

MSURABAYA

INOVASI



SEJUTA

KAMPUS



MSURABAYA



**PROSPECTUS FOR FOREIGN STUDENTS  
DEPARTEMENT OF NAVAL ARCHITECTURE  
FACULTY OF ENGINEERING  
UNIVERSITAS MUHAMMADIYAH SURABAYA  
2023/2024**

**Accreditation Status: B**

**VISION**

"Transforming into an outstanding academic program in the field of Naval Engineering, grounded in the development of ship production management based on intellectuality, morality, and entrepreneurial spirit."

**MISSION**

1. Conducting education and learning in Naval Engineering that excels in innovation and entrepreneurial spirit.
2. Organizing research and publications that contribute to science, technology, and innovation in the field of Naval Engineering and Maritime Industry.
3. Providing community service based on research and innovation in Naval Engineering and Maritime Industry.
4. Nurturing and developing the academic community of Naval Engineering based on the values of Al Islam and Kemuhammadiyah.
5. Establishing collaboration and governance based on the principles of good governance.

## Graduate Profile

PROFILE	PROFILE DESCRIPTION
Technopreneur	Entrepreneurs providing services in the fields of planning, supervision, and execution of construction, or entrepreneurs engaged in buying and selling activities or services in the maritime sector, such as coating services, blasting, and the like.
Surveyor Boat	Expert in the field of ship surveying, encompassing routine surveys and vessel damage assessments. Conducts testing of equipment and ship provisions related to ship class certifications, both hull and machinery, which are essential for purposes of vessel chartering, buying and selling, as well as ship insurance.
Engineer	Expert project implementer for ship construction responsible for coordinating the construction according to predetermined specifications. Proficient in ship design, possessing knowledge in ship design and construction, and creating ship designs according to the owner's desired specifications with considerations for technical, economic, and maritime safety aspects.
Researcher	A young scientist who is interested in advancing the field of naval architecture and is prepared to participate in a Master's level educational program.

**LIST OF COURSES 2023**  
**DEPARTMENT OF NAVAL ARCHITECTURE**  
**FACULTY OF ENGINEERING**  
**UNIVERSITAS MUHAMMADIYAH SURABAYA**

**First Year**  
**Semester I**

Course	Code	SKS
Mathematics 1	20WP2713G14	3
Basic Physics 1	20WP2713G15	3
Fundamentals of Computers & Programming	20WP2713G16	2
Theory of Ship Structures 1	20WP2713G17	2
Technical Drawing	20WP2713G18	2
Introduction to Maritime Technology	20WP2713G19	2
Pancasila Education	20WU2713G02	2
Indonesian Language Education	20WU2713G04	3
Total Credits		19

**Semester 2**

Course	Code	SKS
Islam and Muhammadiyah 1 (AIK 1)	20WI2713G05	2
English Language	20WI2713G10	2
Material Technology and Mechanics	20WP2713G20	2
Engineering Mechanics	20WP2713G21	2
Line Plan Assignment	20WP2713G22	2
Ship Structure Theory 2	20WP2713G24	2
Mathematics 2	20WP2713G25	3
Basic Physics 2	20WP2713G26	3
Civic Education	20WU2713G03	2
Total Credits		20

**Semester 3**

Course	Code	SKS
Islam and Kemuhammadiyah 2 (AIK 2)	20WI2713G06	2
Life Sciences	20WP2713G63	2
Mathematics 3	20WP2713G27	3
Ship Design	20WP2713G28	2
Chemistry	20WP2713G29	3
Statistics	20WP2713G30	2
Ship Construction and Strength 1	20WP2713G31	2
Ship Equipment	20WP2713G32	2
Welding Technology	20WP2713G33	2
Ship Machinery	20WP2713G66	2
Total Credits		22

**Semester 4**

<b>Course</b>	<b>Code</b>	<b>SKS</b>
Islamic and Kemuhammadiyah 3 (AIK 3)	20WI2713G07	2
Marine System	20WP2713G35	2
Ship Resistance and Propulsion	20WP2713G36	2
Theory and Application of Optimization	20WP2713G37	2
Mathematics 4	20WP2713G38	3
Computer-Aided Design (CAD)	20WP2713G40	2
Ship Dynamics	20WP2713G50	2
Ship Construction and Strength 2	20WP2713G42	2
Welding Practicum	20WP2713G43	1
Marine Business	20WP2713G56	2
Total Credits		20

**Semester 5**

<b>Course</b>	<b>Code</b>	<b>SKS</b>
Islam and Kemuhammadiyah 4 (AIK 4)	20WI2713G08	2
Theory and Application of Finite Elements	20WP2713G44	2
Ship Production Technology 1	20WP2713G45	2
Ship Production with Computers	20WP2713G46	2
Safety Management	20WP2713G47	2
Ship Production Management	20WP2713G48	2
Quality Management	20WP2713G64	2
Risk Management	20WP2713G50	2
Capstone Project I - Design Task 1	20WP2713G51	3
Ship Production Practicum with Computers	20WP2713G52	1
Total Credits		20

**Semester 6**

<b>Course</b>	<b>Code</b>	<b>SKS</b>
Cooperative Work Program for Business and Management	20WI2713G12	4
Practical Work	20WP2713G53	2
Research Methodology	20WP2713G54	2
Ship Production Technology 2	20WP2713G55	2
Logistics Management	20WP2713G65	2
Welding Inspection	20WP2713G57	2
Inspection Practicum	20WP2713G58	1
Capstone II Design Task 2	20WP2713G59	3
Elective Course 1		2

Elective Course 2	2
<b>Total Credits</b>	<b>22</b>

### Semester 7

Course	Code	SKS
Arabic	20WI2713G09	2
Basic Entrepreneurship	20WI2713G11	2
Project management	20WP2713G64	2
Ship Production Tasks	20WP2713G61	2
Design Task 3	20WP2713G62	3
Elective course 4		2
Elective course 5		2
<b>Total Credits</b>		<b>15</b>

### Semester 8

Course	Code	SKS
Thesis	20WI2713G14	6
Elective courses 7		2
Elective courses 8		2
<b>Total Credits</b>		<b>10</b>

### FINAL PROJECT PROCESS

The execution of the final assignment commences in the 7th semester, subject to the prerequisite of having completed the Research Methodology course. The potential topics that can be pursued for the final assignment encompass Ship Production Management and Technology, Ship Machinery, Inspection and Welding, Ship Design and Planning, Eco Vessel, as well as other topics pertinent to the field of maritime engineering.

### Learning Facilities

The facilities and infrastructure within the Bachelor's Degree Program in Naval Engineering are integral components of Muhammadiyah's own charitable endeavor, overseen and developed by the University of Muhammadiyah Surabaya. These include: highly representative lecture halls, each equipped with teaching aids (LCD, AC, White Board, Wifi, E-learning), with an average seating capacity of 60 students per class. The program offers comprehensive laboratory facilities equipped with tools tailored to students' competencies and ratios. Abundant

faculty members and additional amenities such as a library, office spaces, and a student center



are also available.

#### Outdoor Discussion Room

### **EXCELLENT AND SUPERIOR PROGRAM**

The Bachelor's Degree Program in Naval Architecture Engineering offers a distinguished program, namely the Welding and Inspection competency, in collaboration with PT. Kampuh Welding Indonesia and The Welding Institute, for the implementation of competency certification related to welding and inspection.



**LABORATORIES**  
**DEPARTMENT OF NAVAL ARCHITECTURE**  
**FACULTY OF ENGINEERING**  
**UNIVERSITAS MUHAMMADIYAH SURABAYA**

**Laboratory Learning Support Facilities**

Laboratory of Inspection and Welding  
Laboratory of Ship Design & Engineering

Computational Laboratory  
Ship Production Laboratory  
Basic Physics Laboratory  
Internal Combustion Engine Laboratory

**PARTNER FOREIGN UNIVERSITIES**

Asia University  
University Teknologi Petronas  
University Tun Husein Onn  
The Welding Institute

**PARTNER INDUSTRY WHERE PRACTICE**

PT.PAL Indonesia  
PT. Adiluhung Sarana Segara Indonesia  
PT. Ouneer Indonesia Group  
PT.Surabaya Marine  
PT.Dok & Perkapalan Surabaya



## STUDENT EXCELLENCE ACHIEVEMENTS

National Unmanned Speedboat Contest 2019 National FERC Finalist	National Unmanned Speedboat Contest 2019 National FERC Finalist
2020 National Unmanned Speedboat Contest 3rd Place in Hospital Ship Design	2020 National Unmanned Speedboat Contest 3rd Place in Hospital Ship Design
Unmanned speed boat contest 2021 FERC National Finalist	Unmanned speed boat contest 2021 FERC National Finalist
Indonesian Innovation Talents TA Funding Grants	Indonesian Innovation Talents TA Funding Grants
best graduate of engineering faculty best graduate of FT	best graduate of engineering faculty best graduate of FT
Singapore from your home Passed Selection	Singapore from your home Passed Selection

## FEES

No	Items	Amount / Period	Information
1	Tuition Fee	\$ 350 / semester	Not Covered by University
2	Development Fee	\$ 450 / study	Not Covered by University
3	Laboratory and site visit	\$ 350 / semester	Not Covered by University
4	Bahasa Indonesia Course for Foreigners	\$ 375 / 3 months	Covered by University
5	Judicium and Graduation	\$ 100 / study	Covered by University
6	Registration Form	\$ 75 / study	Covered by University
7	Visa and non-permanent residential Permit	\$ 375 / study	Not covered by University
8	University Jacket, Id, Laboratory Suit	\$ 75 / study	Covered by University
9	Housing	\$ 100 / month	Not Covered by University
10	OSCE and Clinic/hospital practicum	\$ 570 / study	Not Covered by University
11	Journal access, library, and books	\$ 120 / semester	Covered by University
12	Seminar and Final Report	\$ 150 / study	Covered by University
13	Community Service	\$ 140 / study	Covered by University
14	English and Computer Laboratory	\$ 50 / Semester	Covered by University

**TOTAL**

**Amount Covered by UMSurabaya : \$ 1,935**

**Amount Covered by Students : \$ 9,195**

**Alumni workplace distribution**

PT.Pal Indonesia

PT.Adiluhung Sarana Segara Indonesia

Biro Klasifikasi Indonesia

PT.Gapura Surabaya

Dlyoid Register

PT. Dok Perkapalan Lamongan

VISIT US:

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