

STELLA MARIS COLLEGE (AUTONOMOUS), CHENNAI 600 086
(For candidates admitted during the academic year 2023 – 2024)

B. Sc. DEGREE EXAMINATION, APRIL 2026
BRANCH VI.A. ADVANCED ZOOLOGY & BIOTECHNOLOGY
SIXTH SEMESTER

COURSE : MAJOR ELECTIVE
PAPER : INTRODUCTION TO MARINE BIOLOGY
SUBJECT CODE : 23ZL/ME/IB45
TIME : 3 HOURS **MAX. MARKS: 100**

Q.No	SECTION A	CO	KL
	Answer all questions (10 x 2 = 20)		
1.	Comment on echo sounder.	CO1	K1
2.	Illustrate the topography of the sea floor.	CO1	K1
3.	List any two characteristic features of kelp forests.	CO1	K1
4.	Name any two divisions of the intertidal zone.	CO1	K1
5.	What are marine biofoulers? Give examples.	CO1	K1
6.	Name any two invasive species that threaten the marine ecosystem.	CO1	K1
7.	List the two types of mariculture.	CO1	K1
8.	Name any two marine ornamental fishes.	CO1	K1
9.	What are mussel adhesive proteins?	CO1	K1
10.	Give two examples of drugs extracted from marine sources.	CO1	K1
	SECTION B	CO	KL
	Answer all questions (10 x 2 = 20)		
11.	What is an Exclusive Economic zone?	CO2	K2
12.	Differentiate between waves and tsunamis.	CO2	K2
13.	Comment on epipelagic zone.	CO2	K2
14.	List any two adaptations of sea otters.	CO2	K2
15.	State the chemistry of ocean acidification.	CO2	K2
16.	Highlight any two impacts of oil spill in the marine ecosystem	CO2	K2
17.	Mention any two requirements for mariculture.	CO2	K2
18.	Comment on marine protected areas.	CO2	K2
19.	Write any two applications of marine thermostable enzymes.	CO2	K2

20.	Differentiate between tetrodotoxin fish poisoning and ciguatera fish poisoning.	CO2	K2
	SECTION C Answer any two questions (2x10=20)	CO	KL
21.	Summarise the characteristic features of nektons.	CO3	K3
22.	Explain the ways sewage enters the ocean. Add a note on the impact of sewage in the marine ecosystem.	CO3	K3
23.	Explain how oceanic currents are generated.	CO3	K3
	SECTION D Answer any two questions (2x15=30)	CO	KL
24.	Explain in detail the marine fossils with suitable examples.	CO4	K4
25.	Analyse the adaptations and behaviour of sea birds with suitable examples.	CO4	K4
26.	Discuss in detail plastic pollution and its impact on marine biodiversity.	CO4	K4
	SECTION E Answer any two questions (2x5=10)	CO	KL
27.	Highlight the major challenges in Mariculture.	CO5	K5
28.	Evaluate the significance of Probiotic bacteria in aquaculture.	CO5	K5
29.	“Hydrothermal vents are an oasis of life”. Justify.	CO5	K5
