LORETO COLLEGE
SEMESTER ONE GEOGRAPHY
MINOR
TIME PLAN 2025

Name of the teacher: Dr. Sushma Sahai
Initials: SWS

Teaching Objective:

- To understand the relationship between seismic waves and Earth's internal structure
- To foster scientific reasoning and appreciation of Earth science
- To understand the nature of fluvial processes
- To analyze the formation of fluvial landforms
- To understand the nature and circulation of the atmosphere
- Comprehend the soil forming factors
- To enable students to understand the evolution of a soil profile
- To provide guidance beyond prescribed syllabus

Semester One Geography Minor Topic-wise Time Plan
COURSE: GEOG-CC-01-TH – PHYSICAL GEOGRAPHY

Topics	*Hours allotted*	*Topics (as per curriculum)*	*Teaching method*	*Learning outcome (output)*	*Assessment*
1	3	**Unit II: Geotectonics** 2. Seismic waves and internal structure of the earth	• Technology based learning	• Explain the different types of seismic waves and their properties • Differentiate between lithosphere, asthenosphere, mantle, outer core, and inner core based on seismic evidence • Connect the study of seismic waves to broader geophysical phenomena such as plate tectonics and volcanism	• Open book assessment
2	5	**Unit III: Geomorphology** 4. Fluvial processes and landforms	• Technology based learning		• Tutorial

3	4	**Unit IV: Climatology** 5. Nature, Composition and layering of the atmosphere	• Technology based learning • Asynchronous teaching • Blended learning	• Comprehend the physical and chemical composition of the atmosphere and its role in sustaining life on Earth. • Identify and describe the characteristics and functions of the different atmospheric layers	• Tutorial
4	5	6. Circulation in the atmosphere: Planetary winds, jet streams, index cycle	• Technology based learning • Blended learning	• Examine the mechanisms driving atmospheric circulation, including planetary wind systems and their global patterns. • Analyze the formation and index cycle of jet streams	• Open book assessment • Assignment
5	4.	**Unit V: Soil Geography** 7. Factors of soil formation	• Technology based learning • Asynchronous teaching • Group-Learning and teaching	• Understand and explain the major factors influencing soil formation • Analyze how the interaction of various soil-forming factors contributes to the development of different soil types	• Peer assessment
6	4	8. Evolution of an ideal soil profile	• Technology based learning • Blended	• Identify and describe the horizons of an ideal soil profile and their physical and chemical characteristics. • Evaluate the processes involved in the development and transformation of soil horizons over time.	• Case study • Assignment

LORETO COLLEGE
GEOGRAPHY TIME PLAN 2025

Semester 1 (Minor)

Name of the teacher: Dr. Ambika Roy Bardhan
Initials: A.R

Teaching Objective:

- Explain the concept of maps, scales and projections and their importance in Geography.
- Classify the various types of weathering with examples and the different agents of erosion.
- Analyse how water availability determines plant adaptations and distribution across the globe.
- Differentiate between hazards and disasters and classify them.

Topics	*Hours allotted*	*Topics (as per curriculum)*	*Teaching method*	*Learning outcome (output)*	*Assessment*
(Paper: GEOG-H-CC01/MD-CC01-1/3-Th -Physical Geography)					
Plant adaptation and distribution in relation to water availability	1 hour 30 minutes	9. Plant adaptation and distribution in relation to water availability	**. Group Learning and Teaching** **. Technology based learning**	. Classify various types of plants according to water availability. . Identify the various types of plants adaptations and their distributions based on water availability	**Assignments**
Nature and classification of hazards and disasters in Indian context	1 hour 30 minutes	10. Nature and classification of hazards and disasters in Indian context	**. Group Learning and Teaching** **. Technology based learning**	. Distinguish between Hazard and Disaster . Explain the concepts and the relationships among Risk, Vulnerability and Capacity. . Classify Hazards and Disasters in the Indian context.	**Assignments**

(Paper: GEOG-H-CC01/MD-CC01-1/3-P -Physical Geography)					
Linear Scale	3 hours	1.Graphical Construction of Scales: Plain, Comparative, Diagonal, and Vernier	**Learning through problem solving**	. Define the various types of scales . List the properties of different types of scales . Infer the merits and demerits of various types of scales. . Differentiate among the various types of scales . Calculate and draw linear scale	**Assignments**
Vernier Scale	3 hours	1.Graphical Construction of Scales: Plain, Comparative, Diagonal, and Vernier	**Learning through problem solving**	Calculate and draw vernier scale	**Assignments**
Drainage patterns	1 hour 30 minutes	3. Identification of drainage and channel patterns from Survey of India 1:50k topographical maps.	**. Experiential Learning** **. Learning through problem solving**	. Identify different types of drainage patterns . Draw different types of drainage patterns	**Assignments**
Channel patterns	1 hour 30 minutes	3. Identification of drainage and channel patterns from Survey of India 1:50k topographical maps.	**. Experiential Learning** **. Learning through problem solving**	. Identify different types of channel patterns . Draw different types of channel patterns	**Assignments**