

KTSPMS

**Hutatma Rajguru Mahavidyalaya, Rajgurunagar**

Tal – Khed, Dist – Pune Pin.- 410505

**Department of Geography**

**Teaching Plan NEP 2020 (2024 Pattern)**

**Academic year - 2026-2027**

**Class – FYBA**

**Semester – I**

**Subject Code – GEO-101-T**

**Div- A**

**Credits - 02**

**Subject – Theory (Main Subject)**

**Name of Subject – Introduction to Physical Geography NEP 2020 (2024 Pattern)**

**Name of Subject Teacher - Prof. Muluk M. L.**

| Month       | Teaching Hours | Topic                              | Sub Topics                                                                                                                                                      |
|-------------|----------------|------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------|
| July 2026   | 08             | Introduction to Physical Geography | i. Introduction, definition and branches of Geography ii. Definition and Branches of Physical Geography iii. Nature, Scope and importance of Physical Geography |
| August 2026 | 06             | Lithosphere                        | i. Interior of the Earth - Structure and Composition ii. Wegener's Continental Drift Theory                                                                     |
| Sept. 2026  | 08             | Atmosphere                         | i. Concept of weather and climate. ii. Composition and structure of the atmosphere iii. Factors affecting horizontal distribution of the temperature            |
| Oct. 2026   | 06             | Hydrosphere                        | i. General structure of ocean floor ii. Movements of ocean water a. Tides- meaning, causes and types                                                            |

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**Department of Geography**

**Teaching Plan NEP 2020 (2024 Pattern)**

**Academic year - 2026-2027**

**Class – FYBA**

**Semester – I**

**Subject Code – GEO-102-P**

**Div- A (8 Batches)**

**Credits - 02**

**Subject – Practical (Main Subject)**

**Name of Subject – Practicals in Geography NEP 2020 (2024 Pattern)**

**Name of Subject Teacher - Prof. Dr. Muluk D. D.**

| Month            | Teaching Hours | Topic                                             | Sub Topics                                                                                                                                                                                                                               |
|------------------|----------------|---------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| June/July 2026   | 20             | Qualitative Methods of Relief Representation      | Methods of Relief Representation<br>Qualitative Methods a. Hachures b. Hill shading c. Color shading or tinting                                                                                                                          |
| August/Sept 2026 | 20             | Quantitative Methods of Relief Representation     | Methods of Relief Representation<br>Quantitative Methods a. Spot Height b. Bench Mark c. Triangulation Method d. Contours e. Form lines                                                                                                  |
| Sept/Oct. 2026   | 20             | Representation of slope and landforms by contours | Representation of slope by contours<br>a. Gentle and steep slope b. Even and uneven slope c. Concave and convex slope<br>Representation of landforms by contours a. Conical hill b. Cliff c. V shaped valley d. Ridge e. Plateau f. Pass |

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**Department of Geography**

**Teaching Plan NEP 2020 (2024 Pattern)**

**Academic year - 2026-2027**

**Class – FYBA**

**Semester – I**

**Subject Code – OE-101-GEO**

**Div- FYBSC A Group**

**Credits - 02**

**Subject – Theory(Open Elective)**

**Name of Subject – Geography of Tourism NEP 2020 (2024 Pattern)**

**Name of Subject Teacher - Prof. Muluk M. L.**

| Months           | Teaching Hours | Topic                                      | Sub Topics                                                                                                                                                                                                       |
|------------------|----------------|--------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| July 2026        | 10             | Introduction to Tourism Geography          | i. Definition, Nature and Scope of Tourism Geography<br>ii. Concept of Tourist and Tourism<br>iii. Importance of Tourism in Geography                                                                            |
| August/Sept 2026 | 10             | Determinants of Tourism Development        | i. Physical a. Relief b. Climate c. Forest d. Water<br>ii. Socio-Cultural a. Religious b. Historical c. Cultural<br>iii. Political a. Policies<br>iv. Other a. Accessibility b. Safety of Tourists               |
| Sept/Oct. 2026   | 10             | Classification and recent types of Tourism | i. Classification of Tourism based on a. Nationality b. Travel Period c. Purpose of Tourism<br>ii. Recent types of Tourism a. Agro Tourism b. Ecotourism c. Wildlife Tourism d. Health Tourism e. Sports Tourism |

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Tal – Khed, Dist – Pune Pin.- 410505

**Department of Geography**

**Teaching Plan 2026-2027**

**(SYBA NEP 2020) 2024 Pattern**

|                               |                                                                        |
|-------------------------------|------------------------------------------------------------------------|
| <b>Name of the Programme</b>  | <b>B.A. (Geography)</b>                                                |
| <b>Class</b>                  | <b>S.Y.B.A.</b>                                                        |
| <b>Semester</b>               | <b>III</b>                                                             |
| <b>Name of Vertical Group</b> | <b>Major Core</b>                                                      |
| <b>Course Code</b>            | <b>GEO-201- MJ</b>                                                     |
| <b>Course Title</b>           | <b>Fundamentals of Geomorphology</b>                                   |
| <b>Type of course</b>         | <b>Theory</b>                                                          |
| <b>Total Credits</b>          | <b>04</b>                                                              |
| <b>Workload</b>               | <b>(15 hours / credit) 4 credits x 15 hours = 60 hours in semester</b> |
| <b>Name of Teacher</b>        | <b>Prof. Dr. Muluk D. D.</b>                                           |

| <b>Months</b>         | <b>Teaching Hours</b> | <b>Topic Name</b>                | <b>Sub Topic</b>                                                                                                                                                                                                                                                                    |
|-----------------------|-----------------------|----------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| June/July 2026        | 10                    | Introduction of Geomorphology    | 1. Definition of geomorphology<br>2. Nature and scope of geomorphology<br>3. Branches of geomorphology<br>4. Significance of geomorphology                                                                                                                                          |
| July/August 2026      | 16                    | Tectonics and Crustal Movements  | 1. Origin of continents and oceans<br>i. Theory of plate tectonics<br>ii. Theory of sea floor spreading<br>2. Classification of crustal movements<br>i. Slow movements- folding and faulting and its types<br>ii. Rapid movements - volcanism and earthquakes: causes, consequences |
| August 2026           | 10                    | Weathering                       | 1. Definition of Weathering<br>2. Types of weathering<br>(i) Physical (ii) Chemical (iii) Biological                                                                                                                                                                                |
| August/September 2026 | 12                    | Agents of Erosion and Deposition | 1. Erosional and depositional landforms created by the following geomorphic agents River (ii) Sea wave                                                                                                                                                                              |
| Sept./Oct 2026        | 12                    | Applied Geomorphology            | 1. Definition and significance of applied geomorphology<br>2. Concept of Geomorphosites<br>3. Human activity and geomorphology<br>(i) Settlement (ii) Mining<br>(iii) Urbanization (iv) Land Degradation                                                                            |

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| <b>Name of the Programme</b>  | <b>B.A. (Geography)</b>                                                |
| <b>Class</b>                  | <b>S.Y.B.A.</b>                                                        |
| <b>Semester</b>               | <b>III</b>                                                             |
| <b>Name of Vertical Group</b> | <b>Major Core</b>                                                      |
| <b>Course Code</b>            | <b>GEO-202-MJP</b>                                                     |
| <b>Course Title</b>           | <b>Practicals in Fundamentals of Geomorphology</b>                     |
| <b>Type of course</b>         | <b>Practical</b>                                                       |
| <b>Total Credits</b>          | <b>02</b>                                                              |
| <b>Workload</b>               | <b>(30 hours / credit) 2 credits x 30 hours = 60 hours in semester</b> |
| <b>Name of Teacher</b>        | <b>Dr. Markad. D. M.</b>                                               |

| <b>Months</b>           | <b>Teaching Hours</b> | <b>Topic Name</b>                                     | <b>Sub Topic</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
|-------------------------|-----------------------|-------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| June/July 2026          | 15                    | Introduction to Geomorphological Tools and Techniques | <ol style="list-style-type: none"> <li>1. Introduction to SOI topographic sheets and understanding geomorphological features based on contour patterns/relief</li> <li>2. Identifying fluvial features such as „V“ shaped valley, gorge, waterfall, potholes, meanders, deltas, floodplains etc. using contour patterns or Google Earth programming</li> <li>3. Identifying coastal features: beaches, sea cliff, sea island etc. using contour patterns or Google Earth</li> </ol> |
| July/August 2026        | 15                    | Slope and Drainage Basin Analysis                     | <ol style="list-style-type: none"> <li>1. Measuring slope angles</li> <li>2. Identifying drainage patterns and their geomorphological significance</li> <li>3. Profile- Drawing and interpretation of cross- section of river</li> <li>4. Stream order and number by Strahlers method</li> </ol>                                                                                                                                                                                    |
| August/Sept./ Oct. 2026 | 30                    | Field Mapping Techniques (Field excursion)            | <ol style="list-style-type: none"> <li>1. Techniques for mapping landforms in the field using SOI toposheet or GPS</li> <li>2. Field survey for locating bench mark/spot height / triangulation mark with reference to SOI toposheet</li> <li>3. Identifying landforms in the field<br/>(at least any two depositional c</li> <li>4. Report writing on the basis of<br/><b>(Conduct a field visit or field excursion lasting one or more days)</b></li> </ol>                       |

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| <b>Name of the Programme</b>  | B.A. (Geography)                                    |
| <b>Class</b>                  | S.Y.B.A.                                            |
| <b>Semester</b>               | III                                                 |
| <b>Name of Vertical Group</b> | VSC                                                 |
| <b>Course Code</b>            | <b>GEO-221- VSC</b>                                 |
| <b>Course Title</b>           | <b>Introduction to Cartography</b>                  |
| <b>Type of course</b>         | Theory                                              |
| <b>Total Credits</b>          | 02                                                  |
| <b>Workload</b>               | (15 hours / credit) 2 credits x 15 hours = 30 hours |
| <b>Name of Teacher</b>        | Prof. Muluk M. L.                                   |

| <b>Months</b>              | <b>Teaching Hours</b> | <b>Topic Name</b>           | <b>Sub Topic</b>                                                                                                                                                                                                                   |
|----------------------------|-----------------------|-----------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| June/July<br>2026          | 12                    | Introduction to Cartography | 1. Definition of cartography<br>2. History of cartographic techniques<br>3. Essence of cartography<br>i. Atlas<br>ii. Globe<br>iii. Map<br>4. Branches of cartography<br>5. Importance and applications of cartographic techniques |
| July/August<br>2026        | 08                    | Map and Map Scale           | 1. Map<br>i. Definition<br>ii. Aspects<br>iii. Types<br>2. Map Scale<br>i. Definition<br>ii. Types of map scale: verbal, representative fraction and graphical                                                                     |
| August/Sept./<br>Oct. 2026 | 10                    | Map Projections             | 1. Meaning<br>2. Classification of map projection on the basis of use and construction<br>3. Selection of map projection<br>4. Concept and significance of UTM Projection                                                          |

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|-------------------------------|-----------------------------------------------------------------|
| <b>Name of the Programme</b>  | B.A.(Geography)                                                 |
| <b>Class</b>                  | S.Y.B.A.                                                        |
| <b>Semester</b>               | III                                                             |
| <b>Name of Vertical Group</b> | VSC                                                             |
| <b>Course Code</b>            | <b>GEO -222 -VSC</b>                                            |
| <b>Course Title</b>           | <b>Introduction to Surveying</b>                                |
| <b>Type of course</b>         | Theory                                                          |
| <b>Total Credits</b>          | 02                                                              |
| <b>Workload</b>               | (15 hours / credit) 2 credits x 15 hours = 30 hours in semester |
| <b>Name of Teacher</b>        | Prof. Muluk M. L.                                               |

| <b>Months</b>       | <b>Teaching Hours</b> | <b>Topic Name</b>                  | <b>Sub Topic</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                |
|---------------------|-----------------------|------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| June/July<br>2026   | 08                    | Land Measurement                   | <ol style="list-style-type: none"> <li>1. Definition of land measurement</li> <li>2. Development of land measurement</li> <li>3. Types of land measurement <ol style="list-style-type: none"> <li>a. Linear methods, b. Areal methods</li> </ol> </li> <li>4. Importance of land measurement</li> </ol>                                                                                                                                                         |
| July/August<br>2026 | 08                    | Surveying                          | <ol style="list-style-type: none"> <li>1. Definition of surveying</li> <li>2. Types of surveys: Plane surveying and geodetic surveying <ol style="list-style-type: none"> <li>3. Classification of survey <ol style="list-style-type: none"> <li>a. On the basis of area</li> <li>b. On the basis of objectives</li> <li>c. On the basis of survey instruments (conventional and modern)</li> </ol> </li> </ol> </li> <li>4. Importance of Surveying</li> </ol> |
| Sept./<br>Oct. 2026 | 14                    | Introduction to Survey Instruments | <ol style="list-style-type: none"> <li>1. Structure, function, merits and demerits of following survey instruments <ol style="list-style-type: none"> <li>a. Plane table    b. Dumpy</li> <li>c. GPS                d. Total station</li> </ol> </li> <li>2. Applications of land measurement and surveying in Geography</li> </ol>                                                                                                                             |

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| <b>Name of the Programme</b>  | <b>B. A. (Geography)</b>                                           |
| <b>Class</b>                  | <b>S.Y.B.A.</b>                                                    |
| <b>Semester</b>               | <b>III</b>                                                         |
| <b>Name of Vertical Group</b> | <b>FP / OJT / CEP</b>                                              |
| <b>Course Code</b>            | <b>GEO -231-FP</b>                                                 |
| <b>Course Title</b>           | <b>Field Visit and Report Writing</b>                              |
| <b>Type of course</b>         | <b>Field Project</b>                                               |
| <b>Total Credits</b>          | <b>02</b>                                                          |
| <b>Workload</b>               | <b>(30 hours / credit) 2 credits x 30 hours = 60 hours in sem.</b> |
| <b>Name of Teacher</b>        | <b>Prof. Dr. Dilip Muluk</b>                                       |

- A field visit to a geographical area should be conducted in pre-approved locations that provide opportunities to observe and analyze geographical phenomena, including natural landscapes, urban environments, or socio-economic settings.
- Faculty members will provide guidance and supervision throughout the field visit. Students must adhere to their instructions.
- Students are required to actively participate in data collection, group discussions, and assigned tasks while working effectively with peers and supervisors.
- Students must submit a field report, highlighting their observations about the geographical phenomena studied.
- The field report should follow the prescribed format, including Title Page, Table of Contents, Introduction, Objectives, significance of the study, Study Area, Methodology, Techniques and tools used for data collection, Observations, Description, Major findings and Summary.
- Maps, Grphas, Digrams and Geotagged photographs should be included in the final report.
- The final field report should be submitted in both printed and digital formats to the department.



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| <b>Name of the Programme</b>  | <b>B.A. (Geography)</b>                                                |
| <b>Class</b>                  | <b>S.Y.B.A.</b>                                                        |
| <b>Semester</b>               | <b>III</b>                                                             |
| <b>Name of Vertical Group</b> | <b>Minor</b>                                                           |
| <b>Course Code</b>            | <b>GEO -241-MN</b>                                                     |
| <b>Course Title</b>           | <b>Physical Geography of India</b>                                     |
| <b>Type of course</b>         | <b>Theory</b>                                                          |
| <b>Total Credits</b>          | <b>02</b>                                                              |
| <b>Workload</b>               | <b>(15 hours / credit) 2 credits x 15 hours = 30 hours in semester</b> |
| <b>Name of Teacher</b>        | <b>Dr. Markad D. M.</b>                                                |

| <b>Months</b>       | <b>Teaching Hours</b> | <b>Topic Name</b>             | <b>Sub Topic</b>                                                                                                                                                                                                                                         |
|---------------------|-----------------------|-------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| June/July<br>2026   | 10                    | Location and Physical Setting | 1. Location, relation with neighboring countries<br>2. Physical divisions<br>a. The Northern Mountains<br>b. The North Indian Plains<br>c. The Peninsular Plateau<br>d. The Coastal Lowlands and Islands                                                 |
| July/August<br>2026 | 12                    | Drainage System and Climate   | 1. Drainage system<br>a. East flowing rivers- Ganga, Brahmaputra, Godawari, Krushna and Kaveri<br>b. West flowing rivers- Indus, Narmda, Tapi and Vashishti<br>2. Major Seasons and weather associated with them<br>a. Summer<br>b. Monsoon<br>c. Winter |
| Sept./<br>Oct. 2026 | 8                     | Soil and Forest               | 1. Soil types and distribution<br>2. Soil conservation<br>3. Forest types and distribution<br>4. Forest Conservation                                                                                                                                     |

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| <b>Name of the Programme</b>  | <b>B.A. (Geography)</b>                                                |
| <b>Class</b>                  | <b>S.Y.B.A.</b>                                                        |
| <b>Semester</b>               | <b>III</b>                                                             |
| <b>Name of Vertical Group</b> | <b>Minor</b>                                                           |
| <b>Course Code</b>            | <b>GEO -242 -MNP</b>                                                   |
| <b>Course Title</b>           | <b>Practicals in Map Reading</b>                                       |
| <b>Type of course</b>         | <b>Practical</b>                                                       |
| <b>Total Credits</b>          | <b>02</b>                                                              |
| <b>Workload</b>               | <b>(30 hours / credit) 2 credits x 30 hours = 60 hours in semester</b> |
| <b>Name of Teacher</b>        | <b>Dr. Markad D. M.</b>                                                |

| <b>Months</b>     | <b>Teaching Hours</b> | <b>Topic Name</b>                    | <b>Sub Topic</b>                                                                                                                                                                                                                                                                                                                                        |
|-------------------|-----------------------|--------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| June 2026         | 08                    | Introduction to Map                  | 1. Map: definition and elements<br>2. Classification of map: based on scale and purpose<br>3. Use of map                                                                                                                                                                                                                                                |
| July/August 2026  | 16                    | Map Scale                            | 1. Definition<br>2. Types of scale: verbal, numerical and graphical<br>3. Conversion of scale (British and Metric system)<br>a. Verbal scale to representative fraction<br>b. Representative fraction into verbal scale<br>4. Construction of simple graphical scale<br>(At least two examples from each)                                               |
| August/Sept. 2026 | 18                    | Introduction to Map Projection       | 1. Definition and types of map projection<br>2. Basic concepts of projection: latitude, longitude, parallel of latitude, meridian of longitude, prime meridian, equator, direction<br>3. Calculation of time basis on meridian and GMT<br>(Calculation of minimum two examples)                                                                         |
| Sept/Oct 2026     | 18                    | Interpretation of Maps and Excursion | 1. Introduction to Survey of India toposheets - marginal information, conventional signs and symbols and colours in S.O.I. toposheets<br>2. Interpretation of S.O.I. toposheets<br>(At least one map of mountain, plateau, plain and costal region)<br>3. One-day field excursion for orientation of maps and toposheets, reading of maps in the field. |

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| <b>Name of the Programme</b>  | <b>B.A. (Geography)</b>                                                |
| <b>Class</b>                  | <b>S.Y.B.A.</b>                                                        |
| <b>Semester</b>               | <b>III</b>                                                             |
| <b>Name of Vertical Group</b> | <b>Minor</b>                                                           |
| <b>Course Code</b>            | <b>OE -201-GEO</b>                                                     |
| <b>Course Title</b>           | <b>Political Geography</b>                                             |
| <b>Type of course</b>         | <b>Theory</b>                                                          |
| <b>Total Credits</b>          | <b>02</b>                                                              |
| <b>Workload</b>               | <b>(15 hours / credit) 2 credits x 15 hours = 30 hours in semester</b> |
| <b>Name of Teacher</b>        | <b>Prof. M. L. Muluk</b>                                               |

| <b>Months</b>       | <b>Teaching Hours</b> | <b>Topic Name</b>                   | <b>Sub Topic</b>                                                                                                                                                                                                                                                                                                                                  |
|---------------------|-----------------------|-------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| June/July<br>2026   | 08                    | Introduction to Political Geography | <ol style="list-style-type: none"> <li>1. Definition, nature and scope</li> <li>2. Historical development</li> <li>3. Concept of geopolitics</li> </ol>                                                                                                                                                                                           |
| July/August<br>2026 | 12                    | Concepts in Political Geography     | <ol style="list-style-type: none"> <li>1. Nation, state and nation state</li> <li>2. Nation building</li> <li>3. Frontiers and boundaries</li> <li>4. Maritime boundaries</li> </ol>                                                                                                                                                              |
| Sept./<br>Oct. 2026 | 10                    | Current Political Issues            | <ol style="list-style-type: none"> <li>1. Political Issues                         <ol style="list-style-type: none"> <li>i. India - Pakistan</li> <li>ii. Russia-Ukraine</li> <li>iii. Problems in Bangladesh</li> </ol> </li> <li>2. International river water disputes of India</li> <li>3. Geopolitical importance of Indian ocean</li> </ol> |

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| <b>Name of the Programme</b>  | <b>B.A. (Geography)</b>                                                |
| <b>Class</b>                  | <b>S.Y.B.A.</b>                                                        |
| <b>Semester</b>               | <b>III</b>                                                             |
| <b>Name of Vertical Group</b> | <b>IKS</b>                                                             |
| <b>Course Code</b>            | <b>GEO- 201- IKS</b>                                                   |
| <b>Course Title</b>           | <b>Indian Geographical Knowledge</b>                                   |
| <b>Type of course</b>         | <b>Theory</b>                                                          |
| <b>Total Credits</b>          | <b>02</b>                                                              |
| <b>Workload</b>               | <b>(15 hours / credit) 2 credits x 15 hours = 30 hours in semester</b> |
| <b>Name of teacher</b>        | <b>Dr. D. M. Markad</b>                                                |

| <b>Months</b>           | <b>Teaching Hours</b> | <b>Topic Name</b>                             | <b>Sub Topic</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
|-------------------------|-----------------------|-----------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| June/July 2026          | 08                    | Introduction to Indian Knowledge System (IKS) | <ol style="list-style-type: none"> <li>1. Concept of IKS</li> <li>2. Nature and Scope of IKS</li> <li>3. IKS based approaches on knowledge paradigms</li> <li>4. IKS from ancient to medieval period.</li> </ol>                                                                                                                                                                                                                                                                                                                                                                                         |
| July/August 2026        | 12                    | Indian Geographical knowledge                 | <ol style="list-style-type: none"> <li>1. Geographical Literature - Vaidikas, Puranas, the Ramayana, the Mahabharata, the works of Buddhists, Jains and Gandhian philosophy.</li> <li>2. Geographical concepts in ancient India – eclipses, earth, size of earth, latitude and longitude, atmosphere, weather and climate, division of celestial sphere (Panchang), planetary computation</li> <li>3. Regional geography of ancient India: continents, Bharatvarsa, mountains and rivers</li> <li>4. Gandhian ideas of regional development, concept of gramswaraj as microregional approach.</li> </ol> |
| August/Sept./ Oct. 2026 | 10                    | Practices of Indian Knowledge in Geography    | <ol style="list-style-type: none"> <li>1. Ancient routes of trade (Inland and Overseas)</li> <li>2. Observatories in historical India – Rajasthan, Delhi, Uttar Pradesh and Madhya Pradesh</li> <li>3. Indian geographical knowledge and cultural practices in India. (agriculture, festivals, architecture),</li> <li>4. Gandhian approach towards agriculture, architecture, resource management and environment.</li> <li>5. Gandhian philosophy for climate adaptation.</li> </ol>                                                                                                                   |

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**Department of Geography****Teaching Plan NEP 2020 (2024 Pattern)****Academic year - 2026-2027****Semester – V****Div- A****Credits - 04****Class – TYBA****Subject Code – GEO-301-MJ****Subject – Theory****Name of Subject – Fundamentals of Climatology****Name of Subject Teacher - Prof. Dr. D. D. Muluk**

| <b>Month</b>     | <b>Hours</b> | <b>Topic</b>                                       | <b>Sub Topics</b>                                                                                                                                                        | <b>Learning Outcomes</b>                                                                                                           |
|------------------|--------------|----------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------|
| <b>July</b>      | 12           | <b>Introduction to Climatology</b>                 | Definition, Nature and Scope; Weather and Climate; Elements of Weather and Climate; Branches of Climatology                                                              | Students will explain the basic concepts, nature, scope and branches of climatology and differentiate between weather and climate. |
| <b>August</b>    | 12           | <b>Energy System of Earth– Atmosphere</b>          | Solar Radiation and Earth–Sun Relationship; Insolation and its Spatial Variation; Terrestrial Radiation; Earth's Heat Budget                                             | Students will explain the Earth–Sun relationship, solar radiation, insolation and Earth's heat budget.                             |
| <b>September</b> | 12           | <b>Atmospheric Circulation and Weather Systems</b> | Atmospheric Pressure Belts; Planetary Wind Systems; General Circulation of the Atmosphere                                                                                | Students will analyse atmospheric circulation patterns and explain their influence on global weather conditions.                   |
| <b>October</b>   | 12           | <b>Atmospheric Moisture and Precipitation</b>      | Humidity and Measurement; Condensation Processes; Cloud Types and Classification; Forms of Precipitation; Mechanisms of Rainfall – Convictional, Orographic and Cyclonic | Students will classify atmospheric moisture processes, cloud formation and different mechanisms of precipitation.                  |
| <b>November</b>  | 12           | <b>Climate Change</b>                              | Climate Variability vs. Climate Change; Evidence of Climate Change; Natural and Anthropogenic Causes; Global Warming                                                     | Students will evaluate the causes, evidence and impacts of climate change and global warming on the environment and society.       |

**Teaching Methods / Teaching Aids / ICT** - Lecture Method, Interactive Discussion, Question–Answer Method, Group Discussion, Demonstration, Case Study, Seminar, Student Presentation and Map Interpretation supported through PowerPoint Presentations (PPT), Smart Board, LCD

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Tal – Khed, Dist – Pune Pin.- 410505

**Department of Geography****Teaching Plan NEP 2020 (2024 Pattern)****Academic year - 2026-2027****Course Code: GEO-302-MJ****Course Title: Regional Geography of India****Class: T.Y.B.A.****Semester: V****Credits: 04 (60 Hours)****Name of Subject Teacher - Prof. Muluk M. L.**

| <b>Month</b>     | <b>Hours</b> | <b>Topic</b>                  | <b>Sub Topics</b>                                                                                                   | <b>Learning Outcomes</b>                                                                                         |
|------------------|--------------|-------------------------------|---------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------|
| <b>July</b>      | 08           | <b>Introduction</b>           | Geographical and Relative Location of India; Frontiers of India; Strategic Significance                             | Students will explain the geographical location, frontiers and strategic significance of India.                  |
| <b>July</b>      | 08           | <b>Physiography (Part-I)</b>  | The Northern Mountains; The North Indian Plain; Significance of Physiographic Divisions                             | Students will describe the origin, characteristics and importance of the Northern Mountains and Northern Plains. |
| <b>August</b>    | 08           | <b>Physiography (Part-II)</b> | The Peninsular Plateau; Coastal Lowlands; Islands                                                                   | Students will analyse the physiographic divisions of Peninsular India, Coastal Plains and Islands.               |
| <b>August</b>    | 08           | <b>Drainage Systems</b>       | Himalayan Rivers – Ganga, Brahmaputra, Indus; Peninsular Rivers – Narmada, Tapi, Mahi, Godavari, Krishna and Kaveri | Students will explain the drainage systems of India and evaluate their regional importance.                      |
| <b>September</b> | 08           | <b>Climate (Part-I)</b>       | Main Seasons and Associated Weather Conditions – Winter, Summer and Monsoon                                         | Students will explain the seasonal characteristics and weather conditions of India.                              |
| <b>September</b> | 08           | <b>Climate (Part-II)</b>      | Origin and Mechanism of Monsoon – Traditional Concept (Halley's View) and Recent Concept (Role of Tibetan Plateau)  | Students will analyse the origin and mechanism of the Indian Monsoon.                                            |
| <b>October</b>   | 06           | <b>Soils</b>                  | Major Soil Types and their Distribution; Soil Degradation and Soil Conservation                                     | Students will classify the major soil types of India and evaluate soil conservation measures.                    |
| <b>October</b>   | 06           | <b>Forests</b>                | Major Forest Types and their Distribution; Deforestation and Forest Conservation                                    | Students will identify the major forest types of India and assess the need for forest conservation.              |

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**Department of Geography**

**Teaching Plan NEP 2020 (2024 Pattern)**

**Academic year - 2026-2027**

**Class – TYBA**

**Semester – V**

**Subject Code – GEO-303-MJP**

**Div- A**

**Credits - 04**

**Subject – Theory**

**Name of Subject – Practicals in Climatology and Soil Geography**

**Name of Subject Teacher - Prof. Dr. D. D. Muluk and Dr. D. M. Markad**

| Month     | Hours | Topic                                                | Sub Topics                                                                                                                                       | Learning Outcomes                                                                                                          |
|-----------|-------|------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------|
| July      | 08    | <b>Weather Instruments and Observation (Part-I)</b>  | Introduction to weather instruments; Measurement of Temperature, Atmospheric Pressure and Humidity; Recording and Interpretation of Weather Data | Students will identify weather instruments and accurately record basic weather elements.                                   |
| July      | 08    | <b>Weather Instruments and Observation (Part-II)</b> | Measurement of Rainfall, Wind Direction and Wind Speed; Preparation and Interpretation of Daily Weather Report                                   | Students will use weather instruments effectively and prepare weather observation records.                                 |
| August    | 08    | <b>Climatic Data Representation</b>                  | Preparation and Interpretation of Climograph, Hythergraph and Rainfall Graphs using climatic data                                                | Students will construct and interpret various climatic graphs for geographical analysis.                                   |
| August    | 08    | <b>Weather Maps and Climatic Analysis</b>            | Interpretation of Weather Maps; Identification of Pressure Systems, Wind Patterns and Weather Conditions                                         | Students will analyse weather maps and interpret prevailing atmospheric conditions.                                        |
| September | 08    | <b>Soil Profile and Soil Properties</b>              | Soil Profile; Physical and Chemical Properties of Soil; Soil Texture and Soil Structure                                                          | Students will identify soil horizons and explain important physical and chemical properties of soil.                       |
| September | 08    | <b>Soil Analysis Techniques</b>                      | Soil Sampling Methods; Determination of Soil Texture; Soil pH Testing and Interpretation                                                         | Students will perform basic soil analysis techniques and interpret soil characteristics.                                   |
| October   | 06    | <b>Soil Mapping and Classification</b>               | Soil Classification; Preparation and Interpretation of Soil Maps                                                                                 | Students will classify soils and interpret soil distribution maps effectively.                                             |
| October   | 06    | <b>Practical Record and Viva-Voce</b>                | Journal Completion, Practical Record Verification, Viva-Voce and Practical Revision                                                              | Students will demonstrate practical competency, maintain a certified journal and confidently explain practical procedures. |

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**Department of Geography****Teaching Plan NEP 2020 (2024 Pattern)****Academic year - 2026-2027****Semester – V****Div- A****Credits - 02****Class – TYBA****Subject Code – GEO-310-MJ****Subject – Theory****Name of Subject – Soil Geography****Name of Subject Teacher – Dr. D. M. Markad**

| <b>Month</b>     | <b>Hours</b> | <b>Topic</b>                                    | <b>Sub Topics</b>                                                                                                               | <b>Learning Outcomes</b>                                                                                                         |
|------------------|--------------|-------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------|
| <b>July</b>      | 08           | <b>Introduction to Soil Geography</b>           | Definition, Nature and Scope of Soil Geography; Factors of Soil Formation; Soil Profile and Soil Horizons                       | Students will explain the basic concepts of soil geography, factors of soil formation and identify different soil horizons.      |
| <b>August</b>    | 08           | <b>Physical and Chemical Properties of Soil</b> | Physical Properties – Texture, Structure, Colour and Porosity; Chemical Properties – Soil pH, Organic Matter and Soil Fertility | Students will describe the physical and chemical properties of soil and evaluate their significance in agriculture and land use. |
| <b>September</b> | 08           | <b>Soil Classification and Distribution</b>     | Soil Classification; Major Soil Types of the World and India; Soil Erosion and Soil Conservation                                | Students will classify different soil types, explain their distribution and analyse causes and control measures of soil erosion. |
| <b>October</b>   | 06           | <b>Soil Management and Sustainable Use</b>      | Soil Degradation; Soil Conservation Techniques; Sustainable Soil Management and Land Capability                                 | Students will evaluate soil degradation problems and recommend suitable soil conservation and sustainable management practices.  |

**Teaching Methods / Teaching Aids / ICT**

Lecture Method, Interactive Discussion, Question–Answer Method, Demonstration, Case Study, Group Discussion and Student Presentation supported by PowerPoint Presentations (PPT), Smart Board, LCD Projector, Soil Samples, Soil Profile Models, Soil Maps, Charts, Diagrams, Google Earth, FAO Soil Resources, Educational Videos and other online learning resources.



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**Department of Geography****Teaching Plan NEP 2020 (2024 Pattern)****Academic year - 2026-2027****Semester – V****Div- A****Credits - 02****Class – TYBA****Subject Code – GEO-312-MJP****Subject – Practical****Name of Subject – Practicals in Fundamentals of Mapping****Name of Subject Teacher – Prof. Dr. D. Muluk**

| <b>Month</b>     | <b>Hours</b> | <b>Topic</b>                                   | <b>Sub Topics</b>                                                                                           | <b>Learning Outcomes</b>                                                                                                                       |
|------------------|--------------|------------------------------------------------|-------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>July</b>      | 08           | <b>Introduction to Mapping</b>                 | Types of Maps; Elements of Maps; Scale, Direction and Conventional Signs                                    | Students will identify different types of maps and explain the essential components of map preparation and interpretation.                     |
| <b>August</b>    | 08           | <b>Map Scale and Measurement</b>               | Types of Scale; Conversion of Scales; Measurement of Distance and Area using Maps                           | Students will apply different map scales and accurately calculate distance and area from maps.                                                 |
| <b>September</b> | 08           | <b>Map Interpretation and Representation</b>   | Interpretation of Physical and Thematic Maps; Representation of Geographical Data using Symbols and Colours | Students will interpret different maps and represent geographical information using appropriate cartographic techniques.                       |
| <b>October</b>   | 06           | <b>Practical Mapping Exercises and Journal</b> | Preparation of Base Maps; Map Completion; Practical Record Writing; Journal Submission and Viva-Voce        | Students will prepare neat and accurate maps, maintain a practical journal and demonstrate proficiency in map interpretation and presentation. |

**Teaching Methods / Teaching Aids / ICT**

Demonstration Method, Hands-on Practical Work, Laboratory Exercises, Guided Practice, Group Activity, Problem Solving, Map Interpretation and Student Presentation supported by Topographical Maps, Thematic Maps, Atlas, Outline Maps, Graph Sheets, Drawing Instruments, Scale, Protractor, PowerPoint Presentations (PPT), Smart Board, LCD Projector, Google Earth, GIS-based Map Visualisation, Educational Videos and other digital learning resources.

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**Department of Geography****Teaching Plan NEP 2020 (2024 Pattern)****Academic year - 2026-2027****Class – TYBA****Semester – V****Subject Code – GEO-321-VSC Div-****A****Credits - 02****Subject – Theory****Name of Subject – Introduction to Tourism Geography****Name of Subject Teacher – Prof. Dr. D. Muluk**

| <b>Month</b>     | <b>Hours</b> | <b>Topic</b>                             | <b>Sub Topics</b>                                                                                                       | <b>Learning Outcomes</b>                                                                                                                                               |
|------------------|--------------|------------------------------------------|-------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>July</b>      | 08           | <b>Introduction to Tourism Geography</b> | Definition, Nature and Scope of Tourism Geography; Concepts of Tourism, Tourist and Excursionist; Types of Tourism      | Students will explain the basic concepts, nature, scope and significance of tourism geography and differentiate between various forms of tourism.                      |
| <b>August</b>    | 08           | <b>Tourism Resources</b>                 | Natural Tourism Resources; Cultural and Heritage Resources; Religious, Historical and Man-made Tourist Attractions      | Students will identify and classify different tourism resources and evaluate their geographical importance.                                                            |
| <b>September</b> | 08           | <b>Tourism Development and Impacts</b>   | Factors Affecting Tourism Development; Economic, Social and Environmental Impacts of Tourism; Sustainable Tourism       | Students will analyse the factors influencing tourism development and evaluate the positive and negative impacts of tourism with reference to sustainable development. |
| <b>October</b>   | 06           | <b>Tourism Planning and Promotion</b>    | Tourism Planning; Role of Government and Tourism Organisations; Tourism Marketing; Future Prospects of Tourism in India | Students will explain the importance of tourism planning and assess the role of tourism organisations in promoting sustainable tourism.                                |

**Teaching Methods / Teaching Aids / ICT**

Lecture Method, Interactive Discussion, Question–Answer Method, Case Study, Group Discussion, Seminar, Student Presentation and Audio-Visual Learning supported by PowerPoint Presentations (PPT), Smart Board, LCD Projector, Tourist Maps, Atlas, Photographs, Brochures, Google Earth, Virtual Tours, Government Tourism Portals, Educational Videos and other online learning resources.

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**Department of Geography****Teaching Plan NEP 2020 (2024 Pattern)****Academic year - 2026-2027****Class – TYBA****Semester – V****Subject Code – GEO-331-FP/CEP****Div- A****Credits - 02****Subject – Field Project****Name of Subject – Field Visit and Report Writing/ Engagement Programme****Name of Subject Teacher – Prof. Dr. D. Muluk**

| <b>Month</b>     | <b>Hours</b> | <b>Topic</b>                            | <b>Sub Topics</b>                                                                                                                                | <b>Learning Outcomes</b>                                                                                                                                   |
|------------------|--------------|-----------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>July</b>      | 08           | <b>Introduction to Field Work</b>       | Importance and Objectives of Field Visit; Types of Field Surveys; Planning and Organization of Field Work; Ethics and Safety Measures            | Students will understand the importance of geographical fieldwork, plan a field visit and follow ethical and safety practices during field investigations. |
| <b>August</b>    | 08           | <b>Field Data Collection Techniques</b> | Observation Method; Questionnaire and Schedule; Interview Techniques; GPS and Mobile-based Data Collection; Field Notes and Photography          | Students will apply appropriate field survey techniques and collect reliable primary geographical data.                                                    |
| <b>September</b> | 08           | <b>Field Survey and Data Analysis</b>   | Conduct of Field Visit; Data Compilation, Tabulation and Interpretation; Preparation of Maps, Graphs and Photographs; Analysis of Field Findings | Students will analyse field data, prepare geographical representations and interpret the results scientifically.                                           |
| <b>October</b>   | 06           | <b>Report Writing and Presentation</b>  | Structure of Field Report; Report Writing Format; Bibliography and References; Submission of Field Report; Seminar Presentation and Viva-Voce    | Students will prepare a scientific field report, present the findings effectively and demonstrate professional reporting and communication skills.         |

**Teaching Methods / Teaching Aids / ICT**

Orientation Lecture, Demonstration, Field Visit, Observation Method, Survey Method, Interview Technique, Group Discussion, Hands-on Training, Student Presentation and Report Writing supported by GPS, Mobile GIS Applications, Google Maps, Google Earth, Topographical Maps, Field Survey Schedule, Questionnaire, Camera, Measuring Tape, Compass, PowerPoint Presentations (PPT), Smart Board, LCD Projector, Charts, Field Notebook and other digital learning resources.

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Department of Geography

Teaching Plan NEP 2020 (2024 Pattern)

Academic year - 2026-2027

Semester – V

Div- A

Credits - 02

Class – TYBA

Subject Code – GEO-341-MN

Subject – Theory

Name of Subject – Environmental Geography

Name of Subject Teacher – Dr. D. M. Markad

| Month     | Hours | Topic                                                       | Sub Topics                                                                                                                                    | Learning Outcomes                                                                                                                                  |
|-----------|-------|-------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------|
| July      | 08    | <b>Introduction to Environmental Geography</b>              | Definition, Nature and Scope of Environmental Geography; Components of Environment; Ecosystem and Environmental Balance                       | Students will explain the concepts, components and significance of environmental geography and ecosystem functioning.                              |
| August    | 08    | <b>Natural Resources and Environmental Issues</b>           | Renewable and Non-renewable Resources; Resource Conservation; Air, Water, Soil and Noise Pollution; Causes and Effects                        | Students will identify different natural resources and analyse major environmental problems and their impacts.                                     |
| September | 08    | <b>Environmental Management and Sustainable Development</b> | Environmental Conservation; Sustainable Development; Environmental Impact Assessment (EIA); Environmental Protection Measures                 | Students will evaluate environmental management strategies and explain the principles of sustainable development.                                  |
| October   | 06    | <b>Climate Change and Environmental Policies</b>            | Climate Change; Global Warming; Environmental Acts and Policies; Role of National and International Organizations in Environmental Protection | Students will assess the impacts of climate change and explain the role of environmental policies and organizations in environmental conservation. |

Head of Department

