test and measures of association
   iv. Estimation of confidence interval
   v. Study design issues: Sample size and Power
7. Analysis of variance
8. Importance and implication of Pedigree Analysis.

Note: A student will be required to construct 5 pedigrees for understanding inheritability or variability of some specific, characteristics of a population problems.
AN 6204: Human Ecology: Biological & Cultural Dimensions

Theory

Biological Dimensions

c. Adaptation to various ecological stressors.
d. Ecological rules and their applicability to human populations.
e. Impact of urbanization and industrialization on Man.

Suggested Literature


Cultural Dimensions

(a) Culture as a tool of adaptation

(b) Various modes of human adaptation in pre-state societies-
   i. hunting and food gathering
   ii. pastoralism
   iii. shifting cultivation

(c) Ecological themes of state formation
   i. Neolithic revolution
   ii. Hydraulic civilization

(d) Agriculture and peasantry

(e) Industrial civilization and growth of urban societies

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Suggested Literature


2. Redfield, Robert. 1965. Peasant society and culture an anthropological approach to civilization. Chicago [u.a.]: Univ. of Chicago Press.


AN 6204: Human Ecology: Biological & Cultural Dimensions

Practical/Project

Biological Dimensions

Size and Shape Measurements

1. Stature
2. Sitting Height
3. Body Weight
4. Total Upper Extremity Length
5. Total Lower Extremity Length
6. Nasal Breadth
7. Nasal Height

Size and Shape Indices

1. Body Mass Index
2. Ponderal Index
3. Relative Sitting Height
4. Relative Upper Extremity Length
5. Relative Total Lower Extremity Length
6. Nasal Index

Cultural Dimensions

1. Make a research design pertaining to any environmental problem and do a project based on it.
AN 6301: Paleoanthropology

Theory


d. Ramapithecus: Phylogenetic & Taxonomic status.

   i. Australopithecines
   ii. Homo habilis
   iii. Homo erectus

f. Early Homo sapiens (Fontechevade, Shiring dorf, Karapina, Saccopastore)
   Homo sapiens neanderthalensis
   Homo sapiens sapiens (Upper Palaeolithic men - Grimaldi, Cromagnon and Chancelade.


h. Palaeodemography- skeletal analysis and determination of demographic variables in prehistoric populations and post-neolithic population growth.

i. Palaeopathology- The dispersion of modern humans - molecular and morphological patterns of relationship.

j. On going evolution in man: are we still evolving?

Suggested Literature


AN 6301: Paleoanthropology

Practical/ Project

1. Comparative primate Osteology
2. Description and identification of the disarticulated skeleton of non-human primates (to be specified)
3. Identification and description of fossil casts; Excursion to a site for seven days for collection of fossil material and its record (not exceeding 5 pages)
AN 6302: Human Growth, Development and Nutrition.

Theory


b. Major stages of human growth and development - Prenatal growth, Postnatal growth and their characteristics


e. Segmental growth and development; analysis of Human physique and body composition – Sheldon, Parnell, Heath -Carter methods of somatotyping.

f. Significance of age in growth studies: Methods of assessing age-chronological age, dental age, skeletal age, secondary sex character age, morphological age, age-grouping. Decimal age calendar

g. Body Composition: Methods of study, changes during growth, variation and covariates.


i. Nutritional epidemiology, impact of malnutrition under-nutrition and over-nutrition.

Suggested Literature


AN 6302: Human Growth

Practical/ Project

I Size and Shape measurements

1. Standing Height Vertex
2. Sitting Height Vertex
3. Body weight
4. Total Right Upper Extremity Length (Direct & Indirect)
5. Total Right Lower Extremity Length (K-quotient method)
6. Right Upper Arm Length (Direct & Indirect).
7. Right Fore Arm Length (Direct & Indirect)
8. Right Hand Breadth
9. Right Hand Length
10. Right Foot Length
11. Right Foot Breadth
12. Biacromial Breadth
13. Bicristal Breadth
14. Chest Breadth (Transverse)
15. Chest Depth (Sagittal)
16. Chest Girth (Inspiration, Expiration, Normal)
17. Minimum Waist Girth
18. Head Circumference
19. Mid. Upper Arm Girth
20. Maximum Calf Girth
21. Skinfold at Triceps
22. Skinfold at Biceps

II Shape Growth Ratios

23. Relative Sitting Height vertex
24. Relative Right Total Upper Extremity Length
25. Relative Right Total Lower Extremity Length
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<td>28</td>
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<td>29</td>
<td>Relative Bicristal Breadth</td>
</tr>
<tr>
<td>30</td>
<td>Relative Head and Face Segment</td>
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<td>Relative Head and Neck Segment</td>
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<td>Relative Right Upper arm length</td>
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<td>Cephalic Index</td>
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<td>Nasal Index</td>
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</table>
AN 6303: Human Population Genetics

Theory


b. Measurers of Genetic diversity and tool used for Phylogenetic analysis.

c. Genetic polymorphism- basic concept of transient and balanced polymorphism. Natural selection, Darwinian fitness, selection relaxation, selection leading to change in gene frequency, and selection leading to change in genetic equilibrium.

d. Models explaining the maintenance of genetic polymorphism (Relationship between sickle cell and malaria, other polymorphism and adaptation to malaria, X-linked polymorphism, selection due to infectious diseases and its association with blood groups and other polymorphism).

e. Haemoglobin polymorphism, thalassaemia and abnormalities of polypeptide chains.

f. Genetic isolates- Formation and disintegration. Mutation rate, Dynamics of genetic drift, mutation, selection and gene flow/ migration

g. Consanguinity and inbreeding – (definitions and concept) Genetic consequences of inbreeding in human population, inbreeding coefficient and genetic load. Magnitude of consanguineous marriages in India and World over.

Suggested Literature


AN 6303: Serology, PTC, Colour Blindness, Dermatoglyphics

Practical/ Project

1. Blood Group
   i. Blood Typing - Detection of complete and incomplete antibodies with reference to Rh (including subgroups), MNSs, Kell, and Lewis blood group systems.
   ii. Detection of secretion of antigens in saliva-ABH and Lewis antigen secretion.

2. ABO (Subgroups), MN and Rh Blood group Systems

3. PTC

4. Colour Blindness

5. Dermatoglyphics
   i. Finger Print
   ii. Palmer Print
   iii. Planter Print
AN 6304: Biostatistics and Computational Anthropology (Interdisciplinary)

Theory

a. Introduction to Basic Components of Computers
b. Concepts of Hardware
c. Concept and Application of Software – Introduction to MS-Office (MS-Word, MS-Excel, MS-Powerpoint)
d. Basic knowledge of softwares applied in anthropological data like demography and genetic data. (Eg.- SPSS, POPGENE, PHYLIP, DISPAN, HAPLOPOP, LD)
e. Concepts of Primary and Secondary data
f. Various types of representation of population data (tabular, graphical)
g. Basic concepts like Hypothesis, Probability, Variance, Test of significance (one-way & two-way), Confidence intervals, Odds ratio.
h. Introduction to various sites on internet like NCBI, EMBO; sequence alignment-BLAST, FASTA, Primer designing, Polymerase Chain Reaction (PCR)
i. Data Mining

Suggested Literature

AN 6304: Biostatistics and Computational Anthropology (Interdisciplinary)

Practical/ Project

1. MS-Office
2. Statistical Package for Social Sciences (SPSS)
3. Application of softwares for analyzing anthropological data (POPGENE, PHYLIP, DISPAN, HAPLOPOP, LD)
AN 6305: Anthropological Theory-I

Theory

a. Emergence of anthropological theory- The philosophical foundations.

b. Colonialism and its impact on anthropological theory: concept of primitive, evolution, function and diffusion, culture contact and development.

c. Post-colonial critiques.

d. Marxism and Neo-Marxian Trends.

e. Phenomenology.

Suggested Literature


AN 6305: Practical based on Anthropological theory Part1

Practical/ Project

1. Preparing research tools adequate for doing the following kind of research
   1. Functional studies
   2. Village and community studies
   3. Historical studies
2. Making a research proposal and doing an independent project on any of the above areas
3. Preparing bibliography and list of references for the project
AN 6306: Anthropological Theory- II

Theory

a. Structuralism: Structural analysis of symbols, myth and totemism (Claude Levi- Strauss and E.R. Leach)
b. New Ethnography and Semantic analysis
c. Interpretive and hermeneutical approach (Clifford Geertz)
d. Post-structuralism and post-modernism: Theories and trends (M. Foucault, P. Bourdieu)
e. Globalization and its impact
f. Contemporary social anthropology: its foci and concerns

Suggested Literature

   1, Anthropology and society. New Haven [Conn.]: Yale University Press.
   2, Culture and human nature. New Haven [Conn.]: Yale University Press.
4. Leach, Edmund. 1985. Culture & [and] communication: the logic by which symbols are 
   connected ; an introduction to the use of structuralist analysis in social anthropology. Themes in 
   the social sciences. Cambridge: Cambridge Univ. Press.
   Routledge.
   Cambridge [England]: Cambridge University Press.
   contemporary world. London: Athlone.
AN 6306: Practical based on Anthropological Theory Part 2

Practical/ Project

1. Preparing research tools adequate for the following types of research
   1. Structural studies such as of myths and rituals
   2. Multi-sited research
   3. Studying complex and multicultural situations

2. Preparing a research proposal and doing an independent study on any of the above areas.

3. Preparing a bibliography and list of references for the project.
AN 6307: Epistemological Foundations of Social and Behaviour Sciences (Interdisciplinary)

Theory

a. Introduction to social research: The process, conceptualization and measurement
b. Theoretical and epistemological foundation of research
c. Preparation of research projects
d. Survey research: Data analysis and presentation of research
e. Qualitative research: Analysis of textual data and presentation
f. Writing up qualitative research
g. Evaluative research
h. Critics, politics and ethics of social research

Suggested Literature

AN 6307: Research Methods

Practical/ Project

Student will be required to design two research proposal based on qualitative and quantities methods respectively. They will then collect appropriate data, analysis the data and write the report based on their findings.

1. Making a research design on any problem related to the social or behavioural fields.

2. Construct statistical tools to study any social problem.

3. Make a bibliography of the research project and write a research report based on research design.

4. Indicate ethical and critical problems you are likely to face in conducting this research.
AN 6308: Religion and Symbolism

Theory


c. Rituals: Functions: Durkheim and Radcliffe Brown, Max Gluckmann, Roy Rappaport


e. Religious Specialists: Shamans, Priests, Yogis, Mystics.

f. Witchcraft and Magic: Traditional and Modern.

Suggested Literature

7. Rites of Passage by Arnold Van Gennep (1960 Tr. Reprint) University of Chicago Press
AN 6308: Religion and Symbolism

Practical

1. Make a research design to do a study on any aspect of religion
2. Do a critical book review of any book on religion
3. Prepare an annotated bibliography on any topic in religion and symbolism

AN 6401: Dissertation based on fieldwork at 2-3 weeks duration.
AN 7101: Physiological Anthropology

Theory

a. Fundamentals of Work Physiology: Cardio-vascular and respiratory endurance, haemodynamics and exercise (blood pressure, pulse rate, heart rate and oxygen-transporting system, blood flow, Hb, hematocrit etc)

b. Physical working capacity and physical fitness methodology: evaluation of response and adaptation of the body to stress of exercise.

c. Variations in respiratory functions with age, sex and environment; interrelationship of body measurements with respiratory functions.

d. Impact of smoking, alcohol, air pollution and occupation on cardio-respiratory functions.

e. Physical performance and environmental stress: heat stress, cold stress and high altitude, chronic diseases, malnutrition.


g. Global prevalence and secular trends in obesity: regulation of body weight-energy expenditure and physical activity.

h. Ageing and health related aspects of exercise. Health and fitness

Suggested Literature


AN 7101: Physiological Anthropology

Practical/ Project

1. Blood pressure
2. Heart rate/pulse rate
3. Minute ventilation
4. Respiratory rate
5. Tidal volume
6. Vital capacity/forced vital capacity
7. Timed Expiratory volumes
8. Maximal voluntary ventilation
9. Haemoglobin estimation
AN 7102: Kinanthropometry and Ergonomics

Theory


b. Applied ergonomics: Designing and safety, Ergonomics, work and health


e. Physical performance tests

f. Disability ageing and inclusive design.

g. Physical Activity and Health.

Suggested Literature


2. Ergonomics man in his working environment by Murrell, KFH (1965) London; Chapman & Hall.

3. Ergonomics Glossary: Terms Commonly used in Ergonomics by North, K; Stepheton, C;Vogt, Chantal (1982). Published for the Bureau of information and co-ordination of community ergonomics action of the European Coal and Steel Community by Bohn, Scheltema & Holkema (Utrecht).
1. Rapid Fitness Index
2. VO₂ submax
3. Treadmill test/Bicycle ergometer
4. Physical performance test
   i  Pull ups
   ii  Sit ups
   iii  Shuttle run
5. Operation Designing Measurements
AN 7103: Biochemical Genetics

Theory

a. Genetical variation and polymorphism of human red cell enzymes with special reference to G-6PD, PGM, ADA, APOE, Aldehyde dehydrogenase, MTHFR.

b. Serum proteins: Genetic variability, synthesis and physiological role of Haptoglobins, Transferrins, and Immunoglobulins. Immunology & Reproduction.

c. Haemoglobins: Normal and abnormal Structural variation and Inheritance of with special reference to HbA, HbF, HbS, HbA2, HbC, HbD and HbE, Thalassaemia.


e. Tools for biochemical analysis: Types of electrophoresis. Isoelectric focusing, ELISA, HPLC.

Suggested Literature


AN 7103: Biochemical Genetics

Practical/ Project

2. Hb -Qualitative and Quantitative analysis
4. PGM typing.
AN 7104: Molecular Anthropology

Theory


b. Molecular Marker technology.


f. Use of common software in Molecular Anthropology.

g. Some importance software for Molecular Anthropology, Data Analysis like DISPAN, POPGENE, ARLIQUE, Sequence editing tool.

h. Forensic Applications: Identity and Non-Identity, Paternity, Gender Determination.

i. Speciation and Hybridization: Mitochondrial Eve versus the Multiregional Hypothesis

j. MacroEvolution and Speciation

k. mtDNA, Y chromosome and the Peopling. Migrations of Modern Humans

l. Ancient DNA and Molecular Archaeology.

m. Various methods of mutation detection, contribution in linkage and association.

n. Human Genome Diversity initiation in global perspective with special reference to India.

Suggested Literature


Rob, E. and Roger, M. (Eds) Molecular Diagnosis of Genetic Diseases. 1996. Humana Press, USA
AN 7104: Molecular Anthropology

Practical/ Project

Collection of Biological samples (blood). Extraction of DNA from blood

1. PCR amplification
2. Restriction enzyme digestion
3. Allele specific PCR.
4. Documentation of Result in Gel documentation system.
5. Molecular data analysis using DISPAN.
6. Phylogentic analysis (Dendogram).
AN 7105: Dermatoglyphics

Theory

a. Early history & development of Dermatoglyphics; Development of ridges
b. Identification of various finger prints, Technique of taking prints.
c. Topography of finger prints
d. Study of mid phalangeal patterns
e. Mode of Inheritance of Finger prints
f. Study of Palm prints. Main Line formula, Palmer formula, Main Line Index and Transversality, Mode of Inheritance of Main Lines D, C, B & A and the Patterns on the configurational areas of Palm.
g. Identification of the Toe Prints, Mode of Inheritance, Typology.
h. Study of Sole Prints, Main Line Formula, Pattern Formula, Main Line Index and Transversality; Mode of Inheritance of patterns on the configurational areas of plantar surface.
i. Practical applicability of Dermatoglyphics in relation to congenital malformation.
j. Dermatoglyphics phici in relation to Chromosomal aberrations
k. Finger Print classification-Primary, Secondary, Major, Sub-secondary, Second sub-secondary, Final and Key.
l. Uses of Dermatoglyphics in Paternity Disputes -Recent trends in Dermatoglyphics
m. Discriminant analysis of finger patterns
n. Flexion creases
o. Comparative dermatoglyphics &: Population Variations.

Suggested Literature

AN 7105: Dermatoglyphics

Practical/ Project

Collection and analysis of 50 individuals' dermal prints.

1. Identification of pattern types: Arch, Loop, Whorl and Composites.
2. Ridge counting: procedure and applicability.
3. Calculation of various indices.
4. Taking of palmer prints, identification of palmar main lines, calculation of main line formula, main line index.
5. Identification of patterns in different palmer configurational areas.
6. Position of axial triradii.
7. Importance of atd angle.
8. Use of statistical techniques in the analysis of finger and palmer print data.
AN 7106. Primate Behaviour

Theory

a. Evolution of Behaviour
b. Behaviour taxonomy: hierarchical, associative and sexual
c. Patterns of social behaviour
d. Field and laboratory studies
e. Leadership: inter and intra group encounters
f. Dominance
g. Aggression
h. Primate Societies

Suggested Literature


AN 7106: Primate Behaviour

Practical/ Practical

1. Field studies on mother-infant relationship, social structure, population dynamics of the non-human primates.

2. 7 Day's visit to a non-human primate population living in the natural habitat.
AN 7107: Primate Biology

Theory

a. Aim and scope of evolutionary biology with special reference to nonhuman primates.
b. Trends in early primate radiation-dentition, postural modifications with special reference to shoulder girdle, pelvic girdle, limbs, hand and foot.
c. Population genetics of nonhuman primates.
d. Cladistic: relationships and molecular evolution of primates: Serological aspects
   - Amino acid sequences
   - Immunochemical studies
   - Proteins
   - Chromosomal aspects
   - DNA

e. Socioecology and population dynamics of nonhuman primates.
f. Communication: patterns, signals, display and vocational
g. Use of nonhuman primates in biomedical research
h. Breeding and husbandry of non-human primates: Conservation of nonhuman primates.

Suggested Literature


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AN 7107: Primate Biology

Practical/ Project

1. Electrophoretic assays of serum proteins and red cell enzymes in nonhuman primates
2. Immunodiffusion
3. Preparation and identification of nonhuman primate chromosomes
4. Osteology, craniometry and osteometry of primate bones Blood groups and dermatoglyphics of nonhuman primates.
AN 7108: Statistical Methods in Biological Anthropology

Theory

a. Development and importance of statistical methods in Biological Anthropology.
b. Formation of a research design on a specific problem.
c. Definition and identification of universe, units and methods of sampling, variables, frequency, percentages and ratios. Graphical representation of frequency curves.
d. Measures of Central tendency and dispersion.
e. Concept of probability-properties and uses. Types of distribution.
f. Tests of significance: t-test, $x^2$, F-test, etc.
g. Analysis of variance; one-way, two-way, multiple.
i. Knowledge of computer: various computer programmes: to be specified.
j. Role model studies in Biological Anthropology - Robert’s Schalls & Haris’ Kirks, Dangers, Gaddis, etc.

Suggested Literature

Measures of Central tendency and dispersion, test of significance, Analysis of variance and correlation based on hypothetical data.

1. Odds ratios and confidence intervals.
2. The use of various statistical software like SPSS, Stata, Statistica etc for data entry and analysis of biological epidemiological and clinical data.
AN 7201: Psychological Anthropology

Theory

a. The basis of human behaviour- Cultural, psychological and biological
b. The relationships of anthropology, psychology, psycho-analysis and psychological anthropology
c. Culture and child-rearing practices- infancy, childhood and puberty (comparative and cross cultural)
d. Socialization and personality formation
e. Culture and personality
   i. Modal personality
   ii. Psychopathology
   iii. Adult personality: Assessment, inferential and direct
f. National character studies
g. Perception and cognition
   i. Perception- culture and biology
   ii. Colour vocabularies and colour vision
   iii. Perception and personality
   iv. Sensotypes
   v. Case studies of cognition
h. Culturally stimulated altered state of consciousness
   i. Ritual
   ii. Possession
   iii. Trance
   iv. Mythology
   i. Recent trends in psychological anthropology

Suggested Literature


AN 7201: Psychological Anthropology

Practical/ Project

Introduction to Psychological tests: Inferential and Direct Tests on 20 individuals belonging to a cultural cohort using quasi-participant techniques. Use of Computers in Psychological Qualitative Data Analysis.

The students are required to do the following tests:

1. IPAT Humor Test
2. Culture Fair Test
3. Eysenck's Modular Personality Inventory
4. General Mental Ability Test
5. Personality Traits Tests

Project Work: The students are supposed to prepare a report based on minimum 15 days of fieldwork in a community, on a topic related to psychological anthropology.
AN 7202: Tribal India

Theory

a. Concept of tribe in Indian context

b. Tribal societies in changing perspective
   i. Pre-colonial period
   ii. Colonial period
   iii. Post Independence

c. Geographic and linguistic distribution of tribes in India

d. Institutional structure
   i. Kinship, Family and Marriage
   ii. Economy
   iii. Religion

e. Social Change in Tribal Societies: A Historical perspective
   i. Tribe-caste Interaction
   ii. Religious conversions
   iii. Economic and political factors of change
   iv. Tribal uprisings

f. Social change in contemporary period
   i. Political democracy
   ii. Constitutional safeguards in modern India
   iii. Industrialization and urbanisation

g. Tribal society in contemporary India
   i. Identity and ethnicity
   ii. Conflict and dissension
   iii. Integration

h. Tribal development: plans and policies
Suggested Literature


AN 7202: Tribal India

Practical/ Project

1. Map out the various tribal communities on a Map of India
2. Make a research proposal on any contemporary tribal issue and prepare a relevant bibliography.
AN 7203: Ecological Anthropology

Theory

a. Cultural/ Social Ecology: concept, definition and relevance
b. Cultural ecology: Concept, its development and different theories
c. Nature and Culture: Cognitive, Phenomenological and contemporary approaches
d. Indigenous Knowledge and alternative models
e. Contemporary environmental issues and debates
f. The Himalayas- an environmental case study

Suggested Literature

AN 7203: Ecological Anthropology

Practical/ Project

14. Critically review and ethnographic work on ecological anthropology
15. Make a project proposal and an annotated bibliography.
AN 7204: Urban Anthropology

Theory

a. Rise of city and civilization in India
   i. Pre-industrial
   ii. Orthogenetic and Heterogenetic

b. Folk-urban continuum of India

c. Processes of Urbanisation, urbanism, urban structures and urban ecology

d. Basic features of Urban Social Structure
   i. Heterogeneity
   ii. Neighbourhood
   iii. Slums
   iv. Ethnic, Cultural, Linguistic affiliation of an Indian city

e. Continuity and change in Indian Urban Society
   i. Kinship and family
   ii. Caste
   iii. Religion

f. Secular values and Urban setting
   i. Secularism
   ii. Multi-ethnicity
   iii. Cultural integration

Suggested Literature

AN 7204. Urban Anthropology

Practical/ Project

The students will be required to undertake two minor research projects, one comprising study of a city based on secondary sources and another on some specific dimension of city, based on primary field research.

1. Identify a problem in an urban area, consult secondary sources to make an annotated bibliography.
2. Write a report on the problem selected using secondary sources.
3. Do fieldwork in any urban area and do any of the following type of primary research.
   a. Observing an urban situation.
   b. Understanding neighbourhood relations.
   c. Analyzing urban Kinship.
   d. Any other urban problems.
AN 7205: Gender and Society

Theory

a. The basic concepts of gender and the construction of gender.
This unit will examine the emergence of the theoretical concept of gender, relationship between gender and sex, the historical and social conditions that favoured a gendered approach, the cross-cultural implications of the concept of gender. Basic notions of femininity and masculinities.

b. Nature, Culture and Gender:
This unit will critically examine how historically men and women have been conceptualized with respect to nature and culture, bringing out some of the key issues that situate human beings with respect to nature and to their bodies. It will also include some of the issues raised with respect to medical and western science's contribution to understanding of the human body and also compare it to non-western modes of thinking.

c. Gender and Kinship:
This unit will focus on how personhoods are constructed in society and how relationships are observed and evaluated. This will examine men's and women's position within the kinship network and critically examine rules and norms pertaining to rights and duties, inheritance and rules of marriage etc. Laws pertaining to women; Special emphasis will be paid here to the South Asian ethnographic material.

d. Intersections of gender with other social categories like caste, race and ethnicity
This section will examine the internal divisions in gender categories and what it means to be men and women in unequal social situations and historical contexts.

e. Gender and globalization
How concepts of gender are being critiqued and reconstructed in the contemporary world. Rethinking of categories of gender and gender roles, influence of mass media, communication and new reproductive technologies, new perspectives on sexuality
Suggested Literature


AN 7205: Gender and Society

Practical/ Project

1. Make a fully annotated bibliography on any topic on the theory of gender.
2. Make a research design to study a relevant gender based social issue.
3. Make research tools for studying the problem and submit a report.
AN 7301: Demographic Anthropology

Theory


b. Various types of sampling design and their relevance in demographic studies.

c. Sources of demographic data- Census, Civil Registration system (CRS), Sample Registration system (SRS), National samples survey organizations (NSSO), Model Registration System (MRS) – merits and demerits.

d. Population theories – Grant, Godwin, Malthus, Sadler, Marx, Gray, Mercantilism, biological theory of population, theories of demographic transition.

e. Population structure- Age and sex composition, Ethnic and racial composition, geographical distribution and urbanization, distribution according to various social characteristics. Literacy trend in world population, population projection.

f. Population of India: Pre-independence and post-independence scenario, population dynamics of Indian tribes and castes.


h. The basic components of population change – fertility, mortality, marriage, migration and biological, social, ecological and economical factors influencing these components

i. Morbidity and its relationship with fertility and mortality.


k. Reproductive health care in Indian Populations with special reference to MCH, STDs, AIDS, Abortion etc.

l. Estimation of demographic characteristics – general estimates and specific estimates and their merits and demerits.

Suggested Literature


5. Journal Demography India
AN 7301: Demographic Anthropology

Practical/ Project

Collection and analysis of some demographic characteristics of a specified population.

1. Preparation of schedules for collection of demographic data.
2. Preparation of flow chart and graphic presentation
3. Compilation and presentation of data on population studies:
   a. age composition
   b. sex composition
   c. age ratio
   d. fertility measures
   e. modality measures
4. Pictorial comparison of health indicators.
AN 7302: Prehistoric India

Theory

Geological Features of India
a. Geological formations
b. Introductory overview of the stratigraphy of the Indian sub-continent.
c. Pleistocene chronology, climate and environmental features of Indian subcontinent

Contemporary Theories and models in Archaeology
a. Middle Range Theory
b. New Archaeology/ Processual Archaeology
c. Post-processual Archaeology
d. Post-Modernism
e. Models for understanding Hunter-gatherers’ and early Agriculturalists’ Appropriation of Nature
   i. Site Catchment Analysis (SCA)
   ii. Site Exploitation Territory (SET)
   iii. XTENT Modeling
   iv. Multi-Dimensional Scaling (MDSCAL)
   v. Optimal Foraging Models

Palaeolithic in India
a. Northern Region
b. Western Region
c. Central Region
d. Eastern Region
e. Southern Region

Mesolithic Cultures in India
a. Northern Region
b. Western Region
c. Central Region
d. Eastern Region
e. Southern Region
Advent and Evolution of settlement in India

a. Advent of agriculture in India with respect to all five regions.
b. The beginning of agriculture in India in pan-Asian perspective

Rise of Complex Society in India

a. Emergence of the Indian Civilization.
b. Emergence of State Civilization: Harrapan civilization
c. Neolithic/ Chalcolithic cultures- Western region, Central region, Eastern region and Southern region

Legacy of the Harrapan Civilization

a. Advent of Iron.
b. Late/ Post Harrapan Civilization: Ochre Coloured Pottery and Copper Hoards in Ganga Valley, Gujarat and Sindh.
c. Megaliths and use of iron in South India

Suggested Literature

AN 7302: Prehistoric India

Practical/ Project

1. Identification of stone tools-type, technology and function
2. Identification of ceramic traditions-type, technology and function
3. Computer applications for archaeology
4. Geographical Information System (GIS) for archaeology

Suggested Literature

AN 7303: Medical Anthropology

Theory

a. Medical anthropology: Historical development and subject matter
b. Development of theory in medical anthropology
c. Traditional systems: classical systems, alternative systems, medical pluralism
d. Medical anthropology and mental health
e. Issues and trends in international health: AIDS, Diarrhoea, ARI, Reproductive health and Vector borne diseases
f. Health care in India: National Health Policy; health care programmes

Suggested Literature

The students shall be required to undertake two projects: one based on secondary sources and the other based on primary data collected through fieldwork in a community.

1. Make a project proposal on any relevant issue in Medical Anthropology.
2. Collect secondary data using a multisource approach like books, formulas, newspapers, media etc.
3. Submit a project report based on the above material.
4. Do a short field-work to investigate any of the following.
   a. Cultural approach to health and healing.
   b. Traditional health practitioners.
   c. Collection of medical biographies.
   d. Indigenous knowledge of medicine.
   e. Any other as suggested by concerned teacher.
AN 7304: Anthropology of Development

Theory

a. Development: Meaning and evolution of concept
b. Development: Theories and models
c. Development in India-
   i. Identification of needs
   ii. Socio-cultural aspects
   iii. Poverty and development
   iv. Constitutional provision for development
   v. Agencies for development
d. Sustainable development
e. Role of anthropology in development
f. Case studies in development

Suggested Literature


Do a critical evaluative case study of any development Project in India using a multimedia approach (Books, magazines, newspaper articles, television and radio reporting etc).

1. Identify any development project in India and construct a brief ethnography of the project.
2. Collect all available material debating the project.
3. Make a project report with your own critical evaluation of the debate.
4. Provide a comprehensive bibliography.
AN 7305: Anthropology of Disaster

Theory

a. Disaster: Definition, typology, vulnerability, risk, coping
b. Anthropological approaches to study disasters - archaeological/historical, political ecology, socio-cultural behavioural, gendered perspective.
e. Methods for studying disasters.
f. Health, social and economic impacts of disaster.
g. Plans and National policies concerning disasters, disaster risk mitigation, disasters management.

Suggested Literature

AN 7305: Anthropology of Disaster

Practical/ Project

The students are required to do two projects.

1. The first project will be on disaster trends in a country or disaster incidence based on EMDAT or NIDM data base.

2. A project based on primary data collected from a disaster affected population.
   a. Identify the problem.
   b. A project based on primary data collected from a disaster affected population.
      i. Identify the problem.
      ii. Make a comprehensive research design
      iii. Construct appropriate tools.
      iv. Identify sample and sample size.
      v. Conduct fieldwork.
      vi. Prepare report and suitable bibliography.
AN 7306: Forensic Anthropology

Theory

a. Definition, scope and schools of forensic anthropology.

b. Study of skeletal material: Human and animal remains. The study of bone fragments. Attribution of sex, estimation of age and reconstruction of stature from the skeletal remains, and their medico-legal implications.


d. Establishment of partial and complete identity of skeletal material and dead bodies - morphometric techniques.

e. Personal identification of living persons - Identification through somatometric and somatoscopic observations, nails, occupation marks, scars, tattoo marks and deformities; handwriting and mannerisms.


g. Forensic Haemogenetics: Pattern of blood splashes, Identification of bloodstains and determination of species of origin. Individualization of blood stains: Determination of blood group, sex, age and racial origin from dried bloodstains. Typing of some common polymorphic enzymes. HLA haplotypes and serum proteins from dried blood stain. Menstural and lochial blood identification. Identification and individualization of body fluids like semen, saliva, urine etc.

h. DNA profiling and individualization: concept of sequence variations, STR, VNTRs, STR markers used in DNA finger printing.

i. Disputed parentage: role of Anthropologic traits in solving such cases: Forensic Anthropologist's as an expert witness under section 45 of the Indian Evidence Act.

Suggested Literature


AN 7306: Forensic Anthropology

Practical/ Project


2. Measurement and observations on living persons.

3. Recording and classification of fingerprints, development of chance prints by various methods. Comparison of questioned and suspected fingerprints.

4. Hair examination from various body sites and comparative analysis.

5. Identification of blood stains, Determination of blood group from dried stains, Determination of origin (i.e. the species).

6. Identification of seminal, urine and saliva stains.