



TECHNO INDIA UNIVERSITY
WESTBENGAL

Syllabus for 2- Years M.Sc. in Oceanography



Department of Oceanography

Techno India University, West Bengal

**EM-4, EM Block, Sector V, Bidhannagar,
Kolkata, West Bengal 700091**



M.Sc. in Oceanography
Course Curriculum for All Semester

Semester I

Sl. No.	Course Code	Course Title	Contact Hrs. / Week			Credit	Page No.
			L	T	P		
Theory							
1	TIU-POG-T101	Introductory Physical Oceanography	00	04	00	04	
2	TIU-POG-T103	Fundamentals of Chemical Oceanography	00	03	00	03	
3	TIU-POG-T105	Fundamentals of Marine Geology	00	04	00	04	
4	TIU-POG-T107	Basics of Biological Oceanography	00	03	00	03	
Practical							
1	TIU-POG-L101	Introductory Physical Oceanography – Practical	00	00	01	01	
2	TIU-POG-L103	Fundamentals of Chemical Oceanography – Practical	00	00	02	02	
3	TIU-POG-L105	Fundamentals of Marine Geology – Practical	00	00	01	01	
4	TIU-POG-L107	Basics of Biological Oceanography – Practical	00	00	02	02	
1	TIU-POG-P101	Scientific Report Writing and Seminar	00	00	05	05	
Total Credit						25	



Semester II

Sl. No.	Course Code	Course Title	Contact Hrs. / Week			Credit	Page No.
			L	T	P		
Theory							
1	TIU-POG-T100	Dynamic Oceanography and Fluid Mechanics and Basic Environmental Statistics	00	03	00	03	
2	TIU-POG-T102	Marine and Atmospheric Chemistry	00	03	00	03	
3	TIU-POG-T104	Basics of Blue Economy	00	03	00	03	
4	TIU-POG-T106	Marine Ecology	00	04	00	04	
Practical							
1	TIU-POG-L100	Dynamic Oceanography and Fluid Mechanics and Basic Environmental Statistics – Practical	00	00	02	02	
2	TIU-POG-L102	Marine and Atmospheric Chemistry - Practical	00	00	02	02	
3	TIU-POG-L104	Basics of Blue Economy – Practical	00	00	02	02	
4	TIU-POG-L106	Marine Ecology – Practical	00	00	01	01	
1	TIU-POG-S100	Entrepreneurship Skill Development / ESD	00	00	05	05	
Total Credit						25	



Semester III

Sl. No.	Course Code	Course Title	Contact Hrs. / Week			Credit	Page No.
			L	T	P		
Theory							
1	TIU-POG-T201	Meteorology, Remote Sensing and GIS	00	03	00	03	
2	TIU-POG-T203	Marine Biogeochemistry	00	04	00	04	
3	TIU-POG-T205	Coastal Geomorphology and ICZM	00	04	00	04	
4	TIU-POG-T207	Marine Microbiology and Marine Pollution	00	03	00	03	
5	TIU-POG-T209	Aquaculture and Fisheries Management	00	03	00	03	
Practical							
1	TIU-POG-L201	Meteorology, Remote Sensing and GIS – Practical	00	00	02	02	
2	TIU-POG-L203	Marine Biogeochemistry – Practical	00	00	01	01	
3	TIU-POG-L205	Coastal Geomorphology and ICZM – Practical	00	00	01	01	
4	TIU-POG-L207	Marine Microbiology and Marine Pollution – Practical	00	00	02	02	
5	TIU-POG-L209	Aquaculture and Fisheries Management – Practical	00	00	02	02	
Total Credit						25	



Semester IV

Sl. No.	Course Code	Course Title	Contact Hrs. / Week			Credit	Page No.
			L	T	P		
Theory							
1	TIU-POG-T200	Marine Laws and Policies	00	02	00	02	
2	TIU-POG-T202	Advances in Chemical Oceanography	00	02	00	02	
3	TIU-POG-T204	Advances in Biological Oceanography	00	04	00	04	
1	TIU-POG-D200	Special Paper Dissertation	00	00	10	10	
2	TIU-POG-P200	Project and Field Work	00	00	06	06	
Total Credit						24	

Special Paper Dissertation Areas:

1. Climate Change
2. Marine Pharmacy
3. Marine Food and Sea-based Industry
4. Marine Resources
5. Mangrove-based Livelihood
6. Marine Pollution
7. Alternative Livelihood