



SECOND-YEAR OF BACHELOR OF ARTS MAJOR GEOGRAPHY REVISED SYLLABUS ACCORDING TO CBCS NEP2020

COURSE TITLE: INTRODUCTION TO OCEANOGRAPHY
SEMESTER-IV, W.E.F. 2024-2025

**RECOMMENDED BY THE BOARD OF STUDIES IN GEOGRAPHY
AND
APPROVED BY THE ACADEMIC COUNCIL
Devrukh Shikshan Prasarak Mandal's
Nya. Tatyasaheb Athalye Arts, Ved. S. R. Sapre Commerce, and
Vid. Dadasaheb Pitre Science College (Autonomous), Devrukh.
Tal. Sangmeshwar, Dist. Ratnagiri-415804, Maharashtra, India**

Academic Council Item No: 03

Name of the Implementing Institute	:	Nya. TatyasahebAthalye Arts, Ved. S. R. Sapre Commerce, and Vid. DadasahebPitre Science College (Autonomous), Devrukh. Tal.Sangmeshwar, Dist. Ratnagiri-415804,
Name of the Parent University	:	University of Mumbai
Name of the Programme	:	Bachelor of Arts
Name of the Department	:	Geography
Name of the Class	:	Second Year
Semester	:	Fourth
No. of Credits	:	04
Title of the Course	:	Introduction to Oceanography
Course Code	:	A203GET
Name of the Vertical in adherence to NEP 2020	:	Major and Minor
Eligibility for Admission	:	
Passing Marks	:	40%
Mode of Assessment	:	Formative and Summative
Level	:	UG
The pattern of Marks Distribution for TE and CIA	:	60:40
Status	:	NEP-CBCS
To be implemented from the Academic Year	:	2023-2024
Ordinances/Regulations (if any)		

Syllabus for Second Year of Bachelor of Arts in Geography

(With effect from the academic year 2024-2025)

SEMESTER-IV

Paper No.– I

Course Title: Introduction to Oceanography

No. of Credits - 04

Type of Vertical: Major and Minor

COURSE CODE: A203GET

Learning Outcomes Based on BLOOM’s Taxonomy:

After completing the course, the learner will be able to...		
Course Learning Outcome No.	Blooms Taxonomy	Course Learning Outcome
CLO-01	Remember	Remember the fundamentals of Oceanography & basic oceanic processes
CLO-02	Understand	Understand the basics of Ocean’s physical, Chemical, Biological and geological processes
CLO-03	Apply	Apply the oceanographic principles to real-world scenarios
CLO-04	Analyze	Analyze the oceanographic processes and interaction between the ocean and the atmosphere
CLO-05	Evaluate	Evaluate the changing nature & scope of Oceanography
CLO-06	Create	Create models; and develop innovative solutions to address challenges in oceanography, such as proposing sustainable practices for marine resource management.

Syllabus for Second Year of Bachelor of Arts in Geography
(With effect from the academic year 2024-2025)

SEMESTER-IV**Paper No.–Geography Paper –I****Course Title: Introduction to Oceanography****No. of Credits - 04****Type of Vertical: Major and Minor****COURSE CODE: A203GET**

COURSE CONTENT			
Module No.	Content	Credits	No. of Lectures
1	Introduction to Oceanography <ul style="list-style-type: none"> ○ Origin and Development of Oceanography ○ Definition, nature and scope of Oceanography ○ Branches of oceanography: physical chemical and biological ○ Major Oceans and its characteristic features ○ Ocean floor and its characteristics ○ Oceans and global climate change 	01	15
2	Ocean Water Composition <ul style="list-style-type: none"> ○ Composition of ocean water ○ Factors affecting ocean water temperature ○ Vertical and horizontal distribution of ocean temperature ○ Factors affecting the salinity of ocean water ○ Vertical and horizontal distribution of oceanic salinity ○ Factors affecting the Density of ocean water and its Distribution 	01	15
3	Movements of Ocean Water <ul style="list-style-type: none"> ○ Waves- Formation and types ○ Tsunamis and their effects on the coast ○ Concept and types of Tides ○ Equilibrium theory of Tides ○ Ocean Currents – types and their effects ○ El- Niño and La-Niña phenomenon and its impact on Indian Monsoon 	01	15
4	OCEANIC DATA ANALYSIS <ul style="list-style-type: none"> ○ Distance measurement on the Ocean Surface: ○ Map filling: Related to Oceanography ○ Signs and Symbols used on Navigation Charts and bathymetric maps ○ Creation of Isohalines Map ○ Reading and Interpretation of navigation charts and bathymetric maps ○ Measurement of Ocean water temperature, salinity and density 		
	Total	04	60

Required Previous Knowledge

For the study of the theoretical component of the course, any previous knowledge is not required but for the practical component, the basic knowledge graph preparation is necessary.

Access to the Course

The course is available for all the students admitting for Bachelor of Arts and selected Geography as an optional subject and cleared the lower examination or eligible for the admission in the class as per the rules and regulations.

Methods of Assessment:

The assessment pattern would be 60:40, 60% for Semester End Examination (SEE) and 40 % for Continuous Internal Assessment (CIA). The structure of the SEE and CIA would be as recommended by the Board of Studies and approved by the Board of Examination and the Academic Council of the college.

Grading Scale

The grading scale used is O to F. Grade O is the highest passing grade on the grading scale, and grade F is a fail. The Board of Examinations of the college reserves the right to change the grading scale.

References:

Reference books:-

1. Bhatt, J.J. 91978): Exploring the Planet Ocean, D.Von Nostrand Co. New York.
2. Birla Economic Research Foundation, Economic Research Division 91992): The Oceans, Allied Publishers Ltd. New Delhi.
3. Chandra, S., and Others (eds). (1993): The Indian Ocean and its islands: Strategic Scientific and Historical perspectives, Sage Publications, New Delhi.
4. Chawan S.V. (ed) (2015): Physical Geography, Paper I, Published by Director (I/C), Institute of Distance and Open Learning, University of Mumbai.
5. Fairbridge, R.W. (ed) Encyclopedia of Oceanography, Reinholt, New York.
6. Sharma, R.C. (ed)(1985): The Oceans: Realities and Prospects, Rajesh Publications, New Delhi.
7. Sengupta, R., and Desa E,(eds) (2001): The Indian Ocean: A Perspective Vol., I and II

Oxford and IBH Publishing Company Private Limited, New Delhi.

8. Paul, P.R.(1998): Invitation to Oceanography, Jones and Bartlett Publishing, Sudbury, Massachusetts.
9. Rajagopalan, R (ed) (1996): Voices for Oceans, A Report to the Independent World Commission on the Oceans, International Ocean Institute, Operational center, Madras, India.
10. Qasim, S.Z(1998): Glimpses of Indian Ocean, Universities Press(India) Limited, Hyderabad.