

**ACCELERATED MASTER'S DEGREE (AMD)  
Program Proposal**

Chair: Tracy Christofero

GC#10: AMD

Prepare **one** paper copy with all signatures and forward to the Graduate Council Chair. Additionally, send **one** identical ELECTRONIC COPY with all supporting documentation as an e-mail attachment by to the Graduate Council Chair for electronic distribution to the Graduate Council Curriculum Committee.

**Guidelines for an AMD Proposal**

Accelerated Master's Degree Programs may be developed between an undergraduate and graduate program in a single department, between two programs in a single school/college or between programs in two different schools/colleges. AMD programs enrich the opportunities of the best undergraduates at Marshall University, enabling them to earn a Bachelor's and Master's degree in much less time than it would take following the traditional path. AMD students do not double count credits. They can take up to 12 graduate credits to be applied to the master's degree in place of 12 undergraduate elective credits. They will earn the undergraduate degree with up to 12 fewer credit hours, depending on how many graduate hours they take.

**Rationale:** The proposal should identify the rationale or need for an AMD, and, if the undergraduate and graduate programs are in different departments, clarify how they are appropriate for the AMD.

Rationale: The AMD-ME pathway will help the Engineering Division in: Retention of our qualified undergraduate students in our programs (instead of allowing them to leave Marshall University and join our competitors' programs, such as WVU's), Enrichment of our current Master's programs with talented and qualified students, who have strong academic background, and Boosting undergraduate student recruitment, as prospective students will see the chance to earn two degrees in approximately five years, and as a result, will join Marshall University.

**Admission Requirements:** The proposal should state whether admission requirements for the AMD differ from regular admission requirements (e.g. waive test scores).

Admission Requirements: AMD-ME Applicants must be undergraduate ME students and have completed a minimum of 80 credit hours including ENGR 318, ENGR 335, ME 310, ME 340 and ME 455. The Applicant must have a minimum over all grade point average of 3.30, and 3.3 in the major and no less the B grade in the following courses: ENGR 318, ENGR 335, ME 310, ME 340, and ME 455.

**AMD Credits:** The proposal may allow an undergraduate student to earn a maximum of 12 credits in approved graduate courses to be applied to the master's degree. These 12 credits take the place of 12 undergraduate electives. Please note the maximum allowed credits.

AMD Credits: 12 Credits

**Curriculum:** The proposal should show how a student can complete the Bachelor's degree by lowering the number of undergraduate credits (up to 12) with up to 12 graduate credits that will apply to the master's degree.

Curriculum: Students enrolled in ME-AMD program can substitute up to a maximum of 12 graduate credits toward their BSME up to a maximum of 12 graduate credits toward their BSME.  
1. Three Technical Elective courses can be substituted by 500 or 600 level ME, EE ,CE or ENGR courses approved by the graduate advisor  
2. ENGR 451-Project Management can be substituted by EM 660-Project Management  
3. ME 420-Control Systems can be substituted by ME 560- Automation and Control  
See the attached BSME suggested Curriculum Plan

**Student Eligibility:** AMD applicants must have a minimum over-all grade point average of 3.30 and 3.30 in the major. Programs may require a higher GPA. Please note your required GPA.

Student Eligibility: The Applicant must have a minimum over all grade point average of 3.30, and 3.3 in the major and no less the B grade in the following courses: ENGR 318, ENGR 335, ME 310, ME 340, and ME 455.

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Please insert in the text box below your summary information for the Graduate Council agenda. Please enter the information exactly in this way (including headings):

AMD Proposal

Department:

Allowable credits:

Student eligibility requirements:

Department: The Weisberg Division of Engineering

Allowable credits: 12 Credit Hours

Student eligibility requirements: The Applicant must have a minimum over all grade point average of 3.30, and 3.3 in the major and no less the B grade in the following courses: ENGR 318, ENGR 335, ME 310, ME 340, and ME 455.

### Approvals

Signatures



Undergraduate Advisor

2/11/2019

Date



Graduate Studies Director

2/11/2019

Date



Dean, Undergraduate College

02/21/2019

Date

Graduate Council Chair

Date

B.S.M.E. Four-Year Curriculum Plan  
(AMD\*\*\*)

Freshman Year

Fall Semester		Spring Semester	
ENGR 103 – Freshmen Engineering Seminar	1	ENGR 102 – Introduction to CAD	2
ENGR 104 – The Engineering Profession	1	ME 111 – ME Computations	3
MTH 229 CT – Calculus I	5	MTH 230 – Calculus II	4
CHM 211 – Principles of Chemistry	3	ENG 101 – English Composition I	3
FYS 100 – First Year Seminar	3	PHY 202 – Physics Lab	1
CMM 103 or 207 - Communication	3	PHY 211 – Principles of Physics I	4
Total	16	Total	17

Sophomore Year

Fall Semester		Spring Semester	
ENGR 213 – Statics	3	ENGR 214 – Dynamics	3
ENGR 215 – Engineering Materials	3	ENGR 216 – Meth. Of Def. Bodies	3
ENGR 245 – Intro to Circuits & Instrumentation	3	ENGR 217 – Co-Op	1
MTH 231 – Calculus III	4	ENGR 219 – Thermodynamics	3
PHY 204 – Physics Lab II	1	ENGR 240 – Manu. Process	3
PHY 213 – Principles of Physics II	4	MTH 335 – Differential Equations	3
Total	18	Total	16

Junior Year

Fall Semester		Spring Semester	
<i>ENGR 318 – Fluid Mechanics****</i>	<u>3</u>	ENG 201 – Advanced Composition II	3
Social Science (CT, M/I, W)	3	ENGR 222 – Engineering Cost Analysis & Economy	3
<i>ME 310 – Thermodynamics II****</i>	<u>3</u>	ME 325 – Design of Exper. & T.F. Lab	2
<i>ME 455 – Metallurgy****</i>	<u>3</u>	ME 350 – Heat Transfer	3
<i>ENGR 335 – Engineering Analysis ****</i>	<u>3</u>	ME 410 – Kinematics & Design of Machines	3
<i>ME 340 – Design of Mach. Elements****</i>	<u>3</u>	ME 360 – Fluid Dynamics	3
Total	18	Total	17

Senior Year

Fall Semester		Spring Semester	
ENGR 451 – Project Management*	3	ENGR 453 – Senior Capstone Design II	3
ENGR 452 – Senior Capstone Design I	2	ME Technical Elective I**	3
ME 420 – Control Systems*	3	ME Technical Elective II**	3
ME 425 – ME Lab II	1	ME Technical Elective III**	3
ME Design Elective	3	Humanities	3
Fine Arts	3		
Total	15	Total	15

\*ENGR 451-Project Management can be substituted by EM 660-Project Management

\*ME 420-Control Systems can be substituted by ME 560- Automation and Control

\*\* Any 500 or 600 level ME, EE or ENGR courses approved by the graduate advisor

\*\*\* Students enrolled in ME-AMD program can substituted up to a maximum of 12 graduate credits toward their BSME.