

Program Change Request

New Program Proposal

Date Submitted: 10/08/18 2:58 pm

Viewing: : **Mechanical Engineering, BS/Applied and Engineering Physics, Accelerated MS**

Last edit: 10/08/18 2:58 pm

Changes proposed by: jbazaz

In Workflow

1. Registrar-Programs:Workflow Review
2. PHYS UG Committee
3. PHYS GR Committee
4. PHYS Chair
5. ME Representative-Graduate
6. ME Chair-Undergraduate
7. SC Curriculum Committee
8. SC Associate Dean
9. VS Undergraduate Studies Committee Chair
10. VS Associate Dean-Undergraduate
11. VS Associate Dean-Graduate
12. VS CAT Editor-Undergraduate
13. VS CAT Editor-Graduate
14. SC CAT Editor
15. Assoc Provost-Undergraduate
16. Assoc Provost-Graduate
17. Registrar:Create Code
18. Registrar-Programs

Are you completing this form on someone else's behalf?

Yes

Requestor:

Approval Path

1. 10/09/18 11:46 am
Tory Sarro (vsarro):
Approved for
Registrar-
Programs:Workflow
Review
2. 10/12/18 9:47 am
Philip Rubin
(prubin): Approved
for PHYS UG
Committee
3. 10/13/18 6:52 pm
Robert Weigel
(rweigel): Approved
for PHYS GR
Committee
4. 10/14/18 3:02 pm
Paul So (paso):
Approved for PHYS
Chair
5. 10/16/18 12:22 pm
Robert Handler
(rhandler):
Approved for ME
Representative-
Graduate
6. 10/16/18 12:25 pm
Colin Reagle
(creagle): Approved
for ME Chair-
Undergraduate

Name	Extension	Email
Chi Yang	4077	cyang@gmu.edu

Effective Catalog: 2019-2020
Program Level: Undergraduate & Graduate (BAMs)
Program Type: Bachelor's/Accelerated Master's
Title:

Mechanical Engineering, BS/Applied and Engineering Physics,
Accelerated MS

**Registrar's Office
Use Only –**

**Program Start
Term**

Concentration(s):

INTO Major(s):

College/School: College of Science

**Department /
Academic Unit:** Physics & Astronomy

**Jointly Owned
Program?** Yes

**Participating
Colleges**

	College
1	Volgenau School of Engineering
	Department
1	Mechanical Engineering

**Participating
Departments**

Justification

The Department of Mechanical Engineering has asked for an accelerated Mechanical Engineering, BS and Applied and Engineering Physics, Accelerated MS with emphasis in Engineering Physics. The admission requirements for students majoring in Mechanical Engineering, BS have to be added.

Catalog Published Information

**Accelerated
Description/Dual
Degree
Description:**

Mechanical Engineering, BS/Applied and Engineering Physics, Accelerated MS

Overview

This program allows academically strong undergraduates with a demonstrable commitment to research to obtain the [Mechanical Engineering, BS](#) and [Applied and Engineering Physics, MS](#) degrees by successfully completing 145 credits. Upon completion, students are well-prepared for entering into the professional workforce, or a PhD program in physics or a related engineering discipline.

Admitted students take selected graduate courses during their senior year and are able to use up to 6 graduate credits in partial satisfaction of requirements for the undergraduate degree. Upon completion and

conferral of the bachelor's degree and with satisfactory performance (grade of 'B' or better) in each of the graduate courses, students are given advanced standing in the master's program and complete an additional 24 credits to receive the master's degree.

For more detailed information, see [AP.6.7 Bachelor's/Accelerated Master's Degrees](#). For policies governing all graduate degrees, see [AP.6 Graduate Policies](#).

Application Requirements

Applicants to all graduate programs at George Mason University must meet the admission standards and application requirements for graduate study as specified in the [Graduate Admission Policies](#) section of this catalog.

Successful applicants majoring in Mechanical Engineering will have completed at least 90 credits toward their undergraduate degree with an overall GPA of at least 3.00, and the following courses with a GPA of 3.00 or better:

[CS 112](#) Introduction to Computer Programming ([Mason Core](#))

[ME 313](#) Material Science

[ME 323](#) Heat Transfer

[ME 351](#) Analytical Methods in Engineering

[ME 212](#) Solid Mechanics

[ME 231](#) Dynamics

[ME 322](#) Fluid Mechanics

One or more recommendation letters from one or more research supervisors are also required. Interested applicants majoring in [Mechanical Engineering, BS](#) should submit a letter to the undergraduate Mechanical Engineering coordinator and the Physics Graduate Coordinator, respectively, requesting admission along with the aforementioned recommendation letter(s). Contact the Mechanical Engineering undergraduate and the Physics graduate coordinator for further details.

Accelerated Option Requirements

At the beginning of the student's final undergraduate semester, students must submit a [bachelor's/accelerated master's transition form](#) to the [College of Science's Office of Academic and Student Affairs](#). Students must begin their master's program in the semester immediately following conferral of the bachelor's degree.

Students must maintain an overall GPA of 3.00 or higher in graduate coursework.

Reserve Graduate Credit

While still in undergraduate status, a maximum of 6 additional graduate credits may be taken as reserve graduate credit and applied to the master's program. Reserve graduate credits do not apply to the undergraduate degree.

**Additional
Attachments**

[PHYS BS ME BS PHAE MS ProgramApprovalForm COSCC.pdf](#)

**Reviewer
Comments**

**Additional
Comments**

J.B. Gettys processed the attached form as a new pathway to the MS-PHAE as opposed to modifying the BS-Physics pathway to the MS-PHAE.