

**BACHELOR OF SCIENCE IN MARINE ENGINEERING (BSMarE)**

Effectivity: Academic Year 2023-2024

Program of Study (3-1)

**FIRST YEAR**

**FIRST SEMESTER**

Subject Code	Description	Units	Grade	Completion	Pre-requisite(s)
BSC 1	Being Skills Course 1	1.5			
Draw	Maritime Drawing and Diagrams	1			
Electro 1	Basic Electricity	4			
EMat	Engineering Materials	4			
GYMATHICS 1	Basic Gymathics	3			
Mach 1	Hand and Measuring Tools	2			
NGEC 4	Mathematics in the Modern World	3			
NGEC 5	Purposive Communication	3			
NGEC 9	Math, Sciences and Technology	3			
NSTP 1	National Service Training Program 1	3			
PathFit 1	Movement Competency Training	2			
		<b>29.5</b>			

**SECOND SEMESTER**

Subject Code	Description	Units	Grade	Completion	Pre-requisite(s)
BSC 2	Basic Skills Course 2	1.5			
Electro 2	Basic Electronics	3			Electro 1
EPC	English Proficiency Course	3			
GYMATHICS 2	Advance Gymathics	3			Gymathics 1
IChem	Industrial Chemistry and Tribology	3			
ICT	Software Applications and Network System used in Seagoing Ships	2			
Mach 2	Machining Tools	2			EMat, Mach 1
Mech	Mechanics and Hydromechanics	3			NGEC 9
NSTP 2	National Service Training Program 2	3			
PathFit 2	Exercise-Based Fitness Activities	2			PathFit 1
Thermo	Thermodynamics	3			NGEC 9
		<b>28.5</b>			

**SECOND YEAR**

**FIRST SEMESTER**

Subject Code	Description	Units	Grade	Completion	Pre-requisite(s)
Auto 1	Basic Contol Engineering	4			Electro 2, Mech
Aux Mach 1	Auxiliary Machinery 1	5			Thermo, Ichem, Mech, Mdraw, Mach 1
Electro 3	Marine Electricity and Electrical Maintenance	5			Electro 2
Mach 3	Gas and Electric Welding	2			Mach 1, EMat
MarEnv	Protection of the Marine Environment	3			
Mgmt	Leadership and Teamwork	3			
MTP 1	Maritime Training Program 1 (Technical Writing 1)	3			
NGEC 6	Art Appreciation	3			
PathFit 3	Outdoor Activities (Basic Swimming)	2			PathFit 2
		<b>30</b>			

**SECOND SEMESTER**

Subject Code	Description	Units	Grade	Completion	Pre-requisite(s)
Auto 2	Marine Automation	4			Auto 1
Aux Mach 2	Auxiliary Machinery 2	5			Aux Mach 1, Electro 3
Mar Law	Maritime Law	4			
MTP 2	Maritime Training Program 2 (Technical Writing 2)	3			
Nav Arch	Naval Architecture for Marine Engineering	2			NGEC 9
NGEC 1	Understanding the Self	3			
NGEC 7	Science, Technology, & Society	3			
NGEC 8	Maritime Ethics	3			
PathFit 4	Outdoor Activities (Advance Swimming)	2			PathFit 3
		<b>29</b>			

SECOND YEAR-SUMMER					
BT	Basic Training	0			
SDSD	Ship Security Awareness Training and Seafarers with Designated Security Duties	0			

THIRD YEAR					
FIRST SEMESTER					
Subject Code	Description	Units	Grade	Completion	Pre-requisite(s)
FL	Foreign Language	3			
MRC 1	Maritime Review Course 1	3			
MTP 3	Maritime Training Program 3 (Entrepreneurship)	3			
NGEC 2	Readings in the Philippine History	3			
NGEC 3	The Contemporary World	3			
PASGT	Propulsion Ancillary System and Gas Turbine	3			Thermo, Aux Mach 1, Auto 2
PPD	Power Plant Diesel	5			
PPS	Power Plant Steam	6			
		29			

SECOND SEMESTER					
Subject Code	Description	Units	Grade	Completion	Pre-requisite(s)
Ewatch	Engine Watch Keeping	4			AuxMach 1, MarLaw, MarEnv, PPD, PPS, PASGT, MGMT
Maint	Maintenance and Repair	3			AuxMach 2, PPD, PPS, PASGT, Mach 2, Mach 3, Nav Arch
MRC 2	Maritime Review Course 2	3			Compre 2
MTP 4	Maritime Training Program 4 (OBT Preparation)	3			
NGEC 10	Social Sciences and Philosophy	3			
NGEC 11	Arts and Humanities	3			
Rizal	The Life and Works of Dr. Jose Rizal	3			
		22			

FOURTH YEAR					
COMPRE	Exit Competency Assessment (Comprehensive Exam and Practical Assessment)	0			
OBT	Onboard Training	40			BT, SDSD
SBTE	Shipboard Training Enrichment	0			
	Total Units for BSMarE	40			

Summary of Courses	Units
General Education Courses	50
Professional Courses	85
Enhancement Courses	33
Shipboard Training	40
Total	208