Program Change Request

Date Submitted: 11/02/18 6:02 am

Viewing: BS-MARR-LIO : Marine Engineering Technology - BS, License Option

Last approved: 03/05/18 4:47 pm

Last edit: 11/08/18 8:04 pm

Changes proposed by: carrollm

Catalog Pages Using this Program: Marine Engineering Technology - BS, License Option

Contact(s)

Name	E-mail	Phone
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Matthew Carroll	**carrollm@tamug.edu**	**409-740-4473**

Academic level	Undergraduate
Effective Term	2019-2020 Galveston
Department	Marine Engineering Technology
College	Galveston Campus
Program type	Degree w/Concentration
Degree designation	BS - Bachelor of Science
With a major in	Marine Engineering Technology (MARR)
Associated Program	**Not Applicable**
With a concentration in	License Option (LIO)

Catalog Program Title

Marine Engineering Technology - BS, License Option

CIP and Fund code 14220100

Rationale for Proposal

Program adjustment to accommodate the new physics courses offered by the Department of Physics and Astronomy. Also, MART prefix is added to those prefixes allowed for the technical elective due to the existence of several MART courses useful for MARR majors. ~~The faculty of the Department of Marine Engineering Technology has conducted their annual review of the MARR curriculum and propose a number of changes, based on the evolving needs in the marine industry, advice by our Industrial Advisory Board, changes in College Station course offerings, and input from recently hired faculty members.Courses have been shifted between semesters, the scope for electives has been broadened, and two new courses have been added to replace ENGR 111 and ENGR 112 which are being discontinued.To clarify licensing option degree requirements to align with federal regulations.~~

Program hours	137
Is this program eligible for financial aid?	Yes

In Workflow

1. **MARE Department Head**
2. **Curricular Services Review**
3. **GV Committee Preparer UG**
4. **GV Committee Chair UG**
5. **GV College Dean UG**
6. **UCC Preparer**
7. **UCC Chair**
8. **Faculty Senate Preparer**
9. Faculty Senate
10. Provost II
11. President
12. Curricular Services

Approval Path

1. 10/23/18 10:47 am Matthew Carroll (carrollm): Approved for MARE Department Head
2. 10/25/18 4:54 pm Angel Mario Carrizales (carri1214): Rollback to Initiator
3. 11/02/18 6:03 am Matthew Carroll (carrollm): Approved for MARE Department Head
4. 11/06/18 6:02 pm Angel Mario Carrizales (carri1214): Approved for Curricular Services Review
5. 11/07/18 8:56 am Meredith Zalesak (zalesakm): Approved for GV Committee Preparer UG
6. 11/07/18 3:29 pm Donna Lang (langd): Approved for GV Committee Chair UG
7. 11/07/18 3:33 pm Donna Lang (langd): Approved for GV College Dean UG
8. 11/08/18 8:23 am Sandra Williams (sandra-williams): Approved for UCC Preparer
9. 12/10/18 10:46 am Terra Bissett (t.bissett):

Will program hours change (increase/decrease) due to the proposed curriculum changes?	No
Program delivery mode	On-campus

Approved for UCC Chair

History

1. Mar 6, 2017 by Steve Bentz (bentzs)
2. Apr 20, 2017 by Angel Mario Carrizales (carri1214)
3. Sep 25, 2017 by Angel Mario Carrizales (carri1214)
4. Mar 5, 2018 by Steve Bentz (bentzs)

Catalog Program Requirements

Plan of Study Grid

First Year		
Fall		Semester Credit Hours
CHEM 107	General Chemistry for Engineering Students	3
CHEM 117	General Chemistry for Engineering Students Laboratory	1
ENGL 104	Composition and Rhetoric	3
MARR 101	Marine Engineering Fundamentals 1, 2	2
MART 103	Basic Safety and Lifeboatman Training 2	3
MATH 151	Engineering Mathematics I 3	4
	Semester Credit Hours	16
Spring		
MARE 111	Methods in Engineering Technology 1	2
MARE 242	Manufacturing Methods I 1,2	2
MARR 102	Engine Room Resource Management and Dynamics	1
MATH 152	Engineering Mathematics II	4
~~PHYS 218~~	~~Mechanics~~	~~4~~
PHYS 206	**Newtonian Mechanics for Engineering and Science**	**4**
& PHYS 226	**and Physics of Motion Laboratory for the Sciences**	
American history		3
	Semester Credit Hours	16
Summer		
MARE 200	Basic Operations 1,2	4
or MARR 200	or Basic Operations	
	Semester Credit Hours	4
Second Year		
Fall		
MARE 112	Graphics for Engineering Technology 1	2
MARE 202	Marine Thermodynamics 1 3	3
MARE 205	Engineering Mechanics I 1,3	3
MARE 243	Manufacturing Methods II 1 2	1
~~PHYS 208~~	~~Electricity and Optics~~	~~4~~
PHYS 207	**Electricity and Magnetism for Engineering and Science**	**4**
& PHYS 227	**and Electricity and Magnetism Laboratory for the Sciences**	
Communication		3
	Semester Credit Hours	16
Spring		
MARE 206	Engineering Mechanics II 1,3	3
MARE 209	Mechanics of Materials 1	3
MARE 211	Steam Propulsion Plants 1,2	3
MARE 261	Engineering Analysis 1	3
American history		3
	Semester Credit Hours	15
Summer		
Select from one of the following: 1,2		4
MARE 300	Intermediate Operations	
MARE 350	Commercial Cruise Internship	
MARR 300	Intermediate Operations	
	Semester Credit Hours	4
Third Year		
Fall		

MARE 207	Electrical Power I 1,3	3
MARE 305	Fluid Mechanics Theory 1	4
MARE 313	Heat Transfer 1	3
NVSC 200	Naval Science for the Merchant Marine Officer 1	3
Creative arts		3
	Semester Credit Hours	16
Spring		
MARE 309	Marine Construction Materials 1	3
MARE 312	Diesel Propulsion Plants 1	3
MARE 306	Electrical Power II 1,2	3
MARE 401	Marine Auxiliary Systems 1,2	3
Language, philosophy and culture		3
	Semester Credit Hours	15
Summer		
MARE 400	Advanced Operations 1,2	4
or MARR 400	or Advanced Operations	
	Semester Credit Hours	4
Fourth Year		
Fall		
MARE 307	Marine Electronics 1	3
MARE 405	Fundamentals of Naval Architecture 1,2	3
MARR 451	Senior Capstone Project I 1	2
POLS 206	American National Government	3
Social and behavioral sciences		3
Free elective		1
	Semester Credit Hours	15
Spring		
MARE 402	Shipboard Automation and Control 1	3
MARE 441	Engineering Economics and Project Management	3
MARR 452	Senior Capstone Project II 1,4	2
MART 498	Maritime Medical Care 2	2
POLS 207	State and Local Government	3
Technical elective 1,5		3
	Semester Credit Hours	16
	Total Semester Credit Hours	137

1 Indicates required courses in the Marine Engineering Technology License Option major. These courses will be used to compute the major GPR.

2 Indicates license courses leading to a USCG/STCW license endorsement or sea time credit accrual which require a minimum grade of C (70%) or better to earn the endorsement or accrual. Cadets will be required to repeat the course until they earn a grade of C (70%) or better. Failure to meet this requirement will prevent the student from continuing any sequence in which the course is a prerequisite.

3MARR students are required to earn a grade of C or better in MATH 151, PHYS 206, PHYS 207, MARE 202, MARE 205, MARE 206, and MARE 207. Failure to meet this requirement will prevent the student from continuing any sequence in which the course is a prerequisite.

4 Designated writing intensive course.

5Technical electives may be any course with the following prefixes: MARE, MARR, MART, MASE, OCEN, CVEN, MATH, PHYS, MARS, or OCNG at the 300 or 400 level in consultation with the student's advisor.

All electives must be chosen in consultation with, and approved by, the student's academic advisor. Unless courses are specifically listed, see University Core Curriculum at http://core.tamu.edu/ for a listing of course options for Communication; Mathematics; Life and Physical Sciences; Language, Philosophy and Culture; Creative Arts; American History; Government and Political Sciences; and Social and Behavioral Sciences. ~~The 6-hour University Core Curriculum requirement for International and Cultural Diversity may be met with courses used to satisfy other degree requirements.~~**The 3-hour University Core Curriculum requirement for International and Cultural Diversity and the 3-hour University Core Curriculum requirement for Cultural Discourse** ~~Although they~~ may **be met with courses used to satisfy** ~~count for university credit, grades from an~~ other **degree requirements. Although they may count for university credit, grades from an other** institution **be** ~~be~~ low a C in engineering, mathematics **and** ~~and~~ physics will not **be** ~~be~~ accepted by **the** ~~the~~ TAMUG engineering programs toward **the** ~~the~~ degree.

The total hours may be increased if the student is required to take remedial math, remedial English, foreign language or International and Cultural Diversity courses, or any of the six hour cruise options. The six-hour cruise options (NAUT 200, NAUT 300, and NAUT 400 or MARR 200, MARR 300 and MARR 400) do not add any required hours to the degree plan.

This degree requires full participation in the Texas A&M University Maritime Academy Corps of Cadets as a qualified License Option cadet. Refer to the University catalog section for the Texas A&M Maritime Academy for additional information. In addition to the academic requirements outlined here, the cadet must also complete the following requirements to receive the degree:

Successfully complete required sea service and minimum training cruise requirements

Pass a comprehensive professional examination (either the Third Mate Unlimited- Oceans or Third Assistant Engineering Unlimited) administered by the U.S. Coast Guard (USCG).

Successfully complete all competencies required by the International Convention on Standards for Training, Certification and Watchkeeping (STCW).

Note: STCW competency certifications expire 5 years after completion. If the cadet does not complete the degree within that time period, the cadet will be required to revalidate the expired competency prior to graduation.

Additional information

Required Proposal Forms	~~LO_markup141_rev2a.pdf~~ ~~PresidentApprovalFacultySenateItems121117.pdf~~ **Physics Letter 9-19-2018.pdf** **DEGEVAL MARR-LIO 10-29-2018.pdf**
Reviewer Comments	**Angel Mario Carrizales (carri1214) (10/25/18 4:54 pm):** Rollback: Please address the following: 1) PHYS 208 and PHYS 218 are still listed in footnote 3. 2) Update the paragraphs referring to the International and Cultural Diversity (ICD) to include the new Cultural Discourse (CD) requirement. (3 hrs of ICD and 3 hrs of CD) 3) Add MART 300-499 to the Technical Electives entry in the degree evaluation (Rule ZF, Major Coursework). 4) Update the ICD requirement area of the degree evaluation to reflect the new ICD/CD requirements **Angel Mario Carrizales (carri1214) (11/06/18 6:02 pm):** Initial concerns addressed. **Terra Bissett (t.bissett) (12/10/18 10:46 am):** UCC approved December 2018.

Key: 514

Take POLS 206 and POLS 207.

Total Credits and GPA 0.000 .00

unofficial evaluation

Area General Electives (1.000 credits) - Not Met
:

Met	Condition	Rule	Subject	Attribute	Low	High	Required Credits	Required Courses	Term	Subject	Course	Title	Attribute	Credits	Grade	Source
No		A.	General Elective 1hr													

Select from any course 100-499 not used elsewhere.

Total Credits and GPA 0.000 .00

unofficial evaluation

Area : Work Not Applied - Met
Description See advisor for acceptable substitutions.
:

Met	Condition	Rule	Subject	Attribute	Low	High	Required Credits	Required Courses	Term	Subject	Course	Title	Attribute	Credits	Grade	Source
No		A.	Courses not applied													

Total Credits and GPA 0.000 .00

unofficial evaluation

Area University Writing Requirement - Not Met
:

Met	Condition	Rule	Subject	Attribute	Low	High	Required Credits	Required Courses	Term	Subject	Course	Title	Attribute	Credits	Grade	Source
No		A.	Writing Requirement													

Select two courses with the Writing Requirement [UWRT] attribute.

Total Credits and GPA 0.000 .00

unofficial evaluation

Area Int'l & Cult Diversity ~~- Not Met~~ & Cult Discourse (ICD/CD)
:

Met	Condition	Rule	Subject	Attribute	Low	High	Required Credits	Required Courses	Term	Subject	Course	Title	Attribute	Credits	Grade	Source
No		A.	Int'l & Cultural Diversity													

3 6 hours required. Select from courses with the International and Cultural Diversity attribute [UICD].

No AND B. Cultural Discourse

Total Credits and GPA 0.000 .00

3 hours required. Select from courses with the Cultural Discourse attribute [UCD].

unofficial evaluation

Area Foreign Language - Not Met
:

Met	Condition	Rule	Subject	Attribute	Low	High	Required Credits	Required Courses	Term	Subject	Course	Title	Attribute	Credits	Grade	Source
No		A.	Foreign Language Rqmt													

Complete one of the following:
1. Two years of the same foreign language in High School.
2. A two semester sequence of the same foreign language for University credit.

Total Credits and GPA 0.000 .00

unofficial evaluation

Area : **GPR-Major - Not Met**

Description : A minimum GPR of 2.000 must be maintained on all major field of study courses.

Met	Condition	Rule	Subject	Attribute	Low	High	Required Credits	Required Courses	Term	Subject	Course	Title	Attribute	Credits	Grade	Source
No		A.	Major GPR 86+hrs													
			Includes ENGR 111, 112; MARE 100-499; MARR 200, 300, 400; MART 103, 498; NVSC 200.													

Total Credits and GPA 0.000 .00

unofficial evaluation

Area : **Residence Requirement - Not Met**

Description : Student must complete minimum of 36 hours of 300-400 level course work at Texas A&M University, 12 hours must be in field of study.

Met	Condition	Rule	Subject	Attribute	Low	High	Required Credits	Required Courses	Term	Subject	Course	Title	Attribute	Credits	Grade	Source
No		A.	Residence - Major 12hrs													
No	AND	B.	Residence 24hrs													

Total Credits and GPA 0.000 .00

unofficial evaluation

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COLLEGE OF SCIENCE
DEPARTMENT OF PHYSICS & ASTRONOMY

TEXAS A&M UNIVERSITY

MEMORANDUM

Date: 19 September 2018

To: Departmental Advisors

From: Department of Physics & Astronomy

Subject: Changes in Calculus-based introductory Physics courses

1. PHYS218 will not be offered in Spring 2019 and beyond.. All students with this course in their degree plan, should instead enroll in PHYS 206 (3CR lecture+recitation) and one of these laboratory courses:

- Engineering students: ENGR/PHYS 216 (2 CR)
- All other students: PHYS 226 ("Physics of Motion Lab", 1 CR) – please register for PHYS 289 in Spring and Summer 2019.

2. PHYS208 will not be offered in Summer 2019 and beyond. All students with this course in their degree plan, should instead enroll in PHYS 207 (3CR lecture+recitation) and one of these laboratory courses:

- Engineering students: ENGR/PHYS 217 (2 CR)
- All other students: PHYS 227 ("Electricity & Magnetism Lab", 1 CR) – please register for PHYS 289 in Summer 2019.

3. We will clearly indicate which PHYS289 sections map to PHYS226 and 227 for the Summer 2019 term. Please remind your students to pay attention during registration…

4. Please remember to update your degree plans and catalog pages accordingly. We will begin the CARS process for PHYS226/227 early next week.

5. If you have any questions, please contact Heather Walker, hwalker@tamu.edu, x5-7717

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