## Program Change Request

New Program Proposal Date Submitted: 04/20/18 1:08 pm Viewing: : Mechanical Engineering, BS/Computational Science, Accelerated MS Last edit: 04/20/18 1:08 pm Changes proposed by: jbazaz	In Workflow 1. Registrar- Programs:Workflow Review 2. CDS Chair 3. ME Representative- Graduate 4. ME Chair-
Are you completing this form on someone else's behalf? Yes Requestor:	Undergraduate 5. SC Curriculum Committee 6. SC Associate Dean 7. VS Undergraduate Studies Committee Chair 8. VS Associate Dean- Undergraduate
	<ol> <li>9. VS Associate Dean- Graduate</li> <li>10. VS CAT Editor- Undergraduate</li> <li>11. VS CAT Editor- Graduate</li> <li>12. SC CAT Editor</li> <li>13. Assoc Provost- Undergraduate</li> <li>14. Assoc Provost- Graduate</li> <li>15. Registrar:Create Code</li> <li>16. Registrar-Programs</li> </ol>
	Approval Path 1. 04/23/18 9:25 am Rebekah Zacharias

(rzachari): Approved for Registrar-Programs:Workflow Review

- 04/23/18 3:05 pm Jason Kinser
   (jkinser): Approved for CDS Chair
- 3. 04/23/18 4:24 pm
  Robert Handler
  (rhandler):
  Approved for ME
  RepresentativeGraduate
- 4. 04/24/18 10:50 am
  Colin Reagle
  (creagle): Approved
  for ME ChairUndergraduate

Name	2	Extension	Email
Matthias Renz		5873	mrenz@gmu.edu
Effective Catalog:	2019-2020		
Program Level:	Undergraduate & Graduate (BAMs)		
Program Type:	Bachelor's/Accelerated Master's		
Title:	Mechanical Engineering, BS/Computational Science, Accelerated MS		
Registrar's Office Use Only – Program Start Term Concentration(s): College/School:	College of Science		
Department / Academic Unit: Jointly Owned Program?	Computational & Data Sciences Yes		
Participating Colleges			College
00110200	1	Volgenau School of Engineerin	g
Participating Departments			Department
Departments	1	Mechanical Engineering	

Justification

To meet the need for an accelerated MS dealing with simulation and modeling.

#### **Catalog Published Information**

Accelerated Description/Dual Degree Description:

# Mechanical Engineering, BS/Computational Science, Accelerated MS

#### **Overview**

This option enables enthusiastic, highly qualified, undergraduates to obtain the <u>Mechanical Engineering, BS</u> and the <u>Computational Science, MS</u> within the accelerated time frame of five years. The program requires 144 credits total, allowing students to undertake graduate coursework during their final year in the bachelor's degree. Upon completion of this 144 credit BS/MS combined program, students are exceptionally well prepared for undertaking doctoral studies or entering the professional workforce. For more detailed information, see <u>AP.6.7 Bachelor's/Accelerated Master's Degrees</u>. For policies governing all graduate degrees, see <u>AP.6 Graduate Policies</u>.

### **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 <u>Graduate Admission Policies</u> section of this catalog1. Application information for this Accelerated Master's program can be found on the <u>Department of Computational and Data Sciences</u> website. Applicants must have an overall undergraduate GPA of at least 3.00 and have completed at least 90 credits. Additionally, applicants will have completed the following courses with a GPA of 3.00 or better:

Course List

Code	Title	Credits
<u>CS 112</u>	Introduction to Computer Programming (Mason Core)	4
<u>ME 212</u>	Solid Mechanics	3
<u>ME 231</u>	Dynamics	3
<u>ME 313</u>	Material Science	3
<u>ME 322</u>	Fluid Mechanics	3
<u>ME 323</u>	Heat Transfer	3
<u>ME 351</u>	Analytical Methods in Engineering	3
Total Credit	S	22

Students must maintain an overall GPA of 3.00 or higher in graduate coursework and should consult with their faculty advisor to coordinate their academic goals within the modeling and simulation or data science emphases of the <u>Computational Science, MS</u>.

1GRE-general scores are waived for graduates of BS degrees from any program in the College of Science or the Volgenau School of Engineering at George Mason University.

### **Reserve Graduate Credit**

While in undergraduate status, a student may take a maximum of six graduate credits as reserve graduate credits and apply those credits to a master's program. Reserve graduate credits are not counted toward the 120 credits required in the undergraduate degree.

Additional Attachments	MechEngBSCompMSAccelerated.pdf
Reviewer Comments	

Additional Comments

Key: 719